Automation, Capitalism, Universal Basic Income, and the Ethically Responsible State





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Submitted in fulfilment of the requirements for the degree of:

Doctor of Philosophy (PhD)

June 2024

Acknowledgments

This project began in late 2017, and although its inception came long before that, I began to formulate my political ideas that would not exist at that point without, building on political theorists, philosophers, economists, sociologists, and historians' ideas and works that enabled me to put forward my own political theory for the future. It is based on this premise that I am a product of my environment, nation, social class, and era, that this work takes shape. It is from my own upbringing, and social relations including those around me and who came before me, that I argue for the responsibility of states and their representative governments to ensure the protection, provision, and investment in their citizenry.

I acknowledge here that the context of capitalism in the twentieth and twenty-first century, the British state, devolution, The Great Recession, Brexit, Climate Change, and the most recent Covid-19 pandemic confirms to me in my belief that my community, town, city, country, continent, and planet ought to be left in a better place than from where I found it. Whether that can be the goal for all citizens, states, governments, and nations to pursue and obtain a sustainable utopia is more than just a research aim for this thesis but will constantly be my own life goal.

My intellectual journey from early days to getting through this PhD has been one that is marked by constant support, love, and encouragement from academic peers, my family, friends, and other networks of support who I will be forever grateful.

I would like to thank my supervisors Heiko Feldner and Fabio Vighi for their continued support, trust and faith in me to explore seemingly risky topics during this project. I have greatly benefited from their vast knowledge and research expertise, as well as their enthusiasm to assist in any way they could throughout the research project. I am grateful to have shared my PhD experience with you both.

I want to pay a special thanks to Dr Helen Brocklehurst to whom I will forever be indebted to as she enabled me to start my academic journey. Dr Claes Belfrage who inspired my very first dissertation on political economy. As well as my master's

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supervisor Professor Graeme Garrard who constantly inspired me to continually aim for an ever-higher research standard.

A very special thanks goes out to those that have pushed me to aim for higher standards and expectations in my personal life from my mother and father to my brothers, to Magdalena, to Geraint, Joe, Ryan, Daniel, and so many more. As well as all of those that have had any impact throughout my life, be it negative or positive.

It has been thanks to these networks of support, love, and encouragement, that often come from unexpected places, that this PhD thesis came to completion. I am forever grateful to everyone that has uplifted my work, proof-read, and commented on drafts. I am eternally grateful for my circle who have provided me with such support. You know who you are. It is my sincere hope to do them proud and to pay it forward.

Abstract

This thesis presents a political theory based on the normative moral argument as to how to logically make the most of humankind's scientific and technological advancements in the fields of automation, robotics, and autonomous systems to lay the groundwork towards a utopian state. This thesis contextualises the role of the evolutionary state and its acting government(s) to protect, provide, and invest in its citizenry in relation to the paradoxical crisis from technological automation on modern advanced capitalism. In doing so, this thesis analyses the paradoxical role of the labour theory of value (LTV) and technological automation on contemporary advanced and late-stage capitalism. From this impending crisis provides the necessary case for citizens to enter an agreeable, fluid, and legally expressed social contract with their state. An expressed social contract with an ethically responsible state would ensure citizens are recipients of a fair, fully fundable and sustainable basic citizens income that gives access to better lives brought about through a contract to guarantee receipt and a range of sustainable policies for government(s) to retain a basic income and amend the inequalities of modern capitalism. The role of the ethically responsible state would ensure protection, provision, and investment in return for dutiful contribution from citizens to achieve a sustainable retention of a basic income.

This work implements a framework that sets out why a basic citizens income is necessary before the adoption of a fully universal basic income can take place following policy adaptations to the capitalist model permitting a more financially equal society that harnesses technology to enable post-scarcity utopias within an ethically responsible state.

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Chapter 1: Introduction

Thesis Outline

Political theories are ultimately concerned with reshaping and remodelling the world itself. Change, therefore, lies at the very heart of politics. In *Theses on Feuerbach* (1845), Marx asserted "philosophers have only interpreted the world, in various ways; the point, however, is to change it" (Marx, 1845). It is from this axiom that I set out this research.

In doing so, this thesis takes a normative methodological approach that aims to question whether the internal issues of capitalism can be rectified and if not, whether capitalism should remain our default economic system. I cross-examine the hegemony of modern advanced capitalism to understand whether the intrinsic characteristics of capitalism have reached a point of contradiction. This point of contradiction relates to the role of automation (Artificial Intelligence (A.I) and robotics) and the coercive laws of competition on the labour theory of value (LTV) and invariably modern advanced capitalism. In doing so, I seek to question whether the fundamental economic behaviours of our advanced socio-economic system should be replaced from both economic and moral standpoints. This is contextualised against the backdrop of an ecological crisis, low growth, high debt, unemployment, stagnant wage growth, persistent crisis, and vast inequality across our economic system.

Predicated on the impact of future full automation in capitalist economies this thesis aims to investigate whether societies should retain capitalism or disconnect from the contradictory elements of the system before gradually moving towards a postcapitalist society. How this can be achieved is observed ultimately through the lens of the citizen-state nexus wherein it is understood the state has the hegemonic power to amend the society it represents and economic system it employs. The defining feature of the state is sovereignty, its absolute and unrestricted power. The state therefore commands supreme power in that it stands above all other associations and groups in society, its laws demand the compliance of all those who

live within the given territory of a state. The modern advanced state has deeply ingrained capitalist tendencies and citizens are stuck within the state-finance nexus.

It is based on this premise that I seek to understand through a normative methodological approach whether the state or an ethically responsible state must evolve to further protect, provide for, and invest in its citizenry with the long-term aim to attain a sustainable post-scarcity utopia. The government would have the duopoly of democratically acting for both the citizenry and the representative of the state - to protect, provide for, and invest in their citizenry to attain sustainability in the long-term future for the state's existence and its citizenry to attain the good life. To ensure the state's existence, it should offer citizens who agree membership of said state to consent to its authority through an expressed social contract. Alternatively, citizens will demand further protections from their state and guarantees through a similar format of an expressed social contract.

One of the main aims of this research is to investigate if this can guarantee the principle of a basic citizens income to ensure protection, provision, and investment from an ethically responsible state. There are long-standing debates around the normative merits and economic effects of a Universal Basic Income (UBI), wherein the existing literature does not sufficiently address or tie together the factors of twenty-first century capitalism with the necessary evolution of the British state, future technological advancements in automation, the welfare state, and the necessary policies to accompany any format of basic income to allow the state to sufficiently invest in, protect, and provide for its citizens.

The thesis aims to update and add to the literature of UBI by outlining the novel position identified through the evolution to an ethically responsible state. This reformed state takes the lead in organising a new social contract and, as a result, a far more democratic and legitimate polity than the one that currently exists in Great Britain.

The thesis considers the argument for UBI and its implications on work, the welfare state, and whether a universally applicable basic income can be provided to all members of the state to ensure a buffer between the transition from modern

advanced capitalism and full automation to a post-scarcity economy orchestrated by an ethically responsible state.

it is necessary to provide a sustainable economic plan to finance any format of basic income. From the axiom that an unaffordable UBI would be inadequate, and an adequate UBI would be unaffordable confirmed that a UBI is not feasible in its purest form.

Finally, this thesis sets out to develop a utopian state enabling citizens to live genuine authentic lives with decent living standards wherein primary goods are provided and physical and social wellbeing is at the heart of citizens lives and is actively promoted by their state. A basic citizens income is this works first step to move out of the epoch of capitalism and into a post-capitalist world.

Contextualising the Background of the study:

The future of work has been a matter of debate and concern in the media and academia in recent decades. From the Luddites in the textiles industry of Nottingham in the 19th century to robotics, automation and artificial intelligence (A.I) in the 21st century. The potential for A.I., robotics and autonomous systems (RAS), the internet of things (IoT), nanotechnology, and 3D printing developments bring opportunities for the world of work, the role of the state, citizens lives and societies.

Technological development is a key issue alongside climate change in policy debates of future risks (Frase, 2016; Streeck, 2016). Predictions have been made regarding the *Disruptive Potential of Technology* (Kurz, 2010) and industrial production, digitalisation, and the roboticization of labour. Studies have highlighted the risks of jobs automation and particularly in reference to the scenario of mass unemployment that automation, RAS, cloud robotics, and IoT can deliver (Gorz, 1985; Brynjolfsson & McAfee, 2014; Pratt, 2015; Ford, 2015; Frey & Osborne, 2017; McKinsey Global Institute, 2017). The changes in the technology of production have the potential to generate technological unemployment at an unprecedented scale (Rifkin, 1995).

A redesign of the welfare state has been viewed as an imperative (Greve, 2017). On the one hand, workers had to be continuously reskilled to survive in the digital

world, which urged countries to put lifelong learning at the centre of their education systems (Duggan, 2019; Penprase, 2018). They were supposed to develop 'robot-proof' capacities, resistant to the coming wave of automation (Aoun, 2017). On the other hand, the increase in non-standard jobs in advanced economies and the persistence of informality in developing ones was seen as an opportunity for innovation in social protection (Behrendt & Nguyen, 2018). The gig economy and the digitalisation of work adds a new layer to the existing deficit in protection coverage; automation is seen as a real threat for displaced workers who lose their income protection attached to their employment. It is in this context that universal basic income (Van Parijs, 1995; Lacey, 2017), guaranteed basic income (Gorz, 1989) or a tax on robots (Freeman, 2015; Stiglitz, 2017) have become more prominent in policy debates.

Ideas that seemed to be peripheral in previous decades, have found a policy window to gain traction, being conceptualised now as preventive solutions for the changing world of work. The future of work was at the centre of the respective agendas of international organisations in the 2010s (Grimshaw, 2020), expressed in flagship reports, commissions, policy strategies and high-level governmental meetings. Automation of workplaces is on the one hand expected to boost productivity and increase economic growth (Acemoglu & Restrepo, 2018; Autor & Salomons, 2018); on the other, it could liberate people from wage labour, or *Bullshit Jobs* (Graber, 2018) and make a post-work world achievable (Mason, 2015; Srnicek & Williams, 2015; Danaher, 2017).

The implications of automation can be framed in many instances, not as a problem, but desirable because "work is, for many people, a source of misery and frustration...the reality is that paid work monopolises our time" (Danaher, 2017, p75). Following this premise, Srnicek and Williams call for a post-work world where "people are no longer bound to their jobs, but free to create their own lives" (Srnicek & Williams, 2015, p63). The future of work is thus not a problem to solve, but a project to construct (Danaher, 2016; Susskind, 2020).

Whether or not we are on the precipice of a *Post-capitalist Society* or *Post-Scarcity World* (Drucker, 1993; Aguillar-Millan et al, 2010), a *Second Machine Age*

(Brynjolfsson & McAfee, 2014), *PostCapitalism* (Mason, 2015), *Four Futures: Visions of the World after Capitalism* (Frase, 2016), a *Fourth Industrial Revolution* (Schwab, 2016), a *Coming Great Transformation* (Stiglitz, 2017), a *Fully Automated Luxury Communism* (FALC) (Bastani, 2019), *Stakeholder Capitalism* (Shwaab & Vanham, 2021) or dystopian or utopian worlds. The combined mixture of global 'Megathreats' such as climate change (global warming), capitalist crises (wealth and income inequality, wage labour, stagflation, automation, debt, currency and economic crises) and technological innovations in workplaces (cloud robotics, machine learning, IoT, A.I, human-labour replacement), suggests that states and societies will drastically change in years to come (Roubini, 2022). What this change looks like depends entirely on the choices of state(s), government(s), and citizens.

Chapter Outline:

This introductory chapter introduces the contextual background of the study and outlines the thesis statement of this political theory. Chapter 1 defines the key concepts of this thesis and explains the methodological approach taken proposing a normative outlook that seeks to identify how things 'ought to be'.

Chapter 2 investigates modern advanced capitalism from a critical Marxist perspective seeking to understand whether the technological advances of A.I, robotics, and autonomous systems (RAS) are conceptually valid in the inherent characteristics of the labour theory of value (LTV), wage-labour, and capital accumulation. Does capitalism promote automation over human labour through the coercive laws of competition? If so, what are the implications for wage labour? If economic value comes from (the exploitation of) productive labour (labour employed for the production of commodities), and if automation is increasingly eliminating value-productive labour (not necessarily labour as such, as there's plenty of 'bullshit jobs' as David Graeber aptly puts it), then we have a number of problems: How sustainable is capitalist civilisation? What to do with workers without work and how to manage ultra-financialised, debt-soaked capitalism and its boom-and-bust bubble addiction? Thus, if capitalism cannot be saved from itself primarily from an economic standpoint there is a case for the removal of our economic system? While Marxism

does not lay out a blueprint of a communist society *per se* it presents an analysis that needs to be formulated. This leads to the formulation of the Ethically Responsible State.

Chapter 3 builds on the findings that advanced late capitalism must be replaced by an ethically responsible state and government(s). This chapter questions whether the role of the state should evolve to better protect, provide for, and invest in their citizenry. I do so by exploring whether a new economic model based around a circular economy that prioritises technology as progression to achieve a post-scarcity economy of sustainable abundance ought to be instilled. I make this case by contextualising the theoretical futures set out by the Royal Society for the encouragement of Arts (RSA) Four Futures of Work: Coping with uncertainty in an age of radical technologies with Peter Frase's Four Futures of Capitalism: A world after capitalism to highlight that unless capitalism is managed by an ethically responsible state, we are most likely to experience a dystopian variant of highly automated capitalism. How to structure this societal change will depend largely on the role of a modern agile government and the role of reasonable citizens and citizenship. Understanding whether the installation of an expressed social contract helps achieve an ethical responsible state leads to a guarantee for citizens expectations. In return citizens provide dutiful contribution in return for protection, provision, investment, and s stake in society to legitimise an ethically responsible state and instil a basic citizens income.

Chapter 4 questions whether a basic income can be installed by the state to alleviate the full automation question and meet the protection, provision, and investment principles of an ethically responsible state. This chapter seeks to identify the nuances between the equality and freedom debates of UBI that lay the foundations of the basic income proposed. In doing so, the chapter seeks to understand what the defining features of a universal basic income (UBI) are and identifies the five factors of UBI. The five factors formulate the format of a UBI and how it can be deployed based on the choices of universality, conditionality, means-tested, or through the alternative cash transfers like universal basic services (UBS). If a format of basic income were proposed by government(s) what would be the impacts on

work, the welfare state, and would anyone work if they received a basic income? Understanding the implications of any format of basic income I seek in this chapter would change the conceptual understanding of work amidst the contextual impact of automation. In doing so, I seek to propose upon membership of a social contract that participation income, contribution, and duty replace our traditional concept of wage labour and work. Finally, I highlight the usage of tax and policy amendments to contribute towards the financing of a basic citizens income.

The final chapter is a summary of the thesis, reflecting on the broader conclusions of the study as well as providing possibilities for future research from the findings.

Key Concepts of the Study

I want to introduce here the key concepts of this study and refer the reader to the glossary of terms used throughout this thesis that can be found in the appendix. Andrew Heywood states:

"Politics is, in part, a struggle over the legitimate meaning of terms and concepts...Concepts are the building blocks of knowledge. Concepts are sometimes abstract models or ideal-types, which only approximate to the reality they help to understand. They can either be descriptive, referring to 'what is', or normative, expressing views about 'what ought to be'. The meaning of political concepts is often contested; some of them may be 'essentially contested concepts', meaning that no neutral or settled definition can ever be developed" (Heywood, 2004, p14).

I turn here to define the key concepts this study explores.

1.1: Defining Capitalism

Dictionary.com describes capitalism as:

An economic system in which investment in and ownership of the means of production, distribution, and exchange of wealth is made and maintained chiefly by private individuals or corporations, especially as contrasted to cooperatively or stateowned means of wealth. Typically, capitalism is considered the combination of two components, the private ownership of capital and a free market where goods are bought and sold. It is an economic system characterised by private or corporate ownership of capital goods, by investments that are determined by private decisions, and by prices, production, and the distribution and consumption of goods that are determined mainly by competition in a free market.

The epoch of capitalism has experienced crises and frailties throughout its existence. Yet it has overcome barriers, crises, and problems proving to be a resilient system for the most part. However, capitalism is contributing to the planet's demise through climate change (Oviningtyas, 2021). The impact of capitalism on the climate has played a crucial role in the Anthropocene geological epoch. Global warming stands out as the biggest natural disaster facing the world with irreversible environmental consequences and is the most devastating expression of the destructive nature of the capitalist system towards the environment leading to rising sea levels, changes in ocean circulations, and acidity, the desolation of habitats, and regions, through the pollution of our air and water, soil degradation, deforestation, and the destruction of biodiversity. The cycles of capital accumulation collide directly with nature yet capital accumulation and the ever-present consumption of goods are central to capitalism. Global warming and climate change are manmade results of capitalism. It is partly through capital accumulation that, we as a species have reached a point in human history where all citizens on earth could have good access to healthcare, education, shelter, clothing, and opportunities. However, the reason we do not yet have this is because of entrenched 'advanced capitalism' described by Jürgen Habermas as:

1) The concentration of industrial activity held in a few large firms,

2) A constant reliance on the state to stabilise the economic system,

3) A formally democratic government that legitimises the activities of the state and dissipates opposition to the system,

4) The use of nominal wage increases to pacify the most restless segments of the work force (Habermas, 1988, p37 & 75).

These cases are prominent in capitalist societies and have been for some time, bringing obscene wealth inequality, degradation, exploitation, precarity, and poverty. Capitalism does not have a social conscience and is instead led by the actions of capitalists seeking profit accumulation above all else. However, because of technological and scientific advancements we are entering an era of highly advanced automation wherein machines can increasingly produce all necessary goods and services while also releasing humanity from the effort of producing them through a post-scarcity economy. Capitalism has been synonymous with rapid changes in technology driven by the coercive laws of competition and the imperative to accumulate profits which have resulted in the means of production being continually transformed. The problem for capitalism and governments by default as the dual actors for a capitalist economy and representatives of the citizens is that an impasse will be reached whereby the traits of capitalism will seek new avenues for profit that will come at the expense of human labour and invariably the state will have to respond. Societies too have experienced automation many times before is this time different? Will robotics and autonomous systems (RAS) bring new jobs, or will this fourth industrial revolution and second machine age be different? Chapter 2 approaches these issues through a critical Marxian analysis that questions whether the intrinsic laws of capitalism contradict themselves when the coercive laws of competition push for further automation removing the majority of human labour for the process of capital accumulation how this can be met against the backdrop of the labour theory of value that stipulates real value production can only be added by human capital.

1.2: Defining Artificial Intelligence: Robotics vs A.I.

The terms robot/robotics/artificial intelligence/autonomous systems are often clustered under the blanket term of automation. The origin of the word *robot* comes from the Czech and Slavic translation of *robota*, which translates as *Corvée*'serf labour' (unpaid or forced labour), and figuratively as 'drudgery' or 'hard work'. Karel Čapek's play *Rossumovi Univerzální Roboti* (*Rossum's Universal Robots*) gave the term robot international acclaim after it premiered in Prague in 1921. The usage of the word robot today will be much closer to its etymological genesis: *robotics*

referring to robotic process automation to "automate repetitive and often rulesbased processes" (Horton, 2015, p5). In this thesis, this will include, but is not limited to, robotic processed automation (RPA), computer coded software, algorithms, programs, machines, and electronic persons that replace humans performing repetitive tasks, regardless of such performance being carried out or not by physical machines. Following the same rationale, machines that perform simple tasks dependent of human initiative, such as dispensing drinks, heating food, or shredding paper, are excluded from the concept of robotics. The definition of 'robot' has significant impacts on how they will be treated, taxed, used, and regarded. Isaac Asimov's '*Runaround*' introduced the three fundamental laws of robotics that should be accepted wherever robots are used:

First Law: A robot may not injure a human being or, through inaction, allow a human being to come to harm.

Second Law: A robot must obey the orders given it by human beings except where such orders would conflict with the First Law.

Third Law: A robot must protect its own existence as long as such protection does not conflict with the First or Second Laws (Asimov, 1942).

Artificial Intelligence (AI) is harder to define because it refers to intelligence exhibited by machines such as robots. Can human intelligence and machine intelligence be the same? Could a machine exhibit consciousness the way a human can? Alan Turing in his 1950 work *Computing Machinery and Intelligence* suggested that rather than determining if a machine could think, the question should be whether a machine can convince a human that it can think. By doing so, the machine could pass the Turing Test, which consists in inducing a human who is not aware they are communicating with a machine into believing that they are communicating with another human. According to Turing, if a machine can behave as intelligently as a human being, then it is as intelligent as a human being (Turing, 1950). The intelligence of a robot, machine, or even an electronic person is irrelevant to this work because it is not to understand the scenarios where AI exist or not, but to address the consequences of its existence and impact on society.

Artificial General Intelligence (AGI) is the type of AI that matches or surpasses human capabilities across a wide range of cognitive tasks. AGI is also known as strong AI, full AI, human-level AI, or general intelligence action. Although strong AI is often reserved for computer programs that experience sentience or consciousness. This sentience, consciousness, or superintelligence gives credence to technological singularity which is the hypothetical future point in time whereby technological growth becomes uncontrollable and irreversible, resulting in unforeseeable consequences for human civilization, possibly resulting in human extinction.

In this thesis, a broad concept of artificial intelligence is adopted by using the four types of AI, from reactive robots to self-aware beings. Arend Hintze portrays four different types of AI that separates machine from mankind:

- Reactive Machines The most basic types of AI systems that are purely reactive and programmed to provide a predictable output based on the input it receives.
- Limited Memory AI Limited memory AI learns from the past and builds experiential knowledge by observing actions or data.
- 3) Theory of Mind AI Is the class of machine understanding that people, creatures, and objects in the world can have thoughts and emotions that affect their own behaviour. If AI systems are indeed ever to walk among us, they will have to be able to understand that each of us has thoughts and feelings and expectations for how we will be treated. And they'll have to adjust their behaviour accordingly.
- 4) Self-Aware AI The final step of AI development are systems that can form representations about themselves. Ultimately, machines that understand consciousness. This is an extension of the 'theory of mind' possessed by type III AI's. Consciousness is also called self-awareness for a reason. Conscious beings are aware of themselves, know about their internal states, and can predict feelings of others (Hintze, 2016).

AI should be understood not by a single notion but as perpetually developing and growing in development, intellect, understanding, consciousness and inevitably sentience.

Early robots were primarily stand-alone machines as their capacity to remember and solve problems was limited by the programming that they could carry with them. Updating and reprogramming these robots was costly and time consuming but now there are flexible internet-connected robots that offer different programming possibilities that include problem-solving, learning, and updating. Many of the base hardware technologies on which robots depend such as data storage and communications have been improving at an exponential rate. What will make the Fourth industrial Revolution different from previous industrial revolutions will be the two newly developing technologies of 'cloud robotics' and 'deep learning' which are set to lead an explosion in growth around the capabilities of robotics and advanced automation. Cloud robotics is a term coined by James Kuffner describing how every robot learns from experiences of all other robots and can lead to rapid growth of robot competence, particularly as the use of robots increase (Guizzo, 2011). Deep Learning algorithms are a method for robots to learn and generalise their associations based on very large and often cloud based training data sets that include millions of examples. It is the combination of Deep Learning and Cloud Robotics that will change much of the way we see the impact of RAS in a world of big data.

It is not unreasonable to assume that robots or general-purpose automation will have the ability in the future to perform any associative memory problem at human levels, even those with high dimensional inputs, with the use of Deep Learning algorithms. This kind of robotic advancement uses general learning techniques with very little domain-specific structure and has the capacity to learn at exponential speeds. The recent availability of large amounts of training data and computing resources on the cloud has made this possible because the algorithms and the learning processes used have become simpler as performance improves. The abstract mathematical theory of *computational complexity* explains why so many AI problems prove fearsomely hard to solve (Wooldridge, 2021, p5). Yet according to Gill Pratt "it seems more likely that Deep Learning will soon be able to replicate the performance of many of the perceptual parts of the brain" (Pratt, 2015, p54). There is reason to believe that artificial cognition may be put into effect through Deep

Learning techniques that are augmented with short-term memory systems and new methods of doing unsupervised learning. It is not illogical to suppose that the average robot of the future will surpass human intelligence.

Although there is no specified timing for when there will be a robotic revolution, the early signs are taking place with examples of autonomous vehicles (AVs) and automated warehouses & factories. Companies like Amazon, Apple, Google, and Uber have announced significant projects and research and development (R&D) in this area. According to Scott Anderson, an Amazon warehouse that is "fully end-to-end automated" is only "10 years away" (Statt, 2019). This highlights the current pace of automation, even in environments that are ready for robotic labour. Since writing this thesis *Amazon Go* opened its own supermarket chain in Seattle and London (Amazon Fresh) where customers sign up to Amazon's app upon entering for the first time and are automatically billed as they leave (BBC, 2021). The debate about when full automation will take place is contested but whether it is this half of the century or the next, this thesis seeks to understand whether this will lead us to a post-scarcity utopia or hierarchical capitalist dystopia?

There has been a prolonged hype about jobs disappearing resulting in mass unemployment and whether society needs to better support those that will be replaced by RAS, with a UBI? The most likely scenario in the short term is not the disappearance of jobs but instead that jobs will change. Jobs will not disappear entirely and nor should they for those of us that want one. Work gives us a reason to get up in the morning, gives us pride and often can make our lives better for ourselves and others in our communities or in nations on the other side of the planet.

The most recent wave of automation is poised to change the labour market dramatically as it comes to encompass every aspect of the economy through data collection (big data and radio-frequency identification), new variants of production (the flexible production of robots, additive manufacturing, automated fast-food), services (A.I. customer assistance, care for the elderly), decision-making (computational models, software agents), financial allocation (algorithmic trading) and distribution (in the logistics revolution through self-driving automobiles, drone

container ships and automated warehouses and shops). This wave of automation is predicated upon algorithmic enhancements particularly in machine learning (ML) and deep learning creating rapid developments in the field of robotics due to the exponential growth in computing power (the source of big data) that coalesces into a 'Second Machine Age' that transforms the range of tasks machines can fulfil.

Society will enter a new era that is unique, historically as new pattern-recognition technologies are rendering both routine and non-routine tasks subject to automation: complex communication technologies are making computers better than humans at certain skilled-knowledge tasks, and advances in robotics are rapidly making technology better at a wide variety of manual-labour tasks. While the last wave of automation led to a polarisation of the labour market, the future wave is set to create many jobs, however, not to the extent of the job losses they will replace. If robots, software, and machines substitute for human labour, are workers likely to face lower wages, job-losses and precarity? If so, logically the possibility of an emerging wave of robotics and autonomous systems potentially leads to significant reductions in demand for human labour if a cheaper robotic alternative is made available. In every aspect of the economy there will be automated functions from production to distribution, to management, to retail and consumption. Contemporary capitalism will see large-scale tendencies towards further automation for capital accumulation (economic growth) and driven by the coercive laws of competition forcing businesses to automate to compete, often at the expense of the worker.

The technological advancements of automation and robotics ought to be used to better the lives of citizens rather than diminish or take away from human life. I endorse the advancement of technology and further automation where it enhances human life. Where we must be wary of technology is not through its advancement or growth but where it limits or impacts human life negatively. A.I. is created by humans and thus has the inherent biases and challenges we have as people. Automation should not have a retrograde flow, but harness and better lives of citizens in the long-term. Automation used to mean the replacement of physical labour by machines; now it incorporates the replacement of mental labour by software. Unless whole new industries develop, based on whole new sources of

economic demand, the purchasing power of the majority will fall and ultimately there is only so much money you can print through quantitative easing (QE), and only so many asset bubbles you can stimulate and debt you can accumulate before it comes to a full stop. Therefore, the question for the state domestically, is how does the state provide for the citizenry if there is wide-ranging displacement of human labour for technologically automated replacements? If robotics and autonomous systems (RAS) results in technological unemployment leading to economies with fewer paid jobs, will there be a rationale for some format of basic income?

1.3: Defining Basic Income

The definition of UBI has been developed over the past couple of decades mainly on the contemporary normative debate of Philippe Van Parijs's influential works centred on the philosophical ideals of equality and justice. Van Parijs defined a UBI as simply a cash transfer, funded by taxes and policy amendments that "would be paid to all citizens regardless of need, and regardless of whether they are working, or even willing to work" (Van Parijs, 1995, p9). Van Parijs has produced a rich literature on the topic of UBI and his definition of the term has been developed and I believe put simply in the format of the definition used in this work by the 2016 European Science Survey definition:

"An income (1) paid by government to everyone on a monthly basis to cover living costs, (2) financed by taxes, (3) replacing many other social benefits to (4) guarantee a minimum standard of living, (5) with no variation depending on whether recipients are working and (6) allowing people to keep money earned from work or other sources" (ESS8, 2016).

The data collected was the first large-N academic survey to directly pose a question on UBI attempting to eschew any philosophical discussions of (de)merits of UBI (ESS8, 2016) Academic discussion has ranged on the subject and has moved beyond the behavioural, social, and economic consequences to instead consider factors for supporting formats of basic income. There is a long-standing debate in policymaking, public debate and academia around the normative merits and economic effects of a UBI. However, the existing literature does not sufficiently address, or tie together,

the factors of twenty-first century capitalism with the evolutionary role of the state, citizen expectations, future technological advancements in automation, the welfare state, nor the necessary policies to implement a basic income on a national basis.

Whether a basic income can alleviate the problem of technological unemployment by ensuring everyone benefits from society's wealth and technological advancement will be investigated in this thesis. If this is feasible a basic income becomes the potential transitionary steppingstone towards a resource-based post-scarcity economy. What this thesis builds upon is the assertion "that an unaffordable UBI would be inadequate, and an adequate UBI would be unaffordable" (Martinelli, 2017, p43). Working from this premise I question in chapter 4 whether the pure form of Universal Basic Income (UBI) is economically flawed and from the point of advanced modern capitalism, can UBI fulfil the egalitarian principle in relation to fairness, tackling inequality, or alleviating the innate problems of exploitative capitalism? This raises the implementation question of who and how a basic income will be created, financed, and distributed which leads us to the role of the state. In chapter 3, I seek to understand whether the evolutionary role of the state must progressively change in order to better protect, provide, and invest in the citizenry? And whether the state's evolution is brought about by the state or citizen?

1.4: Defining the Ethically Responsible State

An ethically responsible state is based on the ethics of responsibility. The concept is taken from Hans Jonas's *The Imperative of Responsibility – In Search of an Ethics for the Technological Age* (1984) which argues that the golden promises of modern technology have turned into a threat, and that technology is inseparably linked with the threat. According to Jonas, the characteristics of the modern technological civilisation have changed the nature of our moral obligations. The concept of responsibility is given a new dimension by Jonas since he gives the concept of responsibility a new dimension to traditional ethical theory because it is inadequate when considering future generations. Jonas does this by expressing a reformulation of Immanuel Kant's categorical imperative and to act so that the effects of your action are compatible with the permanence of genuine human life. We must,

therefore, ensure that the effects of our actions do not destroy future genuine human life. To ensure genuine human life means to protect future humanity's autonomy, dignity, integrity, and vulnerability, which in turn, requires the preservation of nature so that future generations can have the best possible living conditions. Man cannot be fully human without nature; the destruction of nature is a threat to man's own 'essence'. It is from this axiom that the ecological crisis faced globally by all states requires international and national change from the way the vast majority of states and specifically the UK conducts its affairs through the current economic system.

An Ethically Responsible State in this work is a state (represented by the elected government of the day and the citizens of said state) that provides long-term, future-orientated, and sustainable - *Protection, Provision*, and *Investment* to its citizenry. The government of an ethically responsible state has the duopoly of acting both for the citizen and representative of the state to protect the state and invest in it to attain sustainability in the long-term for the state's survival and the citizenry to pursue happiness and genuine human life. In this work, I argue from a normative ethical outlook on what the role of the state should be and the duties it should have in relation to its citizens as well as the role of the citizen considering these duties and responsibilities. Applying a shifting baseline of gradual change in the accepted norms of what is 'normal' or 'natural' to change over time due to experiences of subsequent generations I investigate whether the state should provide the necessities for its citizens out of a duty of responsibility to its citizenry in the form of progressive *Protection, Provision*, and *Investment*.

Progressive provision, protection, and investment could come from the state and must be based on the idea of progress whereby advancements in science, technology, economic development, and social organisation are understood as vital to the improvement of the human condition. Progressivism in the 21st century can be viewed through social or political movements aiming to represent the interests of ordinary people through political change and the support of progressive government actions. The actions are brought through government as the representative of the state. Citizens too, are accountable for the sustainability of a progressive state in that when an ethically responsible state is created, citizens must seek to retain it by investing their contributory efforts to protect their state. The reciprocity completed in this action is a justifiable trade-off in which citizens contribute dutifully to the state to ensure its survival through protection and provision from the citizen, otherwise there is no sovereign authority in the state. The state in turn must not only protect its citizenry but provide for and invest in the citizenry. The reciprocal trade-off is necessary as citizen needs state as state needs citizen. One without the other is powerless when realised. An ethically responsible state could, therefore, seek to establish a citizen-state nexus with its citizenry offering them at minimum their basic needs and forms of protection, provision, and investment. I investigate whether citizens seeking to establish such relations would accept standards, laws, and contributions dutifully in response to what the state delivers in sync with citizen's needs. Binding the citizen to the state and the state to the citizen could reconfigure the evolutionary role of the state-citizen nexus. This thesis builds on Jonas's idea to propose how an ethically responsible state can be achieved for the citizen and the state (commonly represented by government) by seeking to understand whether this can be adopted through an expressed social contract.

1.5: Defining the Social Contract

Social contracts are deeply political and reflect a country's history, values, culture, and circumstances. As will be highlighted in Chapter 3, the social contract has evolved as the product of survival, religious traditions and cultural norms governing the obligations of kingship and the roles of the sexes and more recently through the industrial relations and negotiations between employers and workers. Today, the evolution of the social contract depends on the structure of political systems, the effective mechanisms that hold such structures to account and the emergence and the opportunities created by crises.

The usage of a social contract in this work focuses on citizenship, dutiful contribution, and acts as an insurance policy against modern advanced capitalism in the short-term and in the long-term to enable more prosperous citizens by investing in education and skills, providing better infrastructure to deprived areas and by

promoting the pursuit of happiness, innovation, contribution, and productivity, all of which to promote redistribution, fairness, and equality. While part of the social contract will be achieved through public spending and part through regulation, however understanding what is expected of the state, our government(s) and from citizens, is analysed in this work.

The role of the state is the central institution for the maintenance of social order in large and often complex societies. There are two broad views of the origin of the state and effective states. The first is associated with Thomas Hobbes (1651) and regards the *sine qua non* (without something, something else would not be possible) of the state effectiveness to be the projection of coercive power. This sees the problem of state effectiveness as building organisation structures which allow the state to extend its reach and coerce citizens into complying with its diktats. John Locke (1690) and Jean-Jacques Rousseau (1762) argue that civil and political rights constitute a form of exchange where a citizen accepts obligations in return for benevolent government. The institutional definition of the state fails to take account of the fact that, in their capacity as citizens, individuals are also part of the political community, and largest members of the state numerically. Under this axiom we can take the utilitarian approach that the state, (and acting government) must act to get the widest ranging social contract for the largest number of citizens. If government(s) fails to deliver their social contracts, then citizens can legitimately withdraw their cooperation and/or actively seek change in leadership. Both Locke and Rousseau drew different conclusions from their approaches as Rousseau believed in direct government by the people, whereas Locke believed in limited, representative government. They both recognised that coercion was essential but did not give it primacy of place the way Hobbes did.

The social contract theories of Hobbes, Locke, and Rousseau all stressed that the justification of the state depends on showing that everyone would, in some way, consent to it. By relying on consent, social contract theory seemed to suppose a voluntarist conception of political justice and obligation: what counts as *justice* of *obligation* depends on what people agree to, whatever that might be. Only Immanuel Kant (1797) believed that consent is not fundamental to a social contract

view, yet we have a duty to agree to act according to the idea of the 'original contract'. Rawls's revival of social contract theory in *A Theory of Justice* did not base obligations on consent, but though the apparatus of an 'original agreement' to help solve the problem of justification (Rawls, 1971). As the question of public justification takes centre stage, it becomes clear that posing the problem of justification in terms of a deliberative or a bargaining problem is a heuristic: the issue is justification and what principles can be justified to all reasonable citizens or persons. This work seeks to understand whether an expressed contract gives a central role to reciprocal obligation in establishing an effective ethically responsible state? The state's authority is the result of an act of collective authorisation by those subject to its coercive powers. Thus, the state, government(s), and citizens become interlocked, and the state is bound to play a dual role: it is authorised to coerce citizens, but it also must perform its task of protecting, providing and investing in them.

In chapter 3, I seek to answer the question whether an explicit social contract offered by an ethically responsible state could provide the necessary essential requirements for wellbeing? The essential requirements for wellbeing are identified by Narasimha Rao and Jihoon Min in *Decent Living Standards: Material Prerequisites for Human Wellbeing* (2020). These include the advancements of basic needs and central capabilities of physical and social wellbeing. The essential requirements for physical and social wellbeing are part of the decent living standards (DLS) which Rao and Min propose:

"As a 'lowest common denominator' of basic material requirements that are instrumental (but not sufficient) to achieve physical, and to an extent social dimensions of human wellbeing, whether conceived as basic needs or basic capabilities, and independent of peoples' values or relative stature in society" (Rao & Min, 2018).

The essential requirements below build on those presented by Rao and Min and apply to Household, Community, National, and Natural Resource requirements for DLS:

Household:

Physical Wellbeing: Good quality nutrition (total calories, protein, and micronutrients) with access to cold storage (refrigerator), clothing (sufficient to environment, and washing machine), shelter with modern heating/cooling equipment depending on climate (sufficient floor space, and access to outside space, meeting high standards of hygiene), basic amenities (electricity, water, and sanitation) and access to leisure.

Social Wellbeing: Access to phone, computer, or television gaining access to highquality and accurate information, access to good internet connection, access to public transport or vehicle (electric or alternative sustainable solution in the longterm), freedom to gather and protest.

• Community:

Physical Wellbeing: Hospitals and health clinics, access to physicians, gyms, clean air, green spaces.

Social Wellbeing: Good schools, teachers, public transportation, libraries, parks, and green spaces.

National:

Physical Wellbeing: Utilities networks, roads, public spaces, health care expenditure.

Social Wellbeing: Education expenditure, accurate information, infrastructure, and access to national parks, green spaces, and institutional transparency.

Natural Resources:

Physical Wellbeing: Energy (gas and electric), water, phosphorus, clean air, and access to national environmental sites and public spaces (beaches, national parks, and historical sites).

Social Wellbeing: National libraries, historical information, transparency from public institutions, animal welfare and environmental preservation.

These material commodities and conditions that households, communities, citizens, and societies require, at a minimum, could raise the standards of a nation supporting a decent standard of life for all. Rao and Min rightly go beyond the existing indicators, both in scope and specificity as they argue hunger cannot just be adequate calories but instead adequate vitamins and minerals. Rao and Min state that shelter should consist of adequate space with modern heating/cooling equipment, as well as "lighting, water and toilets, access to the Internet, and to public transportation" (Rao & Min, 2018). What is proposed by Rao and Min is not conceptually new; they have, however, pushed the standards of specificity to generate a dashboard for material poverty that is universal. The DLS would provide guides to citizen(s), state(s), and government(s) on resource requirements to meet the essential wellbeing criteria.

I seek to understand if citizens were offered an explicit social contract that provided them with essential requirements for wellbeing, a guaranteed basic income affordable to the state, and a stake in their nation's prosperity in return for dutiful contribution within a sustainable ethically responsible state, would the majority of citizens choose to sign such a contract? If so, the essential criteria can be met leading the citizen-state nexus to a truly egalitarian society offering a generous, flexible, and inclusive social contract that recognises our interdependencies, provides protections to all, shares risks and rewards collectively in reciprocation that everyone in society contribute, for as long as, or as often as they can, to ensure long, healthy, happy, and prosperous lives? A democratically led social contract would not simply be an expansion of the welfare state but instead about investing in citizens with the goal of building a system of risk sharing that increases overall well-being both for the citizenry and the state. The end result would be an ideal utopian state for the vast majority of citizens.

1.6: Defining Utopia

The central theme of utopian thinking is to develop a critique of the existing order by constructing a model of an ideal or perfect alternative to the status quo. There is no agreed definition about what utopia would look like as each model of the perfect

society reflects the values and assumptions of a particular thinker and a particular political tradition or culture. Utopian proposals are often believed to imply naïveté, and many dismiss their ideas as fanciful and unrealistic.

The "word 'utopia' is derived from two sources, the Greek *ou topos*, meaning 'no place', and the Greek *eu topos*, meaning 'good place'. In everyday language, a utopia is an ideal or perfect society" (Heywood, 2004, p364). the term 'utopian' often refers pejoratively to beliefs that utopia is impossible or unrealistic because it is linked to supposed unachievably high goals. Utopias, therefore, are imagined worlds. Imagined worlds have a long history in literature, religion, folklore, and philosophy giving the image of a "Golden Age or Paradise" (Heywood, 2004, p364). Plato's Republic is often understood chronologically as the first political utopia. Thomas Paine's *The Rights of Man*, Robert Owen's *A New View of Society*, Jean-Jacques Rousseau's *The Social Contract*, and Karl Marx's *Communist Manifesto* can all be considered works seeking utopia.

This work as stated above unapologetically seeks a modern-day utopia that provides the citizenry within a given state a sustainable post-scarcity economy wherein citizens have the highest access available to basic material requirements, primary goods, decent living standards with the necessary minimums of physical and social wellbeing. The minimum requirements for an early utopian state.

1.7.1: Research Methodology:

The contextualisation presented above indicates the object of this study and the research aims reflect the logical theoretical approach to address these phenomena. This research design thus takes a normative approach to capitalism, automation, and basic income within the UK today. The normative approach allows me to apply a mixed methods approach identifying how things ought to be. The reason I decided upon the normative approach rather than positivist or descriptive approaches is because the normative approach best defines how things ought to be and seeks qualitative analysis from the relevant literature to understand the facts about how things are, but above all, models and exemplars for society, encompassing the duties and role of the state, government, and citizens. This normative project aims

to improve the object of study, which for my research is capitalism and basic income, by creating an improved version for state and citizenry. A normative approach also provides support for a necessary basic income and offers policy formulations to further understand how it can be brought about through political feasibility.

In contrast the positive approach focuses on studying society, relying specifically on scientific evidence, such as experiments and statistics, to reveal a true nature of how society operates. The problem with the positivist approach is the scientific understanding of politics is untenable with the work I am setting out. A moral approach or understanding cannot be truly tested against capitalism or basic income from a positivist perspective and is the reason why I have chosen not to use this approach within this specific body of research. I have also rejected the use of the descriptive approach in comparison to the normative approach because descriptive studies are used to describe various aspects of the phenomenon. In their popular format, descriptive research is used to describe characteristics and/or behaviour of sample population. An important characteristic of descriptive research relates to the fact that while descriptive research can employ several variables, only one variable is required to conduct a describing, explaining, and validating research findings.

Normative research differs from descriptive studies because the target is not only to gather facts but also to point out in which respects the object of study can be improved. The object of study in my research is applying a basic income in the UK and the normative approach is the research method that allows me to carry out recommendations, rules, and standards, to improve the object of study. The normative approach permits me to offer practical operations of development, as my research does intend to offer up a policy design for basic income to be implemented here in the UK. The normative approach does not restrict me from designing a policy alternative and is another reason why I consider this to be the best approach to my research design.

Utilising the normative approach, I argue how things should be by building on the premise of an ethics of responsibility for government(s) that leads to the

implementation of a basic income via this principle. An ethics of responsibility in relation to technological advancement was used by Hans Jonas who argues from the premise that ethics is concerned with action:

"Technology significantly increases our scope of agency or power to impact the world through our actions. Therefore, technology requires developing an expanded conception of responsibility. Prior to modern technology, it made sense for ethics to focus on local, immediate, and interpersonal interactions. However, technological advances, particularly since the industrial revolution, have empowered those with access to modern technologies to significantly affect people on the other side of the planet, future generations, and non-human nature; and biotechnologies raise the prospect of our modifying our own genetic natures. We must take responsibility for these new powers, and develop ethics appropriate for them — global ethics, environmental ethics, future generation ethics, bioethics, as well as an ethic of technology more generally" (Jonas, 2014, p32).

Jonas's ethics of responsibility comes from the increasing technological changes societies are witnessing across the globe, and I agree with Jonas on this, but my argument for an ethics of responsibility is directed specifically towards the state and government(s) acting on its behalf. It is their dual duty to act and conduct themselves in the interest of the people they represent. Through this normative outlook I deduce that the state and government's primary focus is the safety of its citizens who are the sole reason the nation exists, and it is citizens that legitimise state sovereignty. Whilst warfare still exists in varying forms, I argue that the protection of citizens is still paramount, and this protection must evolve to include economic protection in advanced capitalist societies.

Protection for government(s) should primarily focus on financial protection as financial threats become more prominent in advanced late capitalism creating further rising wealth inequality, stagnation, job losses, inflation, precarity, and crises. The protection of citizens is what I define as an ethics of responsibility, but this protection must include financial security for citizens. The ethics of responsibility is, therefore, the government(s) (and invariably politicians) primary motive to provide economic safety for its citizens and would force governments to act in the interest of

the citizen, which would include the introduction of a basic income providing all resident citizens basic financial security. By creating an ethics of responsibility, government(s) will then be best placed to provide a basic financial security to all citizens, which I will investigate further in Chapter 4, enables true freedom, and meets Guy Standing's basic security test. Were government(s) to adopt an ethics of responsibility to deal with advanced capitalism and the technological changes it could ensure basic financial security for its citizens by deploying a basic income. The state and government thereby ensuring the likelihood of meeting its responsibilities of protection, provision, and investment in its citizenry that meet DLS for physical and social wellbeing.

1.7.2: Research Ethics:

This study complies with the ethical guidelines provided by Cardiff University, as well as those proposed by the UK's Social Policy Association. The latter states there are four issues that should be addressed to guarantee this study's ethical responsibility:

A). Obligation to society: this study aims to be a contribution to the understanding of the state's role to its citizenry in relation to the impact automation has on the capitalist economic system and the related issues that may be faced by societies in the future. It is the purpose then to reflect on the state apparatus and policy instruments that can be implemented to prevent diverse societal and social issues and the adequacy of institutions to face them.

B). Obligation to research participants: the research methodology deployed in this study does not use research participants. This does not limit the research findings although the findings from this research could result in new studies utilising research participation in relation to universal basic services, basic income trials as well as social contract creation and satisfaction trials for example.

C). Obligations to research sponsors: my doctoral study has not been funded by any external sources. I have fully funded my own studies myself and in doing so I am free to publish this study's findings without any external constraint related to any form of sponsorship.

D). Obligations to the subject and to colleagues: I have a duty and responsibility to attain the necessary highest standards to the fields of political theory, political economy, economics, and public policy. In doing so, I have used publicly accessible sources with all ideas presented in the analysis rightly attributed to those authors and organisations referenced throughout this thesis.

1.8: Chapter Summary:

This chapter has briefly introduced and defined the topics of capitalism, basic income, the ethically responsible state, utopia, and the social contract. Contextualised within the parameters of advanced modern capitalism in conjunction with the future of work amid rising automation in the forms of artificial intelligence, robotics, and autonomous systems that pose a significant threat to workers, yet has the potential to provide the foundations of a post-scarcity economy via full automation.

This chapter has set the backdrop of future technologies alluding to the fact that only the state and government(s) has the ability to regulate and manage the future direction of society. As well as introducing how a normative approach to basic income and an ethically responsible state (represented by a democratically elected government to act on behalf of the state and citizenry) ought to act to safeguard citizens amid the context of modern advanced twenty-first century capitalism.

Chapter 2: Contradictions of the Capitalist Status Quo

2.1: Introduction:

In this chapter, I show how the dominance of capitalism cannot be understood one dimensionally but rather through the analysis of an amalgamation of events and effects that characterise the modern era of capitalism as the status quo. The aim is to explore the ideological traits of capitalism, including the primitive accumulation of capital, the coercive laws of competition, private ownership, the implications on wage labour, wealth inequality, alienation, the era of financialised capitalism, and the paradox of advanced late capitalism brought about by technological automation.

I take a critical Marxian approach to capitalism analysing the system we have inherited and identify with ideologically and culturally. I discuss how capitalism is retained throughout its recurring crises by focusing on its internal contradictions. Understanding the inherent contradictions of capitalism will highlight the findings as to why technological automation through robotic and autonomous systems (RAS) exposes the paradox of capital via the labour theory of value (LTV). The LTV questions the flaw within automation replacing human labour, whereby surplus-value is being eliminated. In doing so, if nation-states and government(s) rely more and more on fictitious capital, and thus, on credit created by central banks (which is insubstantial in capitalist terms), what role can capitalism play? I will also express how capitalism has evolved over time, becoming ever more engrained, problematic, unsustainable, and fatal to our species' existence by highlighting the contradictions within our current socio-political and economic model requires a structural overhaul. The structural overhaul will be examined throughout this thesis but the reasoning for structural overhaul will be based on the findings from this chapter on modern advanced capitalism.

I use the term capitalism in the understanding that it is an economic system based on the private ownership of the means of production and the production of goods and services for profit; the market-based allocation of resources; and the accumulation of capital. The term capitalism can be recognised variously as economic liberalism, free-market economics, state capitalism, monopoly capitalism,

laissez-faire capitalism, or neoliberalism. The problem with liberalism, therefore, lies in its foundational economic level which maintains the inequalities and injustices from the structural foundations of free markets and private property.

Capitalism has come about through a constellation of events, evolving ways of life, technological developments, ideas, and the ideological characteristics highlighted above. Capitalism at the beginning was not the evolved system it is today but was "rather some scattered way of doing things differently that proved so successful that they acquired legs" (Appleby, 2010, p7). The development and evolution of capitalism has taken place over centuries, and has appeared intermittently throughout the history of commerce and trade to modern day late capitalism. Capital has existed on a small scale for centuries, perhaps even thousands of years, in the form of merchant bartering, renting, and lending activities. There is evidence "that shareholder companies date back to ancient Rome", the "first stock market goes to Amsterdam, where an active secondary market in company shares emerged" (Stringham, 2015, p328). Capitalism historically shows how and why we have inherited the system we have today, and for much of the history covered, it has been progressive in terms of humanity's scientific and technological advancement. However, it is based on an imperialistic, exploitative, and monopolising nature that can be applied by a start-up business, individual, or imperialist nation-state.

Economists, politicians, sociologists, and historians have discussed other aspects in their analyses of capitalism over time to include dirigiste, regulatory market capitalism, welfare capitalism, and even ethnicity based Nordic models or Anglo-Saxon capitalism. All mentioned are variants or branches of the capitalist tree sharing the innate connection to capitalism in that the market and the accumulation of capital dictates all. In a capitalist market economy, the decision making, and investments are determined by owners of wealth, property or production who direct financial markets, whereas prices and distribution of goods and services are primarily determined by competition in markets. Market economies exist under many forms of government and in many different places, times, and cultures; they have varying degrees of free market and public ownership. Obstacles to free competition and state-sanctioned social policies over time have led to regulation and interventions

from state(s) government(s). The model of the free market remains the same to the extent that markets are free, and the rules defining private property are matters of policy and politics. Most of the existing capitalist economies are mixed economies that combine elements of free markets with state intervention and in some cases economic planning. Modern capitalist societies are marked by the universalisation of money-based social relations, a large worker base that must sell their labour for wages, and a capitalist class that own the means of production. Over time, capitalism has spread across nations and the globe, with most nation-state's experiencing economic growth and an increase in the standard of living.

Capitalism over time places power in the hands of a minority ruling capitalist class that exists through the exploitation of the majority working class and their labour, prioritises profit above all else, views the environment and natural resources as something to make a profit from, rather than something for the social good of humanity or the fellow species that also share this planet. Capitalism is the engine of inequality, corruption, and economic instability, which results in large numbers of people being unable to access its purported benefits and freedoms. Proponents of capitalism argue it provides better products and innovation through competition, disperses wealth to those who can invest in useful enterprises based on market demands, allowing for a flexible incentive system where efficiency and sustainability are priorities to protect capital, and creates strong economic growth that yields productivity and prosperity that overall benefits society. It is this capitalist rhetoric that promotes the ideology of an economic model that has overcome barriers and has evolved fluidly over time to remain the default systemic model.

2.2: Capitalism as Ideology

An ideology is a conceptual framework for the way people deal with reality, and if one does not subject that ideology to empirical evidence, the ideology becomes dogmatic. The ideology of capitalism is no different, relying on individual choices and initiatives to constantly impose on societies. Ideologically, capitalism exists to confirm a certain political viewpoint, serve the interests of the ruling class, and perform a functional role in relation to social, economic, political, and legal

institutions. I use ideology in a constructive sense to refer to a set of *a priori* plausible ideas and discourse as to how society should be constructed because ideology has political, economic, cultural, and social dimensions. It is an attempt to respond to a broad set of questions concerning the ideal or most desirable organisation of society.

What is ideology, after all, but a set of values and ideals? From a Marxist view, the norms are defined in terms of the interests they serve, rather than the justice they embody. Law for example is normative, but it is certainly not always moral. Economic systems, therefore, do not exist in isolation but are intimately intertwined in their country's laws and customs. This is because the rule of law is interpreted as a device that serves the interests of the powerful who legislate it in the first place; moreover, it is a device that dissembles itself. The rule of law, in its restraint on the exercise of governmental and judicial power, facilitates the aims of those with power of other kinds, particularly economic power. This is not a surprising argument and will not be a surprise to those who understand this, especially if one considers how right-wing thinkers like Frederick Hayek have lauded the rule of law for its essential role in buttressing the free market so that "within the known rules of the game, the individual is free to pursue his personal ends, certain that the powers of government will not be used deliberately to frustrate his efforts" (Hayek, 1971, p57). Left-wing and right-wing thinkers are agreed on the capitalist function of the rule of law. Whilst legislators can approve laws, they can also repeal such laws to enhance the capitalist system. Obviously, this depends on the government(s), dictator(ship), or ruling party of the day with their preferences and views on how they envision the societies and nations they represent.

Capitalism as a cultural system has been intertwined into a country's laws, customs, traditions, and moral codes; even though it relies on individual initiatives and choices, its social way of life channels desires and ambitions for a 'good life'. The hegemony of capitalist ideology is steeped in our everyday lives, be it socially, politically, economically, and culturally. The culture of capitalism or capitalist culture is the set of social practices, social norms, values, and patterns of behaviour that are attributed to the capitalist economic system in a capitalist society. Culture is an

umbrella term for the knowledge, language, customs, values, assumptions, and material objects that are passed from person to person and from one generation to the next, for the purpose of instructing how people should live. The culture is composed of people who, behaving according to a set of learned rules, act as they must act in order to survive in capitalist societies. Individuals and groups of peoples in modern capitalism are defined by their relationship to the market because they were born into the system that has existed and evolved over hundreds of years. What the ideology and capitalist culture have in common is the perpetual drive to accumulate capital.

2.2.1: The Evolution of Capital Accumulation as Economic Growth

Capital accumulation is more often referred to as economic growth. I will use the terms variously, as the production for profit and accumulation is the implicit purpose of all or most acts. Put simply, it is the investment of money to make profit. Capital becomes capital when someone uses it to gain more money, normally by producing something. In economics, capital consists of human-created assets that can enhance one's power to perform economically useful work. For Marx, capital is used to buy something only in order to sell it on and realise a profit. Joyce Appleby states that "we can add the 'ism' to 'capital' only when the imperatives and strategies of private investments come to dominance" (Appleby, 2010, p7). This dominance begins in the form of markets, and as one would be taught in Economics, markets are where supply and demand meet.

The general formula for capital and the starting point in the process of accumulation is with the circulation of commodities (or services) in the marketplace, and the ultimate product of this commodity circulation is money. We see this everyday as capital enters various markets in the form of money. Marx distinguished two kinds of circulation. C>M>C (commodities transformed into money which is transformed back into commodities) is the direct form of circulation. In this case, we sell commodities to buy more, and money acts as the legal tender middleman. An example would be a person who sold a book at an exchange-value for £30, and then used that money to buy bread (use-value). The money is instrumentally useful in trading

commodities. The person with the book does not have to find someone who would like to buy it with bread. Rather, they can sell the book to someone for money, and then buy the bread from somebody else with that money. The ultimate purpose of C>M>C, then, is to consume use-values which in this case is the bread.

The second form is M>C>M, and in this case, we buy to sell, and money is capital. The first phase transforms money into a commodity and the second transforms a commodity into money. Ultimately, we exchange money for money. Both C>M>C and M>C>M are similar in that they both have M>C and C>M phases involving commodities and money, and buyers and sellers. However, in the case of C>M>C, the final product is a use-value, and thus gets spent once and for all. There is no reflux of money because it is lost in exchange for the product bought. In M>C>M, the seller gets his money back again as the money is not spent, but rather advanced. This reflux of money occurs regardless of whether profit is made, by the nature of the process. Use-value is the purpose of C>M>C, while exchange-value is the purpose of M>C>M. Money is indistinguishable, and it seems absurd to exchange it for itself. It is indistinguishable only in amount. Thus, in M>C>M what really occurs is M>C>M' where M' = M plus excess. The excess is called surplusvalue. The original value adds to itself and converts the surplus-value to capital. Since M>C>M' is buying to sell, the cycle is endless as both M and M' have the same role and, in the end, money is again the starting point, and the cycle goes again from M' to M" and so on. "M>C>M' is therefore in reality the general formula for capital as it appears prima facie within the sphere of circulation" (Marx, 1867).

M>C>M' represents modern capitalism, and its dogmatic belief that the accumulation of money and capital moves as if in perpetual motion in a neverending cycle, because the result is simply more money (or economic growth). It is here where money is properly thought of as capital, because it is an end-in-itself and is put back into the market to buy goods in order to sell them for more money. The process of financialisation found a way to cut the M>C>M sequence short to M>M' and according to John McMurtry, became the *Cancer Stage of Capitalism* (1999). McMurtry develops the metaphor of modern capitalism as a cancer because its "invasive growth threatens to break down our society's immune system" and if not

restrained could "reverse all the progress that has been made toward social equity and stability" (McMurtry, 1999).

The financialisation process enabled capitalism, business, and nation-states to enable the contradiction of capital by filling the gap when the poor did not have the purchasing power to buy goods, they could do through credit. The financialisation process of capitalism, and predominantly consumer credit has been used to supplement consumerist incentives. Lendol Calder in *Financing the American Dream: A Cultural History of Consumer Credit*, portrays the rise of consumer credit and its expansion since the 1920s as "an age whose pocketbook prudence has been abandoned by a contemporary generation demanding instant gratification" (Calder, 1999, p22). Daniel Bell claims in *The Cultural Contradictions of Capitalism*, that "the greatest single engine in the destruction of the protestant ethic was the invention of the instalment plan, or instant credit" (Bell, 1976, p21). The adoption of finance credit meant the consumer buys now, but pays later, and it has been widely accepted that it is now part of government policymaking, business models, and a way of life. Even citizens with jobs, many still cannot pay the full amount up front so they are given the option to make these purchases with credit.

The M>M' sequence is crucial in the adaptation of the financialisation era in capitalism's history gaining prominence from the 1970s onwards. The M>M' sequence of financialisation is most common in advanced and late capitalism as once a sum of money is lent out at interest to obtain more money, or one currency or financial claim is traded for another i.e., money begetting money. The M>M' sequence is the replacement of selling physical commodities for fictitious capital commodities in the forms of trading in the stock market and banking sector on values of entities, such as stocks, bonds, and derivatives in the case of the Great Recession of 2008. Fictitious capital best represents the M>M' sequence as it contrasts with what Marx referred to as real capital that is based in physical means of production and workers, and money capital. Fictitious capital is effectively "accumulated claims, legal titles, to future production" and more specifically claims to the income generated by that production of value that are best seen in the development of the credit system and the joint-stock system (Marx, 1894, p599).

The market value of fictitious capital assets (such as stocks and securities) varies according to the expected return or yield of those assets in the future, which Marx felt was only indirectly related to the growth of real production. The fictitious capital of tradable paper claims to wealth can also be understood as a capitalisation on property ownership, and such ownership is real and legally enforced, as are profits made from it, but the capital involved is fictitious because it is "money that is thrown into circulation as capital without any material basis in commodities or productive activity" (Harvey, 2006, p95). Fictitious capital that has been appropriated exponentially since the financialisation era is merely a claim on future surplus according to Marx, and "the capital-value of such paper is nevertheless wholly illusory"; this was largely a contradictory cause of the capitalist Great Recession (Marx, 1894, p334). Fictitious capital and the financial industry are advanced capitalism's leading contributors to the formation of economic bubbles. The financialisation of economies has led to nations seeking fictitious capital growth rather than value creating growth through human labour because of the coercive laws of competition.

2.2.2: The Coercive Laws of Competition and Capitalist Freedom

Capitalists enter the marketplace to purchase labour power (normally at the cheapest for a day's labour) and the means of production (the raw materials, facilities, tools in the production, and machinery). The capitalist then puts them to work in an organisational form to create a commodity which is then sold at the end of the day for the original money plus a profit. After time the capitalist is faced with a dilemma of what to do with their excess surplus. This leads us to the coercive laws of competition.

The capitalist's dilemma of how to spend their excess surplus is set between two options: a) they either spend the money on pleasures or b) reinvest to further the means of capital accumulation. The latter is chosen because the "coercive laws of competition" establish that if a capitalist does not reinvest in expansion and his rival does, then after a while they are likely to be driven out of business (Harvey, 2011, p43). As a capitalist, one would need to protect and expand their market share, and

as such they need to reinvest to remain a capitalist. David Harvey states that "capitalists behave like capitalists wherever they are" (Harvey, 1990, p424). After a while, there becomes an imbalance due to financial ingenuity and greed, because the coercive laws of competition result in monopolisation, conglomerates, and oligopolies. However, this happens after a sustained period in which the larger business(es) becomes the dominant player(s) in the marketplace, and it becomes much more difficult for others to compete in the same way. The other(s) are predominantly going to smaller enterprises without the financial backing to compete with the bigger player(s) in their chosen field of commodity sale. The consumer in the history of transactions is partly the reason for the driving down of costs in sale and purchases, as most consumers will seek the cheapest price for goods and products without understanding the extent to which their choices drive the ongoing culture of dog-eat-dog competitive capitalism. When the consumer enters the marketplace to buy a desired good or product, they will have the opportunity to choose between vendors. The vendors that are seeking sales will accept a lower price for said good if it means it is purchased from them, rather than their competitors. The cycle of competition is here seen as constant for both the capitalist and the consumer.

While competition drives capitalism forward, the unlimited economic gains encourage and instil greed as a positive capitalist trait. Without this trait, a competing business will over time seek to buy up the market space that you have in search of their business's further profit maximisation. Competition also instils fear, and when this is merged with greed, the two together produce the characteristic that fuels a relentless capitalistic political economy and society. A capitalist society that utilises and instils greed and fear through the lens of competition is one that creates unpredictable social and economic consequences of precariousness and risk. The capitalist ideology states this kind of competition and race to the bottom for cheaper prices is a win-win for all involved in the process. However, the access and expansion of more technology, capital flows, larger export markets, and cheaper imports (remembering that someone somewhere is being exploited to create this commodity for a cheaper price) means more precariousness and job losses as these

markets expand. Capitalism and its markets, we must always accept, do not ensure that the benefits of increased efficiency or financial rewards are felt by all. Globalisation is the extension of capitalism beyond nation-states and can be viewed through the coercive laws of competition through expansion across nations. Unprecedented economic gains and losing your job exist today and have been a requirement throughout the history of capitalism, because it is culturally and ideologically required to retain its dominance.

Are people on welfare because they are unlucky, or, worse, because they deserve to be? The answer is neither, simply put capitalism needs this reserve labour force of unemployed to ensure wages stay low and profits can be higher, as employees seek to retain the jobs they have because there is the threat that the unemployed will simply take their place in a race to bottom for wages shown below. It has been accepted culturally in Britain that we must look after those who need it, or who are down on their luck.

In all capitalist nations, there has been an acceptance for decades that full employment is unattainable. It is not that full employment is impossible, but rather that it is incompatible with capitalism because capitalists want higher profits, and they can obtain this at the expense of the workers by driving down wages. Michael Kalecki made the argument in the 1940s that:

"Under a regime of permanent full employment, the 'sack' would cease to play its role as a disciplinary measure. The social position of the boss would be undermined, and the self-assurance and class-consciousness of the working class would grow. Strikes for wage increases and improvements in conditions of work would create political tension. It is true that profits would be higher under a regime of full employment than they are on the average under laissez-faire; and even the rise in wage rates resulting from the stronger bargaining power of the workers is less likely to reduce profits than to increase prices, and thus adversely affects only the rentier interests. But 'discipline in the factories' and 'political stability' are more appreciated than profits by business leaders. Their class instinct tells them that lasting full employment is unsound from their point of view, and that unemployment is an integral part of the 'normal' capitalist system" (Kalecki, 1943, p3). Without the possibility of no work, or the possibility of losing work, capitalists cannot undercut the worker for further profit. Nor would the capitalists have a reserve labour force (unemployed) that is desperate for a job, for income, and desperate to fit into society. The reserve labour force must accept lower wages than what is sometimes enough to live on, because it is at least something, however small. Heiner Flassbeck argues that income is earned by people because they are essentially selling their "labour on the labour market as a contribution to the production of goods and services" for the economy (Flassbeck, 2017). As understood above, a low income is better than nothing, not just in capitalism but for the basic purpose of survival. Kalecki highlights the necessity of the threat to work via the sack through downsizing or streamlining a business (whatever the reason may be). The cultural acceptance that full employment is unobtainable or even undesirable has not only helped create a culture of dog-eat-dog for jobs, but a culture in society that accepts all the failures that come along with capitalism. Nick Stricek and Alex Williams identified this crisis in capitalism's ability and willingness to employ all members of society, stating "there is a growing population of people that are situated outside formal, waged work, making do with minimal welfare benefits, informal subsistence work, or by illegal means" (Srnicek & Williams, 2016, pp103-104). As this population of unemployed grows, so too will their acceptance of the status quo.

The freedom of the capitalist to take the decisions that suit themselves along with the structures that promote and defend private ownership enables pure freedom for the capitalist ruling class. In practice this is "freedom from trade unions and collective bargaining allowing the freedom to suppress wages. Freedom from tax means freedom from the distribution of wealth that lifts citizens out of poverty" (Monbiot, 2016). Freedom from regulation allows capitalists to freely degrade environments, endanger workers safety, charge iniquitous interest rates or even provide inaccurate news or disinformation under the guise of freedom of speech or expression. Private ownership, therefore, gives unlimited access to the abuse of freedom under capitalism.

2.2.3: Private Ownership

Private ownership in the Marxist sense consists of the ownership of the means of production such as the raw materials, facilities, machinery, and tools used in the production of goods and services for profit. The means of production can include two broad categories of objects. Firstly, the instruments of labour as stated above in the form of tools, factories, and infrastructure and secondly, in the form of subjects of labour like natural resources and raw materials. In an agrarian society, the principal means of production is the soil and the shovel. In an industrial society, the means of production become social means of production and include factories and mines. In a knowledge economy, computers and networks are the means of production. In the broad sense, the means of production also includes the means of distribution such as shops, the internet, and transport.

In capitalism, ownership can be viewed as a bundle of rights over an asset that entitles its holders to a strong form of authority over it. Such rights allow the owner of the asset to control it and decide on its use, claim the value generated by it, exclude others from using it and the right to transfer the ownership of it to another holder (predominantly a relative). Prior to the 18th century, private ownership was usually referred to as land ownership. English speakers generally used the term "propertye" in reference to land ownership or "goods and chattels" in legal possession, with the term property coming to have a legal definition in the 17th century (Aylmer, 1980, p93-94). The capitalist obtained strengthened legal rights to include "an absolute proprietor hath an absolute Power to dispose of his Estate as he pleases, subject only to the Laws of the Land" (Aylmer, 1980, p95). The legislative developments in late feudal and early capitalist society gave substantial power to beneficiaries of the capitalist ideology, so long as they were subject to the laws of the land. It is important to remember here that the laws of the land throughout are crucial to the development, regulation, retention, or unleashing of the capitalist ideology.

Private ownership is crucial to the capitalist ideology, and the freedom of the individual. The ideology of capitalism relies on the enforcement of law and private property rights, to provide incentives or investment in and productive use of productive capital. The vast decisions that were made and are made today in the

capitalist system lie with those who have access to capital. The freedom of the capitalist to make decisions that suit them on who they employ, where they are based, or how they conduct their business has also been enshrined into law in the same way as private ownership. Since capitalist ventures have primarily involved employing men and women, entrepreneurs depend on others for their labour. Workers in turn depend on employers for their wages to support themselves and their families. Once separated from the land or tools, ordinary men and women had no resources with which to earn their daily bread and had to go out and sell their labour. However, the way we talk about jobs today does not always make clear this mutual transaction. The implicit coercion not just between capitalist and labour but simply as a way of life means that while people may be free to take a job or not, they are not free from the need to work, so long as they wish to eat. The capitalist is not under that same existential threat unless they are a start-up without any capital to fall back on. These start-up capitalists are often wage labourers unable to find places of work to sell their labour, so they become independent traders instead. Partly for this reason, the cheaper and easier the capitalist can produce something, the more profit they get to keep. As a result, capitalists and start-up capitalists are constantly trying to figure out how to make more things to sell than we need to consume, and how to make the commodity in the quickest, easiest, and cheapest way possible. The downside of making this happen is that workers have become alienated, more precarious, more competitive, dehumanised, and removed from meaningful relations they have with each other, themselves, and with the things they make or do.

2.2.4: Wage Labour and Employment

High levels of wage labour are another characteristic of capitalism. Wage labour is the socio-economic relationship between a worker and an employer, in which the worker sells their labour power under a formal or informal contract of employment. A wage labourer is a person whose primary means of income comes from the selling of their labour in this way. A wage labourer today is anyone working for a company, organisation, government, individual that is a contracted labourer, in either the public or private sector, and that receives a wage for their labour. We accept this

trade off today in the hunt for work, but we must remember that those with capital can exploit the situation of the individual without work or capital by offering them the opportunity to work for a given wage, however small, because something is better than nothing. Exploitation is capitalising off those who are vulnerable to exploitation in the first place, and this tool of capitalism is still used today because of how crucial it is to the ideology. Marx concluded that wage labour is the very foundation of capitalism stating:

"Without a class dependent on wages, the moment individuals confront each other as free persons, there can be no production of surplus value; without the production of surplus-value there can be no capitalist production, and hence no capital and no capitalist" (Marx, 1867).

Employment and wage labour have been necessary tools for capitalists, but it is one that can be replaced if it means the accumulation of capitalism can be extended or grown. What this looks like in application is shutting down a factory in the UK to move it to Malaysia, as in the case of Sir James Dyson who, in 2002, moved his Malmesbury, Wiltshire based production to South-East Asia. The "move was driven by lower production costs in Malaysia (30% less than in the UK); it resulted in the loss of 65 jobs" (Gribben, 2003). What this means is that the local economy in Malmesbury is disassembled, and 65 people must find new work; those that replace the 65 are being paid a lot less in the overall context to do the same work. If there are no new markets readily available, then the capitalist will export capital to create a new centre of production (as in contemporary China) or in the Dyson case; Malaysia, to absorb surplus and seek further profits.

Another contemporary example is moving a business's headquarters to a low tax nation, as in the case of Google who moved their headquarters to Dublin, Ireland to make the most of Ireland's low corporation tax. Corporate tax was "12.5% in Ireland" compared to 26% in the United Kingdom in 2011, so it made sense for a large organisation like Google to want to seek lower taxes for higher profits and Ireland was happy to allow it because it meant they received some part of the tax pie (O'Carroll, 2011). It is important to note here that the coercive laws of competition outlined above can also be applied to nations and states, compelling

them to seek out advantages conferred by superior command over space and time, as well as technological advances, or in this case tax revenue. If a state, corporation, or individual holds any superiority, be it economically, militarily, or politically, and it faces a capital surplus absorption problem, then it can either, "invent a new technology and product line or expand geographically and find a market elsewhere, in another space, by colonial or neo-colonial domination if necessary" (Harvey, 2011, p158). Applying the coercive laws of competition nationally means that a nation like Ireland can compete with others to appeal to companies such as Google with lower tax rates. More interestingly, Google were able to reduce taxation fees further because they use "Ireland as a conduit for revenues that end up being costed to another country where its intellectual property (the brand and technology such as Google's algorithms) is registered"; that "country is Bermuda" (O'Carroll, 2011). Google's income-shuffle and tax avoidance are all above board and legal. This tactic is then replicated by business entities seeking lower tax jurisdictions to compete because the online revenues generated by Google in all the countries where the search engine is active are taxed elsewhere. Ironically for Ireland, so long as the intellectual property (IP) is in Bermuda, that is where the profits reside, which means Ireland has no rights to the profit earned by the intellectual property based in another country. For the time being, Ireland will happily take a small piece of the tax pie and provide a haven for Google until it decides to rehome in another place that offers better business rates or tax incentives. As we know from above, the freedom of the capitalist to act in their business's best interest is paramount to the ideology of capitalism, and in almost all cases, the wage labourer is expendable.

In all capitalist nations, the capitalist mobilises against workers' rights, trade unions and minimum wages statuses (even though low wages weaken aggregate demand) to maximise profits and keep the worker on the side of the company (capitalist) rather than as a collective. Collective bargaining power in unions gives credence and unity in relation to issues faced by the workers. These trade and labour unions are collectives of workers who have come together to achieve many common goals, such as protecting the integrity of their trade, improving safety standards, and

attaining better wages, benefits (such as holidays, health care, and retirement), and working conditions through the increased bargaining power wielded by the creation of a monopoly of the workers. The problem with unions for capitalists is that unions disrupt the freedom of the capitalist to act in their best interest which is why the capitalist ideology vehemently opposes the unionisation of workers. American journalist Steven Greenhouse argues when promoting his book *Beaten Down, Worked Up: The Past, Present and Future of American Labour* that:

"America's unions and workers have less power in policymaking and the workplace than they have in decades [as] the percentage of workers in unions is at its lowest level in over a century – down to 10.5% from a peak of 35%. All this helps explain why wages have stagnated for decades, income inequality has soared, and corporations and billionaire donors have undue sway over our politics, policymaking and political appointments" (Greenhouse, 2019).

The decline in trade and labour unions is not solely an American problem. Unions have declined in size, power, and cultural impact across nations, even though unions and union membership have been linked to "improved health outcomes, increased firm productivity and workers' wages, and increased political knowledge in members" (Leigh & Chakalov, 2021). The diminishing unionisation and collective bargaining have enabled a race to the bottom of lower wages merged with the threat from the army of reserve labour (unemployed). Wage labour also is becoming increasing insufficient at meeting decent living standards (DLS).

The International Labour Organisation's (ILO) Department of Statistics gained datasets from 189 countries (the UN officially recognises 193 countries) which are drawn from the world's largest collection of harmonised labour force survey data, found that:

"Ten per cent of workers receive 48.9 per cent of total global pay, while the lowestpaid 50 per cent of workers receive just 6.4 per cent [while] the lowest 20 percent of income earners around 650 million workers earn less than 1 percent of global labour income, a figure that has hardly changed in 13 years" (ILO, 2019).

The ILO confirm that even in high-income countries including the UK, US, and Germany, there were substantial losses in earnings for the middle and lower-middle class over the 13-year period, and large gains for the top. Roger Gomis, economist in the ILO Department of Statistics, said in 2019:

"The majority of the global workforce endures strikingly low pay and for many having a job does not mean having enough to live on. The average pay of the bottom half of the world's workers is just 198 dollars per month and the poorest 10 per cent would need to work more than three centuries to earn the same as the richest 10 per cent do in one year" (ILO, 2019).

Wage labour and employment must be reset to sufficiently allow workers to earn enough to have DLS; without this inequality rises and will be evermore supressed by technological automation. Private ownership and the freedom of the capitalist will perpetuate further wealth inequality in the era of automation.

2.2.5: Wealth Inequality

The examples shown above of Google and Dyson are just two among many, and we must understand that the bond that ties profits of the rich to the wages of the poor are severed, cutting the ties of economic elites from the masses. Capitalists no longer need to worry about national economic growth because their transnational fortunes grow without it. Therefore, the super-rich elite from countries withdraw their money (or that of their fellow citizens) and move to Switzerland, Monaco, the US, or Britain, who provide a safe-haven for their wealth. The global capitalist market provides a platform for the super-rich to withdraw themselves, their wealth, and possessions, and move into an endgame mode of cashing in, burning bridges, and leaving nothing behind. In economics, this is referred to as capital flight when assets or money rapidly flow out of a country. Whilst this does not sound bad for those who genuinely have their lives threatened by states, this is more often used instead by the super-rich as a threat to domestic government(s) that unless they cut taxes on corporations, inheritance, or income then they will remove their business(es), leaving their workers without a place to work. As such, the super-rich have become increasingly powerful while inequality continues to rise exponentially.

Inequality in advanced and late capitalist economies have been proven statistically by Thomas Piketty's *Capital in the Twenty-First Century*. Piketty displayed a 200-year global study of trends in wealth and income inequality showing that, contrary to the premises of mainstream economics and the law-and-policy worlds that increases in aggregate wealth are not necessarily good for everyone (Piketty, 2014). Most of the gains of economic growth in recent decades have gone to very few people. Growth has not only failed to make others better off, by creating a more unequal world, where everything from political influence to social standing and dignity is distributed in line with wealth, but it may have made their lives substantially worse off. This trend will continue to worsen the lives of citizens under the capitalist economic system.

The reason for this is that extreme inequality inevitably leads to plutocracy where government(s) are run by the wealthy for the wealthy. Under a plutonomy, you will see oligarchs and plutocrats take up pet hobbies like buying football clubs or funding space travel and exploration rather than bettering their nations through redistribution or creating better workplaces for their employees, who have enabled such owners to obtain their riches. Redistribution under oligarchs tend towards the plutonomy even in nations that are considered democratic. Late capitalism has seen plutonomy's rise in many states, such as the UK and US, extending globally. Oxfam highlighted in 2010 how 388 of the world's billionaires on the planet are worth more than the combined wealth of half the world's population; in 2014, the number of billionaires that owned "as much wealth as half the world's population" went down to 80, and in 2016 it went down to 62 (Delahanty, 2016). Amazon's Jeff Bezos is the richest man in the world and had a net worth of \$177 billion, according to Bloomberg's billionaires index in 2021 (Bloomberg, 2021). By 2026 Bezos is set to become the world's first trillionaire whereby "he'd be worth more than the individual GDPs of 179 countries with a combined population of 3.4 billion — 43.7 percent of all humans alive" (Steinbuch, 2020). Bezos's wealth is more astonishing when broken down "as he earns \$2500 a second" which "works out at \$150,000 a minute" and "every hour he becomes a millionaire nine times over"; assuming Jeff Bezos

were a country, "he would be the 54th wealthiest country in the world" (Abela, 2020). Even more tragic is the fact that:

"A child dies of starvation every three seconds. Every minute nine people die from lack of access to safe drinking water. Every hour, over 2000 people die from infectious diseases, many of which could be prevented for a single dollar per person" (Abela, 2020).

What makes these figures relevant is that we as people (individuals, nations, and government) have the means to solve these problems, but choose not to. If an infectious disease costs \$1 per person to prevent, it would cost \$2000 an hour to provide cures for infectious diseases, which would be fractional for Bezos who would have made \$9.5 million in that time. World hunger, however, is very different as "over 800 million people go hungry each year, yet we grow enough food to feed 10 billion people"; the reason for this is due to poverty and inequality, not scarcity, as many people simply do not have the means to earn enough money to buy food (Abela, 2020). Rather than helping to solve world hunger, the fortune of people like Bezos is the very reason millions go hungry. Extreme wealth inequality means a handful live in unbelievable splendour, while millions live in dire squalor. This is a morally shocking situation, yet a capitalist society does not just normalise inequality, it celebrates it.

Andrew Sayer notes in *Why We Can't Afford the Rich* that the past four decades have been characterised by a transfer of wealth not only from the poor to the rich, but within the ranks of the wealthy. From those who make their money by producing new goods or services to those who make their money by controlling existing assets and harvesting rent, interest or capital gains. Earned income has been supplemented by unearned income – "like rent...interest is unearned income that accrues without any effort" (Sayer, 2015). As a result of the monopolisation of resources such as buy to let housing the poor become poorer, and the rich become richer as the rich acquire increasing control over money, resources, and inevitably access to markets without capital. Joseph Stiglitz argues that inequality is self-perpetuating and "politics have shaped the market and shaped it in ways that advantage the top at the expense of the rest" (Stiglitz, 2012). Stiglitz blames rent-seeking for causing the

inequality, with the wealthy using their power to shape monopolies, incur favourable treatment by government(s), and pay low taxes. Not only is the end result morally wrong but economically damages productivity in the economy.

2.2.6: Capitalism's Competition Contradiction

Jonathan Aldred argues since the 1950s economics has provided a culture and Licence to Be Bad. Aldred highlights how economists have linked selfishness and greed to rationality. Aldred shows that inequality has become culturally accepted since the 1980s as "rising inequality has become more acceptable – or at least, less unacceptable" (Aldred, 2019, p221). Not only do we accept it culturally, but we adopt the narrative that we deserve what we get, be it our salaries, or our luck in life. This legitimises the argument that 'you deserve what you get' which is fatally flawed, but culturally accepted; as the UK has high inequality and low economic and social mobility, and our recent history fits this cause-and-effect relationship. Countries with high inequality show this same reoccurring pattern across the world, something that became known as the 'Great Gatsby Curve'. The curve relates to intergenerational income elasticity and measures the persistence of incomes between parents and their children. It is characters and stories like Jay Gatsby's and others, going from rags to riches, that we are told we can achieve through capitalism. However, these stories are few and far between, yet we believe this can be us if we follow the rules of the game.

The American Dream, and the 'work hard and you shall be rewarded' narrative is another part of this greater fallacy. Culturally, the American Dream is idolised across the world, portraying America as a place where you can go and work hard and make a life for yourself, when in reality, the American Dream has become an unachievable goal for the majority of citizens. The definition of the American Dream by James Truslow Adams in 1931 was that "life should be better and richer and fuller for everyone, with opportunity each according to ability or achievement...regardless of the fortuitous circumstances of birth or position" (Adams, 1931, pp373-375). This is not how the American Dream appears in 21st century America, although it is still advertised in the same way that if you work hard and are the driver of your dreams,

then you can make them a reality. It sounds and seems legitimate, but it is not seen in real terms, because not only American society, but other advanced societies, too, allow the passing of wealth (through inheritance) culturally, hindering competitive capitalism. By utilising trusts and other techniques, the wealthiest seek to shield their wealth with "almost half of all U.S. wealth transferred over the next quarter century will come from the top 1.5% of households" (Steverman, 2022).

Six of the 10 wealthiest Americans alive today are heirs to fortunes passed on to them by wealthy ancestors (Steverman, 2022). Billionaires today have had the advantages that come with wealthy parents. We are told self-made individuals who made it on their own are the pinnacle of our capitalist system, however this is a fallacy in modern day capitalism as nobody are truly self-made. Jeff Bezos's garagebased start-up was funded by a quarter-million-dollar investment from his parents (Mejia, 2018). Bill Gates's mother used her business connections to help land a software deal with IBM that made Microsoft (Locke, 2020). Elon Musk came from a family that owned shares of an emerald mine in southern Africa (de Wet, 2018).

The reality of passing wealth to your child is seen as the best option rather than benefitting society overall. We accept the passing of wealth because it is a reality and have not considered doing things differently. Inheritance is contradictory to the competitive aspect that is intended to drive the marketplace. When there is an unequal playing field, the marketplace of opportunity will always be stifled. Inheritance tax is viewed by recipients and those seeking to pass on wealth as an unnecessary tax on top of taxes already paid throughout life by many citizens. We as a civilised society accept paying taxes, even though many of us would rather not pay them at all, but there is a bigger societal picture in terms of what our taxes are used for. These include, but are not limited to in the UK, a National Health Service (NHS) free to the point of use, public education for children and future inheritors of the nation, social protection for elderly, disabled and unemployed, transport and public infrastructure, defence and military personnel, public order, and safety, including police, as well as boosting industry, agriculture, and housing.

The argument for the legitimacy of taxes has already been won, and the way they are calculated depends on the government of the day, but to return to Aldred here,

the way that taxes are actively avoided and evaded shows not only a moral problem, but a cultural one. The apotheosis in this can be understood in Donald Trump's justification for paying no tax despite claiming to be billionaire in the televised presidential debate in 2016 (before winning), that "it makes [him] smart" in response to the accusation that he had paid no federal income tax in some years (Diaz, 2016). The association of avoiding paying taxes with intelligence gives credence to the idea that you are clever by not paying tax. The federal taxes that Donald Trump actively avoided (and other citizens who do the same) means over time, less money went towards the social security of his fellow citizens, less money towards Medicare and Medicaid (health insurance for fellow citizens), less money on defence and international security assistance, as well as less money to tackle everincreasing US national debt. To actively avoid paying these federal taxes is not just wrong morally but also unpatriotic. What this shows is that tax evasion has become accepted culturally, if not by all, but by many. The contradiction of competition in the forms of paying taxes, access to opportunities, and the unfair advantage of inheritance all contradict the necessary driver of competition to instil a sufficient marketplace.

We live in a time when anything can be bought and sold. Over the last three decades, the market and market values have come to govern our lives like never before. The rampant pace of the capitalist market has today shown that anything and anyone has a price. Michael Sandel confirms in *What Money Can't Buy: The Moral Limit of Markets* that in modern day capitalism, everything has a price, from the right to pollute, to shooting a White Rhino, to buying an Indian surrogate, to getting a place at university, or perhaps the most morally reprehensible, buying "the life insurance policy of an ailing or elderly person" whilst they are still alive "and then collect the death benefit when he or she dies" (Sandel, 2012, p5). Sandel shows that "the logic of buying and selling no longer applies to material goods alone but increasingly governs the whole of life. It is time to ask whether we want to live this" (Sandel, 2012, p6). The reach of markets, and capitalist-oriented thinking, into aspects of life traditionally governed by non-market norms has been one of the most significant developments of modern capitalism. Sandel questions whether it is

morally right that we live within a societal model where everything is up for sale. Sandel believes it is morally wrong for two reasons; firstly, inequality and secondly corruption in so far that "in a society where everything is for sale, life is harder for modest means" (Sandel, 2012, p8). The rise in inequality has been worse for middleclass and poorer families as not only has the gap between rich and poor widened, but the commodification of everything has also sharpened inequality by making money matter more. Were government(s) or states to step in to ensure citizens were not so far off from each other in terms of wealth or ensured citizens on low incomes were provided enough money for the essential requirements of wellbeing that met DLS then capitalism could be reset. Competition within capitalism is stifled through inheritance and is a contradiction within the system.

The argument of fairness is therefore crucial to understanding modern capitalism. Capitalism has always harnessed exploitation, competition, and aspects that are repugnant to the morals of the objective mind. Capitalism has counteracted its negative qualities by offsetting prosperity for a wide range of people, however its ability to do this is diminishing. Capitalism from inception has depended on relentless and restless commercialisation through the monetarisation of ever more social relations. The result is perpetual precariousness of societies placed under continuous pressures by their economy for constant reorganisation in line with the need for constant capital accumulation.

The precariousness of work and the threat of technological automation to the worker that capitalists view as necessary via the coercive laws of competition seeking higher profits through automation rather than pay human labour. Marx argues that work is central to a human being's self-conception and sense of wellbeing. By working on and transforming objective matter into sustenance and objects of use-value, humans meet the needs of existence and come to see themselves externalised in the world. Working is as much an act of personal creation and a projection of one's identity as it is a means of survival. However, capitalism, the system of private ownership of the means of production, deprives human beings of this essential source of self-worth and identity. The worker approaches work only as a means of survival and derives none of the other personal satisfactions of work because the products of their labour

do not belong to him. These products are instead expropriated by capitalists and sold for profit. As a result, the worker becomes alienated not only from their work, but from the products they make and from society when competition and the coercive laws drive markets and jobs abroad. This alienation is exacerbated by the threat of technological automation.

2.2.7: Alienation

Alienation exists almost everywhere in the 21st century and there is abundant evidence of deep alienation with respect to contemporary forms of the labour process. The problem for labour is not simply that there are not enough good-paying jobs to go around (which is bad enough in most areas of the world), or that there are millions misemployed, but that there are few meaningful jobs.

The individual psychologised (existential) alienation as articulated in Marx's early manuscripts connects with a critique of the objective alienation produced through the reproduction of capital on the world market. Workers may accept the alienations of wage labour in return for sufficient access to commodities to fulfil their personal wants, needs and desires. Alienated wage labour may be offset by compensatory consumerism. Consumerism is usually a pejorative term for the mere accumulation of consumer goods, and a desire for conspicuous consumption. However, capitalism flourishes not by covering existing needs, but creating new ones, as it requires permanent demand to stimulate its growth for profits. Lendol Calder argues in *Financing the American Dream: A Cultural History of Consumer Credit* that the culture of consumption defines the good life:

"Not primarily in terms of satisfying work, or economic independence, or devotion to God, or commitment to the group, or any other ideal honoured by people past and present, but rather is dedicated to the proposition that 'good living' means having lots of goods" (Calder, 1999, p7).

The ideal consumer is someone who believes the meaning of life is to be found in consumption. This is representative of the fact that consumption in advanced capitalist societies has long been disassociated from material need. Much of what is

purchased is not use value goods, but rather their symbolic value, aura, or dream value. Georg Simmel analysed value as emerging from a distance between subject and object:

"We desire objects ... in terms of [their] distance as something not-yet-enjoyed, the subjective aspect of this condition being desire. ... The object thus formed, which is characterized by its separation from the subject, who at the same time establishes it and seeks to overcome it by his desire, is for us a value. The moment of enjoyment itself, when the separation of subject and object is effaced, consumes the value. Value is only reinstated as contrast, as an object separated from the subject" (Simmel, 1978, p66).

This is the idea that capitalism can satisfy our everyday needs, so we simply buy things because we believe that "consumerism equates personal happiness" (Zamponi, 2011, p14). In both the *Grundrisse* and *Das* K*apital* Marx notes how endless capital accumulation rests on the endless production and reproduction of new wants, needs and desires, backed by an ability to pay.

In modes of production where the subordinate classes have been alienated from the means of production, workers are forced to use their own labour to live through wage-labour which will itself constitute a permanent pressure towards their co-optation. In capitalism, the coercion of everyday life is reinforced by the fact that urban workers during economic crises cannot return to self-sufficiency of the land; the same also holds for agricultural wage labourers. In capitalism, especially before unionisation, the working class is effectively controlled by everyday exigencies in that capitalists decompose labour by employing migrant, women, or child labourers, extending the working day, or ensuring that necessary labour time is at the bare minimum. Ironically, these workers are also the ones blamed when the fractious failures of capitalism are exposed.

Societies have and will continue to encounter outbreaks of discontent, from those who are alienated in daily life, no matter whether it is in the living space, the workspace, on the streets in protest or wherever. The most typical response within a population to conditions of chronic alienation is to remain passive, resentful, and

depressed (sometimes succumbing to drugs and alcohol) but to occasionally erupt in anger, frustration, and rage. People want to tear down and destroy the existing order of things, and they seek scapegoats to blame. The capitalist class feeds them racial minorities, women, and immigrants as easy targets for global problems. Ralph Milliband highlights Antonio Gramsci's concept of hegemony to suggest that there is, in Western capitalist societies, 'a process of massive indoctrination' and that this is achieved by the "result of a permanent and pervasive effort, conducted through a multitude of agencies" and specifically by the 'micro-politics' and efforts of the members of the "dominant classes who are able, by virtue of their position, for instance as employers, to dissuade members of the subordinate classes, if not from holding, at least from voicing unorthodox views" (Milliband, 1969, p181). David Harvey highlights that:

"Much of Trump's support and much of the Brexit vote in Britain came from small town and rural areas that were facing catastrophic economic decline and less jobs, leaving no option for the young but to migrate to already overcrowded and high rent metropolitan areas in hope of finding work" (Harvey, 2018, p430)

The Fordist compromise of selling your labour for eight hours a day, for five days a week, in return for a wage that provides enough for a family to live on, with enough left over to enjoy leisure time or holidays, and with a pension at the end does not apply *en masse*. Whilst this still exists for some, the factory-based industry has almost completely migrated to cheaper labour markets which have in turn changed the bargaining power for workers also. Instead of the eight-hour day over five days, we have a working world in the West that delivers precariousness and anxiety as flexibility and freedom, in the forms of zero-hours contracts and temporary work in the gig economy. The failure to earn enough to live on or to find job satisfaction is delivered to citizens in personal terms that 'you have made the wrong choices' or having 'not made the most of the opportunities given to you'. Those of us who obtain and retain jobs do so through devotion, hard work and loyalty but must accept exhaustion, exploitation, and the acceptance that we can also have this taken away at any point. Modern work is insecure because capitalism renders the human utterly expendable, and we accept that we can be let go by our employers the

minute costs rise or savings can be made. Capitalism is always about profit, not about productivity. The two often go together but they are likely to part ways when economic growth begins to require a disproportionate expansion of the public domain. The importance of productivity is constantly exclaimed by the capitalist; however, the problem is not about the productivity of the worker's labour, but the value created from the surplus labour exploited for further profit.

Why then have workers become more dehumanised? Marx argued that capital was a moving contradiction whereby it needs workers to generate profits, yet it eliminates labour to be more competitive and further profits. It becomes clear why workers become more dehumanised when there is not only the threat of replacement by unemployed workers (reserve army of labour), but now, there is the very real threat of permanent removal of human labour due to technological automation. It is here that we arrive at the tipping point of the most prominent contradiction of modern advanced capitalism.

2.3: The Labour Theory of Value (LTV)

The labour theory of value (LTV) is the concept whereby value of a commodity or product is determined by the amount of labour that went into producing it. The production of commodities for exchange in a market to maximise exchange-value instead of use-value is the essence of profit via commodity production. Jens Beckert describes the commodification as the "transformation of goods and services into commodities, a process centrally connected to the development of modern capitalism" (Beckert, 2011, p10). Commodification is a key element of economic expansion because commodities are the basis for profit making.

Capitalism can be distinguished from other forms of commodity exchange, Marx argues, in that it involves not merely the exchange of commodities, but the advancement of capital, in the form of money, with the purpose of generating profit through the purchase of commodities and their transformation into other commodities which can command a higher price, and thus yield a profit. Marx claims that no previous theorist has been able to adequately explain how capitalism overall can make a profit. Marx's own solution relies on the idea of exploitation of the

worker. In setting up conditions of production, the capitalist purchases the worker's labour power—his or her ability to labour—for the day. The cost of this commodity is determined in the same way as the cost of every other; that is, in terms of the amount of socially necessary labour power required to produce it. In this case, the value of a day's labour power is the value of the commodities necessary to keep the worker alive for a day. Suppose that such commodities take four hours to produce. Accordingly, the first four hours of the working day is spent on producing value equivalent to the value of the wages the worker will be paid. This is known as necessary labour. Any other work the worker does above this is known as surplus labour, producing surplus-value for the capitalist. Surplus-value, according to Marx, is the "source of all profit" (Marx, 1867). In Marx's analysis, labour power is the only commodity which can produce more value than it is worth, and for this reason it is known as variable capital. Other commodities simply pass their value on to the finished commodities, but do not create any extra value. They are known as constant capital. Profit, then, is the result of the labour performed by the worker beyond that necessary to create the value of his or her wages. This is the surplusvalue theory of profit. The only thing that all commodities have in common is that they are a product of labour. Therefore, the value of a commodity in a market represents the amount of labour that went into its production.

It appears to follow from this analysis that as industry becomes more mechanised, using more constant capital and less variable capital, the rate of profit ought to fall. For as a proportion less capital will be advanced on labour, and only labour can create value. It follows from the analysis so far, that labour-intensive industries should have a higher rate of profit than those which use less labour. Not only is this empirically false, but it is also theoretically unacceptable. Marx argued that in real economic life, prices vary in a systematic way from values. If it is thought that the LTV was initially motivated as an intuitively plausible theory of price, then when the connection between price and value is rendered as indirect, as it is in the final theory, the intuitive motivation of the theory withers away.

The labour theory is important, not because it gives special insight into the nature of prices (economists today do not use this theory to explain why commodities are

priced as they are), but because it forms the foundation of Marx's notion of exploitation. The LTV shows the innate contradictions within the processes of capitalism long-term. In the simplest form of exchange, people produce commodities and sell them so that they can buy other commodities to satisfy their own needs and wants. In such exchanges, money is only the common medium that allows transactions to take place. Capitalists, in contrast, are motivated not by a need for commodities but by a desire to accumulate capital. Capitalists take advantage of their power to set wages and working hours to extract the greatest amount of labour from workers at the lowest possible cost, selling the products of the workers at a higher price than the capitalists paid for them. Rather than buy or sell products at their true exchange-value, as determined by the labour that went into making them, capitalists enrich themselves by extracting the surplus-value from their workers by exploiting them. This exploitation in practice can be viewed in all aspects of capitalist history because the wage labourer needs money to live on (to buy food, shelter, and clothing) and can only do this with the wages from their labour that they sell at whatever price the capitalist offers. The capitalist seeking labour in the marketplace understands what they need, and how much they can afford to pay their workers, so long as a profit is made. That profit can be higher if the labourers pay is lower. The capitalist through the coercive laws of competition must obtain higher profits at the expense of the worker and thus the LTV and valorisation become entwined.

Human labour brings value and capitalists understand this to an extent. Capitalists understand there is some value to their workforce as they request workers to 'teach' their robot replacements to be the most experienced or the most efficient of the factory's workforce. Workers are paid to pass on their skill, knowledge, experience, and understandings essentially to better their replacements. The depiction of the mechanisation of a potentially dreary and dangerous job, or the years of carefully acquired skills transferred to an inanimate object can be seen as the everprogressing triumph of technology, but however it is understood, the human worker is rendered redundant. The LTV stipulates that labour is the source of all value and thus of profit, hence why Marx believed the working class had a numerical superiority under capitalism which would be the driving force for revolution. This

symbolises the paradoxical issue for the nature and future destiny of the capitalist system. It confronts us with the instant at which living labour ceases to be involved in the productive process, and therefore, according to the LTV, the instant at which this fragment of the productive process ceases to generate surplus value. Envisaging the same event repeated hundreds of times, we seem inexorably to be propelled towards the conclusions put forward by Ernest Mandel. In *Late Capitalism*, Mandel argued that the process of automation constituted the critical contradictory force within the development of capitalism:

"We have here arrived at the absolute inner limit of the capitalist mode of production. This absolute limit...lies in the fact that the mass of surplus-value itself necessarily diminishes as a result of the elimination of living labour from the production process in the course of the final stage of mechanization-automation. Capitalism is incompatible with fully automated production in the whole of industry and agriculture, because this no longer allows the creation of surplus-value or valorisation of capital. It is hence impossible for automation to spread to the entire realm of production in the age of late capitalism" (Mandel, 1975, p207).

2.3.1: Automation, Robotics, & Software

Automation has traditionally been viewed as a linear process wherein machines grow larger and larger, and workers decrease until there is an organised system of machines wherein motion is communicated by the transmitting mechanisms software from an automated centre is the most developed form of production by machinery. This separation from hardware to software is arguably the revolutionary fission of the labour process. The reasoning behind this is that software represents a special form of the commodification of knowledge. To understand the nature of this fission we must consider the relationship between knowledge, labour, and machinery. According to Marx, a machine by definition cannot be a source of human labour (Marx, 1867). The separation of knowledge from human labour and machinery, and its emergence as an independent commodity and element in production has been a gradual process dating back to the very beginnings of capitalism. Essential steps in the process were popularisation of the printed book, and later the creation of patent

and copyright systems. The latter measures are crucial because the special properties of knowledge (its lack of material substance; the ease with which it can be copied and transmitted) mean that it can only acquire exchange value where institutional arrangements confer a degree of monopoly power on its owner.

The distinctive characteristic of a robot is its ability to be programmed to perform a number of different tasks, or to vary its action in response to everchanging circumstances. For this reason, robots, unlike conventional mass production techniques, are particularly applicable to the production of widening varied products. The software written in specialised programming languages enables robots and autonomous systems to perform complex and coordinated actions, mimicking the flexibility and responsiveness of the human worker.

Software in essence consists of instructions for performing a particular task, and a major technological key to the growth of computing was the creation of means by which these instructions could readily be stored and fed into a machine. It is this technological key, applied to industrial production, that enables automation. Harry Braverman stated in *Labour and Monopoly Capital* that the "deskilling of intellectual work has been most obvious and extreme in the development of software production" (Braverman, 1974, pp 315-316). The significance of the application of software to manufacturing is firstly that a single machine may be made to vary its movement without alteration to its mechanical structure; but secondly, and most importantly, that the worker's knowledge may be separated from the physical body of the worker and may itself become a commodity. Until now the productive process has always implied the bringing together of machinery and human labour (in whatever proportions).

Surplus value is extracted from workers who create software for an automated production system, but this surplus value only acquires meaning and substance when the software is brought together with machinery, and the production of goods commences. Once this happens, however, the value of labour embodied in the software becomes subdivided between a potentially infinite number of products. Unless the manufacturer is able to maintain total monopoly over the technique, spreading automation will inevitably and rapidly reduce the value of the product, and

profits will fall to nothing. The fission of labour inherent in the nature of robots creates a situation where it is only in the design of new productive information and the initial bringing together of information and machinery that surplus value can be extracted. Unless this process is continually repeated, surplus value cannot be continuously created, and the total mass of profit must ultimately fall. Marx confirmed this in his theory on the tendency of the rate of profit to fall (TRPF).

2.3.2: Tendency of the Rate of Profit to Fall (TRPF)

The TRPF is Marx's hypothesis that the rate of profit i.e., the ratio of the profit to the amount of invested capital, decreases over time. Marx regarded the TRPF as proof that capitalist production could not be an everlasting form of production, since in the end the profit principle itself would suffer a breakdown. There is empirical validity that the cause of recurring and regular economic crises or slumps in output, investment, and employment in modern economies can be found in Marx's law of the tendential fall in the rate of profit. This law is disputed and flat out ignored in mainstream economics, because it suggests a fundamental flaw in the capitalist mode of production. However, alternative theories of underconsumption, rising inequality of income and wealth, surplus capital and overproduction disregard the law of the rate of profits to fall empirical evidence. The empirical analysis reveals that crises arise from the very essence of capitalism, as there is a fundamental contradiction inherent in the motor of capitalism's development, namely technological progress. While it increases labour productivity, technological progress replaces labour at the same time with the means of production, thus decreasing the value of greater output. If less value and surplus-value is generated, less value and surplus-value can be realised. This again becomes the root cause of falling profitability and crises. It appears in different guises and can change to give it its own specific features, such as in the examples shown above and below in market failures, yet the underlying cause is the same. Marx's law on the tendency for the rate of profit to fall implies the truth that capitalist crises cannot be ended without ending the capitalist mode of production itself. Therefore, the emergence of the fourth industrial revolution is pure crisis of capitalism, which in my view is the crisis that puts an end to the current capitalist system we live within.

This fall in profit will happen over an extended period of time, however the question arises whether there is a possibility that high levels of automation can be sustained by the incessant generation of new products and new methods of production?

It is possible that high levels of automation may be sustained by the incessant generation of new products and new methods of production. However, the perpetual innovation economy in the age of information cannot solve the problem of the emergence of robotics. Knowledge as a vital source of corporate profits is being mass produced and will be subject to automation that pushes out the human labour element of the innovative process. What this means is automation causes the focus of surplus value creation to shift away from the production of goods and instead towards the production of innovation, of new knowledge for making goods (Kurz, 2010). The problem remains for capitalists forced to obey the coercive laws of competition to state that the only solution to this problem is to put increasing amounts of capital and labour into the development of better software, new techniques, and different products or to seek profits elsewhere via fictitious capital. Whatever happens there is a capital surplus absorption problem.

The spread of automated manufacturing, by severing the labour process and eliminating surplus value from the production of material objects, forces capitalist enterprises and capitalist economies to become perpetual innovators. The long-term survival of highly automated capitalist economies will depend upon the possibility of new knowledge being produced with the speed and consistency necessary to maintain corporate profits through a perpetual innovation economy.

2.3.3: Perpetual Innovation Economy

The idea of a highly automated perpetual innovation economy has controversial implications. The first is that fewer and fewer workers will be engaged in directly productive manual labour, more and more in indirectly productive tasks involving limited physical activity. The second is that information, and not merely any information, but information which contributes to productive processes becomes a commodity churned out by corporate enterprises as routinely as products through assembly lines. What these corporate enterprises must then concern themselves

with is not how they produce products but innovate these products. The structure is centred on the development, refinement, and alteration of productive processes because without these additions the product system loses its *raison d'être*. It is, in fact the quintessential perpetual innovation enterprise. The accelerating drift of surplus value creation from production to innovation can be observed, not only of individual enterprises but also at the highest level of the total economy.

Innovation often occurs in uneven patterns, as clusters of major inventions triggered subsidiary chains of minor innovation. The extent to which the commodification of knowledge can turn innovation into a steady flow remains to be seen. Even more fatefully, it remains to be seen how long demand for these new products of innovation can be sustained in a society characterised by highly unstable employment patterns caused by automation in the workplace.

As long as automated capitalist production maintains its viability through innovation, it creates new structures which expand the boundaries both of human potential and of human misery. The latter more likely under a capitalist economic system. I identify this aspect further in the following chapter through the futures of work.

2.4: The Inherent Paradox of Capitalism

Capitalism is incompatible with fully automated production in the whole of industry and agriculture (through agritech), because this no longer allows the creation of surplus-value or the valorisation of capital. The labour theory of value epitomises this contradiction through the ensuing tendency for the rate of profit to fall. Automation not only makes labour redundant, but also wealth creation. Without a labour-intensive economy, capital gains in real terms steadily decrease. When Mandel wrote *Late Capitalism*, total automation was limited to industries such as oil refining, that work on the continuous flow principle. Assembly line industries still required a substantial (though constantly declining) input of human labour. Since then, the development of robots and their incorporation into data-controlled production systems creates a realistic future prospect of worker-less factories (from the perspective of management no doubt 'worker-free' factories) even in complex assembly processes including the production of robots themselves. Our present situation is still far from the total automation Mandel depicted, yet if we accept that automated enterprises can make profits only parasitically, by absorbing the surplus value created in other parts of the economy, and that the rising level of automation must be accompanied either by increasing exploitation of the remaining labour force or by falling average levels of profit, then it would seem that advanced capitalist economies are heading towards their demise. The total automation of all productive activities is not only incompatible with capitalism but it destroys capitalism. We cannot even be sure if automation and advanced artificial intelligence can be compatible to human societies. However, what can be understood with the emergence of robotic autonomous systems (RAS) and highly automated capitalism are three things:

Firstly, highly automated systems are being deployed within a world economy marked by grotesque international inequalities of wealth, and will amplify such inequalities. Perpetual innovation economies of the type outlined above rely on the existence of sophisticated social structure including high levels of education, complex corporate networks, and strong state systems. Advanced developed nations whose economies are being transformed into highly automated information societies will use their existing advantages to strengthen the ties of dominance and dependence between themselves and less developed ones. Both the products of their automated factories and the commodified knowledge of their innovation-producing corporations will enable them to increase their unequal share of the benefits of global trade. This will be blessed by neo-classical economic thinking with the euphemism of comparative advantage.

Secondly, the diffusion of robotics and the emergence of perpetual innovation economies accentuates the central paradox of capitalism. The paradox is the gap between technology's increasing potential to liberate people from suffering, isolation and boredom and the reality of continuing human bondage to a dehumanising social and economic system.

Thirdly, income lost from replaced workers cannot be used to purchase the new products from the perpetual innovation economy without some form of financing for citizens. This financing cannot be tied to the current capitalist system through the

stock market because of the inability to protect itself from perpetually inherent volatile systemic crises.

2.5: The Endemicity of Market Failure and Crisis Capitalism

Inherent to the capitalist model is the innate and ever-present threat of crisis. Capitalist crises are portrayed as freakish and rare, likely to be the last one, however, crises are endemic to the capitalist model. Crises of capitalism are not uncommon throughout history, and capitalist nations have experienced many in the 21st century. According to Laeven and Valencia, there have been "147 banking crises...over the period 1970-2011. We also counted 218 currency crises and 66 sovereign crises over this period" (Laeven & Valencia, 2012, p3). What is more interesting is that one would think these numbers must be affecting developing economies, but instead, over the same period, "the recent wave of crises has (thus far) affected mostly advanced economies...and the effects of the crises are still lingering and in many cases the crisis is still ongoing" (Laeven & Valencia, 2012, p3). The results of these banking, currency and sovereign crises have huge economic and fiscal costs and are felt for years if not decades after they arise, most notably to those of us who do not reap grand rewards but always pay the costs when they hit.

A capitalist (financial or economic) crisis is any of a broad variety of situations in which some financial assets suddenly lose a large part of their nominal value. In the 19th and early 20th centuries, many financial crises were associated with banking panics, and recessions coincided with these panics. Other crises or crashes have included (but not limited to) stock market crashes, bursting of other financial bubbles (housing/dotcom/Dutch Tulip), currency crises, and sovereign defaults. Financial crises result in a loss of paper wealth (wealth measured by monetary value as reflected in price of assets and how much one's assets could be sold for) but do not necessarily result in changes in the real economy. There is no consensus or direct correlation from capitalism or capitalists as to how to prevent financial crises or crashes, and they are simply accepted to be part of the larger business cycle.

Capitalism was exposed globally in the 1929 Wall Street Crash, as it experienced its first widespread economic crash, commonly referred to as the Great Depression.

Beginning in the United States on 'Black Tuesday' October 29th, 1929, its effects lasted until the late 1930s as worldwide gross domestic product (GDP) fell by an estimated 15% by comparison, the Great Recession in 2008 saw worldwide GDP fall by "less than 1%" (Lowenstein, 2015). It can be argued that following the recovery of the Great Depression, we as a species have accepted the ongoing and regular cycle of boom-and-bust economics. The boom-and-bust cycle is a process of economic expansion and contraction that occurs repeatedly in capitalist societies. The repetition of crises across nations and as globalisation expands global crashes become more regular. Crisis and crises are ideologically inherent to capitalist systems.

The range of theories as to why a crisis happens will be recognisable in the following list of reasons why the "great recession of 2007-08 occurred but are not limited to:

- Unrestrained greed and other psychological propensities rooted in human nature
- Blind faith in neoliberal theories about the efficiency and self-sufficiency of markets
- institutional failure to monitor and regulate the financial sector and especially the banking system
- A failure of the collective imagination to understand systemic risk as well as heed the lessons of history: the ever recurring 'this-time-is-different syndrome'
- Severe imbalances in international financial, monetary and trading systems and the system of global governance
- An ill-conceived Anglo-Saxon model of capitalism exposing itself on the world economy
- Big government along with too much regulation of the wrong kind
- A long-term crisis of over-accumulation and profitability as well as underconsumption caused by decades of excessive exploitation
- The historical tendency of the rate of profit to fall as predicted by Marx in volume three of Capital

- A blockage to the new forms of capital accumulation which are thought to have emerged with the development of cognitive capitalism
- A secular stagnation tendency of monopoly-finance capital rather than rapid growth – generating a surplus-capital absorption problem" (Feldner & Vighi, 2014, pp11-12)

Hyman Minsky confirms that the "fundamental characteristic of our economy is that the financial system swings between robustness and fragility and these swings are an integral part of the process that generates business cycles" (Minsky, 1974). Minsky's Financial Instability Hypothesis (FIH) proposes that transition towards instability will inevitably reach financial crash which is referenced as a Minsky moment (Cassidy, 2008).

Minsky identified five stages in a bubble:

- 1) Displacement A trigger event, such as a new technology or falling interest rates
- 2) Boom When asset prices start rising
- 3) Euphoria When investors' caution is thrown to the wind
- 4) Profit-Taking When intelligent investors start taking profits
- 5) Panic A period of collapsing asset prices and mass bankruptcy (Minsky, 1974).

In *Capitalism, Socialism and Democracy*, Joseph Schumpeter developed the concept 'creative destruction' arguing that the creative-destructive forces unleashed by capitalism would eventually lead to its demise as a system (Schumpeter, 1942). The idea of markets acting as self-correcting systems through an "invisible hand" of markets can fix the issues without the state having to step in to correct problems caused by capitalism (Smith, 1776, p349). Paul Krugman highlights in *Return of Depression Economics* that recent financial crises provide evidence that markets consistently behave irrationally, directly contradicting neoclassical ideas of an efficient free market system (Krugman, 2008).

When a crisis arises, government(s), businesses and media indicate to 'tighten belts', because the government is 'living beyond its means' or they need to 'get their fiscal

house in order' and that cuts are required to supposedly non-essentials such as arts, international aid, and leisure. To remedy the crisis of capitalism, we also need to be more productive, work harder and go back to capitalist basics by deregulating and cutting public expenditure. The "age of austerity" began during a time in which 'we had maxed out the credit cards' (Cameron, 2009). Paul Krugman argued that austerity had been a political choice as it "deprives the economy of precious funds that can circulate and add to a poor economy. If there is large unemployment, there cannot be sufficient consumption. Under poor consumption people are unable to spend and markets cannot thrive" (Krugman, 2012). Krugman disputes that although it is necessary to cut debt, it is the worst moment to do so at the time when an economy has just suffered severe financial shocks. However, the analogies of 'belt-tightening' and 'maxing out the credit cards' are regularly regurgitated and repeated during political discourse across media so often that they became not only believable, but an accepted fact. This has to be understood as the fallacy it is and democracies that perpetuate this fallacy must be held to account.

Neoliberal policies are everywhere beset by market failures. Not only were the banks too big to fail, but so are the corporations now charged with delivering public services. Neoliberals misunderstand that vital national services cannot be allowed to collapse, which means that competition cannot run its course. Business takes profits yet the state (and the public) gets the risk as Mazzucato acknowledges in The Entrepreneurial State (Mazzucato, 2014). The greater the failure, the more extreme the ideology becomes. Government(s) use neoliberal crises as both excuse and opportunity to cut taxes, privatise remaining public services, cut the social safety net, deregulate corporations and re-regulate citizens.

"Supporters of markets see it as the only reliable mechanism to create wealth; it promotes efficiency, responds to consumer wants, and provides freedom of choice and political liberty. On the other hand, markets do not rectify social costs and in doing so fails to provide public goods, generates deep inequalities in society and markets have the ability to corrupt the democratic process" (Heywood, 2004, p344).

Ha-Joon Chang confirms that "market and democracy clash at the fundamental level" (Chang, 2007). Chang advocates a system of capitalism in which the

government has a higher degree of control over the economy and wariness towards the neoliberal version of capitalism with minimal government involvement (Chang, 2010). Jodi Dean confirms this as contemporary economic and financial calamities dispel any notion that capitalism is a viable economic system, and "the fantasy that democracy exerts a force for economic justice has dissolved as the US government funnels trillions of dollars to banks and European central banks rig national governments and cut social programs to keep themselves afloat" (Dean, 2012, p21). Not only is democracy incompatible with capitalism, nation-states part of the capitalist system but they are keeping the economic system afloat through finance and ever-increasing debt. We live in crisis capitalism where crises and market failures are endemic and no longer need labour-intensive growth cycles. The reason this cannot be done is because of technological automation. Hence, we live in a debt-based, bubble-to-bubble, hyper-financialised economic system, where wealth creation is increasingly stimulated in financial markets which are in turn propped up by Central Banks printing money to attempt to bring balance to an imbalanced system. Nouriel Roubini states in *The Age of Megathreats* that:

"The next crisis will not be like its predecessors. In the 1970s, we had stagflation but no massive debt crises because debt levels were low. After 2008, we had a debt crisis followed by low inflation or deflation because the credit crunch had generated a negative demand shock. Today, we face supply shocks in a context of much higher debt levels, implying that we are heading for a combination of 1970s-style stagflation and 2008-style debt crises – that is, a stagflationary debt crisis" (Roubini, 2021). Roubini predicted the 2008 Global Recession and states that again the next economic crisis "will not be short and shallow but long and severe" (Roubini, 2022).

Roubini believes that:

"Today's higher inflation is a global phenomenon, most central banks are tightening at the same time, thereby increasing the probability of a synchronised global recession. This tightening is already having an effect: bubbles are deflating everywhere – including in public and private equity, real estate, housing, meme stocks, crypto, Spacs (special purpose acquisition companies), bonds, and credit

instruments. Real and financial wealth is falling, and debts and debt-servicing ratios are rising" (Roubini, 2022).

Martin Wolf also believes the reason markets are unstable and endemic because of "the links between debt, money, and credit" (Wolf, 2014b, p119).

"The advantage of debt...is that lenders do not have to monitor what borrowers are doing, which is inherently costly. But once lenders, learn that important classes of borrowers are close to, or in, default, they are likely to become nervous. If enough lenders become nervous at the same time, interest rates will jump, and the market value of tradable loans will collapse. Lenders then provide funds on ever-shorter maturities. Such maturity mismatches - situations in which liabilities have shorter terms than assets they fund - make finance inherently unstable" (Wolf, 2014b, p119).

The ever-present rising debt that government(s) and nation-states are utilising through quantitative easing (QE) cannot be sustained to simply keep the economic system afloat. The impending debt crisis is yet another example of the inevitable existential crisis of capitalism.

2.6: An Inevitable Crisis of Capitalism

Capitalism has been part of our history, socio-economically, politically, and culturally. It has become our default way of life that we accept ideologically because sociopolitically neither our representatives nor the wider public seek an alternative. An alternative is available, but those who have power always seek to retain capitalism and suppress opposition. One should not underestimate the influential power of the capitalist classes as they promote the retention of a system that best suits them. There is somewhat of an acceptance whether explicitly or implicitly, that "the capitalist mode of production possesses the miraculous ability to renew itself eternally, unless it is opposed and overthrown" (Feldner & Vighi, 2014, p12). The success of the free-market for creating wealth is widely accepted. Marx acknowledges this in *The Communist Manifesto*; however, he concluded the system needed to be abolished (Marx, 1848). The predominant economic trend in the West was for *laissez-faire* to be abandoned as government(s) assumed growing responsibility for economic and social life. Government(s) created welfare states providing a social wage and government(s) managed their economies through fiscal and monetary policies and in many cases exerted direct influence onto their economies, taking industries into public ownership and national control giving credence to the belief that this explains widespread prosperity in advanced capitalist nations. Only government(s) intervention (or effective regulation) can force businesses to take account of social costs.

Neoliberal free market fundamentalism offers the opposite and has no counterbalance when monopolies form and conglomerates choose cooperative behaviour over competition. Such conglomerates and cartels set price agreements and work together to exclude new competitors to the marketplace. Yet another contradiction within capitalist competition and why a perpetual innovation economy is paradoxical. Within many sectors most economic markets are dominated by a small number of corporations meaning consumers quite often have little market power. Ironically when individual workers seek to gain power by acting collectively through unionisation, they are vehemently opposed. The market responds to effective demand with the ability to pay rather than human needs. This means that resources are used for the "production of expensive cars, high fashion and other luxuries for the rich rather than providing decent housing, and an adequate diet for the mass of society" (Heywood, 2004, p342). Paul Krugman challenges the effectiveness of the price mechanism whereby prices signal the efficient allocation of resources arguing instead for the incorporation of behavioural economics in the pursuit of policy and regulation of markets, to counteract the consequences of irrational decision making (Krugman, 2008). Market values skew rewards rather than benefiting society and this enables media personalities and sports stars to be paid substantially more than teachers, nurses, soldiers, and doctors. The market destroys social values instead rewarding greed and selfishness isolating citizens who have little incentive to fulfil social and civic responsibilities. It would be a mistake to believe the market is a level playing field and capitalism is meritocratic. Instead, the

distribution of wealth and income is influenced by social background, inheritance, nepotism, education, and access.

The Austrian variant of political economy that argues for a small state, noninterventionist, trickle-down, free-trade, low-tax model based around the ideas of Friedrich von Hayek has dominated. It replaced the Keynesian variant because in the 1970s a free-market approach was seen as the answer to the challenges of the time: inflation, weak corporate profitability, and a loss of business dynamism. Proponents of capitalism cannot say it is a perfect system, merely that, so far at least, it has proved to be more durable than its rivals. The flexibility to adapt to changing circumstances is a big part of this. The state is now a much more powerful economic actor than it was before the Covid-19 pandemic. The pandemic exposed fundamental vulnerabilities in the British state. Underfunded institutions, weak processes and systems, and gulfs between decision-making in central and local government(s).

In retrospect, the last hurrah for the Austrian variant was the aftermath of the Great Recession, bringing a period of economic orthodoxy insisting on austerity to balance the books. The results have been weak growth, low investment, and stagnating living standards. Central banks found it difficult to raise interest rates from their rock-bottom levels, because so many people on low incomes were relying on debt to get by, and higher borrowing costs would have tipped them over the edge. At the other end of the spectrum, corporate and personal taxes were cut, and the wealthy got wealthier. The big tech giants used their market power to prevent new start-ups from posing a threat. Voters started to get the impression that the system only really worked for those at the top...and they are right. Populist backlashes were aimed primarily at governments, but the biggest problem is the capitalist economic system itself.

Trickle-down economics is a fallacy. For years wealth at the very top has soared with very little trickling down. Stagflation has shown in reality that wealthy capitalists do not create jobs or raise wages. Rather jobs are created when working people earn enough to buy all the goods and services they help produce, enabling companies to hire more people and pay them higher wages.

There is a moral case for the removal of the capitalist system and the ruling class it breeds. The market is destructive of social values breeding selfishness and greed as staples which creates such isolated individuals who have little incentive to fulfil any civic or social responsibilities. Capitalism is a threat to democracy and democratic values as genuine democracy is impossible within a context of economic inequality. Party competition is unbalanced for example when pro-business parties are financially better funded than pro-labour ones. Pro-business parties are sympathetically favoured by privately owned media outlets. As the principal source of employment and investment, private corporations exert considerable sway over government(s), regardless of manifesto commitments or ideological leanings.

2.7: An Accepted and Embedded Culture: Capitalism as a Way of Life

Capitalism has become a way of life for us across the globe, be it economically, physically, socially, politically, culturally, sociologically, or psychologically. We have all been conditioned into accepting capitalism in our everyday lives.

Slovenian philosopher Slavoj Žižek claims that we, the people, know full well that neoliberalism has inherent flaws and contradictions, but we continue to participate in its regulatory processes regardless. Žižek writes that the "cynical subject is quite aware of the distance between the ideological mask and the social reality but he none the less still insists upon the mask" (Žižek, 1989, p25). The guilt resulting from this fissure between what is perceived as being necessary to ensure the continuation of neoliberalism (economic subordination, cultural appropriation and human exploitation for instance) and the disturbing knowledge that the individual may be somewhat responsible in the detrimental process that results from it is filled by a resulting "social reality" exemplified in the rise of so-called "cultural capitalism" or in other words, capitalism with a human face (Žižek, 2009, p34).

"At this point we reach the supreme irony of how ideology functions today: it appears precisely as its own opposite, as a radical critique of ideological utopias. The predominant ideology today is not a positive vision of some utopian future but a cynical resignation, an acceptance of how 'the world really is', accompanied by a

warning that, if we cannot change it (too much), only totalitarian horror can ensue" (Žižek, 2019).

The creative destruction that breeds possessive individualism of citizens has become the norm within the wider dog-eat-dog social fabric of capitalism. The deep inconsistencies innate to the capitalist model must enable us to not only recognise the tactics, but analyse them and formulate a response to make wiser policy decisions to repair it, better it, or replace it. The market as shown is not a selfcorrecting system as Adam Smith proponents believe via the invisible hand analogy, but an erratic system made up of billions of players in a fast-moving world. By understanding this, we view capitalism not just as an economic model but a sociopolitical and cultural superstructure. By recognising capitalism in everyday life, we understand its flaws, and in doing so we can seek alternatives and move out of the capitalist status quo. We cannot move to an alternative format of capitalism overnight. Instead, we must remove the inherent contradictions of capital accumulation and consolidate the resources we have to redistribute amongst citizens of the state.

The capitalist system is not only innately flawed, contradictory, and crisis ridden but morally bankrupt. Under capitalism there must always be winners and losers in the free market with billions more losers than winners on a grand scale. We understand this because the flaws inherent to capitalism have throughout history created aristocracies, plutocracies, monopolies, oligopolies, and grotesque inequality. This will be brutally exposed by technological automation as more human workers will be replaced than new ones entering the workplace. Capitalism must now be viewed as an epoch nearing its end. The formations of capitalism started leading to the decline of feudalism, and similarly post-capitalism can only be achieved when the new epoch starts to move out the old.

The French Sociologist Émile Durkheim stated:

"What history teaches us is that man does not change arbitrarily; he does not transform himself at will on hearing the voices of inspired prophets. The reason is that all change, in colliding with the inherited institutions of the past, is inevitably

hard and laborious; consequently, it only takes place in response to the demands of necessity. For change to be brought about it is not enough that it should be seen as desirable; it must be the product of changes within the whole network of diverse causal relationships which determine the situation on man" (Durkheim, 1977, p329-330).

There is an alternative to capitalism and we as citizens must accept that we are entitled to a better economic system than the current. We must seek a higher standard of our politician(s), government(s), and nation-state(s), and in doing so call for greater transparency, economic protection, and greater stability and sustainability. Capitalism cannot guarantee us this, let alone provide it for all, and therefore it must be replaced gradually to promote a new sustainable, progressive culture and way of life. German sociologist Wolfgang Streeck argues that:

"For capitalists and their retainers, the future looks like a decidedly bumpy ride. Low growth will refuse them additional resources with which to settle distributional conflicts and pacify discontent. Bubbles are waiting to burst, out of the blue, and it is not certain whether states will regain the capacity to take care of victims in time. The stagnant economy that is shaping up will be far from stationary or steady-state economy; as growth declines and risks increase, the struggle for survival will become more intense. Rather than restoring the protective limits to commodification that were rendered obsolete by globalization, ever new ways will be sought to exploit nature, extend and intensify working time, and encourage what the jargons call creative finance, in a desperate effort to keep profits up and capital accumulation going. The scenario of 'stagnation with a chance of bubbles' may most plausibly be imagined as a battle of all against all, punctured by occasional panics and with the playing of endgames becoming a popular pastime" (Streeck, 2016, p67).

Karl Polanyi's *The Great Transformation* (1944) argued the state created pushing, not only nudging the most 'capitalist' of all markets, the 'national market' (while local and international ones have pre-dated capitalism). The capitalist economy will always be subordinate to the state and subject to its changes (Polanyi, 1944). Thus, rather than relying on the false dream that markets will run the world optimally for

us if we just leave it be, policymakers must better learn how to efficiently use the tools to and means to shape and create markets - making things happen that otherwise would not. Increasingly this requires the state(s), government(s), and citizen(s) to be not only smart but inclusive and sustainable.

2.8: Chapter Summary

This chapter has found that capitalism has been wondrously productive yet hugely problematic. On the downside, capitalism is inherently exploitative, anti-democratic, unequal, alienating, unstable, and unsustainable; promotes excessive inequality, valorises immediate returns over long-term benefits; commodifies people, addicts us to unnecessary products, encourages excessive consumption of the world's resources with disastrous consequences, erodes human rights, incentivises imperialist expansion and warfare. This chapter has shown that the internal contradictions of capitalism cannot provide a sustainable economic system, let alone a utopia.

This chapter found that the crisis for citizens, nations, and states, and that of capitalism itself, is that of automation. I argue this on the basis shown through the LTV wherein only human labour creates value. The replacement of technology by capitalists competing with other capitalists, driven by the coercive laws to lower costs in search of profit accumulation will be forced to remove human workers for technological replacements. The law of the tendency of the rate of profit to fall as the value and surplus value generated by capitalists investing in new technological methods of production then begins to fall. The capitalists that invest in technological advancement earlier become more efficient and profitable in the short run as they produce a greater output. By selling this output to others at the same price, or even lower compared with those capitalists that did not or could not invest in technological advancement, modernising capitalists appropriate a share of the surplus-value produced by the latter. Their rate of profit rises, but that of the nonmodernising capitalists, and of the economy as a whole, falls. Capitalists are forced to compete with others by the coercive laws of competition, further diminishing valorisation through automation. Were other capitalists to modernise with

technology in replacement of human labour, the profitability would fall even further. The less profitable capitalists go bankrupt and eventually the mass of profit falls as well, and a crisis ensues. This time, it is a crisis in which workers without work cannot afford to buy the commodities created by the automated technology that replaced them. Yet another crisis ensues. Who buys the products of robot workers when there are not enough wages to afford what is being sold on the market by those replaced? How in turn can the capitalist make a profit and keep their business sustainable, let alone profitable?

We are entering a new phase of capitalist ideology, where productive labour is on the way out (not completely but substantially) and the speculative sector is more and more central to capitalist accumulation - but no longer based on M-C-M'; rather on M-M', with Central Banks as 'buyers and lenders of last resort'. What would the role of government and the state be here? Crucially, without either the worker or capitalist receiving a wage how does the state respond or function?

There can be an alternative to capitalism and we as citizens must accept that we are entitled to a better economic system than the current model. We must seek a higher standard of our representative politician(s), government(s), and nation-state, and in doing so call for greater transparency, economic protection, greater stability and sustainability. Capitalism cannot guarantee us this, let alone provide it for the majority, therefore, it must be replaced gradually to promote a new sustainable, progressive culture and way of life. This leads to the evolutionary ethically responsible state.

Chapter 3: The Role and Responsibility of the Evolutionary State

3.1: Introduction

In this chapter I highlight what the theoretical future holds for societies under a hierarchical capitalist economy when post-scarcity becomes available. Whether the role of the state polity should evolve? What does this evolution consist of? What role citizenship has in relation to state evolution understanding if adopting a social contract ensures citizens become stakeholders of their state(s)? In doing so I seek to question what role government(s) play in the process and within the state's evolution? By evolution, I refer to the shifting baseline of how a system is measured, usually against previous reference points (baselines), that represent significant changes from an even earlier state of the system. The evolutionary role of the state has shifted over time and we as citizens must reflect and look to progress from previous baselines of our state. This can be done comparatively from century to century, generationally, or at a much more granular level annually. With new developments, through scientific and technological progression, information and experience, the state, its representative government(s) and citizens must all seek to be doing better through such progression.

I question in this chapter what the role of the state has been and what it now ought to be regarding the potential for technology in the future for the betterment of citizens lives. This chapter seeks to understand the theoretical potential of the four futures of work as considered by the Royal Society for the encouragement of Arts (RSA) and Peter Frase's *Four Futures: Visions of the World after Capitalism*. In doing so, I highlight why capitalism and its hierarchical nature requires the state and citizenry to bond together through a social contract that can create the next evolutionary development towards an ethically responsible state and citizenry. In short, I question whether the state should provide the necessities for its citizens out of a duty of responsibility to its citizenry through an ever-evolving social contract?

The evolution of the state begins from the Hobbesian 'state of nature' which is a theoretical argument used by Thomas Hobbes to show what would exist if there were no government, no civilization, no laws, and no common power to restrain

human nature. Life in a state of nature in Hobbes's view was "solitary, poor, nasty, brutish and short" (Hobbes, 1651, p xiii. 9). The Term 'State' can be used to refer to a number of things: a territorial unit, a historical entity, a collection of institutions, a philosophical idea and so on. The state is often confused with government and the two terms are often mistakenly used interchangeably. The relationship between government and state can be complex. Government is part of the state, and can be at times its most important part, but is only an element within the much larger and powerful entity, that is the modern state. The state is thus "a neutral entity, acting in the interests of all and representing what can be called the 'common good' or 'public interest' (Heywood, 2004, p79). Murray Rothbard confirms "the state is almost universally considered an institution of social service" (Rothbard, 2009, p9).

The state in the words of Franz Oppenheimer, is the "organisation of the political means"; it is the systemisation of the predatory process over (or within) a given territory (Oppenheimer, 1926, p24). The state is thus the sovereign entity that is the longstanding embodiment that represents the nation by placing citizen's wellbeing (health and happiness); welfare (economic, physical, social), and education (development and attainment) at the heart of its being. When the citizens' welfare, wellbeing and education are placed at the forefront of the state and government then the citizenry can comfortably claim that they are in receipt of being able to attain an authentically genuine life. For Hegel, the state was the culmination of moral action, where freedom of choice leads to unity of the national will, and all parts of society were nourished within the health of the whole (Hegel, 1820).

Clearly the state within the current capitalist status quo cements the perpetuation of class domination in favour of the ruling capitalist class under the economic capitalist mode of production, and the state exists to defend the ruling class's claims to private property and it's capturing of surplus profits at the expense of the majority populace. The state ought instead to be made up of organised future orientated political institutions that put the wellbeing and welfare of its citizens at the forefront. In doing so the state by way of government and institutions provide for its citizenry a more developed and entrenched provision of protection and investment. I will argue that the binding of the state and citizen through an expressed social contract

is how government(s) can provide a genuinely authentic life for its citizenry and ought only to propose this if it were to act as a future-orientated ethically responsible state that invests, protects, and provides for its citizenry.

Whilst the arguments in this work and the ideology behind this research can theoretically be applied to many nations and states experiencing advanced and late capitalism, I make these arguments based primarily from the perspective of the United Kingdom (UK). The UK is a British sovereign state which has a parliamentary democracy, monarchy and is a capitalist, multicultural, liberal democracy. The British state has evolved and adapted throughout the centuries as protector provider. This adaption and evolution of the state I believe is needed now because of the advancement in technologies that can be harnessed progressively to make citizens' lives better. To do so, the potential of a post-scarcity economy of a well-developed nation like the UK will need to align itself more closely with its citizenry. The advancement in technology will merge the citizenry closer to the state and I seek to understand whether this can be obtained through an expressed social contract. An expressed social contract has the ability to provide the citizen(s) with rights to demand an ethically responsible state that ought to be in place but is not because of the capitalist ideological framework that is ingrained into society. I also highlight the importance of future-orientated ethics through Hans Jonas to expose the shorttermism and short-sightedness of government(s) and inevitably the state. The ethics behind the ethically responsible state are to act whereby nation-states prioritise their citizens through protection, provision, and investment to make their lives better.

Tim Berners-Lee has stated that "ethics, like technology, is design...as we are designing the system, we're designing society" (Lomas, 2018). Therefore, government(s) (actors on behalf of the state) should act in the interest of public policy over private interest. On occasions there will be times when prioritising private interest is in the best interest of the public. By contrast citizens of the state should act in the interests of the stakeholders. The stakeholders in this work are both the citizen and the state. The role of the government of the day will be crucially important and the roles it will play in this state as the facilitator of legitimate, fairly elected, and provider/investor of the basic necessities which upholds the citizen-

state connection. The government is the actor of the state and facilitator for the citizenry.

The state is the sovereign political body of a given territory, an association of people or other units who have been organised together for mutual benefit. The state entity represents the nation, and an elected government is thus the entity responsible for governing the state. That is, government(s) are the means through which state power is employed. States are served by a continuous succession of democratically elected governments. Government(s) will come and go, but the state remains. A sovereign state has the full right and power of a governing body over itself, without any interference from outside sources or bodies. While the state and its representative government are separate entities, I want to acknowledge from the outset that the term 'state' and 'government' are not synonyms. The state remains and exists throughout, while government(s) are the political overseers of the term(s) in which they are freely elected. The state exists without a government, but a government cannot exist without a state. The state plays an important role in this work as it is the state to which the citizens contract themselves should they choose. The nexus between the state and citizen is facilitated through an expressed contract and both government and citizenry lead the role of ensuring the contract between citizen and state is fulfilled. This nexus is enacted by government as the actor for this duopoly. In doing so an ethically responsible state is created democratically, enacted legally, and sustained by a social contract between citizen and state. This will legitimise the authority of the state and government and their role as being ethically responsible. A binding contract would ensure the state's duty as protector, provider, and investor in their citizenry through elected representative government(s). In turn, the contract would provide the citizens an insurance for their protection, provision, and investment from their state should they choose to become full members. In doing so they would have a duty to fulfil their potential and their roles as contributors to society and their state's communities.

3.2: The Role of the State: Protector and Provider

The role of the state has historically been at its simplest form a justification of power and protector. At its most basic the government protects citizens from violence. This idea was born out of Thomas Hobbes' *Leviathan* (1651) which describes a world in a state of nature of unrelenting insecurity without a government to provide law and order, nor protecting citizens from each other or from foreign foes. Hobbes argued that when the chaos of war and disorder mounted high, citizens will choose (primarily out of fear) even despotic and fanatical governments because "everyone of that province is obliged to do all he shall do in the name of the sovereign" which gives credence to the divine right of kings and absolutism (Hobbes, 1651, p179).

I do however believe the 21st century state has evolved since its inception and with this evolution, so has the role of government as protector. The role of the state has evolved and changed for many differing nations over time. Initially states emerged over territories built by conquest in which one culture, one set of ideals and one set of laws were imposed by force or threat over diverse nations by a civilian and military bureaucracy. Currently, that is not always the case and there are multinational states, federated states, and autonomous areas within states. Since the late 19th century, virtually the entirety of the world's inhabitable land has been drawn into areas with more or less definitive borders claimed by various states. Currently the international community comprises around 200 sovereign states, the vast majority of which are represented in the United Nations (UN).

The idea of government as protector required taxes to fund, train and equip a military and police force; to build courts and jails; and to elect or appoint the officials to pass and implement the laws that citizens ought to adhere to. Regarding foreign threats, government as protector requires the ability to meet and ally with other governments, as well as to go to war with them. However, if we take the minimalist view of government in that all it should do is protect its citizens, what does protection look like? Is it simply protection from other states in the form of armies and warfare or protection from other citizens within the state such as providing a prison system, police, and judiciary to decide punishments? Perhaps the state may not even warrant a judiciary as part of minimalist protection? Protection even on a minimal scale may entail protection from a number of things such as protection of

rights, welfare, health, shelter or economic protection? Minimalist protection by the state could theoretically apply to a few different things. The minimalist view of the state has changed over time as it garners more revenue from citizens through taxes and other ventures. The state I argue must evolve to better protect and provide for its citizenry financially and this must be the primary goal. I say this because without a citizenry, how could a state be legitimate? Without a citizenry there is no state, and without provision no citizenry.

3.2.1: Government as Provider

The governments of many states around the world are providers for their citizens including the UK. Government as provider for goods and services that individuals could not provide individually for themselves on a mass scale include healthcare, education, infrastructure, and opportunities. The basic economic infrastructure of human connectivity falls into this category through the means of physical travel, such as roads, bridges, and ports of all kinds, and increasingly the means of virtual travel, such as broadband. This infrastructure can be, and typically is provided by private entrepreneurs who see an opportunity to build a road, say, and charge users a toll, but the capital necessary is so great and the public benefit so obvious that ultimately the government takes over because they benefit as much, if not more, when the public benefits from greater access to resources. Whether the public benefit through government infrastructure through better broadband, interconnected transport, or access to world class healthcare shall be understood below.

A more expansive concept of government(s) as provider is the welfare state where government(s) cushions the inability of citizens to provide for themselves, particularly in the vulnerable conditions of youth, old age, sickness, disability, and unemployment due to economic forces beyond their citizens' control. As the welfare state has evolved, we understand the role of government as protector from the harsh results of capitalism, or perhaps as a means of protecting the capitalist class from the political discontent of the non-aligned. At its best, however, it is providing an infrastructure of care to enable citizens to survive socially and economically in the same way that the capitalist infrastructure of competition does. The state provides a

minimum social security that does not enable citizens to flourish but survive economic uncertainty. The provision of welfare has historically provided basic protection to citizens.

The shifting baseline and evolution of the state ought to give more opportunities for citizens to flourish. The citizenry will expect a more expansive state to meet their expanding means of protection and provision. The successes of the state should be felt by the citizen and likewise the citizens contribute to a successful state. This is the basis of my argument for the duty of the responsible state and the duty of the citizen. It is here that I want to argue for the basis of the responsible state using Hans Jonas's 'The Imperative of Responsibility: In search of an Ethics for the Technological Age'(1984) as an important aspect in this work. I do so because his search of an ethics for the technological age gives an insight into his formulation of ethics and the responsibility of future sustainable development. Jonas argues that responsibility finds itself responsible for the future with responsibility and accountability in present time. By this I believe he means that people should act in such a way that the effects of their actions are compatible with the preservation of an authentically human life on earth. The implications of this principle of responsibility means being aware of what is being done now and to act in relation to their offspring as current generations are aware of their future actions whereas future generations can neither claim right nor respect the obligations to current generations. Therefore, the reciprocity in rights and duties of intergenerational justice should be redistributed between generations. The ethical argument for environmental disaster and the climate emergency has been called for by Jonas and it is this argument that is most prevalent today. According to Jonas the preservation of nature and value of the natural world goes beyond use of nature as all nature is an object of human responsibility (Jonas, 1984). Nature is an integral part of the scope of responsibility as it is not just nationally, but globally important to the survival of all species. The obligation to preserve human life and nature is therefore key because this obligation of a finite planet and ecological threat means selflimitation is a requirement to protect environmental resources for future generations. Future generations are just as entitled to this planet as we are, and they must

inherit nature as a legacy to provide an authentic life on earth in the future. The legacy of mankind globally or of a single state's citizenry is dependent on futureorientated thinking, cooperation, long-term and short-term action. The single state cannot do this alone having to work with other states for the benefit of the whole planet.

Earth is not man's planet alone; we share it with a variety of species. Humans have committed the ecological damage to the planet (past and present), and it is our duty to reverse this trend for current and future inhabitants of the planet. We only have one currently habitable planet Earth and there are no second chances, so when a species becomes extinct, that is the end. When it comes to the survival of the planet, we cannot afford to be ignorant or apathetic. The ecological argument is crucial here, in that the individual state has the responsibility to act through its governments, and citizens have a duty to act responsibly and to use resources sustainably and not to spend or act recklessly, wastefully, or extravagantly. Man cannot be fully human without nature; the destruction of nature is a threat to man's own essence and as a part of that nature man has responsibility to protect and preserve nature. The 'creative destruction' and creative tendencies of capitalism ignores the ecological crisis we face. Marx admired capitalism's creativity but he "strongly emphasised its self-destructiveness. The Schumpeterian's have all along gloried in capitalism's endless creativity while treating the destructiveness as mostly a matter of the normal costs of doing business" (Harvey, 2010, p46). The ecological crisis is not one that can be a normal cost of doing business.

A state's government that is aware of the damaging effects of climate change but fails to tackle the problem is clearly an example of irresponsible government and history will remember them for it. Whereas an ethically responsible state is one that would prioritise the issues that have a damaging effect on citizens and instead acts in a way that is ethically responsible. Another example of an irresponsible state or government is one that allows its citizens to fall below the poverty line and leaves citizens without economic protection. An ethically responsible government would be bound to address the issues of poverty which could mean funding citizens through a

basic income because it is the responsibility of the state and therefore the government as its primary actor.

Jonas gives the concept of responsibility a new dimension to traditional ethical theory because it is inadequate when considering future generations. Jonas does this by expressing a reformulation of Immanuel Kant's categorical imperative. Act so that the effects of your action are compatible with the permanence of genuine human life. We must therefore ensure that the effects of our actions do not destroy future genuine human life. To ensure genuine human life means to protect the future humanity's autonomy, dignity, integrity, and vulnerability. The citizen and the state here are both responsible for future-orientated action. The government of the day currently serves a five-year term in the UK, so they and the democratic voter are more concerned about the present than by the future, more by their own desires immediately than the needs of distant future generations. It is simply rational for individuals to make choices that in a long term are irrational. Jonas's theory of responsibility takes on the importance of value and very basic value-choice problems. There is a connection between environmental crises and values, and our ability to prioritise, to choose between values are challenged. I believe most people would agree that human survival has priority over for example income equalisation in both the short and long-term. However, governments today only plan and prioritise for as long as they are in office, so why consider anything long-term that may not be your problem in the future? Granted this may well be an extreme case of government but for me and my argument, this is the reason government should not be the sole bearer of responsibility. Government must be the actor and facilitator on behalf of the citizen and state. Government would ideally prioritise itself with the day-to-day dealings of the citizen and state. However, there must be the overarching concerns of both citizen and state. This includes climate change, long term infrastructure planning, technological advancements as well as international relations concerning diplomacy, trade, and global issues.

3.2.2: Government as Investor

Mariana Mazzucato highlighted in *The Entrepreneurial State: Debunking Public vs Private Sector Myths* that the idea of the state being a static bureaucratic organisation only needed to fix market failures, leaving dynamic entrepreneurship and innovation to the private sector is false (Mazzucato, 2015). Mazzucato outlined a variety of case studies across different sectors, including pharmaceuticals, clean technology, and biotech, to highlight that the high-risk investments are being made by the state before the private sector gets involved and credited with the final product. Mazzucato showed that the iPhone's technologies that make it 'smart' such as "the internet, wireless networks, GPS, microelectronics, touch-screen display, and voice-activated assistant Siri personal assistant" were all US government funded (Mazzucato, 2015, pp202-203). The United States economic success (including Apple, Google, and Microsoft) is, thus, a result of public and state funded investments in innovation and technology, rather than a result of the small state, free market doctrine that often receives credit for the nation's strong economy. The corporations that build robots and other labour-displacing technologies are essentially using the research and intellectual property generated by governmentfunded organisations such as universities for free that benefit enormously from various forms of public investment. Mazzucato exposes the fact that the state is the primary risk taker in innovation-based investment and that the socialisation of risks for radical innovation requires rethinking how the rewards are privatised with the aim of producing more inclusive growth.

Government(s) typically makes investments in human and physical infrastructure that individual employees and business enterprises cannot fund themselves because of high fixed costs that innovation requires and the degree of uncertainty that such investment entails as stated above in the example of public roads. Often the state/government subsidises businesses to employ workers, compete with other businesses (both foreign and domestic), and in times of collapse, government(s) may step in (depending on the size of the business or sector) as in the 'too big to fail' banks of the 2008 global financial crash. Neither state nor government step in to help a corner shop or SME stay in business but will often provide help to bigger businesses and multi-nationals. Government(s) helps many businesses in the initial

set-up stages where they are aware and offer such support, but this is not transparent or clear to many budding start-ups. Often the entrepreneurs do not seek support from government or the state but should be offered it throughout its business cycles in a fair and transparent manner. A government investor must be one that enables and promotes innovation for the benefit of citizens rather than for private profits. Government(s) do invest regularly in research and development (R&D) to innovate industries, technologies, and societies for the greater good but these as Mazzucato confirms often end up with private companies making the most profit from the state's early investments. The role of government traditionally, therefore, has been more about fixing network failures than about failure in the market. It has also been about preventing opportunity failures when government(s) willingness to think big and take risks has created new opportunities and markets, whereas the private sector has shied away because of the long-time horizons and the high failure rates. In response to this problem, William Lazonick and Marianna Mazzucato (2013) proposed a risk-reward nexus framework to address such innovation and inequality. They argue that it "is collective, cumulative and uncertain characteristics of the innovation process that make this disconnect between risks and rewards possible" (Lazonick & Mazzucato, 2013). Mazzucato confirms in the *Entrepreneurial State* that:

"Across [the] different types of collective actors (in the 'ecosystem'), the distribution of financial rewards from the innovation process reflects the distribution of contributions to the innovation process, innovation tends to reduce inequality. When, however, some actors are able to reap shares of financial rewards from the innovation process that are disproportionate to their contributions to the process, innovation increases inequality. The latter outcome occurs when certain actors are able to position themselves at the point – along the cumulative innovation curve – where the innovative enterprise generates financial returns; that is, close to the final product market or, in some cases, close to a financial market such as the stock market. These favoured actors then propound ideological arguments, typically with intellectual roots in neoclassical economics (and the related field of 'shareholder value'), that justify the disproportionate shares of the gains from innovation that

they have been able to appropriate. These ideological arguments invariably favour financial contributions to the innovation process over both worker contributions and taxpayer contributions. Ultimately, precisely because the risk-reward nexus not only results in greater inequality but also undermines the innovation process itself" (Mazzucato, 2015, p201).

Lazonick and Mazzucato's call to amend the risk-reward nexus is one that government(s) have failed to address. The key role of government as investor, therefore, cannot simply be about fixing market failures, but rather about actively creating the market for the new technologies by envisioning the opportunity space and allowing the right network of private and public actors to meet for radical innovation to occur. Once this occurs the citizen-state nexus must be the primary financial beneficiaries of such successes. Credit, design, application must always be accredited to those who have undertaken the work. However, the role of government as investor must always understand that the citizen-state nexus is the most important aspect of any ruling government. Therefore, government(s) must invest in the citizenry in a variety of ways to enable them to pursue happiness and prosperity. A government can do so by investing in sustainable infrastructure (including housing for citizens), providing Universal Basic Services (UBS), as well as a basic income. A government as investor intervenes wherever necessary to ensure protection for both the citizenry and the state. Protection of citizens can be met economically where states provide for their citizenry (most effectively under a social contract) through an ethically responsible state. A government as investor utilises the state's resources to best provide protection to the citizens of the state through provision and investment as outlined above. The state can better enhance, protect, provide for, and invest in its citizenry through amendments to our capitalist society that enables the citizen-state nexus to uphold the requirements of decent standards of living (DLS) and the essential physical, social, and mental requirements for wellbeing.

The role of government(s) cannot be reduced simply to tax collectors, redistributors, or recipients of the investments it makes in citizens and business. Mazzucato calls for golden shares of intellectual property rights, a national innovation fund, income-

contingent loans and equity, as well as a development bank to address many of her concerns facing the US. Variations of these recommendations already exist in Brazil, China, Denmark, Finland, Germany, Israel, and the EU (through the European Investment Bank). However, Mazzucato rightly confirms that "had the state earned back just 1 percent from the investments it made in the Internet, there would be much more to invest in green tech" (Mazzucato, 2015, p201). The government must, therefore, take calculated risks and cannot act in an insular way. Governments must adopt an agile model, long-term planning, a culture of transparency with a service-design model that turns emerging challenges into opportunities for advancement and progressive change.

Many governments with a capitalist state (including the UK) already invest in their citizens through free education and national healthcare provision, however the state does not support or invest in citizens enough financially which is why societies still have poverty and lack economic equity. An ethically responsible state would invest in their citizenry by providing citizens with financial security and protection. This kind of protection should be ample enough that it is deemed an investment in citizens rather than basic form of welfare protection. Pushing citizens into jobs (often misemployed jobs) as the standard operating procedure cannot and will not work long-term if we choose the technological progression that will be available to us in a post-scarcity economy. Government(s) as investors must invest in their citizens by providing economic security through a guaranteed basic income that can be offset initially through tax amendments, structural changes to our political economy, as well as cultural changes to society and the systems we have all inherited must be amended for the state (and modern government) to innovate in technologies that mean citizens are protected and provided for, so they can thrive into the 22nd century. The usage of technologies will be an integral part of the state's road out of capitalism and into a post-capitalist socialism, until the full delivery of a post-scarcity economy can provide us with a sustainable utopian system of regulated abundance.

3.3: Technology as Progression

The term 'Technology' is defined three-fold as:

1) The application of scientific knowledge for practical purposes, especially in industry.

2) Machinery and equipment developed from the application of scientific knowledge.

3) The branch of knowledge dealing with engineering or applied sciences.

Technology is simply the use of scientific knowledge to create tools and has evolved throughout the centuries in all aspects and industries. Appliances are general terms for technologies that are useful around the house from vacuums, refrigerators, toaster to smart cleaners, Nest home heating devices and smart ovens. Industrial technology specialised for the manufacturing, building, or mining industries. Agricultural technologies have included heavy duty machinery like tractors, diggers, and milk processing equipment. However, today's Agri-tech routinely uses sophisticated technologies such as robots, temperature and moisture sensors, aerial images, and GPS technology. These advanced devices and precision agriculture and robotic systems allow businesses to be more profitable, efficient, safer, and more environmentally friendly. Humans have used technology to travel to space and develop communication satellites to better deliver systems for human life. The development of transport technology such as high-speed trains, motor vehicles and aircraft has made it easier to travel the globe. Mankind and machine are developing energy efficient infrastructure such as solar panels, grids, wind turbines and tidal energy to enhance human life and become more environmentally sustainable. Whilst these formats of technology are evolving and enhancing human lives further, they are doing so broadly under the advancement of information technology which is a broad class of technology based on machines that process data and perform calculations at high speed. Most modern technologies have some relationship with information technology such as computers. The developments in molecular manufacturing, nanotechnology, robotics, and A.I provide the opportunities for technology to lead us to a post-scarcity economy whereby most goods can be produced in great abundance with minimal human labour needed meaning they become available to all very cheaply or even freely.

The RepRap project (short for replicating rapid prototype) started in 2005 developing a low-cost 3D printer that could print most of its own components using open-design, and released under a free software license and the GNU General Public License (GPL) showed that due to the ability of the machine to make its own parts, its authors envisioned the possibility of cheap RepRap units to enable the manufacturing of complex products without the need for extensive industrial infrastructure. The stated goal of the RepRap project was to "produce a pure selfreplicating device ...to put in the hands of individuals anywhere on the planet, for a minimal outlay of capital, a desktop manufacturing system that would enable the individual to manufacture many of the artifacts used in everyday life" – thereby, working towards creating a universal constructor by using rapid prototyping, and then give the results away free under the GNU General Public Licence to allow other investigators to work on the same idea (Bowyer et al, 2011, p177-178).

The fourth industrial revolution is led by the development of the internet of things (IoT) and is a term for the practice of embedding computers, sensors, and networking capabilities into everyday objects such as infrastructure. Networks are links that allow devices to share data. Networks are connected to other networks to create larger networks such as the internet. Sensors are devices that record data from their environment such as microphones, accelerometers, and cameras. The internet of things uses these advancements to further develop artificial intelligence, which is the format of technology that learns, and self improves. This will change society as it becomes more widely available through the development and evolution of the internet of things (IoT).

The ethics of responsibility, I argue that the state must address, is around the impact these technologies will have on human lives and work specifically. If we remain within the boundaries of capitalism, we will more likely experience a dystopian outcome for citizens. Hence the state and its citizenry must come together and use technology to benefit both as the advancement in technology will merge the citizenry closer to the state. The deployment of long-range forecasts is an activity that is hazardous in nature and there is a distinct possibility that the future may not unfold quite as originally anticipated. The use of the ethical perspective of

technology from Jonas is that the potential of modern technologies has turned into a threat, and that technology is inseparably linked with the threat. Whilst I agree with Jonas that technology can be a threat, I view technology more as a vehicle for progress which he clearly acknowledges where it contributes to the enjoyment of life.

"Technology has become the dominant symbol of progress, at least its most visible external measure. In that connection, progress comes almost to be equated with material betterment. Advancing technology is expected to raise the material wellbeing of mankind by heightening the productivity of the global economy, multiplying the kinds as well as the quantities of goods which contribute to the enjoyment of life, at the same time lightening the burden of labour" (Jonas, 1984, p163).

What then could be decisive for normative assessments of the relationship between technology use and future generations? We do not know the value preferences of future generations. We do not know if future technological innovations will place the current concepts of resource problems in a completely different light. It is not clear if present actions will be perceived as beneficial in the future. Advances in technology have led to a world where most people enjoy a safer, longer, and more satisfying life than previous generations, and this trend must continue. It is possible that technology can be of different character in the future, and this does not mean we cannot assume that future generations would prefer the benefits of less work. However, this could be a reality in a post-scarcity economy.

3.4: Post-Scarcity and Post-Capitalism

Post-scarcity does not mean that scarcity has been eliminated for all goods and services, but that all citizens can easily have their basic needs met along with some significant proportion of their desires for 'essential requirements' and 'primary goods'. In this model the acquisition of wealth would no longer be the driving force of citizens' lives. Instead, citizens would work to better themselves and the state through reciprocity and contribution. Money and the accumulation of capital could no longer be considered a prerequisite for liberation and rendered obsolete.

Murray Bookchin wrote in *Post-Scarcity Anarchism* that post-industrial societies have the potential to be developed into post-scarcity societies. For Bookchin, such development would enable "the fulfilment of the social and cultural potentialities latent in a technology of abundance" (Bookchin, 1971, p13). Bookchin claims that the expanded production made possible by the technological advances of the twentieth century were in the pursuit of market profit and at the expense of the needs of humans and of ecological sustainability.

The world's most highly developed economies are now capable of producing huge amounts of material wealth in the form of goods and services with the help of a relatively small percentage of the population and are moving at an accelerating pace towards a state of post-scarcity, an age of abundance and a state of capitalism in which a wider range of economic goods and services are available at low cost and achieved with minimal human labour needed, so that they become available to all very cheaply or freely. Philip Sadler argues in *Sustainable Growth in a Post-Scarcity* World: Consumption, Demand, and the Poverty Penalty that "in the early days of industrialisation most goods and services were expensive relative to average earnings and were produced by the masses of the working class for consumption primarily by the middle and upper classes" (Sadler, 2010, p8). However, what changes are the huge strides in automated productivity leading to greatly reduced costs of production. Paul Mason argues in PostCapitalism: A Guide to our Future that the rise of income inequality, repeating cycles of boom and bust and capitalism's contribution to climate change has led economists, political thinkers, and philosophers to begin to "seriously consider how a post-capitalist society would look and function" (Mason, 2015). Post-capitalism can be expected to be made possible as further advances in automation and information technology are effectively causing production costs to trend towards zero. The impact of productivity has been augmented by the globalisation of capitalism and manufacturing very rapidly increased the supply of cheap labour as a result of the rapid industrialisation of poorer nations. The intensification of the coercive laws of competition has caused the prices of a wide range of goods and services to fall to the marginal cost of production. At the same time, rises in real wages in the more developed countries

have produced an increasing range of goods and services which until relatively recently were restricted to the middle and upper classes including the likes of air travel, foreign holidays, cruises, eating out, home cinemas, smart phones, and personal computers. The shift from relative scarcity to relative abundance has progressed steadily for years but the pace of it will grow significantly with further automation. A consequence of the development of abundance over the past few decades has been the shift from managing production to managing consumption.

Stephen Aguillar-Millan et al argues in *The Post-Scarcity World of 2050-2075* that the current age is one of scarcity resulting from negligent behaviour in the 19th and 20th century categorising the period between 1975 to 2005 as a period "of relative abundance" of natural resources like oil, water, food, energy, and credit, among others which boosted industrialisation and development in Western economies (Aguillar-Millan et al, 2010, p282). An increased demand of resources combined with a rising population led to resource exhaustion in part. The ideas developed about post-scarcity are motivated by analyses that posit that capitalism takes advantage of scarcity. One of the main traces of the scarcity periods is the increase and fluctuation of prices. To deal with this situation, technology comes into play, driving an efficient use of resources to the extent that costs will be considerably reduced to the point that almost everything could be free. The authors of *The Post-Scarcity* World of 2050-2075 claim that the period between 2050 and 2075 will be a postscarcity age in which scarcity will no longer exist. The reason for this is the "digitisation (along with other technological advancements, such as nanotechnology, molecular manufacturing, robotics, and artificial intelligence), [that] will continue to increase efficiencies in resourcing, production, transportation, and overall operations that will drive away costs in the future" (Aguillar-Millan et al, 2010, p287). Evidence already shows that costs are decreasing for clothing, furniture, fast food, and computer hardware. For example, basing estimates on Moore's law, the observation that the number of transistors in a dense integrated circuit (IC) doubles about every two years. Moore's prediction has been used in the semiconductor industry to guide long-term planning and to set targets for research and development, thus functioning to some extent as a self-fulfilling prophecy. With Moore's law in mind

technological advancements will "drive the cost of a laptop computer to \$10, and within 20 years to only \$1. Essentially, within 20 years, laptops could be free" (Aguillar-Millan, 2010, pp287-288). What this means is an economy based on advances in automated manufacturing technologies including 3D printing and self-replicating machines in theory could produce nearly all goods in abundance, given adequate raw materials and energy. The more speculative forms of nanotechnology such as molecular assemblers or nanofactories, that raise the possibility of devices that can automatically manufacture any specified goods given the correct instructions and the necessary raw materials and energy. Nanotechnology will help enable a post-scarcity world. Marx's communism was based on the premise that technology would develop to a point that material need would be eradicated. Communism can be similarly understood as a post-scarcity society. Aaron Bastani uses the term Communism in his work to denote:

"A society in which work is eliminated, scarcity replaced by abundance and where labour and leisure blend into one another. Given the possibilities arising from the Third Disruption, with the emergence of extreme supply in information, labour, energy, and resources, it should be viewed not only as an idea adequate to our time but impossible before now" (Bastani, 2019, pp50-51).

In Marx's *Grundrisse* there is a section which has become known as 'the fragment of machines' which includes the argument that the transition to a post-capitalist society combined with advances in automation would allow for significant reductions in labour needed to produce necessary goods, eventually reaching a point where all people would have "significant amounts of leisure time to pursue science, the arts, and creative activities"; a state later labelled as post-scarcity (Barbour, 2012, p118). Marx argued that capitalism depends on the exploitation of the surplus labour of workers, but a post-capitalist society would allow for "the free development of individualities, and hence not the reduction of necessary labour time so as to posit surplus labour, but rather the general reduction of the necessary labour of society to a minimum, which then corresponds to the artistic, scientific etc, development of the individuals in the time set free, and with the means created, for all of them" (Marx,

1973, p706). Marx's concept of a post-capitalist communist society involves the free distribution of goods made possible by the abundance provided by automation.

The fully developed communist economic system is postulated to develop from a preceding socialist system. Marx viewed that a socialist system based on the social ownership of the means of production would enable progress toward the beginning of fully developed communism by further advancing productive technology. Under socialism, with its increasing levels of automation, an increasing proportion of goods would be distributed freely. Marx did not believe in the elimination of most physical labour through technological advancements alone in a capitalist society, because he believed capitalism contained within it, certain tendencies which countered increasing automation and prevented it from developing beyond a limited point, so that manual industrial labour could not be eliminated until the overthrow of capitalism. As stated through the labour theory of value (LTV), capitalists cannot turn a profit by selling their products, without labour to add value to the products being made. There lies the necessary relationship between human labourer to add value and the capitalist to make a profit from the value added by the labourer and the inevitable tendency for the rate of profit received from the capitalist to fall. Hence, the creation of the ethically responsible state to use the current economic system to create the foundations of a post-scarcity economy before limiting then eliminating the three major forms of power in capitalist retention i.e., capital accumulation, competition, private property and ownership of the means of production. By breaking up these power structures of capitalism they will also limit and destabilise the influences of inheritance, inequality, wealth, nepotism, poverty, and scarcity of the essential requirements and primary goods.

A progressive post-scarcity economy will offer freedom to citizens who live within it, assuming they have available to them high quality education, food, healthcare, environment, clothing, housing, and the ability to pursue their goals provided by their government(s). The principle of 'security' as legally ensured provision of the necessities of life for everybody is better than permitting want and deprivation through the caprices of the market. Therefore, public control over the distribution of the social product through the state (including immaterial products like health and

education and even workplaces) – a control inevitably extending to the sphere of production and its overall planning is:

"Better than a distribution left to the mercy of individually possessed or lacking purchasing power, and, than a production left to the fiat of untrammelled competition; therefore, also the 'welfare state' overseeing the economy better than individualistic 'sink or swim' system of free enterprise and so on" (Jonas, 1984, p175).

Jonas concludes that this recognition of the 'better than' series of freedom is better than unfreedom and stability is better than instability, "not everything can be had together in the same degree...therefore balance and compromise between which in the bipolar extreme is incompatible is the best one can realistically hope for" (Jonas, 1984, p175). Technology shares with science the "property that 'progress' as such is an objective phenomenon inherent in its autonomous motion, in the sense that every 'next' is necessarily superior to its 'before'" (Jonas, 1984, p168). Progress does not always necessarily mean better. The progression of technology does not necessarily mean better lives for users, nor does the progress of weaponry mean better wars. Likewise, the erosion of work would not happen over a single day but will be gradual. Wage labour work will continue for many until the day comes where wage labour is swapped for a state income without having to work, or it could mean only those with capital can feasibly make ends meet unlike non-owners. This is not a guaranteed path but one we as citizens must choose for ourselves. If we do not make a choice what are our possibilities if we retain our capitalist economic system?

3.5: Theoretical Futures

To answer the above question, I portray here a combination of advanced late capitalism's theoretical futures firstly through the *Four Futures of Work: Coping with uncertainty in an age of radical technologies* by the Royal Society for the encouragement of Arts (RSA) showing the varying outcomes of work within the economy of the future. This includes the Big Tech economy of rapid technological growth, the Precision Economy portrayed as a future of hyper-surveillance, the Exodus Economy characterised by an economic slowdown, and the Empathy

Economy which envisages a future of responsible stewardship. Highlighting these scenarios gives an economic picture of what the UK economy could soon look like before secondly highlighting through Peter Frase's *Four Futures of Capitalism: A world after capitalism* which describes how the state and society will theoretically look given the four potential alternatives of Socialism, Rentism, Exterminism and Communism. Highlighting these varying scenarios will make clarify why an ethics of responsibility from the state is needed and why it will be necessary for the citizenry to bind themselves with the ethically responsible state.

3.5.2: The Exodus Economy

The Exodus economy is characterised by a protracted economic slowdown, after a financial crash on the scale of 2008 takes the world by surprise. Unemployment rises and leads to new austerity measures. Automation is limited, as funding for innovation has dried up, but the UK is trapped in a low-pay, low-productivity paradigm. There is a rise in zero-hours contracts and agency work as firms bid to cut costs. Many household names, once captains of industry in the 20th century, go under or are subsumed in a flurry of mergers and acquisitions. This becomes an age of resentment. Disgruntled with a failing economic system, workers take to the streets in protest. Unions organise mass 'log-offs', bringing the gig economy to its knees. Others leave urban areas altogether in search of alternative lifestyles as workers lose faith in the ability of capitalism to improve their lives. New economic models are gaining interest such as co-operatives who have emerged in large numbers to serve people's core needs in food, energy, and banking.

3.5.1: The Big Tech Economy

The Big Tech economy describes a world where technology has developed at a rapid pace, leading to widespread automation. Self-driving buses, vans and bin lorries have reserved lanes in major cities. Versatile robots, capable of complex tasks and human interaction, have become ubiquitous in sectors such as hospitality and healthcare. Unemployment and economic insecurity have risen, with people lucky to find 20 hours of work a week. However, this is tempered by widely felt improvements in living standards as technology lowers the cost of everyday goods and improves the quality of public services, and as people find new outlets for meaning and purpose in their considerable leisure time. The ultimate winners are Silicon Valley multinational tech companies like Google, Amazon, Facebook, and Apple, who not only complete their capture of the digital economy but enter new sectors, gaining profits from productivity growth and transferring them overseas. The velocity of technological changes leaves workers and unions incapable of responding, as well-oiled public relations machines, and highly visible corporate social responsibility (CSR) programmes help to stifle citizen dissent.

3.5.3: The Precision Economy

The precision economy portrays a world of hyper-surveillance. In this scenario, many technologies have failed to live up to their hype, with ambitious projects such as autonomous vehicles abandoned altogether. The internet of things proves to be definitive, with businesses installing sensors across their supply chains. Automation is modest, but workers are subject to new levels of algorithmic oversight and a pervasive ratings system. In the retail sector, for example, shop sensors collect data on footfall while technological wearables track staff activity. Manager-analysts then review metrics and assign ratings following shift competition. Equipped with predictive algorithms and real-time organisational data, employers embrace ondemand labour strategies. Waves of 'urbanisation' ripple across the economy as gig platforms enter new sectors. Workers with in-demand talents or high ratings see enhanced pay and opportunities for progression. But many are left to compete for piecemeal work that does not pay well and offers little control over working hours and minimal task discretion. Clever UX (User Experience), gamification and the promise of upward mobility keep workers logged in.

3.5.4: The Empathy Economy

The empathy economy envisions a future of responsible stewardship. Under this scenario there are technological breakthroughs comparable to those in the *Big Tech economy*, but public attitudes sour as the risks become more apparent. Tech

companies decide to self-regulate. Automation is contained as businesses work with unions to adopt tech on mutually beneficial terms. Rather than squeeze, pressure and scrutinise workers, technology is applied to augment their capabilities, from virtual reality being used by retail workers to role-play customer interactions, to personal trainers using technological wearables to create bespoke training regimes for their clients. Workers see improvements in living standards as the gains from productivity growth are mostly retained in the UK. Disposable income then flows into high-touch sectors such as care and education, which are most resistant to automation. But this work is emotionally demanding, with people required to manage their own emotions in the service of boosting the feelings of others.

The RSA noted in their work that rising inequality, growing suppression in the workplace, stagnant wages, heightened discrimination, bias, and deepening geographic division could all have a bigger impact than simple job losses to automation. Why is this? We understand above that the internal contradictions of capitalism steers toward monopolisation, and inevitably oligopoly which bring with it the inequality, corporate collusion, and wage suppression.

Peter Frase's *Four Futures of Capitalism: A world after capitalism* describes how the state and society will theoretically look given his alternatives of Socialism, Rentism, Exterminism, and Communism. By highlighting the potential futures, we can understand whether or not there is a need for an ethics of responsibility by government(s), not to counter the progression of technology, but enhance citizens lives with it?

3.6: Egalitarianism and Abundance: Communism

Marx distinguished between a 'realm of necessity' and a 'realm of freedom'. In the realm of necessity, we must "wrestle with nature to satisfy [our] wants, to maintain and reproduce life", by means of physical labour in production (Marx, 1894). This realm of necessity, Marx says, exists "in all social formations and under all possible modes of production", presumably including socialism (Marx, 1894). What distinguishes socialism, then, is that production is rationally planned and democratically organised, rather than operating at the whim of the capitalist or the

market. For Marx, however, this level of society was not the true objective of the revolution, but merely a precondition for "that development of human energy which is an end in itself, the true realm of freedom, which, however, can blossom forth only with this realm of necessity as its basis" (Marx, 1894). Marx suggested that one day we may be able to free ourselves from the realm of necessity altogether. In the *Critique of the Gotha Program*, he imagines that:

In a higher phase of communist society, after the enslaving subordination of the individual to the division of labour, and therewith also the antithesis between mental and physical labour, has vanished; after labour has become not only a means of life but life's prime want; after the productive forces have also increased with the all-around development of the individual, and all the springs of co-operative wealth flow more abundantly — only then then can the narrow horizon of bourgeois right be crossed in its entirety and society inscribe on its banners: From each according to his needs (Marx, 1875).

What society could be so productive that humans are entirely liberated from having to perform involuntary and unfulfilling labour? The potential for widespread automation could enact such a liberation, or at least approach it. Recent technological developments have taken place not just in the production of commodities, but in the generation of the energy needed to operate the automatic factories and 3D printers of the future. Hence one possible post-scarcity future combines labour-saving technology with an alternative to the current energy regime, which is ultimately limited by both the physical scarcity and ecological destructiveness of fossil fuels. This is far from guaranteed, but there are indications that it is possible as the cost of producing and operating solar panels, for example, has been falling dramatically over the past decade. The current trajectory shows that they can be cheaper than our current electricity sources. If cheap energy and automation are combined with methods of efficiently fabricating or recycling raw materials, then we have truly left behind 'the economy' as a social mechanism for managing scarcity. What lies over that horizon?

It is not that all employment and work would cease, in the sense that we would all just sit around in indulgence and inactivity. Marx argued that "labour has become

not only a means of life but life's prime want" (Marx, 1875). Whatever activities and projects we undertake, we do so because we find them inherently fulfilling, not simply because we needed a wage (although this is the reality for many). The demise of wage labour may seem like a faraway dream socially today, but John Maynard Keynes predicted in an essay on *Economic possibilities for our grandchildren*, that within a few generations:

"*Man will be faced with his real, his permanent problem — how to use his freedom from pressing economic cares, how to occupy the leisure, which science and compound interest will have won for him, to live wisely and agreeably and well*" (Keynes, 1930).

Robert Chernomas highlights that what "Keynes envisaged [was] a very different kind of 1984, one in which the need for accumulation had withered away" (Chernomas, 1984, p1007). In 1956, Max Horkheimer remarked to Theodor Adorno that "nowadays we have enough by way of productive forces; it is obvious that we could supply the entire world with goods and could then attempt to abolish work as a necessity for human beings" (Adorno & Horkheimer, 2011, p31). Keynes, Horkheimer, and Adorno lived in a world where industry only appeared possible at a very large scale, whether in capitalist factories or state-run enterprises; that form of industry implies hierarchy no matter what social formation it is embedded in. New technological advances suggest the possibility of returning to a less centralized structure, without drastically lowering material standards of living. The proliferation of 3D printers and small scale 'fabrication laboratories' is making it increasingly possible to reduce the scale of at least some manufacturing without completely sacrificing productivity. Thus, insofar as some human labour is still required in production in an imagined communistic future, it could take the form of small collectives or state-run firms.

However, getting past wage labour economically also means getting past it socially, and this entails deep changes in our priorities and our way of life. Communism would be a world in which conflict is no longer based on the opposition between wage workers and capitalists, or on struggles over scarce resources. It has the potential to be a world in which not everything ultimately comes down to money. A

communist society would surely have hierarchies of status as have all human societies, and as does capitalism. However, in capitalism, all status hierarchies tend to be aligned, albeit imperfectly, with one master status hierarchy, the accumulation of capital and money. The ideal of a post-scarcity society is that various kinds of esteem are independent, so that the esteem in which one is held as a musician is independent of the regard one achieves as a political activist, and one cannot use one kind of status to buy another. In a sense, then, it is a misnomer to refer to this as an 'egalitarian' configuration, since it is not a world of no hierarchies but one of many hierarchies, no one of which is superior to all the others.

3.6.1: Hierarchy and Abundance: Rentism

Given the technical premises of complete automation and free energy, the utopia of pure communism becomes a possibility, but not necessarily an inevitability. The bourgeois elite of the present day does not merely enjoy privileged access to scarce material goods, after all; the bourgeoisie enjoy the status and social power over the masses, which cannot be discounted as a source of capitalist motivation. For this elite, money is a source of power over others, a status marker, and a way of power retention. It is expected that even if labour were to become superfluous in production, the ruling classes would endeavour to preserve a system based on money, profit, and class power that would be based on speculative financial capital bringing with it perpetual debt.

The embryonic form of class power in a post-scarcity economy can be found in our systems of intellectual property law. Defenders of intellectual property speak of it as broadly analogous to other kinds of property, it is based on a quite different principle. As the economists Michele Boldrin and David K. Levine conclude, intellectual property rights go beyond the traditional conception of property. They do not merely ensure your right to control your copy of your idea, in the way that they protect my right to control my shoes or my house. Rather, they give rights-holders the ability to tell others how to use copies of an idea that they 'own'. Boldrin and Levine state:

"This is not a right ordinarily or automatically granted to the owners of other types of property. If I produce a cup of coffee, I have the right to choose whether to sell it to you or drink it myself. But my property right is not an automatic right both to sell you the cup of coffee and to tell you how to drink it" (Boldrin & Levine, 2002, p112-113).

The mutation of the property form, from real to intellectual, catalyses the transformation of society into something which is not recognisable as capitalism, but is nevertheless just as unequal. Capitalism, at its root, is not defined by the presence of capitalists, but by the existence of capital, which in turn is inseparable from the process of commodity production by means of wage labour. When wage labour disappears, the ruling class can continue to accumulate money only if they retain the ability to appropriate a stream of rents, which arise from their control not only of intellectual property, but land and resources too. Thus, emerges a rentist, rather than capitalist society. An economy based on artificial scarcity is not only irrational, but also dysfunctional. If everyone is constantly being forced to pay out money in licensing fees, then they need some way of earning money, and this generates a new problem.

The fundamental dilemma of "rentism" for Frase is the problem of effective demand and that is, how to ensure that people can earn enough money to be able to pay the licensing fees on which private profit depends (Frase, 2016, p69). This is not different from the problem that confronted industrial capitalism, but it becomes more severe as human labour is increasingly squeezed out of the system, and human beings become superfluous as elements of production, even as they remain necessary consumers. So, what kind of jobs would still exist in this economy? The biggest threat to any given company's profits will not be the cost of labour or raw materials including both minimal and non-existent, but rather the prospect that the licenses they own will lose out in popularity to those of competitors. Marketing and advertising, then, will continue to employ significant numbers. Alongside the marketers, there will also be an army of lawyers, as today's litigation over patent and copyright infringement grows to encompass every aspect of economic activity.

As in any hierarchical society, there must be an apparatus of repression to keep the poor and powerless from taking a share back from the rich and powerful.

Maintaining full employment in a rentist economy would be a perpetual struggle. It is unlikely that the four areas described can fully replace all the jobs lost to automation. What's more, these jobs are themselves subject to labour-saving innovations. Marketing can be done with data mining and algorithms; much of the routine business of lawyering can be replaced with software; guard labour can be performed by surveillance cameras, robots, and drones rather than human police. Even some of the work of product invention could one day be given to computers that possess some rudimentary artificial creative intelligence. Were automation to fail for whatever reason, the rentist elite can colonise our leisure time to extract free labour. Facebook already relies on its users to create content for free, and the recent trend for gamification suggests that corporations are very interested in finding ways to turn the work of their employees into activities that people will find pleasurable and thus do for free in their own time. Luis von Ahn, has specialised in developing games with a purpose (GWAPs), applications that present themselves to end users as enjoyable diversions while also performing a useful computational task. One of von Ahn's games asked users to identify objects in photos, and the data was then fed back into a database that was used for searching images (Von Ahn, 2006). Many of us that use computers will have been asked to find the traffic lights or cars in images to prove we are not a robot to enter a webpage.

The society of rentism would be subject to a persistent trend toward underemployment, forcing the state to find a way to hold the system together. This entails realising a vision that André Gorz had of post-industrial society: "the distribution of means of payment must correspond to the volume of wealth socially produced and not to the volume of work performed" (Gorz, 1985, p42). This might involve taxing the profits of profitable firms and redistributing the money back to consumers possibly as a no-strings-attached guaranteed income, and possibly in return for performing meaningless make-work. The government could also simply print money to give to the working class, but the resulting inflation would just be an indirect form of redistribution and would also be resisted. Finally, there is the option of funding

consumption through consumer indebtedness but those who remember the global crisis of 2008 should know this is not a solution.

Given these issues, one might ask why the rentier class would bother trying to extract profits from people. What keeps society from simply dissolving into the communist scenario? Perhaps, as noted at the outset, the ruling class would guard their privileged position to protect the power over others granted to those at the top of a class-divided society. This suggests another solution to rentism's underemployment problem; hiring people to perform personal services becomes a status marker, even if automation makes it strictly speaking unnecessary. The muchheralded rise of the service economy would evolve into a futuristic version of nineteenth century England or parts of India today, where those with enough money can afford to hire huge numbers of servants (Patel, 2009). This society would persist only so long as the majority of people accepted the legitimacy of its governing hierarchy. The power of ideology may well be strong enough to induce people to accept the state of affairs described or perhaps citizens would start to ask why the wealth of knowledge and culture was being enclosed within restrictive laws, beyond their reach.

3.6.2: Egalitarianism and Scarcity: Socialism

We understand that the combination of automated production and bounteous resources gives us either the pure utopia of communism or the dystopia of rentism; but what if energy and resources remain scarce? In that case, we arrive in a world characterised simultaneously by abundance and scarcity, in which the liberation of production occurs alongside an intensified planning and management of the inputs to that production. The need to control labour disappears, but the need to manage scarcity remains. Scarcity in the physical inputs to production must be understood to encompass far more than commodities like oil or iron ore. Capitalism's damaging effect on the environment threatens to do permanent damage to the climates and ecosystems on which much of our present economy depends. Climate change already plays havoc with the world's food system, and future generations may look back on the variety of foodstuffs available today as an unsustainable golden age.

Under the more severe projections, many areas that are now densely populated may become uninhabitable, imposing severe relocation and reconstruction costs on our descendants.

Frase's third future, then, is one alike to the empathy economy in which nobody needs to perform labour, and yet people are not free to consume as much as they like. Some format of government is required. For Frase, pure communism is excluded as a possibility because what we get instead is a version of socialism, and "some form of economic planning" (Frase, 2016, p213). In contrast to the plans of the twentieth century, however, those of the resource-constrained future are mostly concerned with managing consumption, rather than production. Consumption, after all, was precisely the area in which Soviet-style planning was found to be most deficient. A society that can arm itself for war with the Nazis but was subject to endless shortages and bread lines, is not an inspiring template of society.

It will be necessary in a world of scarce resources that while private capitalist production has been very successful at incentivising labour-saving technological innovation, it has proven to be terrible at conserving the environment or rationing scarce resources. Even in a post-capitalist, post-work world, coordination is needed to ensure that individuals do not treat the Earth in a way that is, in the aggregate, unsustainable. A distinction should be made, however, between democratic planning and a completely non-market economy. A socialist economy could employ rational planning while still featuring market exchange of some sort, along with money and prices. Suppose that everyone received a wage, not as a return for their labour but simply as a human right. The wage would not just buy the products of others' labour, but rather the right to use up a certain quantity of energy and resources. Markets might develop insofar as people chose to trade one type of consumption permit for another, but this would be what the sociologist Erik Olin Wright calls "capitalism between consenting adults", rather than the involuntary participation in wage labour driven by the threat of starvation (Hahnel & Wright, 2014).

Given the need to determine and stabilise levels of consumption and thus set prices, the state would play a pivotal role. Where there is scarcity, there will surely be political conflict, even if this is no longer a class conflict. Conflicts between locales,

between generations, between those who are more concerned with the long-term health of the environment and those who prefer more material consumption in the short run.

3.6.3: Hierarchy and Scarcity: Exterminism

If we do not arrive as equals, and environmental limits continue to press against us, we come to the fourth and most disturbing of our possible futures. It resembles the communism that we began with, but it is a communism for the few. A paradoxical truth about that global elite we call the 'one percent' is that, while they are defined by their control of the world's monetary wealth, they are at the same time the fragment of humanity whose daily lives are least dominated by money. The difference, of course, is that their post-scarcity condition is made possible not just by machines but by the labour of the global working class. The optimistic view of future developments described as a post-scarcity economy of communism is that we will eventually come to a state in which we are all, in some sense, the one percent.

What if resources and energy are simply too scarce to allow everyone to enjoy the material standard of living of today's rich? What if we arrive in a future that no longer requires the mass proletariat's labour in production and unable to provide everyone with an arbitrarily high standard of consumption? If we arrive in that world as an egalitarian society, then the answer is the socialist regime of shared conservation described in the previous section. If, instead, we remain in a society divided between a privileged elite and a downtrodden mass, then the most plausible trajectory leads to something that Frase calls "exterminism" (Frase, 2016, p14).

The danger posed by the automation of production, in the context of a world of hierarchy and scarce resources, is that it makes many people superfluous from the standpoint of the ruling elite. This contrasts with capitalism, where the antagonism between capital and labour is characterised by both a clash of interests and a relationship of mutual dependence i.e., the workers depend on capitalists as long as they do not control the means of production themselves, while the capitalists need workers to run their factories and shops. The existence of an impoverished, economically superfluous populace poses a great danger to the ruling hierarchical

minority class, which will naturally fear imminent expropriation when confronted with this threat. The minority hierarchy could buy the masses off with some degree of redistribution of resources, as the rich share out their wealth in the form of social welfare programs, at least if resource constraints are not too binding. In addition to potentially reintroducing scarcity into the lives of the rich, this solution is liable to lead to an ever-rising tide of demands on the part of the masses, thus raising the spectre of expropriation once again.

If buying off the masses is not a sustainable strategy for the hierarchy, then another option is for them to run and hide from the masses. This is the trajectory of what the sociologist Bryan Turner called "enclave society", an order in which "governments and other agencies seek to regulate spaces and, where necessary, to immobilise flows of people, goods and services" by means of "enclosure, bureaucratic barriers, legal exclusions and registrations" (Frase, 2016, p86). Gated communities, private islands, ghettos, prisons, terrorism paranoia, biological quarantines altogether amount to an inverted global gulag, where the rich live on islands of wealth strewn around an ocean of misery. In Tropic of Chaos, Christian Parenti makes the case that we are already constructing this new order, as climate change brings about what he calls the "catastrophic convergence" of ecological disruption, economic inequality, and state failure (Parenti, 2011). The legacy of colonialism and neoliberalism is that the rich countries, along with the elites of the poorer ones, have facilitated a disintegration into anarchic violence as various tribal and political factions battle over the diminishing bounty of damaged ecosystems. Faced with this bleak reality, many of the rich which, in global terms, includes many workers in the rich countries will resign to barricading themselves into their fortresses, to be protected by unmanned drones and private military contractors. Human guard labour reappears as a lucky few are employed as enforcers and protectors for the rich.

Frase concludes that exterminsim must be understood as:

"An unstable equilibrium, for the same basic reason that buying off the masses is. So long as the immiserated hordes exist, there is the danger that it may one day become impossible to hold them at bay. Once mass labour has been rendered

superfluous, a final solution lurks: the genocidal war of the rich against the poor" (Frase, 2016, p193).

Hence, exterminism becomes a realistic description of a bleak dystopian society for most citizens. This is the most likely of our current capitalist trajectory as highlighted in Shoshana Zuboff's Age of Surveillance Capitalism: The fight for a Human Future at the New Frontier of Power which shows the development of digital companies like Amazon, Google, and Facebook and their business models representing a new form of capitalist accumulation she calls "surveillance capitalism" (Zuboff, 2019). Zuboff states that surveillance capitalism (pioneered by Google) "unilaterally claims human experience as free raw material for translation into behavioural data [which is] declared as a proprietary behavioural surplus, fed into advanced manufacturing processes known as 'machine intelligence', and fabricated into prediction products that anticipate what you will do now, soon, and later" (Zuboff, 2019). Zuboff believes these new algorithmic capitalist products "are traded in a new kind of marketplace "behavioural futures markets" (Zuboff, 2019). The science behind our behaviour through personality profiling can be understood through our internet searches and our choices to the extent that our smart devices can know us better than our families, spouses, or we know ourselves. Algorithm's abilities to draw inferences about us illustrates how easy it is for anyone who tracks our digital activities to gain insight into our personalities. What is more, psychological inferences about us might be exploited to manipulate what we buy or how we vote in potentially a digital dystopia.

The four alternatives shown are the most likely avenues under capitalism but there could be others not considered here. If capitalism remains our economic model, we are unlikely to decide which of these scenarios we will get. Instead, they will gradually become the accepted norm or imposed on us as a matter of fact. Can we decide our own destiny irrespective of what a hierarchical wealthy capitalist class and system will decide? What I have argued throughout is that the citizenry must be protected and provided for, as well as invested in, by their state. The citizenry will need an insurance policy of an expressed social contract to ensure their representative state(s) and government(s) provide not only the bare minimum from

their ever-evolving state; protection and provision, but investment to achieve good prosperous lives with minimum DLS for all. The role of the representative government(s) is first and foremost to conduct the bidding of the state, fulfilling the duties of protection and provision. The role of the government from the perspective of the citizen should be how best can the government enhance the lives of myself and their electorate (the citizens) and to invest in as many citizens of the state as feasibly and responsibly as possible. Government(s) wherever possible should invest in citizen capabilities to enable them to provide for themselves in rapidly, perpetually changing circumstances and environments. What the ethically responsible state and its government(s) must address is the fundamental question around further roboticization as to who owns the robots in an ethically responsible state?

3.7: Robot Ownership Versus Robot Tax

The Who-Owns-the-Robots-Rules-the-World thesis by Richard Freeman is simple: regardless of whether technological advance is labour-saving or capital-saving, skillbiased or not, and regardless of the speed with which robots or other machines approach or exceed human skill sets, the key to the effect of the new technologies on the well-being of people around the world is based on "who owns the technologies" (Freeman, 2015). This is the critically important question and one which can be deciphered with a thought experiment that captures the importance of ownership. Consider a world in which private businesses create robots/machines that are sufficiently good at mimicking our work activities that they could readily replace us and earn what we currently earn? Alternatively, citizens could own the robots that replaced them and complete the work on their behalf? Or should the ethically responsible state implement a robot tax that pays towards a citizen's basic income? All are feasible but the latter two are far less likely under the capitalist model. The concept of ownership becomes of paramount importance for government(s), businesses, and citizens.

A robot tax can be used as a legislative strategy to disincentivise the replacement of workers by robots to bolster the social safety net for those who are displaced. If robots were made tax-compliant then government spending can continue even as

taxable income for human workers decreases. Defining what a robot is has implications on the design of any robot tax. If this is the path citizens/government(s) decide to take. Government(s) can facilitate the design of the tax to best suit demand. They would have to decide on a definition that includes a physical component of the machine, in addition to other characteristics such as self-learning, autonomy, and the ability to solve complex problems. Francisco Ossandón believes a limited robot tax could be addressed if it meets requirements, such as:

"(*i*) *it is paid by certain taxpayers that use robots (i.e., large companies); (ii) is related to certain activities (i.e., some industrial and/or financial activities); (iii) has a limited definition for robots (i.e. physical smart machines or non-physical intelligent software's in case of financial activities), and; (iv) has a low tax rate*" (Ossandón, 2020, p214).

Under these conditions, a tax on robots could be viable as it is not the same to tax already industrialised countries the same as developing countries who hope to grow their manufacturing companies. Thomas Piketty's *Capital in the Twenty First Century* highlighted that in recent decades "the rate of return on capital (r) has been greater than economic growth (g), and since labour income depends on the latter, if r > g, inequality tends to increase and to be perpetuated in time" (Piketty, 2014). Therefore, it would be practical of government(s) to tax capital more or in a different way to favour labour (should citizens desire work over leisure). A logical solution is to tax the companies that use the robots as they are the ones who benefit from usage. Ossandón states that "these companies would be in charge of paying the respective tax" and this tax "should be calculated in relation to those workers who were substituted or would have been employed if robots had not been used" (Ossandón, 2020, p216).

Microsoft co-founder Bill Gates believes there should be taxes that relate to automation stating that: "*right now, the human worker who does, say, \$50,000 worth of work in a factory, that income is taxed, and you get income tax, social security tax, all those things. If a robot comes in to do the same thing, you'd think that we'd tax the robot at a similar level...But you can't just give up that income tax*

because that's part of how you've been funding that level of human workers" (Delaney, 2017).

This approach has been defended in part by Xavier Oberson in *Taxing Robots? From* the Emergence of an Electronic Ability to Pay to a Tax on Robots or the Use of *Robots.* Under Oberson's view, a tax on robots would be the consequence of recognising a specific tax personality of robots and could be argued that tax law should be "introducing a new type of legal personality into tax law" (Oberson, 2017, p250). Oberson's argument is based on: (1) the development of smart machines, endowed with autonomy and learning experiences, have led them to constantly replace humans in some activities; (2) in the past, the recognition of companies as separate tax subjects was a follow-up to legal personality, and consequently, they were granted with a capacity to pay different from their shareholders (i.e. corporate tax); (3) the same argument can be applied to robots; their autonomy and their activities could show justification to treat them as separate legal entities with their own legal personality, leading to a new electronic ability to pay, derived from activities they perform (work, transfer of goods, and services, etc). Oberson argues the ability to pay robots "should be considered when technology allows for a payment to be allocated to them" (Oberson, 2017, p261).

In 2017, South Korea passed what has been called the first robot tax. Rather than taxing entities directly, the law reduces tax breaks that were previously awarded to investments into robotics. The Moon Jae-in administration downsized "tax deduction benefits that previous governments provided to enterprises for infrastructure investment aimed at boosting productivity" with "industry automation equipment [previously] eligible for a corporate tax deduction" (Sung-won, 2017).

If we owned our replacements, we would have our current earnings and our time freed from labour to spend as we wished by looking after children, engaging in language courses, playing video games, or seeking other productive activity with possible further wages. We would surely be better off? However, if other people owned our replacement robots, we would be jobless and searching for new work at even lower pay while the owners of the robots would reap the benefits from the robots that took human labour roles. The distribution of wage labour income would

shift from us to the owners of capital. They would be better off, and we would inevitably be worse off. The latter is most likely under our current capitalist system. Nationalisation of robots would be the default position of the ethically responsible state. Whether government takes a leading role or allows companies or arm's length regulators to lead is a decision that should be decided and regularly reviewed by citizens. Citizens must understand that under the current economic system...capitalists will be the default owners. Whereas an ethically responsible state would own the robots and regulate their usage in line with citizenry demand. Without an ethically responsible state or citizenry demand there will be a fundamental choice between egalitarianism with abundance or capitalist hierarchical scarcity. The question arises what role the government must have in the age of automation?

3.7.1: The Role of Modern Government in the Age of Automation

Following the Covid-19 'Coronavirus' global pandemic that affected all nations. Governments will be tempted to offset the pandemic's overwhelming costs with strict new fiscal restraints that would limit future investments in technology, talent, services, and economic growth. As governments move to manage the looming debt burden, civil services will be put under pressure to do more with less. The new frontier for modern government is thus an emerging era of customer and business centric, agile, digitally enabled and inspired for future change. Investment in revolutionary technologies, platforms, systems, and processes to ultimately reshape government(s) into an agile, proactive, responsive, cost-efficient, citizen-centred model must be the way forward. Digital transformation holds the potential to shape modern government that's fully connected, agile, responsive, and built to put its citizen-customers at the centre of everything it does. The government(s) role today in fast-moving and evolving trends in digital technologies will lead to a radical change in citizen expectations. Citizens are changing their approach to interacting with, and relating to, governmental organisations and services.

The Citizen-Consumer nexus is one used to highlight the adage that 'the customer is always right'. In a democratic context, the citizens of the state are the consumers

whose votes are sold for the best deal parties and inevitably government(s) provide. Therefore, we assume the citizen is always right. KPMG International's report *Modernising government: Global Trends*, found that:

"Consumers are more informed, connected, and demanding than ever. And while they have come to expect the highest standards of personalisation, choice, speed, satisfaction and security in every digital interaction, the pandemic has served to heighten consumer expectations surrounding CX – customer experience" (KPMG, 2021, p6).

Consumer's priorities have understandably shifted to health and safety but also to more convenience, authenticity, reliability, and transparency. These trends will likely increase across digital channels rather than face-to-face commercial services driving less front of house, human labour. Government(s) customer experience (CX) and user experience (UX) quality lags behind the private sector. Forrester's Customer Experience Index (CX Index) shows that "government provides poorer CX than virtually every other private-sector industry" (Parrish, 2020). Government(s) must therefore change the way they provide services for citizens. Citizen-consumers ought to and will increasingly seek their governments to deliver fast, convenient, secure, personalised, consumer-centric services to better their own lives and this must be linked through the citizen-state nexus provided by government(s). As government's primary stakeholders, citizens ought to be treated not only as valued customers when interacting with their government(s) but valued collaborators who can contribute to communities through communication, collaboration, and action.

Government(s) will be expected to pass more CX-related legislation containing mandates related to the enhancement of service standards, technology, monitoring, reporting, transparency, data protection, and delivery. Were citizen-consumer experience to ascend government's agendas, we would see government bodies placing an enhanced focus on the services it delivered and focus more value and measurements into striving to improve their impact across communities, the environment, the economy, culture, and wider society. An ethically responsible state would do this as a standard process.

The pandemic gave the world and governments an unexpected but highly revealing glimpse of what is not only possible but perilous unless drastic changes are made to the business-as-usual model. Whilst the pandemic presented profound problems and challenges, it also highlighted the historic opportunities for forward-looking governments to put the public at the centre of every service via a consistent and coherent centralised digital approach. This approach encompasses governmental functions to continually adapt with agility to be flexible in preparedness for everevolving public needs, values, and ambitions. The future of public sector policy will likely be driven by underlying socioeconomic objectives for the citizenry by factoring in behavioural science, digital technology, service design and demand from citizens. In doing so, modern governments must become more agile to cope with the demand from citizens and to flexibly invest in sectors to enhance businesses and lives. The simultaneous coming together of citizens' health and the economic emergency of the state forced many governments into rapid response modes, with many governments unable to manage the crisis. However, many forward-thinking governments showed high levels of interaction, innovation, and support with short-term spending to help citizens and their businesses. Clearly this unpreparedness meant a shift from the traditional due-diligence and process driven bureaucratic approach that devotes significant time, resources, and meticulous planning of the political agenda to reactivity and a race to the bottom for medical supplies and research.

Governments everywhere had to dramatically heighten their ability to be agile, transparent, and resilient by responding to demand and change, or crises much more effectively, by looking forward and planning effective buffers for potential problems that will arise in the future. Government(s) must launch new services, benefits, solutions, and emergency processes to include temporary hospitals, fast financial aid, and digital solutions for 24/7 contact between citizen, state, and government. As we look to a capitalistic future characterised by continued low economic growth, widening inequality, and a lack of creative political and socio-economic solutions to harness emerging opportunities amid rapid perpetual technological change. Peter Drucker states that "only a clear, focused, and common mission can hold the organisation together and enable it to produce results"

(Drucker, 1993). Therefore, government(s) need to be responsive in revolutionary new ways to manage for the fourth industrial revolution, climate change, evolving demographics, ageing populations, as well as economic, health, and geopolitical national security uncertainties. Hyper-localised place-based solutions for communities will gain prominence in nations where governments respond effectively to issues with new levels of precision, resources, fairness, and speed.

An ethically responsible government would support industries in their continued growth and success by investing in their long-term futures, while at the same time delivering support to those sectors enduring economic challenges that require protection including large cohorts of workers, mounting talent shortages and the ever-present need to augment workforces with new skillsets. As a significant employer itself, government(s) can and should stimulate significant job creation in partnerships with industries to keep citizens who want to work...in work, and to create work that enables meaningful employment. The emergence of remoteworking arrangements proved to be beneficial for many workers and employers becoming the 'new normal'. Modern government(s) have embraced these changes that benefit congested travel to and from work, with a home and work balance being favoured by workers who are not as comfortable travelling five days a week to a location when they can do the same productive work from their homes. Modern governments are learning from the pandemic experience and looking ahead to efficient rapid-service designs to cope with future problems proactively reacting to citizen and business culture changes. Government's seeking a return to the business-as-usual model will set a culture where little is learnt from previous experiences. This is problematic for governments looking to compete with other nations who will learn, adapt, and build on experiences rather than revert to a business-as-usual model.

If governments do not work together to tackle shared problems and issues. Then an inwardly looking nation becomes one that limits creativity and stifles different perspectives from other nation's successes or failures. A horizontal view offers insights, solutions, and opportunities than stand-alone decision-making when it comes to digital transformation, shared learning/experiences. To harness a

horizontal view of the issues facing nations, they must unite to tackle shared problems in achieving the goal of shared prosperity and sustainability. To do so nations should be united in developing and sharing approaches and best practices with all members to develop digital policy and practices. In doing so, participants are connected by shared principles of open-source information, expertise, resources, fairness, prosperity, education, health, security, and liberty, as well as a commitment to sharing with and learning from one another. This cannot be achieved solely by individual nation-states and instead must be attained through world government or cosmocracy; a single political authority for all humanity.

3.7.2: World Government and Cosmocracy

As argued throughout this thesis, it has been understood that advanced late debtridden capitalism must be eased out through the implementation of an ethically responsible state. In doing so, ethically responsible states across different nations should unite and come together to formulate a group of future-oriented ethically responsible states not only to deal with the omnipresent ecological crisis of climate change and warfare, but global financial crises, health crises like pandemics, food scarcity, tax evasion and avoidance, as well as ending global poverty and discrimination of peoples. There must be collective responsibility to tackle global problems with global solutions. However, as noted above in *Leviathan* (1651), Hobbes gave the quintessential formulation of sovereignty as "supreme legal coercive authority over a particular population and territory" (Hobbes, 1651). Hobbes believed that although mutual vulnerabilities and interests lead individuals to give up their liberties in the state of nature, in exchange for protection thereby instituting sovereign states; the miseries that accompany a plurality of sovereign states are not as onerous to individuals, hence there is less rational basis for political organisation to move towards a global leviathan:

"Because states uphold the Industry of their Subjects; there does not follow from the international state of nature, that misery, which accompanies the Liberty of particular men" (Hobbes, 1651 [1986] p188)

David Held believes that this dispersion of sovereignty is inevitable given that the nation-state does not exist in an insular world, but a highly interdependent and complex system: the contemporary reality consists of a globalized economy, international organisations, regional and global institutions, international law, and military alliances, all of which operate to shape and constrain individual states. Although national sovereignty still has a place in the contemporary world order, "interconnected authority structures ... displace notions of sovereignty as an illimitable, indivisible, and exclusive form of public power" (Held, 1995, p137). In Held's account of cosmopolitan democracy, the universal realisation of the liberal ideal of autonomy ultimately requires long-term institutional developments such as the creation of a global parliament, an international criminal court, the demilitarisation of states, and global distributive justice in the form of a guaranteed annual income for each individual (Held, 1995, pp279–80). The well-being of citizens in society affects that of those in another and is therefore incumbent on us all to optimise the well-being of all global citizens. Failure to do so will haunt those of us aware of this fact but do little to change it.

Many citizens understand the climate crisis the planet faces and those that do not should be led by government action with better land management to enable citizens to have healthier diets, free up land to restore nature and natural landscapes domestically. Nations can feed more of their citizens by reducing the excessive production of meat and dairy. This is a huge contributor to the climate crisis and deforestation. As well as the destructive nature, it is wasteful and an inefficient use of resources. Feeding crops to factory-farmed animals wastes enough food to instead feed billions of people. Consumer capitalism is the driving force behind sentient animals being caged, reared, and killed in factory-line production for our consumption. Citizens are already moving their consumption habits away from meat and dairy as they seek to enable sentient creatures to have their place in the world. It is up to citizens to demand more of their respective domestic government(s), and it is their government(s) who must act internationally within a likeminded international community to tackle such global problems. Trust is not only crucial between citizens and the state but within an international setting of other nations

and states. A cosmocratic government could utilise united nations resources to alleviate problems experienced by domestic nations and states. Such resources can be attained in forms of food, water, finances, human capital, military personnel, and data to inform, educate, and share scientific and technological advances such as space exploration. Shared data, information, and technological advancements between ethically responsible states has potential to provide progressivism to advanced and developing nations.

As government(s) build up immense databases with abilities to implement further technology, data, and analytics to customer-centric models, they will need trusted stewardship of all public data which the citizen ought to demand and hold government(s) to account. Citizens have the right to know and see how their personal data is configured, used, shared, and stored. What then does the role of data have for the state and what is the purpose of data?

3.7.3: The Role and Purpose of Data

The role of data for government(s) will require key components including a centralised data-exchange platform; secure online identification authentication for citizens; modern legislation governing data transparency use and sharing; and new and upskilled talent who can work with and support emerging technologies to deliver a seamless customer experience for the citizen. Governments that possess and embrace such innovations will position themselves towards a new era of capabilities, demands and expectations from citizens. Public service reform from an ethically responsible state would reinforce the spirit of public service that provides and connects a truly citizen-focused nation. Embedding these expectations into a social contract provides a fluid legislative process that positions governments with the framework and momentum to consistently enshrine trust to reliably address the social, economic, and technological expectations between citizens and the state. The data government uses must have the purpose to support, enrich and better the lives of citizens in a meaningful way that cannot rely solely on protection in the case of the state apparatus (Intelligence Services, Police, and Military), or for profit as is the case in the current capitalist system where data is sold and used to sell citizens

things based on their personal search history, or algorithms based on gender, age, genetics, or other identity driven factors. Purposeful data must be used transparently by government(s) to enhance citizens lives for the better.

Government(s) will have to ensure and assure citizens that they are appropriately managing and protecting their citizens data by implementing stringent, anonymised cyber security protocols. Overtime this data should be stored for citizen protection, released for public interpretation and research through open data and destroyed appropriately. It is essential that there is an agile legislative process to protect citizens and ensure that government(s) can be trusted and reliable to secure, promote and provide secure digital frameworks for the advancement of online public service delivery. Delivering shared technology and data platforms spanning governmental agencies enables the rapid and reliable delivery of connected services to the public for an ethically responsible state. This includes increased migration to cloud systems, development of modern enterprise architectures, implementation of robotics and intelligent automation, and the adoption of agile methods for software development. Priorities centre on workforces deriving critical insights from data and the metadata to heighten operational efficiency. Cloud, UX, and security will be three investment areas for national, state, and local governments to enhance operational efficiency. Government(s) must also adapt to new levels of agility and flexibility in how their workforces' roles become more diverse whilst adopting and managing the shift from location-based office work to remote and hybrid working arrangements that for many employees being permanent. Government(s) should proactively lead the way in attracting and retaining talent by introducing new ways of agile working introducing new skills and ultimately reshaping the way contribution aligns with society. Reskilling and upskilling will be pivotal retaining valued talent but enticing and promoting a strong collaborative and contributive culture throughout workplaces.

The nature of these evolving interactions is horizontal, empowering, and spontaneous. Central to this new form of interaction is data which needs to be upto-date, reliable, user-friendly, and open. This need for data is quickly becoming a central theme that applies to all aspects of our ever-evolving digital society with the

field of A.I and robotics having the potential to revolutionise society. Companies such as Google, Facebook and Microsoft are already utilising big data in AI-related techniques to train computers to recognise and understand human language as well as objects in photos. It is becoming possible to train computers to perform more difficult tasks because the enormous quantities of data required that can be obtained and safely stored. The same applies to all forms of metadata, machine learning, smart manufacturing and every other tech-driven trend shaping the future. All are reliant on data, and as such, machines are only as good as the data they receive. Government(s) lag behind the private sector when it comes to A.I development and training techniques for programmes that enhance A.I and IoT. Governing in the age of data is, therefore, vitally important, or at least should be if government(s) were to take the lead.

The rapid pace of technology evolution over the past decades have shown new business models such as e-commerce on a massive level of global connectivity which has accelerated with the smartphone phenomenon. These developments created enormous volumes of data leading to the rapid rise of the data field. What was once the domain of intelligence agencies, market research professionals and some technical statisticians is now mainstream. The new connected world is producing data at a pace that is unprecedented in human history. It is estimated that "by 2025, the amount of data generated each day will reach 463 exabytes globally...all the words ever spoken by humans fit into only 5 exabytes" and "by 2030, 90% of the population older than 6 will be online" (Vuleta, 2021). This has led to the rise of 'big data', commonly defined using the four Vs: volume, variety (of sources), velocity (effectively around the clock) and veracity (given abundance, quality assurance becomes key). When used effectively, big data can be a powerful tool. There are strong links between effective data management strategy and financial performance of companies as it helps them get to market faster with products and services that are better aligned with customer needs. It has the same performance enhancement potential for the public sector in relation to policies, more tailored government services, and more effective and efficient distribution of resources. It can also lead to negative outcomes if used incorrectly, in addition to the much-discussed issue of

privacy stemming from the Facebook-Cambridge Analytica data scandal in 2018. Cambridge Analytica "had collected data on millions of American Facebook users without their permission and used their likes to create personality profiles for the 2016 US election" to provide analytical assistance to the 2016 presidential campaigns of Republicans, Ted Cruz and Donald Trump (Lapowsky, 2019). The Cambridge Analytica scandal illustrated how sociotechnical systems are exploding simple notions of individual rights as people's data is being cumulatively pooled and linked so that it can be repurposed and used to manipulate entire groups and even societies as a whole. Tim Berners-Lee confirmed that people's "data is being taken and mixed with that of millions of other people, billions of other people in fact, and then used to manipulate everybody" (Lomas, 2018).

The manipulation of data is detrimental to free and fair elections, when deregulated and in the hands of private companies, individuals, or rogue states who are susceptible to destabilising nation-states if profits or gains can be made. Data scandals will regularly occur when large amounts of the world's data are in the hands of the private sector like *Google* and *Facebook*, who have managed to monetise data by making it central to their business models. Others, including Uber and *Airbnb* have used data to develop platform models that disrupted and changed their industries. The remainder of the global data sits in government hands, mostly stored in paper format, or legacy systems. So far, people have been willingly offering their data for free in exchange for access to technology services. However, this will not remain the case for long as business models are seeking ways and means to start paying people for the data, they generate in their daily lives such as the example Louis von Ahn used above in gamification (GWAPs). An exciting and widely unregulated, sector with massive potential has emerged but governments need to have access to create laws that limit companies who are putting citizens at risk. Either way government must be involved and should ideally be the ones benefitting most from citizens data so that they can provide better services for the citizens who provide their data. Government(s) could in some aspects monetise data from citizens data contributions to go towards funding basic incomes or universal basic services (UBS).

To maximise the societal benefits of the data age, a new movement to start promoting open data is needed. While government data is all data or information that government entities produce or collect, making it open refers to publishing and sharing data that can be readily and easily consulted and re-used by anyone with access to the internet with no fees or technological barriers. Data has and will increasingly become a source of wealth and public value creation. It is the lifeline of the digital society. However, there are big questions that are yet to be answered in the data age. Who owns the data, and who should own it given its centrality in our digital society of the future? Should there be a basic data charter for citizens, so they understand their rights and responsibilities? Who is responsible for our data quality and security? How do we manage and ensure privacy? And will people accept to continue generating data without being compensated for sharing it? These questions all apply to the citizen and the state (government) which makes it integral that data belongs to both the citizen and the state as both benefit from that data, but it is reasonable to have government protect the individual's data and anonymise the data of its citizens (individually and collectively) to help other citizens of the state in respect of public values like health, education, and general welfare of the state population. Government(s) cannot fall into a data trap that allows another country or multinational corporation without real jurisdiction to gain access to critical data about societies for profitable gain, or cultural imperialism. A government or state that sells or allows the harvesting of big data of its citizenry will over time erode sovereignty to the extent that the state does not have control over its own data. Without the control of big data, government(s) and state(s) will be unable to protect its citizens from threats, exploitation, and manipulation. Likewise, citizens must be made aware of the responsibilities they have in relation to how they forego their data, who it goes to, and for what purpose it is being used. We already know that this has begun by big tech companies as shown by Zuboff and will continue to become deeply intrenched unless government(s) act in order to protect themselves, and their citizens. The question arises then, what is the role and purpose of regulators and regulation?

3.7.4: The Role and Purpose of Regulators

Regulation is used for a variety of different purposes, such as to protect and benefit people, businesses and the environment. Regulation is one of the primary ways whereby government(s) can achieve its aims. State-mandated regulation is government intervention into private markets to implement policies and produce outcomes that otherwise may not occur. The role of regulation is thus the management of complex systems to ensure the highest standards of delivery, oversight, and strategic planning in all sectors of human functioning. Regulating sectors is an integral element of democratic nations' culture, and in public life to ensure the highest standards for all sectors and citizen-consumers. Enforced regulation must be implemented to oversee sustainable development stimulating revolutionary technological innovation through environmental, health, safety, economic, and labour market regulation. Enhanced support outside of government(s) for regulatory changes would be reinforced by opening the participatory and political space to enable new voices to contribute to methods of integrated thinking and solutions to problems. Barak Orbach states that:

"We live in a complex world of finite resources, in which the pursuit of self-interest often fails the individual and causes harms to others. These imperfections and limitations are the primary motivation for regulation...society's challenge, therefore, is to acknowledge that imperfections and limitations impair decision-making, communication, and trade, and to utilise legal institutions to address them. In other words, we should accept the fact that regulation is here to stay, and work to maximise its benefits and minimise its costs" (Orbach, 2012, p10).

An ethically responsible state and its government(s) would understand the need for a cluster of new regulators to deal with rapid developments within current sectors, industries and nations for new technologies and unseen developments. There will need to be regulatory authorities independent of government(s) to oversee and protect citizens from capitalism, automation, robotics, data abuse, disinformation, and warfare. International and domestic regulatory authorities must be strengthened and created to deal with new sectors and problems. International regulators would focus across nations and regions on warfare, capitalism, international tax evasion and tax avoidance, food scarcity, energy sustainability, global poverty, human rights,

data governance, election integrity, and climate change. Clearly there needs to be international regulators to deal with international problems. Where there will be overlapping issues with domestic state's regulatory authorities, there must be focus on regular engagement within these networks of regulatory authorities. Domestic regulators will be required by states for robots, wider automation, data handling and management, the health of labour markets, elections, housing, as well as basic income and universal basic services to name a few. Any format of basic income would overlap many regulatory authorities and government departments. It will be necessary to establish a regulator to calculate the necessary social minimum figure, let alone its distribution, ethical core values, and to ensure sustainability. HMRC would be best placed to distribute any basic income format fairly and efficiently to citizens in the UK. HMRC is regulated and accountable to a regulatory authority (currently the Adjudicator's Office). Similarly, regulations and a regulatory body will need to be established to ethically regulate and manage robots, human and job impacted automation as well as the responsible regulation of state and citizenry data. A.I must be regulated in its usage surrounding elections and realistic impersonations of citizens through deepfake videos, false audio, photos and videos that have the potential to falsely sway voters and destroy citizens private lives before such deepfakes can be debunked. New types of regulators are clearly required. The Office for Budget Responsibility (OBR) was established to independently provide economic forecasts and independent analysis of the public finances. If the UK understands economic forecasting and budget responsibility requires regulatory oversight then it must be understood that regulation is required for roboticization, automation, A.I., basic income, and data.

The responsible state needs strengthened regulatory institutions to protect citizenconsumers and state data. Government(s) need to be data-savvy e-governments whose commercial decisions, innovations, public policies, and all other choices based on big and/or open data are only as good as the quality of the data they use to enhance citizens' lives. Such data must be vetted, maintained, up-to-date, useable, and protected. This cannot always be done at the source due to the data sources' variety and veracity. Over the decades, governments have always required a

technological arm and societies have moved from the first generation (web 1.0) egovernment to web 2.0, which has provided citizens richer, immersive web-based services with online applications. Now, we are looking at government 3.0. But rather than being represented by a technology or toolset, it is rather a shift in culture that views government as a platform for enabling the creation of public value. Data must play a key part of the government's platform. If data is properly, efficiently, and safely shared across countries and societies and made accessible (when possible) in the places where analytics are most useful, then it will become a truly positive game changer, altering the way we live, work, and view society. For that to happen, the state's government(s) and institutions need to design, refine, and master a new set of capabilities, regulations, and shape a new culture based on public value. Much of this data currently remains locked up or in proprietary (private property of companies, governments, and other organisations). This severely limits its potential public value. Data must be used as a social good and government(s) must act on data responsibility legislation that guides data owners on their duties in the age of automation and IoT. Therefore, the duty to collect, manage and share in a timely manner, as well as the duty to protect citizens who value privacy will be integral. This legislation is needed over and above a government's own open and big data management systems and will need to cover all data stakeholders (irrespective of ownership or other governing rules). What then is the role of the primary stakeholders of the state, citizens? If citizens contribute to the betterment of the state, the citizenry must understand what their citizenship means to the state and what their duties, and contribution provide them with for their citizenship?

3.8: Citizenship and the role of Reasonable Citizens

The argument around citizenship is one whereby citizenship is understood as membership in a community. Citizenship is often used synonymously with nationality. However, where citizenship is used in a meaning different from nationality is in reference to the legal rights and duties of individuals attached to nationality under domestic law. In some national laws, citizenship has a more specific meaning and refers to rights and duties that can only be exercised upon age of maturity (such as voting rights) or to rights and duties that can only be exercised within the national territory or jurisdiction.

Citizenship is often obtained by meeting the legal requirements of a national, state, or local government. A nation grants certain rights and privileges to its citizens and in return, citizens are expected to obey their country's laws and defend it against enemies. The value of citizenship also varies from nation to nation. In some countries, citizenship means a citizen has the right to vote, the right to hold government offices, and the right to collect welfare payments. Simply living in a country does not mean or guarantee that a person is necessarily a citizen of that country.

Citizenship as with many other concepts is, therefore, "essentially contested" due to its referral as a category of membership which consequently raises questions around the inclusion and exclusion of different groups of people from said membership (Lister, 2003). Notions of citizenship have evolved from their first conception in Ancient Greece for Aristotle who believed it was human nature to want to belong to a political community. However, for Aristotle, citizenship was only reserved for a select few (adult male elites) whilst women, slaves and 'outsiders' were excluded from the democratic process of psephology (Lister, 2003). Exclusion has always played a part in the concept of citizenship as it does today due to boundaries and legal rights as individuals or groups will fall beyond these parameters.

Peter Dwyer argues that "if certain individuals or groups lack substantive rights to welfare, and they are unable to participate in society in meaningful ways, then the very idea of citizenship as a shared common status begins to unravel" (Dwyer, 2010, p15). Robert Drake argues that membership is not enough but that participation within a society is also a requirement of full citizenship (Drake, 2001). Citizenship is, therefore, currently whatever people within that community make it. As stated previously the role of the citizen should facilitate the evolving role of the state to ensure the citizen is better protected, provided for, and invested in. Both Dwyer and Drake would thus accept a format of basic income in principle.

Richard Bellamy argues that, for those people within a political community it is "their participation or lack of it [that] plays an important role in determining how far, and in what ways, it treats people as equals" (Belllamy, 2008, p26).

Bellamy's definition of citizenship involves three overlapping elements to establish a condition of civic equality:

- Membership of a democratic political community
- Collective benefits and rights associated with that membership
- Participation in the community's political, economic, and social processes (Bellamy, 2008).

As part of the human condition, rights are identifiable, and individuals are born with equal worth. Citizenship, therefore, has an intrinsic link with the state as it relates to the membership of an exclusive community which involves the decision making around the good life within that country and state. As a citizen of a state, you are by default a stakeholder in the society or community you are contributing to. Citizenship also relies on social connections, so the context in which citizenship is understood is important because as societies evolve and change over time, so too does the concept of citizenship

What then does a reasonable citizen look for from their state? Reasonable citizens we can suppose want to live in a society which they can cooperate with their fellow citizens on terms that are acceptable to all. Citizens are willing to propose and abide by mutually agreeable terms and rules, given the assurance that others will do the same. A reasonable citizen would honour these rules, even when this means sacrificing their own interests. Reasonable citizens want, in short, to belong to a society where political power is legitimately used and they are treated fairly, equally, and with protections from their fellow citizens and state. Each citizen has an "overlapping consensus" of what is reasonable and have their own view about God and life, good and bad, right, and wrong. Each has, that is, what Rawls refers to as a "comprehensive doctrine" (Rawls, 1993, p14-15 & 58). Yet because reasonable citizens are reasonable, they are unwilling to impose their own comprehensive doctrines who are reasonable and unwilling to impose their own

comprehensive doctrine on others who are also willing to search for mutually agreeable rules. Though each citizen may believe that they know the truth about the best way to live, none is willing to force other reasonable citizens to live according to their beliefs, even if they belong to a majority that has the power to enforce those beliefs on everyone. Rawls says that oppressive use of state power will be necessary to unite a society around any comprehensive doctrine which would include the capitalist doctrine we have all inherited to unite society (Rawls, 1993, p37).

Another reason that reasonable citizens are so tolerant according to Rawls is that they accept a certain explanation for the diversity of worldviews in their society. Reasonable citizens accept the burdens of judgement and the deepest questions of moral, religious, philosophy can be difficult to decipher. Even contentious people will answer these questions in different ways due to their life experiences, upbringing, environment, culture, class, and occupation etc. Reasonable citizens understand that issues regarding religious or philosophical connotations are of personal choice and preference and often not something to agree and disagree on. Most reasonable citizens understand this and are unwilling to impose their own worldviews on those who have reached conclusions different from their own. What reasonable citizens must understand and ought to be looking to accept is economic safety for their fellow citizen and insurance that as citizens of a state, they will be financially protected, provided DLS, invested in to achieve their goals and meet the essential requirements for wellbeing. The way to ensure the state enforces this or guarantees it is by implementing a constitutional social contract. If it is not implemented or offered dutifully by the state, it must surely be demanded by citizens?

3.8.1: Binding the Citizens and State: The Social Contract

I want to now argue why the need to bind the citizen and the state is important. I have argued above the need for a responsible state, but the state alone cannot make this connection unless simply out of a sense of duty. I want to legitimise this duty of the state and citizen connection through an expressed social contract. The government's duty as stated is to carry out the ethics of responsibility. There is then a duty of responsibility for the recipient. Recipients will have a duty to be

contributory citizens. This reciprocity will be based on a trust that the state will need to ensure the best outcome for the public at large. Government(s), regulators, and citizens will have the responsibility to ensure that this is regularly adhered to. The reason I am calling for a social contract to be signed by citizens to the state is to eliminate simple trust and replace it with a signature of promise. This promise will be one the state and citizen must uphold if the citizen is to be properly protected, provided for, and invested in. The benefits of the social contract will inevitably tip in the favour of the citizen as they would benefit more than the state in this contract. The state only gains authority and legitimacy if the majority collective within a state's boundary signs a contract. The citizenry should sign the contract to obtain provision, protection, and investment from the state which they would not otherwise get solely alone.

Why would we have government(s) if the citizenry contracted itself to the state? The government would be central to the facilitation of consent because it represents the rights of the citizen and would actively provide better economic gains that cannot be realised by an individual or private sector. Government provides the state's wellstructured systems to promote citizenship with laws to define the behaviour of citizens, which can only be affected by a well-organised government. Government's today do not need high turnouts of their citizens to elect it. Instead, it can take power on a 10% turnout. Neither would it choose to facilitate a binding of citizens and state because a government feels it has already done so via an election. I believe that there is every reason for the citizen to call for a binding contract between themselves and the state not simply because of the potential revolution of society by technology but an insurance policy for citizens to ensure their protection, provision, and investment from the state that it belongs to. Without the obligation from the citizen and the state together, there lacks true legitimacy in the state's authority and there in, no reason why citizens should obey a state's laws. Therefore, the social contract should be preliminarily offered by the state.

Some government(s) should be more capable of delivering better social contracts. Democracies in which the executive is constrained by free and fair elections with high participation and a free media ought to be better at delivering longer, more

prosperous lives for their citizens with better economic outcomes. Autocracies where leaders have personal power have often performed poorly. Countries that are not democracies but have an effective 'selectorate' that hold policymakers to account (such as the communist party in China) can deliver effective outcomes for their citizens as shown by Besley & Kudamatsu in *'Making Autocracy Work'*. The modelling approach used by Besley & Kudamatsu "makes clear that democracies can be better or worse than autocracies in terms of accountability although it suggests a presumption in favour of democracy on this basis" (Besley & Kudamatsu, 2007, p49). Authoritarian regimes that face little accountability from citizens, the media, or internally face fewer pressures to provide or deliver a social contract and instead use the state to enrich themselves and their supporters through kleptocracy as in the cases of Indonesia's President Suharto, Yugoslavian President Slobodan Milošević, Zimbabwe's President Robert Mugabe, Haitian President Jean-Claude Duvalier, Peruvian President Alberto Fujimori, Philippine President Ferdinand Marcos, and Russia's current President Vladimir Putin.

What I believe possible is that an autocratic state like China and a democratic state like the UK (when both are effectively run well) are both similarly capable with achieving an agreed social contract with their citizens. This can be achieved top-down by a state-run Politburo such as the CCP in China, or bottom-up through democratic means by citizens or progressive governments in advanced democratic states. In advanced capitalist economies the challenge is less that of the state capacity, but of political gridlock, and lack of will. As highlighted in Chapter 1, and using Peter Frase's *Four Futures* above, beneficiaries of modern capitalists but those who have benefited from their own individual successes that would not seek to change a system that they have benefitted from, but their children may not benefit from, instead choosing the status quo that has provided them often only slightly above average prosperity. A change in mindset is not enough as voters (who are often suppressed) cannot often elect a party that does not make their lives better. As noted in Capitalism as Politics, there are very little differences to most

electors in the major parties that not only defend capitalism, but seek to enhance it, often at the expense of their electors.

It is, therefore, important to understand the contemporary theories of political obligation for citizens and state. Although the lines that separate one theory from another are not always distinct, philosophical justifications of political obligation now usually take the form of arguments from consent, gratitude, fair play, membership, or natural duty. By understanding the varying forms of political obligation, we can offer the best-suited format for citizen's and state's seeking to comply with their social contract.

3.8.2: Natural Duty

Natural duties are understood to be those that people have, simply by virtue of their status as moral agents; they need do nothing to acquire them, nor does their bearing such duties depend on their occupying some role in a socially salient relationship. Natural duties are also universal in scope; they are owed to all members of a class defined in terms of possession of some feature, such as sentience or rationality. John Rawls first presented such an argument for political obligation when he asserted in A Theory of Justice that everyone is subject to a natural duty of justice that "requires us to support and to comply with just institutions that exist and apply to us" (Rawls, 1971, p99). Contemporary natural duty theorists differ over the natural duty that provides the basis for political obligation from Rawls. Thomas Christiano grounds political obligation in a fundamental principle of justice requiring "the equal advancement of people's interests" (Christiano, 2008, p77). Whereas Anna Stilz in a Kantian duty of respect for others' freedom-as-independence is understood as a secure sphere of selfdetermination defined by a person's rights. Both theorists agree, however, that moral agents can discharge their natural duty to others only through submission to the authority of a common legal order. Natural duty theorists of political obligation argue either that the law must be crafted according to democratic procedures or that it must not violate certain individual rights, or both, if those it addresses are to have a duty to obey it. Christiano, argues that against a background constituted by

diversity, cognitive bias, and fallibility, agents can be sure that their fundamental interest in judgment will not be unjustifiably set back only if political power is exercised within institutions that publicly realise equality, i.e., democratic ones. Likewise, Jeremy Waldron defends the authority of a majority rule decision procedure based on its "commitment to equality — a determination that when we, who need to settle on a single course of action, disagree about what to do, there is no reasonable basis for us in designing our decision-procedures to accord greater weight to one side than to the other in the disagreement" (Waldron, 1999, p117). Even if a person does not believe that the particular scheme of distributive justice realised in the law treats them justly, they can recognize that the process whereby that scheme was created, and can be modified or eliminated, does treat them as an equal. Stilz argues that law omnilaterally imposes obligations on all only if it expresses a general will. It does the latter if and only if it "first, defines rights (protected interests) that apply equally to all; second, it defines these rights via a procedure that considers everyone's interests equally; and third, everyone who is coerced to obey the law has a voice in the procedure" (Stilz, 2009, p78). The latter two conditions, she maintains, can only be met by a democratic procedure. From Stillz's perspective it is easier to argue the latter two conditions under democratic means after the evolution of the state's creation and the end of the state of nature in which democracy does not exist. The state of nature is the hypothetical life of people before societies came into existence. For Thomas Hobbes, social contract theory established the authority of anyone who was able to wield and hold power. If we imagine ourselves in a state of nature, with no government and no law to guide us but the law of nature, we will recognise that everyone is naturally equal and independent. However, Hobbes recognised that this state of nature will also be a state of war, for the "restless desire for Power after power" that drives all of us will lead to "a war of every man against every man" (Hobbes, 1651, p113). To escape the dreadful state of nature condition, people surrender their independence by entering a covenant to obey a sovereign power that will have the authority to make, enforce, and interpret laws. This form of the social contract Hobbes called 'sovereignty by institution'. Hobbes insisted that conquerors acquire authority over those they subject to their rule — "sovereignty by acquisition" — when they allow

those subjects to go about their business (Hobbes, 1651, p132). In either case, Hobbes said, the subjects' consent to obey those who have effective power over them, whether the subject has a choice in who holds power or not. Since they consent, they therefore have an obligation to obey the sovereign, whether sovereignty be instituted or acquired. The state of nature is an important aspect both historically and hypothetically but my issue with it applying to today is that it relies on tacit consent rather than expressed consent.

3.8.3: Consent

Most people who believe they have an obligation to obey the law probably think that this obligation is grounded in their consent. Consent theorists and I believe that too few people have either expressly or tacitly given the kind of actual consent that can ground a general obligation to obey the law, and hypothetical consent cannot supply the defect. Harry Beran argues the idea that only express consent can generate a political obligation and calls for political societies to establish formal procedures to evoke such consent. States should require their members to openly undertake an obligation to obey the law or to refuse to do so. Members who decline the obligation will then have the options of leaving the state, seceding to form a new state with like-minded people, or taking residence in a territory within the state reserved for dissenters (Beran, 1987). Peter Steinberger on the other hand has argued that voting or otherwise participating in elections should count as consent; and believes that calling the police or fire department for help, sending children to a state school, using a public library, constitutes "active participation in the institutions of the state" (Steinberger, 2004, p219–20). Both Beran and Steinberger make valid arguments and I agree with both points of view. However, in the social contract I put forward below, I favour expressed consent from the age of 18 to 25 and older because it gives legitimacy to the state and portrays what the citizens should expect and demand from their state. The expressed contract would be a fluid contract that establishes an evolved natural duty from the state to as stated protect, provide, and invest in the citizenry in receipt of consensual membership, fair play in return for ensuring such protection, provision, and investment, and gratitude from both parties (citizen & state) through mutual beneficiary.

3.8.4: Gratitude

Appeals to gratitude in debates about political obligation are popular today but are rarely the sole or even primary basis for an attempt to justify the obligation to obey the law. Plato's account of Socrates' reasoning is typical in this regard, with gratitude being but one of at least four considerations Socrates relies on in explaining why he will not disobey the ruling of the jury that sentenced him to death. Gratitude is an important aspect for the social contract I propose from the point of the citizen under the age of 18 who would have received from the state; an education up to age of 16 (students stay in school until age 16, then have the choice to either remain in school or take up vocational training, an apprenticeship, or find work); the use of health services, police, and public spaces as minimum. Gratitude can be applied to the majority of citizens in the UK; however, many would not see this as enough to consent to state laws. Citizens who have been in receipt of state schooling and national health services etc should not only employ gratitude when complying to the state's laws as they may choose not to opt-in to the state's rules and offerings at a later stage in life which is their free choice to do so. Gratitude is an important aspect of the social contract and should play a part in why a citizen of the state continues to remain a member of the state, but it should not be the sole reason the citizen continues to remain a citizen of the state.

A.D.M. Walker's theory in *Political Obligation and the Argument from Gratitude* takes the following form:

- The person who benefits from X has an obligation of gratitude not to act contrary to X's interests.
- Every citizen has received benefits from the state.
- Every citizen has an obligation of gratitude not to act in ways that are contrary to the state's interests.
- Noncompliance with the law is contrary to the state's interests.
- Every citizen has an obligation of gratitude to comply with the law (Walker, 1989, p205).

Whether this argument does indeed provide the basis for a satisfactory theory of political obligation seems to turn on two points. Firstly, are obligations of gratitude at all pertinent where political institutions are concerned? Walker holds that one may have an obligation of gratitude not only to other persons but also to institutions, including the state or polity. However, John Simmons argues instead that gratitude is owed only to those who intentionally and at significant cost to themselves provide us with benefits, and institutions cannot satisfy these conditions (Simmons, 2005, pp119–20). The second point concerns the strength of obligations of gratitude. That is, one may grant that we can have obligations to institutions, including the state, yet hold that these obligations are "too weak to function as prima facie political obligations in the usual sense," for they "would be overridden frequently, not just in unusual circumstances" (Klosko, 1989, p355). Walker responds by pointing to Socrates as someone who obviously thought his obligation of gratitude was very strong indeed and concludes that we "can afford to acknowledge that the extent of our indebtedness to the state is less than his, while still insisting that it grounds a strong, though not absolute, obligation of gratitude to comply with the law" (Walker, 1989, p364). The important aspect of gratitude can be seen here in these arguments though I disagree with Simmons in that I do believe institutions can satisfy conditions when the conditions of the citizens are made better off. Institutions like schools, the NHS and inevitably the state institution that by default funds these institutions can meet the satisfactory condition Simmons calls for in my opinion. The problems considered for gratitude is the lack of express consent. Gratitude would be accepted by many but would not satisfy all citizens.

3.8.5: Fair Play

Although earlier philosophers, including Socrates, appealed to something resembling the principle of fairness (or fair play), the classic formulation of the principle is the one H. L. A. Hart gave it in *Are There Any Natural Rights?* As Hart argues, "when a number of persons conduct any joint enterprise according to rules and thus restrict their liberty, those who have submitted to these restrictions when required have a right to a similar submission from those who have benefited by their submission" (Hart, 1955, p185). John Rawls adopted and referred to the duty derived from the

principle as the 'duty of fair play' (Rawls, 1964). What the principle of fair play holds is that everyone participates in a reasonably just, mutually beneficial cooperative practice. Likewise, Hart's "joint enterprise according to rules" has an obligation to bear a fair share of the burdens of the practice (Hart, 1955, p185). This obligation is owed to the others who cooperate in the enterprise, for cooperation is what makes it possible for any individual to enjoy the benefits of the practice. Anyone who "acts as a free rider is acting wrongly, then, even if his or her shirking does not directly threaten the existence or success of the endeavour" (Hart, 1955, p186). Free-riders have the same obligations to other citizens which includes a right to require others to bear their share of the burdens and an obligation to bear one's share in turn. Whilst I believe the choice to become a free-rider is a choice freely made by any citizen at any point in their lives this can be countered by varying forms of contribution (not necessarily work as we know it today). I do not believe the freerider argument stands as enough to oppose the rule of fair play, neither do I believe a free-rider would want to live their whole life without contributing in some way, however small the contribution is. The principle of fair play applies to a political society only if its members can reasonably regard it as a cooperative enterprise. If they can, the members have an obligation of fair play to do their part in maintaining the enterprise. The rule of law is necessary to the maintenance of such a polity and perhaps even constitutive of it because the principal form of cooperation is abiding by the law. In the absence of overriding considerations, then, the members of the polity *qua* cooperative practice must honour their obligation to one another to obey the laws. In this way the principle of fair play provides the grounding for a general obligation to obey the law, at least on the part of those who regard the state as a cooperative enterprise.

The argument of fair play has been criticised including that of Rawls, who abandoned fair play as an account of political obligation for citizens generally in his *A Theory of Justice* (Rawls, 1971, p97 & p308). The major criticism of fair play came from Robert Nozick, who objects that the principle of fair play would allow others to place us under an obligation to them simply by conferring benefits on us (Nozick, 1974, p90–95). To make his point, Nozick imagines a group of neighbours creating a

public entertainment system and assigning every adult in the neighbourhood a day on which he or she is responsible for planning and broadcasting the program. As a resident of the neighbourhood, you occasionally hear and enjoy the programs, but you never consent to take part in this scheme. When your assigned day arrives, are you obligated to take a turn? The principle of fair play says yes, according to Nozick, but the correct answer is "surely not" (Nozick, 1974, p104). Nozick is right to say that one would have no obligation to operate the system on his or her assigned day, but he is wrong to think fair play would require one to do so. There is no fair play obligation in cases such as this, either because the "passive receipt of benefits is not enough to show that one is a participant in a cooperative practice" (Dagger, 1997, p69–70) or because the benefits are "of relatively little value" (Klosko 2004, p38– 39). What matters is not that one accepts the benefits of the practice, according to Klosko's account, but that three conditions are met: "Goods supplied must be (i) worth the recipients' effort in providing them; (ii) 'presumptively beneficial'; and (iii) have benefits and burdens that are fairly distributed" (Klosko, 2004, p39). If, in sum, a state qualifies as a cooperative enterprise, and if it provides its members with goods that are presumptively beneficial or "indispensable for satisfactory lives" then its members have an obligation grounded in fairness to obey its laws (Klosko, 2005, p6).

Simmons argues that "modern political societies are too large and impersonal to count as cooperative enterprises" (Simmons, 2001, p38–42). He also contends that Klosko's theory is "not really a fairness theory at all," but a "disguised natural duty theory, resting on an unstated moral duty to help supply essential goods locally" (Simmons, 2005, p190). Whether Simmons is right or wrong about natural duty theory or fair play is not important. The argument around fair play that Klosko has made from the state as a cooperative enterprise is correct in my view and the debate of whether this is a natural duty of the state is different. I would argue the state has a natural duty to its citizens and to complete its duties must act as a social enterprise at times for its citizenry. The fair play argument displayed here is one that affects the citizen more than the state. I argue the state has a natural duty to act on behalf of its citizens that best interests them (the citizenry) and the duty or onus of

fair play is on the citizen to reciprocate how the state treats them. The onus of fair play is important to the free-rider argument of the basic income debate discussed in Chapter 4.

3.8.6: Membership or Association

Political obligation is best understood as an associative obligation grounded in membership. If we are members of a group, then we are under an obligation, *ceteris paribus* (all things being equal), to comply with the norms that govern it. Does this obligation follow from our consenting to become members? For it holds even in the case of groups or associations, such as families and polities, that people typically do not consent to join. Voluntary or not, membership entails obligation. Anyone who acknowledges membership in a particular polity must therefore acknowledge that they have a general obligation to obey its laws. At the core of the associative approach is the idea that political obligation is a form of non-voluntary obligation on a par with familial obligations. In Ronald Dworkin's words, "political association, like family and friendship and other forms of association more local and intimate, is in itself pregnant of obligation" (Dworkin, 1986, p206). Dworkin grounds state legitimacy in an associative model that is based in democratic values and the duty to mitigate the effects of sovereignty attempts to pursue an association of equal and cooperative communities.

The membership account has three main objections from John Simmons (1996); Christopher Wellman (1997); and Richard Dagger (2000). First, these critics maintain that the analogy between the polity and the family is neither persuasive nor attractive. It is unpersuasive because the members of the modern polity lack the close and intimate relationships with one another that family members typically share; and it is unattractive because it raises the possibility that the paternalism appropriate within the family may be extended to the polity. Second, the critics object that the associative account conflates the sense of obligation with obligation itself. Whether the proponents of the associative theory can overcome these objections remains a matter of debate. However, I believe that it is best to meet criticism head on, as John Horton does in the second edition of his *Political*

Obligation (2010). Horton developed a two-pronged account of political obligation according to which the polity or state in question must supply the "generic good of order and security" and its members must identify with it and acknowledge its political authority (Horton, 2010, p177). Horton's account of political obligation claims that:

A polity is, like the family, a relationship into which we are mostly born: and that the obligations which are constitutive of the relationship do not stand in need of moral justification in terms of a set of basic moral principles or some comprehensive moral theory. Furthermore, both the family and the political community figure prominently in our sense of who we are: our self-identity and our understanding of our place in the world (Horton, 1992, pp150–51).

Horton's account of political obligation is ideologically in line with the format of social contract and state legitimacy that I am arguing but the membership or association that Horton puts forward is one that, for me, still requires express consent that confirms membership and association to the state. To truly satisfy state legitimacy, the citizens (members or associated members) of the state would only be obligated to obey the laws set and have a duty to uphold the state's rules if they signed a binding contract with the state expressing so. Full members of the state would be considered as those contracted to the state. Whereas quasi-members of the state are those that have not expressly signed but can be considered members of the state if they choose not to opt-out completely of the process. Quasi-members would be associated to the state and would receive the benefits of the state's protection and provision but not investment. Why should the state invest in those that are not or do not choose to be a part of the state? Nothing should stop a member of the state from wanting to opt-out completely and consequently not be in receipt of any of its benefits. It must be the natural duty of the state to want to invest in, and retain members, but the state has a duty not to force or negatively coerce citizens to sign a social contract to the state. Therefore, should citizens decide to remove themselves from the state altogether they ought to be offered the opportunity to do so and assisted by the state.

3.9: A Summary of Social Contract Accounts

These contemporary social contract arguments highlight the variety of formats why political obligation takes place. Whilst we can all accept these arguments separately; I believe a hybrid of the above positions are necessary if the citizenry of an ethically responsible state is to agree to a social contract. The aim of a social contract theory is to show that members of society have reason to endorse and comply with the fundamental social rules, laws, institutions, and/or principles of that state's society. Simply, it is concerned with public justification, i.e., "of determining whether or not a given regime is legitimate and therefore worthy of loyalty" (D'Agostino, 1996, p23).

The development of the social contract occurred in the seventeenth century, when Thomas Hobbes and John Locke used the theory to rather different ends. Jean-Jacques Rousseau, Immanuel Kant, and other philosophers have also relied on social contract theory, but the classic expressions of the contract theory of political obligation were Hobbes's Leviathan (1651), Locke's Second Treatise of Government (1690) and Jean-Jacques Rousseau's *The Social Contract* (1762). Locke's social contract differs from that of Hobbes as it appears to have two stages. In the first stage the naturally free and equal individuals agree to form themselves into a political society, under law, and in the second they establish the government. This move allows Locke to argue, contrary to Hobbes, for a right of revolution on the ground that overthrowing the government will not immediately return the people to the state of nature. Nor does he hold, with Hobbes, that mere submission to a conqueror constitutes a form of consent to the conqueror's rule. Locke agrees with Hobbes in deriving obligations to obey the law from the consent of the governed. In developing his argument, however, he reveals three problems that have bedevilled social contract theory. One problem has to do with the nature of the contract: is it historical or hypothetical? If the former, then the problem is to show that most people truly have entered such a contract. If the contract is meant to be a device that illustrates how people would have given their consent, on the other hand, then the difficulty is that a hypothetical contract "is no contract at all" as stated by Ronald Dworkin (Dworkin, 1977, p151). The second problem has to do with the way Hobbes and Locke rely on tacit consent. If only express or explicit statements of agreement

or commitment count as genuine consent, then it appears that relatively few people have consented to obey the laws of their country; but if tacit or implied consent is allowed, the concept of consent may be stretched too far. Hobbes does this when he counts submission to a conqueror as consent, however Locke also runs this risk when he states, in the *Second Treatise*, that the "very being of anyone within the territories" of a government amount to tacit consent (Locke, 1690). Finally, it is not clear that consent is really the key to political obligation in these theories. The upshot of Hobbes's theory seems to be that we have an obligation to obey anyone who can maintain order, and in Locke's it seems that there are some things to which we cannot consent. We cannot consent to place ourselves under an absolute ruler, for doing so would defeat the very purposes for which we enter the social contract — to "protect our lives, liberty, and property" (Pitkin, 1965).

One of the first to find fault with the argument from consent or contract was David Hume. In *Of the Original Contract*, published in 1752, Hume takes exception to the appeal to tacit consent. To say, he protests, that most people have given their consent to obey the laws simply by remaining in their country of birth is tantamount to saying that someone tacitly consents to obey a ship's captain "though he was carried on board while asleep and must leap into the ocean and perish the moment he leaves her" (Hume, 1953, p51). For Hume, it seems, the obligation to obey the law derives not from consent or contract but from the straightforward utility of a system of laws that enables people to pursue their interests peacefully and conveniently.

3.9.1: A New Social Contract

The social contract is not synonymous with the welfare state and nor should it be. The social contract determines what is to be provided collectively and by whom. The welfare state is one of many possible means of provision for citizens and upheld by the state. A social contract defines what we as citizens of the state can expect from our state, government, and from each other in society. Our own social contract must uphold the duties of the state, the government of the day, and ourselves as citizens, both as representatives at home and abroad. Achieving a better social contract

ultimately increases the accountability of our political systems which in turn not only fosters but creates a fairer society overall.

Different thinkers have argued for different kinds of social contract, but all initially framed it in prevailing the rights of the monarchy. Thomas Hobbes argued that selfinterested but rational individuals should voluntarily submit to the authority of an absolute sovereign as the only sure way to avoid the brutish state of nature (Hobbes, 1651). John Locke believed the purpose of the social contract was to preserve the lives, freedoms, and well-being of citizens and where the sovereign failed to protect those rights, it was legitimate for citizens to revolt and create a new political society (Locke, 1689). Jean-Jacques Rousseau was concerned with the preservation of freedom whilst recognising that because humans were increasingly interdependent, compromises were still necessary to live together in a good society. For Rousseau the social contract required political institutions such as a representative parliament which allowed citizens to create the laws that they would voluntarily subject themselves, thereby giving the justification for the authority of the state (Rousseau, 1762). For these social contract philosophers, the expectations of the individual and of the state were minimal by comparison of our own today. The social contract was the precondition for living in a society free from exploitation. Over time monarchies have either ceded power or been overthrown entirely as power rightly devolved to citizens as democracy gained traction. The moral rationale in a social contract is that within every society, individuals have basic needs like access to education to learn about the world and act as informed citizens and find work, to health care and safety, enough income to live to avoid exclusion from society that helps to fund the individual to pursue their passions and interests, so citizens must share enough common experience to feel that they also have common purpose. As Michael Sandel says, "democracy does not require perfect equality, but it does require that citizens share in common life" (Sandel, 2012, p203).

Risks that are not the fault of the individual such as disability or a job loss resulting from an accident or sudden economic shock are the ones that most citizens are willing to share. However, if losses result from smoking, or poor performance at work, or drunk driving, many people believe that individuals should suffer the

consequences of their actions. Bad behaviour is often attributed to the product of environment and upbringing, deprivation, or even mental illness. Individual behaviour and responsibility are often central to how generous a welfare state should be or perhaps in the case of a social contract. There is no doubting the importance of individual behaviour and accountability

The most influential social contract political theorist of the twentieth century was John Rawls who used an ingenious thought-provoking experiment to create a just society. John Rawls argued that we should design our social contract behind a 'veil of ignorance' meaning without prior knowledge as to what our own status in that society would be. If we did not know prior to birth if we would be born into privilege or peasantry, we would want a set of rules or a guarantee that however you entered the world under any ethnicity, race, creed, or culture you would want to enter a society that was just. Just in the sense that you could pursue through the equality of opportunity that "those who are at the same level of talent and ability, and have the same willingness to use them, should have the same prospects of success regardless of their initial place in the social system" (Rawls, 1971). Today, the notion of equality of opportunity lies at the heart of many citizens' expectations the world over, and the perception of its absence is an important source of anxiety and disaffection.

In modern societies there is an expectation that those who try hard will improve their lot. Most countries pertain to enable social mobility as part of the social contract because it seems fairer, binds society together and enables collective action. The poor in any given society need to have the potential that they or their children can be better off. The rich who fear their children will be worse off cannot simply leave them sums of money to avoid them having to contribute to be better off in themselves. We all need to foster concern about how our society should be and have a common interest in how our society can be better off when we create a sense of common interest.

Society is everything. Some of us go through life attributing our successes to being self-made and self-sufficiency. We credit or blame our families for our lot in life, but we rarely think about the bigger forces that determine our destinies such as the

country we happen to be born in, the social attitudes prevalent at a particular moment in history, cultural values, or the institutions that govern our economy and politics, and the uncertainty of luck. All these factors and more determine the kind of society in which we live and are the most important determinants of human existence.

Minouche Shafik calls for a revisiting of the social contract arguing that:

"Everyone should be guaranteed the minimum required to live a decent life. This minimum should include basic health care, education, benefits associated with work and a pension that protects against poverty in old age, with the level depending on how much society can afford. Second, everyone should be expected to contribute as much as they can and be given the maximum opportunities to do so with training throughout life, later retirement ages and public support for childcare so women can work. Third, the provision of minimum protections around some risks, such as sickness, unemployment, and old age, are better shared by society, rather than asking individuals, families, or employers to carry them" (Shafik, 2021, p26).

3.9.2: A Social Contract for the 21st century

The reason I call for a social contract in the 21st century is to benefit both the state and citizen. With the implications technology has on the future, an ethically responsible state, citizenry, and government are needed. What brings them all together should be a sense of natural duty from the state, duty and accountability from the government and provision with protection from the citizens to the changes in society. A contract inevitably binds the three together. Without the protection and provision of a potential government in the future, there is very little that obliges citizens to follow and obey the laws they have been born into. A social contract that expresses consent to the state for the citizen and in which the state expressly confirms economic, physical, and cultural protection and provision to the citizen in said contract should be signed. Rawls says that, unlike public officials who have taken an oath, citizens have no obligation to obey the government, although they surely can benefit substantially from its actions (Rawls, 1971, p98). Said contract must guarantee individual freedoms, rights, protections, provision and investment in the citizenry and state. In doing so, the citizen will have a duty to uphold the signed contract that benefits them and invariably the government and state. Both Hobbes and Locke agreed on the idea of individual freedom. They both saw that this freedom was limited and accompanied by an obligation to obey the law, rightly so, the individual who signs a contract with the state will be obliged to obey the law and lose freedom by breaking laws that detrimentally affect another citizen or citizens. The idea of pure freedom is a fallacy in most if not all countries around the world. The vast majority of citizens understand that they are not free to act as they choose if it is against the law. Why then should a state offer a social contract or why should a citizen or the citizenry call for a social contract that binds them to the state? As I have argued by highlighting Hans Jonas, the ethics of responsibility leads us down a line of following some form of political legitimacy which can be obtained by fair and free elections in a democracy. However, the future holds a real potential for a technological utopia that can free members of a state economically but as highlighted in Freeman's 'who owns the robots' thesis, nothing guarantees that citizens will be economically freed. The four economic futures showed us that capitalist societies will carry on as usual to the detriment of the vast citizenry which is why I believe it is in the interest of the citizens to call for a legitimised binding promise from and to the state for further protection and provision. The reason a state should want a contractual binding with its citizenry is to legitimise its natural duty and authority. In an age of automation and data, the state with the government as its actor facilitator needs to have a correlated electorate that it can become closer to. I am not calling for a state of surveillance with a dystopian outlook but a state that invests in its citizenry to create an efficient utopian forward looking government that meets the goal of enhancing citizens' lives.

The social contract called for would be a physical one that you can point to and say this is what my state and government(s) provides me with, and this is what I have accepted, rejected, or negotiated. No citizen should be obligated to sign the contract with the state but would be considered to have signed if they did not opt-out. In the sense of David Hume's ship analogy, you can grow up on the ship but at the age of 18 you can decide that if you want to leave the ship, you can freely do so and be

allowed back at a later date. The contract I would like to see the state offer should be one that is flexible and open for the citizen to comment on but should confirm what the minimum expectations are for the citizen signing. As alluded to above, there will be times when there will be difficult citizens who simply do not want to tie themselves to a contract and whilst this is acceptable there must be an opt-in option unless the citizen wants to completely opt-out which would mean they renounce their citizenship and should be provided a lump sum of cash to begin a life in another state. Whilst this may seem harsh this is a free choice of the citizen and should ideally be made over time. The state should in this case also offer the citizen that chose to leave, the option to come back if they wish to sign and become a full member citizen again. Quasi-members of the state who choose not to sign a social contract but remain in the state must accept that they are by default, staying within the state's territory or boundary and should understand that they are giving consent to obey the state's laws unless they actively opt-out. This means that quasimembers of a state are members of the state and must accept the minimum standards expected of them and will be treated as full members by the law but will not receive full membership benefits as those citizens who have signed are able to gain. Citizens can (and ought to) demand more from their government(s) and state(s) to live sustainable lives without the fear of destitution, or the access to basic human rights.

Therefore, a contract between the citizenry and the state would enhance democracy, provide political legitimacy, and derive obligation, duty, and true accountability in relation to the 21st century's problems of the day for both citizen and state. This would breed an ethically responsible state and government(s), to enable the citizenry to make the choice leading to a road of technological utopia for all rather than for some under the current status quo economic model. As highlighted in chapter 1, beneficiaries of modern capitalism seek to cling onto their wealth and power. This does not always imply rich capitalists but those who have benefitted from their own individual successes that would not choose to change a system that they have benefitted from, but their children may not benefit from, instead choosing the status quo that has provided them often only slightly above average prosperity.

A change in mindset is not enough as voters (who are often suppressed) often elect a party that do not make their lives better. It is crucially important that like the state, democracy evolves with it. Cornel West states "genuine, robust democracy must be brought to life through democratic individuality, democratic community, and democratic society" (West, 2004, p203).

In democracies the core requirements are participation in elections, media coverage of the issues, and fostering public discourse and legislative and judicial pressures on those in power to deliver for all in society. In countries that are not democracies, unhappy citizens will find other less orderly ways to pressure their leaders for change, or alternatively leave their countries altogether to more accommodating countries suiting their outlooks. Greater accountability will ensure collective interests are served fairly, effectively, and more efficiently. We have a duty to each other to do better and demand more. Samuel Britten notes in *The Economic Consequences* of Democracy that the democratic process encourages "politicians to outbid one another by making vote-wining promises to the electorate and encourages electors to vote according to short-term self-interest rather than long-term well-being" (Britten, 1977). It is this short-termism why democracy must evolve to tackle the long-term problems of advanced capitalism. Eradicating voter suppression, gerrymandering (manipulating constituency boundaries to benefit political parties), paid lobbying, and outright corruption all thwarts democratic reform. All negative aspects deter citizens from the political process as do the Machiavellian politicians who sacrifice integrity for political success. Machiavellian politicians from across the political spectrum besmirch the very representation they seek and lose the dignity through the misfortune, errors, and shabbiness that define all political lives, when wealth, fame, greed, or ego are the reasons they seek political life.

"It is fashionable today to describe politics as a swamp. For many it has become more than a vulgar spectacle of deceit, ambition, and opportunism. Trust in our political institutions and leaders has sunk to new lows, and politicians are held in greater contempt than for generations. Voter anger and disenchantment are growing at an alarming rate. Distracted by all the unseemly squabbling of politics, we end up

allowing markets and bureaucrats to make decisions for us, leaving citizens resigned and alienated from politics-as-usual" (Garrard & Murphy, 2019, p1).

Democracies must evolve to be more agile, adaptable, resilient, efficient and effective at representing voter's voices. In doing so, not only should the way we conduct elections evolve but the way voters are viewed must change. Analysis by George Ward in *Is Happiness a Predictor of Election Results?* demonstrates that subjective well-being is a robust predictor of election results, even controlling for macroeconomic indicators, various demographic and partisan determinants of individuals' life satisfaction, and using a number of alternative specifications. According to the data collected Ward concludes "it is in politicians' interest not only to make voters financially better off, but also to take steps to comprehensively measure citizens' welfare and formulate policy focused on their subjective well-being" (Ward, 2015, p18).

Citizen-consumers must decide what their priorities are, and ought to be thinking, as well as calling on government(s) to achieve these priorities. The best way to predict the future is to decide it and create it for yourself. A democratic social contract enables this opportunity in its purest form. This can be achieved democratically by citizens calling for this insurance policy to bind the citizen-state nexus in a fluid and ever-changing expressed contract or top-down by an ethically responsible state. Alternatively, government(s) have the duty to bind citizen-state nexus, with following government(s) retaining and building upon the establishment of the ethically responsible state. Once an acceptable contract is offered to citizens that provides financial protection, provision, and investment to meet DLS, essential requirements for wellbeing and human rights, the government on behalf of the state must fulfil what the contract offers to sustainably retain it. It is up to government(s) to find ways to achieve this across the board, incentivising citizens to achieve and retain it. Within this contract must be the understanding and cultural acceptance of contribution over paid employment achieving a post-capitalist and post-scarcity economy.

As stated, change is coming and is inevitable because the forces of capitalism, technology, demography, and environmental pressures will drive it. The question is

whether governments, politicians and we as citizens prepare for that change, or will we continue to stagnantly move towards dystopian variants of capitalism. Countries and governments can take their own direction to implement elements depending on their values, preferences, and cultural traditions. In practical terms, most social contracts and evolutionary states have reformed in stages, progressing over decades as a result from events, developments, individuals, and continuous pressure from society and citizens.

In advanced capitalist economies the challenge is less about the state's capacity to put us onto a path of Bastani's FALC but of political gridlock and lack of will by government(s), politicians, and citizens themselves to demand more of a "political project of collective solidarity and individual happiness" (Bastani, 2019, p12). The negative historical connotations surrounding the term 'communism' will also deter rational citizens fearing the negative connotations from the failed Soviet Union (USSR). A new form of communism or neocommunism will have to be imagined that does not just imply a utopian state but actively seeks its implementation. An acceptable version that could lead to a neocommunist state could be a stakeholder society that is democratically legitimised through an expressed social contract.

3.9.3: The Stakeholder Society

Klaus Schwab and Vanham make the case for a global economy that works for people and the planet through what they call 'stakeholder capitalism' (Schwab & Vanham, 2021). Stakeholder capitalism can either be an ideology adopted by leaders at individual companies or a model enforced by governments through laws and regulations. Another way this can be achieved, is if citizens have a stake in society which will be beneficial in the run up to a post-scarcity society via an expressed social contract. If the citizen is not a stakeholder, then they will still have to pay for such goods and services however cheap they become. It is integral in this work that the citizen in signing the social contract does not undersell themselves and their value as contributors to the state and wider society. The stakeholder society I envisage has the potential to be much more lucrative but that depends on how the citizenry bargains their social contract or what the state can offer in the form of UBS. The premise of the stakeholder society I propose draws similarities to a sovereign wealth fund (SWF). A sovereign wealth fund is a state-owned investment fund generated by the government, often derived from a country's surplus reserves. A SWF would provide a benefit for a country's economy and its citizenry. The funding can come from a variety of sources such as state-owned natural resource revenues, trade surpluses, foreign currency operations, money from privatisations, governmental transfer payments or bank reserves that may accumulate from budgeting excess surpluses in any of the above. Were citizens stakeholders in a sovereign wealth fund or recipients of a dividend that gave them a stake in society, would they not seek for it to be successful and benefit them rather than simply private interests? I would argue the former rather than the latter as reasonable and rational citizens who as noted in relation to RAS if instead of a robot tax which could be applied and distributed to citizens, why not simply give the citizen a stake in the ownership of the robot? In the fields such as management, law, and human resources, stakeholder theory suggests that the stakeholder's needs should be put at the beginning of any action. Were you to see in a contract that you were a recipient of an entity be it natural resources, or a basic income, part owner of a business or enterprise you would seek to push for the success of said entity? The percentage of the stake could be extremely small that it may not even be seen as valuable, however it is the concept of ownership that gives value to the citizen in each society of which the ownership exists. The capitalist model puts the ownership in the hands of the few and the ownership you as a citizen take is of individual responsibility. Were the citizen given a stake then they have true responsibility and would seek to benefit their overall stake in society.

Ensuring citizens become stakeholders in their states and societies allows them to contribute towards bettering not only their own lives but those of future generations. This will lead to why a modern agile government must be attuned to citizens enacting a citizen-consumer nexus from government that has to lead and instil cultural amendments and policies that are post-capitalist and sustainable long-term, creating a circular economy that gives citizens a new way of participation and contribution to their society and communities. The ideal for the citizen-state nexus

must be the creation of utopia and its sustainable retention. The citizens of the state have considerable responsibility for the creation of a utopia as do our representative government(s). Why should we not expect or seek anything else?

Today, beyond any doubt, the necessity to change in the interest of sustainability is increasingly widely accepted. However, less in doubt is that there is a need to drastically change the global system as isolated actions of nations or of individual companies trying to be a force for good cannot alone change the system without it negatively impacting them. If efforts to achieve sustainability are to be truly effective, governments, multinational companies, international institutions, and agencies, as well as NGO's and other bodies or regulators must act and work together to achieve such goals.

Obtaining a stake in society must be given to all resident citizens of an ethically responsible state under its duty to provide, protect, and invest in its citizenry. The first thing the state's government(s) must do to achieve this is providing financial protection for their citizens to protect them from capitalism, and as an investment for the citizen to pursue happiness and a genuine life. Could a basic income contribute to achieving this? Can an ethically responsible state apply a basic income that meets the requirements for essential wellbeing? Would a basic income fall into protection, provision, and investment?

3.10: Chapter Summary

This chapter has highlighted that the role of the state following its inception is to provide protection for its citizenry. From the findings of chapter 2 it is understood that the state must remove capitalism as its economic system. In doing so, the state must evolve as an institution of social service to provide not only protection from enemies but protection and provision from modern advanced capitalism. The evolution of the modern state has to further enhance provision for its citizens but also invest in them as the shifting baseline must give more opportunities for citizens and future generations to flourish. It was found that an irresponsible state or government is one that allows its citizens to fall below the poverty line and leaves citizens without economic protection. An ethically responsible government would be

bound to address the issues of poverty and decent living standards (DLS) which required funding citizens through a basic income because it is the responsibility of the state and government(s) as its primary actor. Utilising Hans Jonas's, *The Imperative of Responsibility* gives the concept of responsibility a new dimension to traditional ethical theory because it is inadequate when considering future generations.

The concept of *The Imperative of Responsibility* emphasises the need for change amidst the incoming crisis of technological automation. This chapter has argued for government(s) as provider(s) and investor(s) in their citizens which can be brought about through technology as progression. Government as investor concluded the responsible usage of technology that is the dominant symbol of progress which leads to the implementation of a post-scarcity economy. Post-scarcity will enable citizens to easily have their basic needs met along with some significant proportion of their desires for the essential requirements of wellbeing and primary goods. In this model the acquisition of wealth would no longer be the driving force of citizens' lives. Instead, citizens would work to better themselves and the state through reciprocity and contribution. Money and the accumulation of capital will no longer be considered a prerequisite for liberation and rendered obsolete.

This chapter discussed the alternative theoretical futures using Peter Frase *Four Futures: Visions of the World after Capitalism* highlighting the four alternatives of Socialism, Rentism, Exterminism and Communism. From these theories I find that unless capitalism is managed by an ethically responsible state, we are most likely to experience a dystopian variant of highly automated capitalism. These scenarios clarify why an ethically responsible state is needed to address the importance of ownership of the technology in this case the robots. This was expressed in the argument around robot tax or whether citizens ought to be recipients and stakeholders of roboticization.

The role of modern government(s) in the age of automation must be updated to prioritise the way they provide services for citizens through customer experience (CX) and user experience (UX). Government(s) representing an ethically responsible state would pass more CX-related legislation to enhance service standards,

technology, monitoring, reporting, transparency, data protection, and delivery. Government bodies would place an enhanced focus on the services it delivered and focus more value and measurements into striving to improve their impact across communities, the environment, the economy, culture, and wider society. What this chapter found from this evolved role of the state is the necessity for a closer working relationship with its citizenry.

The role of reasonable citizens and citizenship is integral for the ethically responsible state and its government's duty of responsibility for the recipient. Recipients will have a duty to be contributory citizens. This reciprocity will be based on a trust that the state must ensure the best outcome for the public at large. Government(s), regulators, and citizens will have the responsibility to ensure that this is regularly adhered to.

An expressed social contract can be signed by citizens to eliminate simple trust and replace it with a signature of promise. This promise will be one the state and citizen must uphold if the citizen is to be properly protected, provided for, and invested in. The benefits of the social contract found that this would tip in the favour of the citizen as they would benefit more than the state in this contract. The state only gains authority and legitimacy if the majority collective within a state's boundary signs the contract. An expressed contract would provide the citizenry insurance for their protection, provision, and investment from their state should they choose to become full members. In doing so, they would have a duty to fulfil their potential and their roles as contributors to society and their state's communities.

This chapter sought to understand how an expressed social contract could be accepted by citizens and what the aspects would be for a reasonable citizen to accept, sign, and want to be a contributing member to the state and wider society. The contemporary theories of political obligation for citizens and state highlighted the variety of formats as to why and how political obligation takes place. Natural duty, consent, gratitude, fair play, and membership/association were considered before concluding a hybrid of the above positions are necessary if the citizenry of an ethically responsible state is to agree to any expressed social contract. The aim of a social contract theory is to show that members of society have reason to endorse

and comply with the fundamental social rules, laws, institutions, and/or principles of that state's society.

A new social contract would ensure all members of the state become stakeholders in their state and society. An acceptable version for the vast majority of citizens can lead to a utopian ethically responsible state or neocommunist state that would be legitimised through an expressed social contract. Any agreement with an ethically responsible state would require the state to provide protection and investment in its citizenry. The most succinct and effective way it could do this is by providing some variant of universal basic income (UBI) and universal basic services (UBS) to protect citizens financially, provide UBS and primary goods for all citizens allowing decent living standards (DLS), and finally invest in citizens and future generations to pursue the good life to obtain the essential requirements of physical and social wellbeing. This succinctly leads this work onto the argument for universal basic income (UBI).

Chapter 4: The Argument for Universal Basic Income (UBI)

4.1: Introduction

The strongest arguments for basic income are moral ones, specifically those of social justice, universalism, basic security, and freedom as they rest on solid foundations of philosophical lineage. The moral imperative is paramount and the evidence that favours basic income is clear. Less clear is how the implementation of basic income takes place. This chapter begins by defining universal basic income (UBI) and providing a brief history of the idea before contextualising it within the current literature and engaging with proponents' arguments and issues with the policy. In doing so, I engage with the relevant literature about the impact UBI on citizenship, the welfare state, and work, before defining my format of a basic income based on the European Science Survey definition principles and how a basic income ought to be formatted and financed within the context of modern capitalism.

4.2: Defining Universal Basic Income (UBI)

UBI is considered a radical policy proposal that in its purest form is quite simply a regular unconditional cash grant given to all members of a community or nation without a means test, regardless of personal desert, with no strings attached, regardless of earned or unearned income and, under most proposals, at a sufficiently high level to enable a life free of economic insecurity. The term *basic* implies enough to make a difference to people's lives, or to provide for some, if not all, basic means of survival. In recent years, UBI has gone from a utopian proposal to a policy in vogue. Whilst there has been no nationwide format of a UBI implemented nationally anywhere in the world, there have been a range of differing pilot schemes and even a referendum on the implementation of a UBI in Switzerland. UBI trials have been conducted in towns, regions, cities, and states including Finland, the Netherlands, Namibia, Kenya, Canada, the United States and on British shores in Scotland and Wales. The idea of a UBI or basic income has been proposed in a variety of forms for centuries and has reoccurred and increased in

prominence in recent decades and is now considered part of political discourse as a policy response to the Covid-19 pandemic.

The term *Universal* means that there are no selection criteria (e.g., age, gender, place of residence). The terms are often used interchangeably. Basic income is sometimes referred to as a 'citizen income' or 'national', 'social' or 'citizens' dividend'. In the context of the EU, some call it a 'European Dividend'. Guaranteed minimum income guarantee policies envisage transfers to assure a minimum level of income. They often rely on selection criteria (e.g., only single mothers under a certain age) or social conditions (e.g., work requirements).

The definition of UBI has been developed over decades mainly on the contemporary normative debate wherein Philippe Van Parijs's influential works centred on the philosophical ideals of equality and justice. Van Parijs defined UBI as simply a cash transfer, funded by taxes and policy amendments that "would be paid to all citizens regardless of need, and regardless of whether they are working, or even willing to work" (Van Parijs, 1995, p9). Van Parijs has produced a rich literature on the topic of UBI and his definition of the term has been developed and I believe put simply in the format of the definition used in this work by the 2016 European Science Survey definition. The European Science Survey defines a UBI as:

"An income (1) paid by government to everyone on a monthly basis to cover living costs, (2) financed by taxes, (3) replacing many other social benefits to (4) guarantee a minimum standard of living, (5) with no variation depending on whether recipients are working and (6) allowing people to keep money earned from work or other sources" (ESS8, 2016).

The data is the first large-N academic survey to directly pose a question on UBI attempting to eschew any philosophical discussions of (de)merits of UBI. The subject has moved beyond the behavioural, social, and economic consequences to instead consider factors for supporting formats of basic income. A normative approach provides support for necessitating basic income offering policy formulations to further understand how it can be brought about financially through political feasibility.

4.2.1: Contextualising Universal Basic Income

It is important to understand that UBI research is multidisciplinary and there are several varying standpoints made from sociologists who have challenged myths around poverty to mitigate fears of parasitism as shown in *Dependency Culture:* Explosion of a Myth by Dean & Taylor-Gooby. There is the context of racial justice and the systemic discrimination against African Americans and the resulting widespread poverty and unemployment stated by Martin Luther King Jr, the Black Panthers, and James Boggs arguing that guaranteed income could be the simplest and most effective strategy to combat poverty. Feminist thinkers have argued that an income separate from labour can be a way to weaken the prominence of the male breadwinner model (Costa & James ,1973; Cox & Federici, 1976). Economists have pointed to empirical evidence from randomised control trials which cast doubt on the notions that the poor are lazy and wasteful (Bastagli et al, 2016; Evans & Popova, 2014). Even Milton Friedman articulated the Negative Income Tax (NIT) would raise the floor of income without negatively affecting the price system and market mechanisms. Friedman believed NIT would reduce the paternalistic and intrusive state bureaucracy required to decide who, among the poor, merited assistance (Friedman, 1962, & 1968). Phillip Harvey argued the usage of a NIT over a UBI or Basic Income Guarantee (BIG) in relation to a 'jobs guarantee strategy'. Harvey says this secures the right to work and income support recognised in the Universal Declaration of Human Rights that would "not only eliminate poverty more efficiently than a UBI, but that it also could achieve most of the other goals of a BIG at less cost, while simultaneously securing a range of economic and social human rights that a UBI would not address" (Harvey, 2006, p18). Harvey concludes that:

"Even if the benefits of a UBI or an equivalent NIT would justify its cost in theory, BIG advocates need to consider the possible opportunity cost of pursuing the strategy in practice. In light of its high cost, is it realistic to imagine that a UBI or an equivalent NIT could be sustained at a high enough level to eliminate poverty? BIG advocates who argue that a society should provide its members the largest sustainable BIG it can afford – whether or not that guarantee would be large enough to eliminate poverty – are on shaky moral ground if the opportunity cost of providing

such a BIG would be the exhaustion of society's redistributive capacity without eliminating poverty when other foregone social welfare strategies could have been funded at far less cost that would have succeeded in achieving that goal" (Harvey, 2006, p18).

Yanis Varoufakis calls for a universal basic dividend (UBD). This is a variation on the idea of universal basic income, but instead of being funded through taxation, it is funded through capital investment meaning companies floated on the stock exchange would be obliged to set aside a certain percentage of their shares to be held in common for all citizens through the government. This UBD "should and can be, independent of welfare payments, unemployment insurance, and so forth, thus ameliorating the concern that it would replace the welfare state" (Varoufakis, 2016). A similar scheme has operated in Alaska since 1976, where returns from state oil revenues are distributed to citizens via the Alaska Permanent Fund (APF). The APF is a constitutionally established permanent fund that is paid to Alaska residents that have lived within the state for a full calendar year and intend to remain an Alaskan resident indefinitely. The "annual check in 2019 was delivered to 631,000 Alaskans [coming] largely from earnings of the state's \$64 billion fund" (DeMarban, 2019). The "lowest individual dividend payout was \$331.29 in 1984 and the highest was \$3,284 in 2022 and the 2022 PFD will inject \$2.1 billion into the state's economy" (Turner, 2022).

The main use for the fund's revenue has been to pay out the Permanent Fund Dividend (PFD), which can be portrayed as a clear example of a basic income in practice in the form of a resource dividend. Karl Wilderquist argues, "it has helped Alaska attain the highest economic equality of any state in the United States... And, seemingly unnoticed, it has provided unconditional cash assistance to needy Alaskans at a time when most states have scaled back aid and increased conditionality" (Wilderquist, 2012). A universal basic dividend (UBD) is a larger version of this, involving investment from every industry in the nation.

Whether a NIT, UBI, BIG, UBD, citizens dividend, social dividend, or a citizen's basic income is the answer or a mix of many, what we do know is that the debate around a universal basic income (UBI) primarily focuses on the social and economic

implications of the policy proposal. Less clear is how a basic income can be implemented nationally in the current context of advanced capitalism. There has been a broad British element in the arguments for UBI for decades, even centuries, including the social dividend (or national dividend) scheme advocated by James Meade that would be funded by publicly owned productive assets (Van Trier, 2018). Thomas Paine discussed the idea of a lump sum granted to all citizens at adulthood in *Agrarian Justice* stating:

"It is a right [Government must] create a national fund, out of which there shall be paid to every person, when arrived at the age of twenty-one years, the sum of fifteen pounds sterling, as a compensation in part, for the loss of his or her inheritance, by the introduction of the system of landed property. And also, the sum of ten pounds per annum, during life, to every person now living of the age of fifty years, and to all others as they shall arrive at that age" (Paine, 1797, p10).

Bertrand Russell argued for a basic income alongside public ownership as a means of shortening the average working day and achieving full employment in *Roads to Freedom, Socialism, Anarchism, and Syndicalism* (Russell, 1918, pp80-81 & 127). The Scottish Economist, Aisla McKay argued that a basic income could promote gender equality and she specifically argued that "social policy reform should take account of all gender inequalities and not just those relating to the traditional labour market" and that "the citizens' basic income model can be a tool for promoting gender-neutral social citizenship rights" (McKay, 2001, pp99-100).

British Economist, Guy Standing has also proposed financing a social dividend from a democratically accountable sovereign wealth fund (SWF) that would be built up primarily from the proceeds of a tax on rentier income derived from ownership or control of assets, be it, physical, financial, or intellectual (Standing, 2016 & 2017). Standing also believes that a basic income would be more transparent and provide for a much simpler welfare system (Standing, 2008). Luke Martinelli has assessed how feasible it is to apply a UBI in the UK. Martinelli's micro-simulation studies on the fiscal and distributional implications found "affordability and distributional effect cannot be separated; rather than claiming UBI is unaffordable *per se*, a more apt

characterisation of opposition is that an unaffordable UBI would be inadequate, and an adequate UBI would be unaffordable" (Martinelli, 2017, p43).

Martinelli's analysis is a crucial finding in the context of the case in Britain and I will explain below how it has shaped my argument as to why a UBI in its purest theoretical form should not yet be implemented in the current contexture, and why my format of basic income is better suited but alone not sufficient enough, without wider state engagement through Universal Basic Services (UBS). Any proposal for basic income requires additional structural policy recommendations including taxes.

4.2.2: Basic Income Pilots and Schemes in the UK

Experiments and pilot schemes generate a degree of public discussion and engagement and serve an important democratic function. There has been considerable international interest in the prospect of basic income experiments in the UK, particularly in Scotland following the Scottish Parliament's 2017 Programme for Government, whereby funding was promised for research into the feasibility of Scottish basic income experiments (Sturgeon, 2017). There have also been several local authorities in the UK across all four nations who have put forward motions of UBI since 2018, to 22 councils in 2020 (UBI Lab Network, 2021). Many more councils across the UK forwarded motions in support of UBI following the Covid-19 pandemic. The Welsh Senedd proposed to implement a UBI scheme in 2020 and following the Welsh Senedd elections, a UBI pilot scheme for care leavers was agreed in 2021 by the Labour-led Welsh government that begins in 2022. The Welsh government's Minister for Social Justice, Jane Hutt stated that:

- Taking part in the pilot should make no participant worse off
- There should be no conditionality on income received
- The same payment should be paid to everyone
- The payment will not be altered midway through the pilot (Welsh Government, 2022).

It is useful here to clarify the distinction between basic income pilots and basic income experiments, while recognising that initiatives may not fall into either. Pilot

Schemes are full basic income pilots adopting all principles. However, pilot schemes will be temporarily limited and may only be applied to a subset of the wider population such as in towns, cities, regions, or sectors. Whereas Experiments are not full pilots as they may not be universal (they may target a particular cohort for example), have elements of conditionality, or do not meet the criteria of other principles laid out in the following sections. This can often be down to financial, legal, or political constraints.

Many surveys, studies and petitions have taken place in the UK regarding UBI. An Ipsos Mori poll in September 2017 found that nearly half of all adults aged 18-75 (49%) supported the idea of the UK government introducing UBI at the level to cover basic needs in principle (Ipsos Mori, 2017). With similar findings made by an investigation conducted by the European Social Survey stating that 52% of Britons over the age of 15 supported the policy (ESS, 2017). Since these surveys were published a global pandemic has taken place and calls for UBI have risen in public debate. The UK parliament received over 100,000 signatures for a petition titled *`Implement Universal Basic Income to give home and food security through Covid-19'-* to:

"Support the needs of those that need to self-isolate as well as the public health at large, and the wider economy...trialling a Universal Basic Income for all residents would give home and food security, allowing people to make the right decisions for their families and wider society, whilst also keeping money flowing through the economy. Doing this will reduce pressures caused by acts of desperation" (Parliament Website, 2020).

The basic income I propose in this chapter has been based around the five factors that make up a UBI. It is important therefore to understand the context of the policy and how it can be most suitably implemented.

4.3: The five factors of UBI

Proposals of UBI differ across political ideologies and disciplines but there are five definitional features that generally remain constant from one proposal to another:

The income is distributed in cash, individually, regularly, unconditionally, and universally. At this point, I will introduce each of these definitional features and explain their arguments. I introduce the idea of alternative cash transfers in the form of Universal Basic Services (UBS). The introduction of a UBS in relation to a basic income being distributed in many states is to help alleviate the affordability argument, whilst also adhering to the ethical responsible state's duty to provide for its citizenry in more ways than guaranteed cash transfers.

4.3.1: A cash Transfer:

UBI in its purest form is a direct cash transfer. Cash has the benefit that it can be converted as the recipient sees fit and a pure UBI allows the recipient to convert their cash into whatever they choose. While we can assume that most beneficiaries will use the cash to buy their weekly food shop or pay rent, bills, transport costs, or purchase garden furniture and dog food, or save it for a rainy-day fund. UBI does not stipulate what you can or cannot buy meaning you could use the money to buy cigarettes, prostitutes, alcohol, gamble, or holiday and endless possibilities for what a cash grant can be spent on. UBI offers full consumer freedom according to Van Parijs, Standing, and Vanderborght believe it brings pure freedom to individuals with the potential to fully emancipate recipients allowing them to pursue lives they desire unencumbered (Van Parijs & Vanderborght, 2017, pp104-105).

Both Van Parijs and Vanderborght believe UBI could be an instrument of freedom from state paternalism. Freedom for citizens to live unencumbered lives is great but as a civilised society we have already been conditioned to accept that there are times when the state needs to intervene to protect citizens from themselves and others. State paternalism is key to my argument of basic income as an ethically responsible state should not allow citizens to have full unencumbered freedoms. The reason for this is that it would be irresponsible of the state and state institutions to allow someone they were aware of having a serious gambling, drinking or disability issues to be allowed to go without protection in the name of freedom. The state must intervene to protect, provide, and invest in the individual as a duty of state paternalism. To say it is the freedom of the individual to drink themselves into an

early grave is a cop-out. The state and government(s) of the day must target citizens to make the right decisions for themselves, freely utilising psychology, and behavioural economics to activate choice architecture such as 'Nudge Theory' made famous by Richard Thaler and Cass Sunstein (Thaler & Sunstein, 2008). This can be as simple as raising taxes on what the government deems detrimental for citizens or through the provision of lifelong learning and education, so citizens can learn for themselves. For a pure UBI, the decisions on where and how cash is spent lies with the recipient and cash benefits have been defended as a superior economic tool by Milton Friedman. Friedman argued that "surely, the families being helped would rather have a given sum in cash than in the form of housing [because] they could themselves spend the money on housing if they so desired" (Friedman, 1962, p178). Cash turns the poor into consumers giving them the freedom to alleviate their own poverty (with enough cash) in theory. In doing so there is no evidence to suggest that turning the poor into consumers distorts markets. If anything, the opposite happens, as more money flows into local economies fuelling microeconomic successes. Assuming this was done on a national basis there would inevitably be a rise in macroeconomic success also.

4.3.2: Alternative Cash Transfers – Universal Basic Services (UBS)

What if there was no money for the government to distribute? Let's say we have experienced another crisis of capitalism and the value of the money we have is not worth the paper or plastic it is written on. The money in bank accounts cannot purchase the goods needed to live which is a possibility in modern advanced capitalism shown in Chapter 2. I want to acknowledge here alongside the argument for cash as the primary allocation for recipients what if governments offered a variety of Universal Basic Services (UBS) alongside cash transfers. UBS are forms of social security in which all citizens or residents of a community, region, or country receive unconditional access to a range of free, basic, public services, funded through taxes and provided by government(s) or public institutions. UBS include but are not limited to shelter, sustenance, health and care, education, transport, legal, and information services. UBS could be provided on the basis that they are necessary to sustain and enable each citizen's material safety, opportunity to

contribute, or participate in the decision-making process of their community, region, or country, even if they lack any financial income. The content of UBS varies according to the resources available to the community, region, or society and their political definitions of what is considered basic provision. Were the government to provide a high standard of nutritional food, a home, sustainable electricity and heating, a good internet connection, childcare for working parents, training for different occupations or access to public services that would benefit citizens' lives for the better. Would we not choose to have a mix of these things instead of cash or on top of the cash given? The UBS system is one which most developed nations have adopted that requires constant upgrading. However, a UBS system is something that should be included as part of a basic income where economic factors are too difficult to attain such services. A basic income would be topped up by UBS or vice versa where services do not meet a decent standard that a basic income would be a top up for citizens lacking access to basic services in their communities. UBS can also be deployed in cases of families with children whereby government(s) provides healthy ingredients sent to homes ensuring children and young people have access to healthy nutritional food. Food choices can be determined by parents and children and sent in the forms similar to HelloFresh, Mindful Chef, or Gousto food recipe boxes delivered to citizens. Clearly this takes away the true freedom to decide how money is spent by recipients; however, I would argue that in the case of child sustenance, it is important for children and young people to have access to high quality nutritional food of which this choice may not be made by all parents. The responsibility of the state would in this case ensures the highest standard for those who due to their age cannot yet make their own decisions on matters concerning them. The argument for UBS has been accepted by most advanced nations, however, I want to highlight the importance of UBS aligned with a basic income format, especially in relation to the argument of affordability if governments genuinely cannot afford cash transfers alone, they could offer other benefits through UBS which I will discuss in more detail below.

In the UK welfare state, there are already cash transfer programs in place that took the form of disability allowance and job-seekers allowance, now part of Universal

Credit. All come in the form of cash transfers and are often household-based rather than individually set, conditioned on behaviours, and targeted towards people with the lack of means. The pure UBI departs from this through individual rather than household payment.

4.3.3: Individual versus Household:

Most means-tested income support schemes establish eligibility based on household income. This means that citizens within households that have a higher income than the eligibility ceiling typically do not receive a welfare payment of their own. A spouse without a wage depending on a well-off (or rich enough) partner for instance lacks the eligibility criteria for welfare support. They are also in many circumstances not only reliant on their spouse but cannot afford to leave their spouse or partner if they wanted to do so without financial support. Although families are often spaces of solidarity and support, we must accept and admit that they can also be spaces of conflict and dominance. The household-based distribution system of resources from breadwinner to care provider, to unemployed spouse or partner does not guarantee the dependents need to lead a dignified life. A basic income given to individuals is better placed to counter the issues of invisible dependents who often go under the radar when household-based tests are calculated. Young adults and child dependents are often ineligible for income support. A UBI to meet its own universality would need to be made available to individuals rather than householdbased to include non-earning citizens that require income for their own financial decision making. UBI can empower women or vulnerable citizens in positions of conflict or dominance to have the financial ability to choose a different life, if they wanted. Sadly, there will always be conflict and dominance in a world where humans exist, and I would not argue that a UBI or basic income could alleviate people being prisoners in their own homes. However, UBI, Citizens Income, or basic income could help victims of domestic violence find new dwellings and provide a financial safety to take control of their lives. I am a proponent of household stress tests where there are children and young adults in the home as they will not benefit from a guaranteed income until they are at minimum 16 years old and even then, this is very young, and the age would ideally be at least 18 in the format I present. Many

formats of UBI do allocate to children but they get a lower amount and the money they receive goes straight to the parents. The individual feature of UBI seeks to protect vulnerable individuals within family units and increase their freedom. The additional allowance for children ensures the family unit has enough to live free of economic insecurity.

The argument of individual versus household is one that I believe has to be made intrinsically on whether there are facilities to accommodate accounting on a massive scale to cope with the demand for individual distribution. The UK is politically, socioeconomically, culturally, and historically used to means-testing and testing on a household basis and has been relatively successful in doing so. Do I believe the UK is capable of accounting on an individual basis? Absolutely, there is no doubt about it. What I am advocating is not one over the other here but a mixture of both individual and household when considering children. I believe we have the capabilities to test and find who needs extra financial assistance of a basic income and who does not. The reason I would not count out household calculations completely is the fact that there should be extra allocations made to households with children and young adults present. An ethically responsible state, would need to ensure future generations are benefitting as referenced above with high-quality healthy nutritional food as an example. While I acknowledge that all citizens should be in receipt of healthy food, I do not discourage those who as adults at times choose not to eat healthily for whatever reason based on free choice. However, government(s) should seek to deter adults making unhealthy decisions on a regular basis on smoking, dangerous drug use, or a reliance on fast food, sugar and alcohol should be deterred via nudging behaviours more progressively or taxing the overconsumption of products known to cause problems when overconsumed. This would not affect a citizen's basic income, but government(s) must take progressive steps in pursuing healthier, fuller lives for its citizens, especially those who cannot yet make their own decisions such as children and young adults. Therefore, distribution of basic income to all individuals becomes standard. Individuals that needed the extra financial boost to not only cover a decent standard of life would be guaranteed a basic income. It would also provide a financial boost to households

split between the parents of the children to provide necessary extras to children's lives. Providing the necessary basic income to cover a decent standard of living for all individuals should ideally mean households with families are meeting the decent standard. The ethically responsible state is right to keep track household data to ensure that those with children have a decent standard and the protection of future generations is ensured by the state.

4.3.4: Unconditional versus Conditional:

The argument of unconditional versus conditional is perhaps the most controversial in the debate around UBI. In most welfare states there are schemes or benefits that are given on the condition that recipients prove that they are looking for work or genuinely unfit to work. In the UK, benefit claimants can lose their payments if they have not applied for enough jobs each week, if they miss an appointment or arrive late at a job centre, and if they refuse a job offer when they have been declared fit enough to work. Conditionality is justified mainly by the evaluation that work is good for individuals and necessary for their community. I believe there ought to be some forms of conditionality wherein recipients have to be residents of a nation and citizens can apply for statehood, identifying with the nation culturally and wanting to contribute to the success of said nation. A higher contribution to the state will mean you can be in receipt of a higher stake from the state. The contribution is not a duty, but it should appear like one. Government(s) should and in some cases would incentivise citizens to contribute in a beneficially mutual way. If, for example you were a stakeholder in a company, you would work hard to ensure that the company would be successful. You would contribute and aim to make the right choices as a representative of the company because you would benefit from its success in the short, and long-term.

Sadly, even today there is a widely believed fallacy that benefit schemes are centred on the suspicion that a significant number of recipients will attempt to cheat the system and are therefore designed to deter and screen out free riders or scroungers. The argument that lazy poor people would not work and spend their money on alcohol or cigarettes is lazily repeated time and time again by those ironically too

lazy to check if what they are stating is true. The medical journal, *The Lancet* decided to test if this argument about people was true. What they found was that when the poor received no-strings attached cash they actually tend to work harder stating that: "emerging data from cash transfers, conditional or unconditional, largely dispel the counter arguments that these programmes prevent adults from seeking work or create a dependency culture which perpetuates intergenerational poverty" (Bregman, 2016, p221).

Culturally there is a misunderstanding in the public sphere of how welfare spending is spent and who it applies too. In the "financial year ending 2017, the UK government spent £264 billion on welfare, making up 34% of all government spending" (ONS, 2016). Many of us could assume that the vast amount of this money is spent on the unemployed job seekers who are 'too lazy or idle to get a job', however, they only get 1% equivalent of £2bn which is the lowest of the six brackets of the welfare budget (ONS, 2016). The five other categories of spend include:

"1) incapacity, disability, and injury benefits at 16% of the budget costing £44bn, 2) housing benefits at 10% of the budget costing £25bn, 3) personal social services and other benefits at 13% of the budget costing £35bn, 4) family benefits, income support and tax credits at 18% of the budget costing £46bn and finally 5) pensions at 42% of the budget costing £111bn" (ONS, 2016).

One could make the claim that state pensions are a form of basic income but only paid to those above pension age.

Dispelling another falsity is that poor people would spend their basic income on alcohol and tobacco. The World Bank finds instead that in "82% of all researched cases in Africa, Latin America, and Asia, alcohol and tobacco consumption actually declined" (Bregman, 2016, p60). In Liberia, an experiment was conducted to see:

"What would happen if you give \$200 to the shiftiest of the poor. Alcoholics, addicts, and petty criminals were rounded up from the slums. Three years later, what had they spent the money on? Food, clothing, medicine, and small businesses, if these *men didn't throw away free money, one of the researchers wondered who would'* (Bregman, 2016, p60).

The argument that people would just waste their money is perhaps one that comes from those of us with money that are in such a stable financial position that we can afford to waste money, whereas those who need money see it as something more precious that cannot be wasted. In *Just Give Money to the Poor*, Hanlon, Barrientos, and Hulme highlight many examples of cases where cash handouts with few or no strings attached have worked confirming that:

"Rather than international sources giving aid to government bureaucrats and consultants, North and South, it should be given directly to poor people so they can pull themselves out of the poverty trap. Cash transfers are a direct challenge to the traditional belief, explicit or at least subconscious, that impoverished people are at least partly responsible for their plight. The new paradigm dovetails in many ways with contemporary thinking on the politics of development" (Hanlon & Barrientos & Hulme, 2010, p10).

Findings in Namibia showed figures for malnutrition took a nosedive from 42% to 10%, as did those for truancy from 40% to virtually 0% and crime by 42%. In Malawi, school attendance among girls and women surged 40%, regardless of whether the cash came with or without conditions. Time and time again findings show that those who profited the most were children as they suffer less hunger and disease, grow taller, perform better at school, and are less likely to be forced into child labour (Hanlon & Barrientos & Hulme, 2010). The researchers found that these programs' benefits: 1) households put the money to good use, 2) poverty declines, 3) diverse long-term benefits for income, health, and tax revenues, and 4) the programs cost less than the alternatives (Hanlon & Barrientos & Hulme, 2010).

In contrast to British conditionality, a pure UBI invokes no work requirement or sanctions. It is accessible to those that are in work and out of work, voluntarily or not. The context for conditionality applies mostly to those seeking employment and whether they are doing this as well as if someone can prove they are ineligible for work. Obviously doctors and individuals themselves know whether they can work or

not. The conditionality for this should simply be scrapped in the name of logic. Capitalism does not allow for full employment because it needs the reserve labour force to drive wages down through competition and leads profits upwards for capitalists. Releasing those at the bottom to do what they so wish, and they will contribute to society in different ways rather than through the binary means of paid employment. The conditionality of the welfare state in the UK is ingrained culturally. This will be problematic to overcome and as many Britons are conditioned to the idea that those on welfare are the lowest of the low, perhaps not realising that the vast sums of welfare benefits go towards the older generations on state pensions. No citizen should be allowed to fall too low, even if they choose to remain inactive, and especially when there is no attempt for full employment. The pure UBI format underpins the commitment to the unconditional features centred on the notions of freedom, choice, dignity, and equality. This freedom is for Guy Standing an economic and social right that would be unconditional in behavioural terms as a *right* and "you do not have a *right* if you have to do X, Y, and Z to receive an entitlement. That is not a right" (Standing, 2005, p91). The only condition Guy Standing hints at being involved with a UBI is the capacity for those to vote in elections, however this is not stipulated but encouraged.

4.3.5: Universal versus Means-Tested:

Also, controversially, the pure form of UBI is not means tested and it is not targeted at those who are poorest needing it most. In contrast, most schemes of public assistance are aimed at those at the bottom of the income distribution. In the majority of UBI proposals, even the richest and wealthiest in society would receive a cash grant although it must be stated that for some income brackets, all of it or more would be taxed back. The argument made is that wouldn't a more just way be to give the money to those that need it? Jennifer Stuber and Mark Schlesinger have made the case that the universality of basic income benefits the least well off whereas being a recipient of welfare benefits is highly stigmatising (Stuber & Schlesinger, 2006). This explains why the take-up rates of benefits tend to be low and many eligible individuals do not apply for existing cash payments because they would rather be poor than demonised as benefit scroungers or welfare queens

according to Robert Moffitt (Moffitt, 1983). A pure UBI would destigmatise public assistance as everyone would be a recipient? UBI radically solves the take up problem by making benefits or receipt a universal default for every person to automatically receive.

Ironically, it is our current means-tested benefit system that acts as a systematic disincentive to take low-wage jobs because of the poverty trap. Government(s) insists on making citizens look for work, when often there is no work to found. There is the notion that if you were to find work you may be no better off in work than on welfare. This is illogical because you lessen your overall income at the expense of working in that scenario? The common-sense approach is to remain with the highest form of income which in many cases is welfare rather than work. Obviously, the problem lies with such low-paying work. A UBI with a floor allows without sanction the option to work if you chose to do so, or choose to contribute in another way such as volunteering or caring etc. Finland's basic income experiment found that removing the condition that the unemployed had to search for jobs made no difference to short-term employment effects (Hiilamo, 2020). Not only did it make no difference to employment but "those in the test group were more confident of their employment prospects than the control group" and according to the analysis:

"the wellbeing of the basic income recipients was clearly better than that of the control group. Those in the test group experienced significantly fewer problems related to health, stress, and ability to concentrate than those in the control group. According to the results, those in the test group were also considerably more confident in their own future and their ability to influence societal issues than the control group" (Kangas, et al, 2019, p30).

The removal of conditions can liberate those anxious and stressed about searching for work altogether. What would be the benefits of setting conditions in the form of searching for work in the context of automation in workplaces? If there were to be any conditions surely it would be on the levelling up of citizens in the form of training, lifelong education, and learning. In the context of the UK's welfare state, the setting of conditions is either the government's way of feeding the fallacy around the wasteful and undeserving poor or the lack of incentives to change the way the

welfare state conducts distribution of benefits. I believe it is a combination of both, and the fact is that there is not enough political will on behalf of citizens to ensure proper economic safety for their neighbours, families, or themselves. Instead, they too feed into the dogma perpetuated by the media, government, and hearsay about welfare within the culture of capitalism.

A 2017 report by MIT and Harvard researchers showed that, after aggregating evidence from randomised evaluations of seven government cash transfer programs, there was no systematic evidence of an impact on work behaviour (Banerjee et al, 2017). They found that as transfer programs have increased, so has the debate about whether they simply discourage work, enabling a 'lazy poor' finding no systematic evidence of an impact of transfers on work behaviour, either for men or women. A 2014 review of transfer programs worldwide by Evans and Popova also showed no evidence despite claims in the policy debate that the transfers induce increases in spending on temptation goods, such as alcohol and tobacco (Evans & Popova, 2014). The available evidence implies:

"That cash transfer programs do not induce the 'bad' behaviours that are often attributed to them in the policy space. Combined with the positive effects of transfer programs documented in the literature, this suggests that transfers can be an effective policy lever to help combat poverty and inequality" (Banerjee et al, 2017, p178).

What we can take from many of the schemes is that much of the social rhetoric around reasons not to implement a UBI are empirically false. The ongoing policy debates on universal versus means-tested transfers (Marx et al, 2016) and on the behavioural requirements to access transfers from Cantillon and Van Lancker who touch closely on the features of UBI while its universal extension of a generous transfer without any prescriptions can "steer human behaviour and its outcomes" (Cantillon & Van Lancker, 2013, p555). UBI also faces the same restrictions of support and institutional capacity as do other policies, universal or not. A UBI or BI/CI would have to be implemented by government or legislature and would require political support to be maintained at a sufficiently intended level (De Wispelaere and Morales, 2016). Therefore, the political will is necessary to the implementation of a

basic income format in the UK. If citizens called on their political representatives to implement a basic income the next question would be how regularly would they receive their payments?

4.3.6: Regular payments versus One-Off payment:

The UBI is a recurrent cash payment and under most proposals is distributed monthly, while under other proposals is a weekly, or annual grant, or even proposed as a one-off lump sum. Bruce Ackerman and Anne Alstott have argued for a stakeholder grant whereby:

"At age 21, as each liberal citizen steps forward to begin their adult life, they should receive a stake of \$80,000 from the government...The money is hers to spend or invest. She may go to college, or not. She may save for a house or a rainy day – or blow her money in Las Vegas" (Ackerman & Alstott, 2006, p45).

Most UBI proponents favour periodic payments because they perceive the fact that benefits must prevent recipients from falling too low at any point in their life. Ackerman & Alstott's stakeholder grant or referred to by UBI proponents like Van Parijs's universal basic endowment, provide the main argument for the one-off payment through free and equal citizenship. Ackerman and Alstott believe that a 'stake' would produce many desirable effects (Ackerman & Alstott, 2006). The stake would give young adults more freedom and produce a degree of equality among them. By delivering a large grant with conditions attached, the program would also give young people strong incentives to finish high school and to avoid crime. Ackerman and Alstott recognise that one-off payments up front would be expensive and the total cost in 1997 would have been about \$255 billion (Ackerman & Alstott, 2006). Initially, the necessary funds would come from an annual wealth tax of 2%, a tax from which 59% of households are exempted by virtue of a proposed \$80,000 exemption for every American. The result would be that more than 90% of the funding would come from the wealth tax on the top 20%. In the long run, however, stakeholders would be asked, before death, to pay back the \$80,000, with interest, into the stakeholder fund. The enforcement mechanism would be the estate tax: subject to a \$50,000 exemption, people would not be permitted to give money to

their children or other heirs unless and until they have paid back their stake. In an interesting variation on the Social Security program, this is an idea of 'liberal trusteeship', in which each person acts, in his individual capacity, as a trustee for the future. The idea of a trustee for the future is one in which you could benefit from a strong state that invested in you early on with a large lump sum, that you inevitably work to pay back in full before your life ends (Ackerman & Alstott, 2006).

This trusteeship is one I believe a dutiful citizen could support, however there still lies the problem whether this will provide basic security long-term as yes there is pure freedom and trust that the individual knows how best to spend the money provided to them. However, I do not believe it can account fairly in terms of the realms of modern capitalism or in a world of rising automation, where economic protection from the harsh realities of capitalism is needed on a regular basis. Were economic downturns to take place which are forever possible under a capitalist system, this wipes much of the value off the lump sum originally provided. Whilst this is still true of regular UBI payments the monthly sum provided to accommodate basic financial security would have to take this into account raising the sums provided to meet the basic needs of recipients. Regular payments of this kind are more insurable for citizens' protection than the one-off payment that can run dry after one night, one month or 20 years of a citizen's life and does not guarantee protection long-term.

The idea of one-off payments or universal endowments are not new as Thomas Paine's *Agrarian Justice* called for a lump sum given at the age of 21 and another for those who reached the age of 50 (Paine, 1797). The Royal Society of the Arts has proposed a 'universal basic opportunity fund' (UBOF) financed from long-term bonds that could pay out an 'opportunity dividend' in a lump-sum payment. This has the drawback of offering a capital grant rather than a basic income but is seen by the authors as a step towards a basic income (Painter et al, 2018, p3). The same concern arises from the interesting proposal from the Institute of Public Policy Research for a citizen's wealth fund like a type of sovereign wealth fund owned by and run in the interests of citizens which would "provide every 25-year-old with a capital dividend of \pounds 10,000 from the year 2030" (Roberts & Lawrence, 2018, p2).

The idea of a basic income and a stakeholder grant are not separate in their idea but the approach as noted by Erik Olin Wright in *Redesigning Redistribution* highlighting the arguments made by Van Parijs, Ackerman and Asltott stating that:

"Basic income and stakeholder grants are not completely different kinds of proposals. After all, if one invests a stakeholder grant in a relatively low-risk investment and waits a number of years, then it will eventually generate a permanent stream of income equivalent to an above-poverty basic income. Similarly, if one continues to work for earnings in the labour market while receiving a basic income and one saves the basic income, after a number of years it will become the equivalent of a stakeholder grant. Nevertheless, the two proposals reflect quite distinct visions of what kind of system of redistribution would be morally and pragmatically optimal in developed market economies. Stakeholder grants emphasize individual responsibility and what is sometimes called "starting gate equality of opportunity". Individuals get a stake, and if they blow it on conspicuous consumption rather than long-term plans, then this is their responsibility. Basic income envisions a system of redistribution that permanently guarantees everyone freedom from poverty and a certain kind of lifetime equality of minimal opportunity: the opportunity to withdraw from the labour force to engage in non-remunerated *activity*"(Wright, 2006, p3).

Any format of basic income should be a safety net that ensures economic security throughout one's life in terms of freedom and equality (Birnbaum, 2012; Bidadanure, 2014). Ackerman and Alstott cannot be criticised for arguing the freedom case in the context of the stakeholder grant, however I would make the point that an ethically responsible state would make a preference towards regular payments to ensure sustainable economic safety for citizens and invariably the state long-term.

4.4: Variable Features of UBI

There are variable features of UBI proposals that do not fall within the five features stated above. These include the source of funding, the level of payment, and the policy package that comes with it. The majority of UBI proposals can be funded through a variety of taxes such as income tax, wealth tax, a consumption tax like

VAT, financial transactions tax, carbon taxes, or a combination of taxes. Guy Standing has called for a sovereign wealth fund (SWF) epitomised in practice by the Alaskan Dividend Fund (Standing, 2017). Under a SWF every citizen becomes a stakeholder receiving a yearly grant in cash. It would give every citizen a stake in the economy and ensuring all can benefit from rising capital income. A citizen's wealth fund could equalise wealth between generations by storing and investing present windfalls for the benefit of future generations who may not have the same revenue streams. The Institute for Public Policy Research (IPPR) highlighted that had a "fund been created from the North Sea Oil revenues in the 1980s, it would be worth over £500 billion today" (Roberts & Lawrence, 2018, p2). There is a strong case that the revenue from future potential windfalls and asset sales should be shared with future generations rather than facilitating lower taxes for current generations. Over 70 different governments around the world have SWFs such as Australia, France, Ireland, Norway, Singapore, and nine US states. These differ in how they are capitalised, governed, and invested, as well as how returns are distributed. The aim of a citizens' wealth fund is to transform national private and corporate wealth, against the backdrop of modern capitalism that is unevenly distributed, into public wealth instead so everyone has a stake in the economy rather than some. Like UBI, the dividend is individual, unconditional, universal, and regular. However, it differs from most common proposals in that it is funded through a non-redistributive mechanism. The level of payment also varies from one nation or scheme to another.

Another point of contention in the argument around UBI is what if anything, it would replace? Obviously, this is contextualised with the welfare state or from governments that provide provisions of cash or in-kind goods from one country to another. In theory, UBI replaces programs that would become redundant under it. For arguments sake, a citizen who has \$500 dollars of food stamps and cash benefits could instead receive a \$1500 unconditional monthly payment; or in the case of a UK British recipient who receives £500 a month, they would receive £1000 a month or if recipients received £1000 a month because of working tax credit, they should have theirs topped up by the UBI so as not to be financially worse off. A true UBI would

have to be a further expansion and enhancement of the safety net to complement the necessary provision of goods by a developed welfare state. Clearly in the context of the UK this would be the most accessible transition as an enhancement to the current welfare state. However, the issue arises wherein studies have distinguished the implementation of UBI and its maintenance to a sufficient level in the face of political adversity as seen in De Wispelaere and Morales in their 2016 work The Stability of Basic Income: A Constitutional Solution for a Political Problem. In addition, the form of UBI being discussed varies significantly. While most commonly taking the form of a regular tax transfer to all citizens without additional requirements, the transfers may still vary in amounts given, regularity and who counts as a citizen and ergo eligible to receive it (De Wispelaere and Stirton, 2004). The eligibility argument as to who receives a UBI and who does not is one that is of crucial importance to the state and would be a point of contention around the debate of UBI. The citizenship argument can be confirmed through an expressed social contract and those who do not sign a contract but tacitly remain within the territory of the state ought to receive basic income. The principle of freedom and equality can be met as basic rights for citizens, even those who only tacitly remain and refuse to sign a social contract.

4.5: True Freedom or True Equality

The argument of pure freedom in the context of UBI has been embraced as a true instrument for freedom. However, Brishen Rogers fears UBI is suspiciously libertarian stating:

"Unlike many libertarians, basic income proponents accept the necessity and fairness of income and wealth taxation. But a basic income is still no cure for the moral ills of liberal markets. Since labour cannot be separated from workers, it will never be a classic commodity, and labour markets will never be stock exchanges for faceless buyers and sellers" (Rogers, 2017).

If we were to think of a policy to give true freedom which is unattainable because we are all rightly curtailed by laws to deter us from acting freely, then we should instead think of UBI as giving the right kinds of freedom such as economic freedom. However, the problem with a pure UBI given to all at the same figure cannot be seen as reducing inequalities in a capitalist society because it would do very little to equalise society financially or lower economic inequality.

Phillippe Van Parijs's 1991 *Why Surfers Should Be Fed* and his 1995 book *Real Freedom for All* have shaped the normative debate on UBI. Against the libertarian claims that taxation infringes on self-ownership, Van Parijs responds that "one cannot truly own oneself without access to the resources needed to survive" (Van Parijs, 1995). The argument Van Parijs makes here is typical of a response to a libertarian who in the name of freedom opposes redistribution as forced labour wherein you cannot be said to own yourself, if you do not own the product of your labour. Van Parijs's main argument is that if you truly care about freedom, not simply for a few but for all, then we should seek to "maximin" (which is his explanation of the Rawlsian Difference Principle) real freedom and should design societies that maximise freedom for those worse off when compared to any alternative societal arrangement (Van Parijs, 1992, pp228-229). Real freedom is then defined as "the freedom to do what one might want to do" and it is not only a formal right to do as one wants but also the actual capacity to do so (Van Parijs, 2000). Van Pairjs argues that:

"What matters to a real libertarian...is not only the protection of individual rights, but assurances of the real value of those rights: we need to be concerned not only with liberty, but, in John Rawls's phrase, with the 'worth of liberty'. At first approximation, the worth or real value of a person's liberty depends on the resources the person has at her command to make use of her liberty. So it is therefore necessary that the distribution of opportunity—understood as access to the means that people need for doing what they might want to do—be designed to offer the greatest possible real opportunity to those with least opportunities, subject to everyone's formal freedom being respected" (Van Parijs, 2000).

With an income independent of labour, citizens cannot be forced into positions that do not reflect their own conception of the good life and that most vulnerable end up disproportionately forced to take up roles that most would never want to occupy. If we were to truly value freedom for all, we should according to Van Parijs oppose conditions that force individuals to choose between survival and a life they do not want for themselves. One should instead have a strong presumption in favour of "a cash grant to all, no questions asked, no strings attached, at the highest sustainable level, can hardly fail to advance that ideal" (Van Parijs, 2000). The strength of this argument is its bold appeal to both the left and right of the political spectrum. The argument for freedom is strong but a UBI would not allow for all to be free because of the inequality of wealth, assets, and opportunities. The argument for UBI cannot be won based on the case of freedom alone. I believe Guy Standing makes the clearest case in the form of basic security. Like Van Parijs, Standing uses the Rawlsian argument and theory of distributive justice to make his claims. Standing confirms that "what should be equalized in the good of society of the 21st century is basic security, which encompasses basic income security [and] this should be a right" (Standing, 2005, p91).

The concept of basic security as a right is what leads Standing to consider the claims for equal security stating that "everybody needs a sense of basic security in order to function rationally, in order to be responsible, and in order to develop competencies and capabilities" (Standing, 2005, p91). Without this basic security I agree with Standing that it is unfair to expect too much from anybody. It is for this reason and based on this premise that Standing argues that basic security is "the essence of real freedom" as well as an "economic and social right" (Standing, 2005, p91). Standing argues the real freedom case highlighting Isaiah Berlin's negative and positive liberty (Berlin, 1958). The positive liberty is used by Standing because positive liberty is "a form of security that gives us self-control, a sense of autonomy that allows us to develop ourselves as human beings within a community" (Standing, 2005, p91). This autonomy is necessary with any format of basic income. The individual citizen ought to understand that when they may choose not to work, they are not becoming burdensome, but they can contribute to society in many other ways to achieve the good life. Instead of supporting freedoms known to be central to a good life, another way to think about it is we should not promote general freedoms at the expense of the particular freedoms assumed to be central to human flourishing. Elizabeth

Anderson highlights the optional freedoms that fall short for a maximised UBI arguing:

"We owe each other the rights, institutions, social norms, public goods, and private resources that people need to avoid oppression (social exclusion, violence, exploitation, and so forth) and to exercise the capabilities necessary for functioning as equal citizens in a democratic state" (Anderson, 2000).

Anderson notes that a UBI does not adjust for the fact that, due to variations in "internal traits, social roles, and other circumstances, some people are better able to convert income to freedoms than others" (Anderson, 2000). Anderson believes it is problematic for a pure UBI that is "not conditioned on the willingness of the able to work, the UBI promotes freedom without responsibility, and thereby both offends and undermines the ideal of social obligation that undergirds the welfare state" (Anderson, 2000). Anderson makes crucial criticisms of a pure UBI and points out how there is a need for citizens to have responsibility. This is important as the role of citizenship is crucially connected to any basic income format. I seek to answer this point below in more detail linking the financing of UBI through citizen duty as stated in the above chapter, participation and contribution explained further below.

A separate critique of the pure form of UBI is that it would not properly benefit those in receipt because were everyone to receive an equal sum of money (yes people would in theory be better off), but in practice, they would be in the same position prior to receiving money if inflation rose. For example, instead of paying £1 for a pint of milk before receipt of a basic income, you now pay £1.50 because the market is aware that consumers have more money, and this would apply to most aspects of the economy. The economic case for a pure UBI is why it fails the equality principle, however it can be attainable in the long-term but through the nudging of contextual basic income within the setting of a civilised welfare state, though this requires other policy amendments and changes to taxes and assets to fully integrate effectively to meet the egalitarian case.

The pure UBI, not only from the economic case but contextually within advanced capitalism is inadequate for egalitarian purposes. UBI can be according to John

Baker an "instrument for equality insofar as freedom and equality are conceptually connected" (Baker, 1992). Van Parijs's *Real Freedom for All* is essentially egalitarian at its core and the egalitarian justice that must be maximised is real freedom rather than welfare, resources, or opportunities (Van Parijs, 1995). Van Parijs has demonstrated that even liberal egalitarian theories of justice from Rawls and Dworkin are compatible with an endorsement of unconditional benefits. This is not, however what most have in mind when they think of an egalitarian proposal. The republican conception of justice is more relational here than the libertarian as it focuses on the presence or absence of dominating control by some over others, or by the state. Jean-Jacques Rousseau wanted to build a society where "no one is too poor to be bought and no one is rich enough to enslave others" (Rousseau, 1762, p52). A UBI could realistically protect citizens from dominating control of others by ensuring an income floor. The freedom to say no to abuses and domination by spouses or bosses are not only good accounts for freedom but are egalitarian too.

Social egalitarianism can be viewed as a conception of justice because it seeks to free people from domination and oppression. What is central to this concept of equality are the notions of equal social standing, equal status, equal respect, and equal political power. A social egalitarian is unwilling to let anyone fall below a critical threshold because of the choices they make. The basic citizens income proposed here would reduce the risks of citizens falling into economic insecurity. The argument for the establishment of an unconditional income floor is well connected to the social egalitarian ideal.

I want to briefly sum up my interpretation of the argument of freedom versus equality and when I prescribe my format of basic income, I have fallen on the side of equality over freedom. Not to lose all the benefits around the arguments for freedom, but simply because we must understand the capitalist world we live in and in my opinion must change to benefit wider society and humanity. A basic income must guarantee basic protection for all citizens and whilst a UBI proposes to do so, I cannot see how a national format of a pure UBI provides the necessary fair and adequate amount sustainably. Nor is a pure UBI fair in that it meets the requirements of egalitarian justice, as it enables the scourge of inequality among

citizens to remain. The idea of freedom in this sense is a freedom of consumers to choose more than they originally had, however in many cases there are conglomerates and monopolies in capitalism. The freedom of choice for those who have a little more cash to spend is not sufficient for me to call for a UBI under our current advanced capitalist model. The freedom that is beneficial and most important element of the argument for a pure UBI to promote freedom, is the free choice to not work. This is essential for any cultural advancement in the development of a post-capitalist utopia.

4.6: Basic Income and Work

Work and the work week have changed over the last two centuries from child labour and working hours to the implementation of paid holidays, sickness, maternity, and paternity leave. John Maynard Keynes anticipated in the 20th century that the greatest challenge for the 21st century would be dealing with leisure time. By the year 2030, Keynes anticipated unless politicians made disastrous choices, that within a century the Western standard of living would have multiplied to at least four times that of 1930. His conclusion was that in 2030, we will be working just 15 hours a week as "three hours a day is quite enough to satisfy the old Adam in all of us" (Keynes, p5 1930). Robert Chernomas highlights that what "Keynes envisaged [was] a very different kind of 1984, one in which the need for accumulation had withered away" (Chernomas, 1984, p1007). Keynes was neither the first nor the last to imagine a future primarily of leisure. Benjamin Franklin "predicted that four hours of work a day would eventually suffice. Beyond that, life would be all leisure and pleasure" (Bregman, 2016, p34). John Stuart Mill believed technology should be used to curb the workweek as far as possible stating:

"There would be as much scope as ever for all kinds of mental culture, and moral and social progress" and "as much room for improving the art of living and much more likelihood of its being improved, when minds ceased to be engrossed by the art of getting on" (Mill, 1848, p752).

The reality of full-time employment or a shorter work week rarely features in economics and has been almost non-existent in public discourse. Prior to the most

recent crises (pandemic and financial) there was little discussion from politicians in the UK about UBI, let alone politicians endorsing the shortening of the working week. Was Keynes wrong to forecast this? No, Keynes simply extrapolated the trend that had begun around 1850 into the future stating "of course, it will all happen gradually [and] not as a catastrophe" (Keynes, 1930, p7). The leisure question will become a fundamental issue this century. Even within capitalist conditions of slow economic growth, we could work 20 hours a week today and fewer than 15 hours a week by 2050 and more can be contributed by those seeking to do so. The 20thcentury concept of a five-day working week is no longer the best fit for 21st-century businesses or citizens. A pilot of 70 different UK companies started trialling a fourday work week but paid for five and "is based on the 100:80:100 model – 100% of pay for 80% of the time, in exchange for a commitment to maintain 100% productivity" (Kollowe, 2022). Juliet Schor, the lead researcher on the pilot, described it as a "historic trial" as they analysed how "employees respond to having an extra day off, in terms of stress and burnout, job and life satisfaction, health, sleep, energy use, travel and many other aspects of life" (Gross, 2022). The fourday week is generally considered a triple-dividend policy by helping employees, companies, and the climate. The findings showed that "most of the companies participating in a four-day workweek pilot program in Britain...had seen no loss of productivity during the experiment, and in some cases had seen a significant improvement" (Gross, 2022). Nick Bloom states that science shows "working from home makes staff more productive – and happier" (Neate, 2022).

What capitalists and government(s) must understand is work and leisure are already becoming difficult to untangle as the more constantly entangled we are with work; the more is expected of us in a work capacity. Work addiction or the inability to switch off and leave work at the office is caused by increased job insecurity, being overworked leading to burnout, and enabled by easy access to work apps by technologies such as mobile internet access on phones and laptops. Work is a constant drive for those that have it, and we work harder and harder to retain it so we do not fall into poverty. However, there are enough of us for the work to be

shared much more equally, for those that want it and those that just want the benefits of it.

It is touted that work is the best route out of poverty, however this is not a guarantee in modern advanced capitalism and many who do work still fall below the poverty line (in-work poverty). We value jobs because it is better for workers themselves to be employed as jobs offer the opportunity to access other things. Anca Gheaus and Lisa Herzog argue in The Goods of Work (Other Than Money!) that the in addition to wages, work brings a multitude of things such as "attaining various" types of excellence, making a social contribution, experiencing community, and gaining social recognition" (Gheaus & Herzog, 2016, p71). Apart from simply receiving a salary, employment enables workers to contribute to communities and gain recognition from others, contributing to self-esteem, by attaining a specific kind of excellence associated with a trade, and developing relationships with others. Unemployment and the idea of unemployment is often damaging to individuals because jobs remain privileged positions to access these goods. Simon McCabe and Michael Daly discovered in their 2018 research Work, Love, and Death-Thought Accessibility: A Terror Management Investigation how the threat of unemployment can activate thoughts of death for those not in a relationship which gives weight to Sigmund Freud's claim that love, and work are important for our well-being. By highlighting the theoretical framework of terror management theory, three studies informed the existential function of employment and close relationships. This study highlights a previously overlooked consequence of the threat of unemployment that:

"Heightened mortality concerns, and the factors of job market health and relationships status that may aid in thwarting the elicitation of such cognition, keeping death thoughts at bay. Indeed, there may be some weight to Freud's ostensible claim that 'to love and to work' are two factors that can protect psychological equanimity, even in the face of mortality concerns" (McCabe & Daly, 2018, pp769-770).

State paternalism is and has been a widespread explanation of poverty alleviation programmes and their emphasis on work for their populations. Richard Layard believes that work is good for people and that, to promote happiness, "any job is

better than no job" and if Europe's greatest problem is unemployment, then anyone seeking work should be guaranteed a job within the first year of searching (Layard, 2004, p1). This thinking still gives credence to justify policies of paid employment to deter those who are tempted by idleness. If working is so central to wellbeing and a life well lived, then perhaps we ought to nudge and invest citizens into some form of contribution.

A competitor to a UBI in relation to jobs has been proposed by Pavlina Tcherneva (Tcherneva, 2012) and Phillip Harvey (Harvey, 2012) who have advocated separately for jobs guarantee proposals which contrary to conditioned benefits on the willingness to work, a job guarantee program puts the burden on the state, rather than the citizen to help the unemployed into work. What matters is that people be given the opportunity to do what they most want, not that they be free to do what others think best for their development or flourishing. Apart from the conflict with the potential values of freedom, choice, and autonomy, the problem with a paternalistic pro-work position is that it is dubious that employment is always preferable. If we consider now what existing job opportunities are truly like, we may not want to promote or fetishise work too much because many jobs, especially those available to benefit recipients, cannot deliver the goods of work mentioned above. Such jobs instead can be demeaning, degrading, hazardous to one's physical and mental health, disempowering, oppressive, isolating, or what David Graeber calls "bullshit jobs" (Graber, 2018). An example of a 'bullshit job' is one that requires the employee (a subcontractor) to rent a car and drive up to and above a hundred miles to oversee a person's computer being moved five metres from one room to another. Predominantly according to Graeber 'bullshit jobs' are in the administrative, information, and financial sectors and while he sees them as pointless, he differentiates them from 'shit jobs' because 'bullshit jobs' often pay well, 'shit jobs' on the other hand "typically involve work that needs to be done and is clearly of benefit to society; it's just that the workers who do them are paid and treated badly" (Graeber, 2018, p14). 'Shit jobs' often "tend to be blue collar and pay by the hour", whereas bullshit jobs "tend to be white collar and salaried" (Graeber, 2018, p15). The labour market increasingly offers precarious opportunities without job or income

security. Graeber confirms this arguing that the psychological aspects of 'bullshit jobs' can be devastating including "feelings of hopelessness, depression, and selfloathing" (Graeber, 2018, p134). If the goal is to promote flourishing lives, it is important to understand whether UBI could improve work opportunities inside and outside the labour market?

Van Parijs and Vanderborght have argued that UBI could provide flexible protection against poverty and destitution within the context of an increasingly fragmented labour market threatened further by automation. Similarly, André Gorz viewed a guaranteed basic income as a necessary adaptation to the increasing automation of work, believing this would also enable workers to overcome alienation in work and life, as well as increasing the amount of leisure time (Gorz, 1989). Gorz advocated for a guaranteed basic income independent from work arguing in *Critique of Economic Reason* that:

"From the point where it takes only 1,000 hours per year or 20,000 to 30,000 hours per lifetime to create an amount of wealth equal to or greater than the amount we create at the present time in 1,600 hours per year or 40,000 to 50,000 hours in a working life, we must all be able to obtain a real income equal to or higher than our current salaries in exchange for a greatly reduced quantity of work. In practice, this means that in the future we must receive our full monthly income every month even if we work full-time only one month in every two or six months in a year or even two years out of four, so as to complete a personal, family or community project, or experiment with different lifestyles, just as we now receive our full salaries during paid holidays, training courses, possibly during periods of sabbatical leave, and so forth" (Gorz, 1989, p240).

Gorz highlights that:

"In contrast to the guaranteed social minimum granted by the state to those unable to find regular paid work, our regular monthly income will be the normal remuneration we have earned by performing the normal amount of labour the economy requires each individual to supply. The fact that the amount of labour required is so low that work can become intermittent and constitute an activity

amongst a number of others, should not be an obstacle to its being remunerated by a full monthly income throughout one's life. This income corresponds to the portion of socially produced wealth to which each individual is entitled by virtue to their participation in the social process of production. It is, however, no longer a true salary, since it is not dependent on the amount of labour supplied (in the month or year) and is not intended to remunerate individuals as workers" (Gorz, 1989, p241).

Objections to a UBI high enough to emancipate people would incur a prohibitive economic cost and concerns over disincentives to work resulting in a reduction of the labour force and, as a result, the tax base that is necessary to help finance UBI. If political societies tend to avoid delivering benefits without conditioning them to work, it is not only for paternalistic and perfectionist reasons but also because they believe that working is the recipients' responsibility. Allowing the idle to benefit from the hard working could be exploitative, and a system encouraging or enabling such free riding would be unfair. Rawls claimed that we "should not design institutions to subsidise those who decide to surf all day; if surfers want an income, they will have to use their productive capacity" (Rawls, 2001, p179). Similarly, Ronald Dworkin rejected the idea of a right to an income for "scroungers" and those who participate in unproductive activities such as beach combing (Dworkin, 2000, p336 & 2006, p104). Those who genuinely choose idleness or unproductive activities cannot expect those who have committed to doing productive work to subsidise their livelihood. Responsibility is central to fairness, and it conflicts with the idea of UBI as a policy. This concern has been raised by Stuart White as the exploitation objection to unconditional basic income is that it is unfair because it allows people to live off the labour of their fellow citizens without making a reciprocal productive contribution to society (White, 2006).

Alternatively, Erik Olin Wright argues basic income empowers labour by giving workers greater bargaining power (Wright, 2005). Karl Widerquist has proposed a theory of freedom in which basic income is needed to protect the power of workers to refuse work altogether (Widerquist, 2018). Frances Fox Piven argues that an income guarantee would benefit all workers by liberating them from the anxiety that results from the "tyranny of wage slavery" and provide opportunities for people to

pursue different occupations or develop untapped potentials for creativity (Piven, 2014, p132). A UBI enables forms of work outside the labour market that can be both beneficial to individuals and their communities and more virtuous than many formal job opportunities for example volunteering, activism, and caring for others. In a sense UBI can be viewed as a form of compensation, and perhaps encouragement for all of those who work without an income. As Brian Barry argues:

"There is surely something crazy about the stipulation that those drawing unemployment benefit must be 'available for work' at any moment, which rules out their using the time to improve their qualifications, engage in community work, or help their neighbour while earning a bit extra" (Barry, 2000).

UBI should not be seen as anti-work, but helps workers secure more fulfilling and productive occupations, demand better working conditions, or enable them to freely contribute wherever they feel they can best offer their contribution.

For Van Parijs, there are no good reasons to favour "crazies" (who want to work hard) over the "lazies" (who would rather work for less) (Van Parijs, 1995). Under UBI, the crazies will anyway likely be better off since they will be able to accumulate income from work and their guaranteed income. They further benefit from not having the lazies competing for the same jobs in the labour market (assuming the crazies and lazies have the same productive potential). Even if one remains unconvinced that UBI is compatible with fairness under ideal conditions, there are pragmatic reasons to support UBI in an unjust society. As mentioned above, the actual conditions of employment are precarious and exploitative within the context of capitalism. Tommie Shelby has argued that the civic duty to work is not as strong as many believe and that there are reasonable responses to joblessness that do not involve instituting a work regime. Shelby maintains that "the ghetto poor would not be wronging their fellow citizens were they to choose not to work and rely on public funds for material support" (Shelby, 2012, p71). It would be difficult to claim that any formal job is a more adequate form of reciprocation than activities outside the labour market that are sometimes more useful or productive. One of the background conditions that needs to be in place for the value of reciprocity to apply is, therefore, that different forms of participation must be recognised, including that of volunteering, care work, and other forms of non-recognised forms of wage labour.

The argument is about whether reciprocity matters to the point that it can be the deciding factor in the design of welfare state safety nets? There ought to be scepticism around reciprocity ranking highly to the point it trumps choice, sufficiency, equality, justice, fairness, opportunity, and freedom in the context of rising automation in RAS, dwindling economic growth, climate change, and the guarantee of future crises of capitalism, pandemics, warfare, or other issues not yet on our radar. Reciprocity will be relevant to the state, citizenship, and duties of recipients, as well as government(s). It is important therefore to acknowledge the argument of Anthony 'Tony' Atkinson's participation income and what role citizenship will have in relation not only to UBI but automation in the forms of robotics and autonomous systems (RAS).

4.6.1: Participation Income, Contribution, and Egalitarianism

Anthony 'Tony' Atkinson argued that any basic income proposal is "the re-affirmation of the principle that societies have a duty to provide social protection. A civilised society should ensure a decent minimum income" (Atkinson, 2011, p1). For Atkinson, everyone should have a right to resources, over which they control, and it is important that the minimum be defined in "terms of income, not consumption" (Atkinson, 2011, p1). Atkinson makes his argument in favour of a basic income that would be conditional, not on citizenship or residence, but rather on participation in society. Participation for Atkinson is defined broadly to include "all forms of paid employment, full-time education, active engagement in seeking employment, caring for children, the disabled, or elderly, and those below a certain age (say 18) or above (say 70)" (Atkinson, 2011, p2). Atkinson has an inclusive model that would mean this participation income (PI) would exclude very few people and the perceived vast majority would have the opportunity to participate. For Atkinson there is the ethical case as his basic income is not just a form of redistribution, but it is a moral statement. A moral statement not only for government(s) as I have stated but responsibility for citizens to participate within an evolving state. Atkinson's

participation income departs from James Meade's citizen income in two ways; firstly, it complements rather than substitutes existing social programs and minimum wage. Secondly it is conditioned on a form of social participation to secure political support (Atkinson, 2011). My issue lies with the semantics as I believe 'contribution' rather than 'participation' is not only more inclusive, but it projects direct action. One can participate in a meeting, or one could contribute to a meeting. The contribution does not outweigh the participation, but I would argue the subject of a nation, community or region would rather contribute to their society rather than participate in society. I am in no doubt that unemployed and misemployed can contribute in a post-capitalist society, whereas they remain underutilised in the capitalist economy, except to keep wages low as the reserve labour force. This is neither productive in our current system or beneficial to achieving a good, desired life.

The modern progressive state must accept the realities that full employment is unachievable under capitalist economic modelling. Therefore, we should accept this and end the conditionality of seeking employment and instead accept a culture of contribution instead. Those of us seeking paid employment can continue to do so because we would wish to do so for ourselves and contribute to wider society. In every society, able-bodied men and women work to support themselves and their families and pay taxes for the common good. This is arguably the most important way in which we can engage with the social contract and the basic income that comes with it by contributing to our communities and society. Contribution is an important part of self-determination, giving people a sense of purpose and of selfworth. By contributing to society in our working years, we ensure that the next generation can benefit from social spending just as we did, and that we will be able to benefit from it again when we are old.

Contribution for my argument here in reference to a basic income is one in which I propose a cultural shift from paid work to simply the ideal of contribution. Contribution in a just and civilised society incorporates both paid and unpaid work as both are contributions to society. I make this claim in reference to the working age housewife analogy, who is productive all day working to keep and uphold her house for their partner and/or family. Were they to do this in their neighbour's house for a

fee, she would be a contributor to the tax system and not viewed as a scrounger or someone demonised for not having a paid job? The housewife is contributing to her family upkeep, yet this does not count to the overall adage of GDP, yet it may be what makes them happy and proud. Schwab & Vanham highlight in *Stakeholder Capitalism* this flaw when government(s) rely on GDP metrics:

"GDP goes up when oil or coal is produced and consumed, but it goes down when people switch from using a car to a bicycle or public transportation (assuming a car is more expensive). GDP also goes up when banks post financial profits, but it remains stagnant when digital innovations get introduced that make our lives easier" (Schwab, 2021, p234)

The idea of work consisting of strictly paid work and relying on GDP metrics does little in reference to the care of others which the previous housewife could do for their elderly relatives. Is she a better daughter for paying someone a decent wage to care for her mother, or is her mother better off by receiving care from her daughter? Obviously, this depends on the relationship and severity of care needed that an unqualified relative may not be able to supply. Yet the role of contribution would still apply to the relative's overall wellbeing even in a small way. The contribution of seeing your elderly relative is outweighed by the fact that you could be financially better off by doing another hour in work. In a capitalist society we often weigh up importance by the price behind our decisions. Whilst this does not always apply, we must accept that it does to some degree. The cultural shift that a basic income could allow for from an ethically responsible state and government could equalise that we appreciate all work including non-paying work. Volunteering is a significant contribution to society and immediate community, yet under the capitalist model, volunteering is not rewarded financially. Were the burdens of paid employment (or at least seeking paid employment) unshackled from the potential to contribute in other ways than from paid work, I believe our priorities change in relation to the way we view work. Paid work is extremely important and often enjoyable for those who do it. However, within the context of future full automation I believe to properly administer a basic income or pure UBI, there must be a cultural shift in the way we view paid and unpaid employment. Those who receive paid employment should

consider themselves contributors to the tax intake which ensures children are financed through schools, hospitals are sufficiently funded to provide medical attention and care, as well as policing for community protection, and so many more things. Although as already stated paid employment is not the only form of positive contribution.

Contribution can take a life form in many ways that we often take for granted. We often give away our data on our smartphones, computers, and other devices providing profits for somebody else somewhere. However, were this used to contribute to a nationalised state industry then it would benefit citizens who contributed at the outset. Contribution from dutiful citizens can be having a vaccine to protect themselves and others from diseases. The Covid-19 uptake of vaccines should highlight the fact that citizens are contributing to the greater good of society but are not paid to do so. We must understand that there are benefits in doing things that we are not paid to do. I have developed this political theory in relation to the potential of technological unemployment and the Covid-19 pandemic has sped up the streamlining of many businesses which is fancy talk for less people working in the company than before. The pandemic has also shown the vulnerability of capitalism that supposedly benefits the masses. Instead, billionaires have doubled or tripled their wealth whilst many have lost businesses, livelihoods, education and many other opportunities. We ought to start envisaging a society that applauds contribution in all manners of speaking, however small, or irregular. Contributing to your family, community, wider society, and country is beneficial to all of us. So, we should accept as citizens that we are all applicable to basic security and we all need to have the ability to contribute in our own ways. I believe it ought to be acceptable even to the most ardent proponents of capitalism that if they accept that full employment is unattainable, then why force people to seek jobs that are not there? Can our society be more productive by allowing those without work to contribute in ways that they can offer value to their community? We know automation will bring new jobs for people, but it will also eliminate jobs. It is becoming increasingly difficult to guarantee full employment, in full time, regular jobs. Employment is increasingly part-time, temporary, and in the form of zero-hour contracts within the

gig economy. For many people, lifetime careers have given way to periodic career changes. Increasing numbers of workers belong not to the proletariat but to what Guy Standing calls the precariat, characterised by "a lack of security in several dimensions" (Standing, 2011, p10).

Investing more in helping citizens renew, reskill, or upskill their skills throughout their lives and careers enables them to get into work, back into work, or change their work entirely to contribute to society for longer. Having the state employ a pure jobs portal where all formats of contribution would be advertised with the intention of amalgamating contribution, participation, and job creation. A pure jobs portal implemented nationally, regionally, and locally could be used to tackle boredom, unemployment, misemployment, and target communities or areas that require human-led assistance. This could be delivered through local government to enable cities, regions, towns, villages, and all communities understand what it is, and who can/or are willing to contribute to the growth of communities.

Not only in response to this but from an evolutionary point of view, are we so engrained to the idea that you are only beneficial to society when you pay taxes through paid employment? A good citizen would, therefore, only be one that works all their life to pay as much taxes as they can so that they pay into government more than they have taken out. The capitalist mantra of paying for goods and services could be enhanced if more citizens had a little more to spend to keep the economy ticking over? The economic effects are of primary importance to the political economy of capitalism. Capitalism itself is a very adaptable system to issues and crises it faces. The government as the regulator of the economy argue that if capitalism is working then society ought to be fine. Those that fall through the cracks are unlucky but will be provided with a safety net of an amount that is not sufficient.

There have been specific applications of UBI as a way of addressing social or economic problems to provide financial safety for citizens in an insecure and intermittent labour market without the risk of sanction (Standing, 2011), or as a safeguard against mass automation of jobs (Sheahan 2012 and Hughes 2014) which has been accepted by Silicon Valley entrepreneurs as a way of allowing people to

move more freely in the labour market (Freedman, 2016; Waters 2017). A free flowing labour market is hit in times of economic hardship and Jože Mencinger takes into account the monetary aspects of a UBI arguing that a "UBI would be superior to the existing system of public goods and social security, as it would enable recipients to choose between public goods and maximising utility in consumption, which should ensure Pareto optimality" and a UBI is much better than quantitative easing (QE) as a "way to lessen the social effects of a period" of economic downturns (Mencinger, 2015, p161).

A UBI would help reduce work hierarchies and segregation as well as the concentration on the activation of benefits systems which devalue activities that are not monetised as referenced in the case above. It is right here, before making my argument about the welfare state, that we understand the conditional benefits systems often condone an endemic demonisation of the poor as the obsession with screening out the supposedly undeserving underclass of welfare queens, and benefit scroungers has generated a toxic and divisive rhetoric undercutting the equal standing of those most vulnerable. This puts at risk the social cohesion that is desired in an egalitarian or equitable society. Were we to alleviate the requirement to seek work for claimants and instead allow those citizens without work the ability to contribute in other ways it would benefit citizens wellbeing and allow the state to focus on misemployment rather than unemployment long-term. Offering a basic income for citizens would also alleviate the exploitative nature of capitalism and work.

4.6.2: Basic Income Alleviates the Exploitation of Labour

A UBI that provides enough for individuals to live freely and above the means of necessity has the potential to change contemporary capitalism as we know it. As highlighted the current format of wage labour is not sufficient for hundreds and thousands of people today. The exploitation of their labour continues to keep citizens in a state of precariousness and the process of treating workers unfairly benefits the capitalist. This exploitation of labour is intrinsic within the nature of capitalism. When speaking about exploitation, there is a tendency to misunderstand the social exploitation of taking advantage of a person because of their inferior position or through deception or extortion. Here, I am referring to the exploitation of labour using Marx's theory which explicitly rejects the moral framing characteristic of the notion of exploitation and restricts the concept to the field of labour relations. I have highlighted how the exploitative nature of capitalism over labour will escalate to the point that capitalism and capitalists will seek to eliminate human labour completely from the means of production by utilising automation with enhanced technology and robotics as stated in Chapter 2 through the coercive laws of competition. Unless a social contract or ethically responsible state is enacted, citizens will forever be precariously pushed aside for profit.

Marx set principles that were to govern the distribution of welfare under a format of socialism and then communism. These principles saw distribution to each person according to their work and needs. For Marx, exploitation occurs when these two principles are not met, and when the workers are not receiving according to their work or needs. Marx's argument on the theory of exploitation is that capitalists do not need to sell their labour power in the market to live, whereas workers need to. As such, workers are not freely and voluntarily participating in the labour market in this format. This power differentiation enables the capitalists to exploit the worker, extracting surplus-value from them. Yet, if a sufficient basic income were to be implemented, workers would not need to offer their labour in the market. Anyone who does so, would do it freely and voluntarily. This not only eliminates the 'slavery' side of the argument, but essentially gives them more power to choose how or when to work or contribute.

From a Marxist point of view, UBI does not solve the problem of exploitation. Nor does free housing, universal health care, or food stamps for all, because UBI instead offers corrections to capitalism and helps keep it in place. I agree with the sentiment that UBI in the context of capitalism aims to correct it, however, I believe basic income is the primary proposal, not only to move out of capitalism, but protect citizens throughout its removal and replacement. It has been made clear that capitalism does not solve problems like poverty, unemployment, and hunger, nor does it try to. Instead using an ethics of responsibility, government(s) would protect

the citizen economically as a basic right that capitalism for all cannot do. Government(s) therefore must address the issue that even the most advanced forms of capitalism failed to address like poverty, unemployment, and hunger. Government(s) acting on behalf of an ethically responsible state and citizens through an expressed social contract would address the problems of poverty, hunger, unemployment and even misemployment, by guaranteeing citizens access to financial security through a basic citizens income.

Under an ethically responsible state, government(s) would worry about misemployment. Employment means being, generically, in work, but misemployment means being in work but of a kind that fails to enhance job sectors, career progression, or to tackle the true needs of other people. Economists and government(s) have, with moderate success, tried applying techniques to reduce the overall rate of unemployment for decades. Central to the modern strategy has been the lowering of interest rates and the printing of money through quantitative easing (QE). The approach applied to bringing down unemployment has been to 'stimulate demand.' Though technically effective, this method fails to draw any distinction between good and bad demand and therefore between employment and misemployment.

Marx discovered that capitalism was fundamentally flawed almost two centuries ago. The problems of exploitation and alienation were baked into the basic workings of capitalism, and as long workers didn't own the means of production, there was no escaping these problems. According to Marx there was no set of adjustments to capitalism that could fix the system, the only solution was to completely overthrow the whole capitalist system and replace it with a "higher phase of communism" (Marx, 1875). Marx's approach has been heavily based on each according to ability, to each according to need which can be described as an ability-needs principle. For Marx, the higher phase of communism would come about after the abolition of the necessity to work for a wage. Marx envisions a society without capitalists, so instead of capitalists profiting, the value created by labour is returned to labour. Whilst I agree with Marx in principle, I would argue against planned economies and governmental control in all aspects of the market. I also agree with Michael Howard

who "accepted the desirability and inevitability of markets in consumer goods" (Howard, 2005, p283), the reason being I do not think it is yet within a government(s) remit to fully dictate the economy but enhance and regulate it with the primary motive of protecting, providing, and investing in their citizenry. Governments should allow citizens, contributors, and self-made capitalists the opportunity to lead in many consumer driven markets, as long as these markets are regulated to the highest possible standards. The ethics of responsibility would allow governments to enter the market and compete should they choose to do so but the governments' primary motive must provide financial security for its citizens.

My response to Marxists would be that there can be a capitalist road to utopian communism. The first turning on this road, is a sharp left, towards a basic income that guarantees economic security and alleviates recipients from the exploitation of labour cycle diminishing its negative impact on work and workers. If recipients of a basic income receive enough to live within their means, have the freedom to refuse work, and choose to work that best suit them, then I would argue this meets the real freedom principle that Van Parijs and Guy Standing call for when providing a basic security. This can be done within the context of UK policy and utilising institutions such as the welfare state in Britain. I want to turn now to the welfare state and argue how a basic income could enhance it.

4.6.3: Basic Income and the Welfare State

The British welfare system is delivered with the assistance of a large bureaucratic apparatus wherein welfare advisors are given discretionary power to monitor claimants, often intruding in their lives, and punishing them for failures in compliance. This not only creates but perpetually generates a toxic and divisive culture with rhetoric that undercuts the equal standing of those most vulnerable, putting at risk the potential for better social cohesion. A radical way to protect claimants is to make the welfare payment an unconditional right and to change the role of the welfare officers from controllers to advisors, trainers, or mentors. I do not mean a cheap reconfiguration of job titles but a change to their overall roles that dramatically changes the British welfare state. The welfare state is a primary element of a civilised and developed nation. We must reconfigure ours that was born in the 20th century and make it applicable to 21st century and viable for the 22nd century. A basic income must constitute a move away from the current welfare of a social safety net to a solid and stable floor for citizens to be able to stand. The welfare state does not move large sections of the population from precarity to economic security nor do we as a society demand full employment. Full employment has been abandoned by governments including the UK and if this has been accepted then it must be understood that work alone cannot remove citizens from the poverty trap. The provision of basic needs would lead to a dramatic reduction in the use of food banks, for example, and increase selfdetermination, wages and freedoms. I envisage a basic income implementation in the UK through the existing welfare state, however, I must stress that I would not want basic income portrayed as only applicable to those on welfare. I would like to think in a financially egalitarian society a pure UBI would work perfectly. Sadly, we are not near utopia and live instead in the advanced capitalist epoch wherein the UK culturally accepts the welfare state, yet there are stigmas attached and cultural nuances that citizens still hold prejudices around.

Van Parijs argues in *Real Freedom for All* that capitalism is superior to socialism for implementing a basic income scheme. Capitalism is clearly not taken for granted by Van Parijs as the subtitle of his book suggests: 'what if anything can justify capitalism'. Van Parijs envisions UBI stemming from capitalism rather than socialism because he sees it as more economically feasible (Van Parijs, 1995). Van Parijs believes capitalism will make real freedom more efficient than the most effective form of socialism calling for an egalitarian standard because the inequality of real freedom is permissible only if it enhances the real freedom of the least advantaged. Whether or not socialism or capitalism is the best route to obtain this freedom is still debated as Michael Howard agrees with Van Parijs on the acceptance of real freedom but differs from him saying "socialism might make real freedom more politically feasible than it could be under capitalism, by reducing political inequality that has generally accompanied capitalist ownership of the means of production" (Howard, 2015, p282). I agree with Howard here as I envisage a left-leaning

socialist government proposing a policy of basic income. However, there is also the very real capability of a right-wing capitalist account of basic income that is an amalgamation of the welfare state and dystopian capitalism.

A basic income could be comfortably implemented within a capitalist economy and welfare state like the UK, overhauling the current welfare state whereby all benefits meet a required standard, affordable and sustainable for the state long-term. The basic income could be a top-up on those benefits if they did not meet an independently verified DLS minimum.

The ethical argument for a basic income is that we ought to encourage both the government(s) and individual(s) to accept responsibility for protecting others. It is also an opportunity to reconsider the interactions with our economy, the state, civil society, and the citizen. Any system of basic income implemented cannot have a *laissez-faire* approach but rather a continuous set of institutions and interventions to reinforce the culture norms of contribution as stated above.

Following the impact of Covid-19, the reality became painfully clear that public assistance was no longer just for some but needed for all. Robert Reich has argued following the Covid-19 pandemic that:

"The economic lesson is that Reaganomics is officially dead. For years, conservative economists argued that tax cuts for the rich create job-creating investments, while assistance to the poor creates dependency. Rubbish. Bidenomics is exactly the reverse: give cash to the bottom two-thirds and their purchasing power will drive growth for everyone" (Reich, 2021).

By accepting that full employment is unfeasible we should allow the surfer or scrounger to live their lives as they choose who can still contribute in their own way to society. Those that want to contribute, can and should be offered the possibility to do so wherever possible. Citizens benefit by enjoying the lifestyles they choose, and if the vast majority of citizens contribute towards bettering the state productively, they would raise the national level for a higher basic income. The argument about the surfer and scrounger are one and the same and what we must accept from the welfare state is that should they change their mind about not contributing (or get tired of surfing), they can go to their welfare state and seek training opportunities or apply for job schemes to contribute at a later stage of their lives. What an ethically responsible state could do for the 'lazy surfer' is invest in their experience and seek to offer them the opportunity to teach others to surf. Most citizens I believe would seek or offer themselves for new opportunities as most people enjoy the responsibility of work and contributing to society, be it volunteering, charity work, or caring for family members or friends and neighbours in their communities. They can work and enjoy what they do and contribute to the system.

As previously stated, we cannot continue to accept the dogma around making people search for work to receive financial support. Simply think about the logic in the fact that if there are not enough jobs for everyone, then why would you expect someone to find a job that is either not there or be used to undercut those with a job, out of their role by accepting lower pay or to work more hours? We must accept that full employment is not a goal of capitalism, never has been, and never will be. Capitalism needs the reserve labour force (unemployed) to keep profits high and wages low. Now think further ahead to the possibility that your job could be automated or done by a robot capable of machine learning. You now must find yourself a new job. Would you want conditional or unconditional cash in either the short-term or long-term? Even those of us who love and enjoy our work still require economic safety. Were we to lose our job we would go into a system of basic income to ensure we had a financial flooring to restart our job search, retrain, or move into a completely different sector of contribution if we chose to do so? Any minimum basic income that met essential requirements for wellbeing and DLS would allow this whether it was a pure UBI or not.

Scrapping all conditions on searching for work should be done the day before a basic income begins as it is an unnecessary burden which recipients must consider rather than just contributing to something they are passionate about. An ethically responsible state should unshackle the citizenry from this outdated and oxymoronic fallacy. Preserving all of the complications of the existing tax and benefit system make a UBI hard to administer and mean that individuals cannot readily calculate

how a change in their situation will change their tax liability. The presence of a UBI would enable the UK to drastically simplify welfare and income tax, with a switch to a flat income tax that would also replace national insurance. The system would still be progressive overall, thanks to the UBI payment being far more significant for people already at the bottom of the income scale (or fall into if they lose their paid work). Harry Shutt proposes a basic income of "a flat rate payment as a right to all resident citizens over the school leaving age, irrespective of means of employment status...it would in principle replace all existing social-security entitlements with the exception of child benefits" that according to Shutt would create a post-capitalist economic system (Shutt, 2010, p124). This is the narrow view of basic income that puts reforms of the tax system or amendments to the welfare state as achievable so long as there is the political will.

Within the context of the UK's welfare state a basic income could according to Luke Martinelli, bring about a "dramatic simplification of existing rules and conditions, both to reduce administrative costs and perhaps more importantly, to reduce the psychological burden and stigma associated with complex and intrusive rules and conditions"; as well as create a "more comprehensive coverage of the population, and thus more effective alleviation of poverty and greater levels of income security" (Martinelli, 2017, p24). A sufficient basic income would eliminate or at worst reduce poverty, unemployment and bureaucracy traps that discourage welfare recipients from engaging or advancing in the labour market. Martinelli argues that the:

"Implementation of a non-withdrawable basic income partly or fully in replacement of means-tested support could increase the incentives for inactive individuals to enter paid employment, since there would be a significant positive return to employment at any wage rate, for any number of hours, and of any contractual duration" (Martinelli, 2017, p24).

Even when the recipient receives means-tested support on top of their UBI, due to the lower payment they would be able to escape extremely high marginal effective tax rates more easily by earning smaller amounts of additional income. Compounding the problem of weak financial incentives in highly conditional systems or bureaucratic traps, are situations in which claimants are reluctant to enter employment due to uncertainty about how the change of circumstance will affect their benefits. The poverty trap or benefits trap would have to be wiped out with an adequate figure that those recipients either receive the same as they already do, or an amount topped up after calculations showed it met or had failed to reach a basic social minimum (independently calculated), thereby, eliminating the poverty or benefits trap that cements recipients in a system wherein it is better to remain.

One of the key benefits of a basic income, if properly constructed, could increase labour supply, particularly among those low-income households. The current UK welfare system creates a benefits trap where the removal or tapering of benefits means that the effective marginal tax rate can be exorbitant on low incomes. By making benefits payments unconditional on income or employment status, a basic income can solve this problem, bringing people back into the labour force (contributory economy). If government(s) accept that full employment is unattainable, or undesirable then why not give up on the conditionality of making people seek work whether it be there or not? If work is there and current recipients of Universal Credit fear losing what they already have, why would they seek further work which inevitably contributes not only to the state but could benefit the recipient's community and themselves more widely?

4.6.4: Why would anyone work if they receive a Basic Income?

The reason people would choose to work or contribute to the above proposal, would be that, if they received a basic income, it would primarily be out of free choice with a nudging sense of moral obligation. By this I mean there is a social responsibility to ensure that there is a perpetual basic income for everyone annually and constant universal basic services available. There would be not just a moral obligation as a recipient but also a duty to uphold the receipt of basic security long-term. Let us imagine that the basic income the citizen receives is from the state via governmental institutions and for all adult inhabitants there was a flat rate of say £30,000 for each recipient in the year 2021. If the UK has a good/profitable year and citizens are contributing to the economy and overall GDP rises to the point that the basic income could rise for the next year. This basic security of £30,000, or whatever figure that sufficiently covers all basic needs and provisions that the citizen requires to live a healthy, fruitful, active life that they can enjoy can rise. Can we then assume that citizens would want to continue this way of life? The citizen has the freedom to not work and not contribute to the state should they choose to. However, if everyone were to do this then the figure of basic security would lower over time which would mean less financial freedom for all citizens to do the things they want to do or enjoy doing. The Elizabeth Anderson criticism of UBI that it takes away responsibility and is not conditioned on the responsibility to work is met here as whilst I do not set conditions for receipt of a UBI, there would be an imperative or duty for citizens to contribute or participate in their communities if they sought to claim higher basic incomes. Remembering, this is contribution without state usage of automation rather than its usage by private enterprises. It is important for government to act as managers for the economy and to invest in people, and automation when desired or required to incentivise citizens to contribute positively. The contribution of the citizen is key and ought to be part of the citizens civic duty to better enhance themselves, their community, peers, and the state by default which encompasses all else. The question arises then: why should the citizen want to better the life of others or even themselves?

In the 18th century Civic duty was the key thing to uphold the public good as opposed to pursuing one's private interest. Private interest was thought of as material gain, pleasure, indolence, while public good were things like resisting corruption, not selling your vote, not seeking bribes and being willing to fight if your country needed you. Civic duty has diminished in value becoming more legitimate to spend your life in pursuit of personal gain (or survival under capitalist settings) rather than public good. The citizen that pursues their own private interest through any format of work is inevitably contributing to the state through taxes with the state using said taxes to benefit the citizenry overall. I understand that the psychological makeup of citizens is very different from one to another and that many only seek personal gain, be that for themselves as an individual or for their immediate family. However, it is this citizen that whether they like it or not, understands it or not, still contributes towards the overall goal of the state which

contributes to the maintenance of the protector and provider state. The citizens in this state that receive a basic security, that choose to contribute whether it be for individual gains or not, are not the problem of the state, especially if this was the vast majority of citizens. The problem arises when the vast majority choose not to contribute to the state and the state's GDP wherein a basic income security can become unaffordable under capitalist ideological settings. This can theoretically happen if the vast majority of the citizens chose, dismissed or refused to contribute to the state. However, whilst I do not think this would be the case, rather the capitalist state replaces human labour with automation, we can accept that beneficiaries of the state i.e., the citizenry would show fair play and gratitude for their education, access to healthcare and ability to receive basic security from their state. Alternatively, an ethically responsible state seeking a post-scarcity economy wherein robotics and autonomous systems (RAS) complete most (if not all) productive work allowing citizens to do other things, productive or not. Citizens that are recipients of Universal Basic Services (USB's) in line with a basic income would also seek to contribute if they were reciprocally being invested in by their state or representative government(s). This contribution would create the value required to transition from the current capitalist epoch to post-capitalism.

Unless the state can offer a basic security at an extremely low cost it would be beneficial for most citizens to contribute to the betterment of the state within their communities. The contribution from citizens would be greater if they were or at least felt like stakeholders in their community and society. Would citizens not be more inclined to do their shopping at the Co-operative if they had a stake in the Co-op, even if Tesco was closer and more accessible? They would at minimum seek the success and overall condition of the Co-op or similarly the energy provider chosen for their home, if its profits were felt by them. In doing so as stated above, if you knew or wanted to get a higher basic income the next year, then you would want to contribute to the state, be it from paid employment, or working collectively with a community group to achieve better broadband for your area, or with your local authority to upgrade degraded areas. Clearly things can be achieved mutually in a capitalist society, however, we must be clear that money talks and bargaining power

of the citizenry is established every couple of years depending on election cycles. Were a basic income implemented that protected citizens economically at the bottom and lower middle class, then we could envisage further communitarian cooperation and contribution to communities and invariably wider society. A format for economic democracy, and the general strengthening of other economic rights, is essential for dealing with the distributional crisis and for strengthening incentives to be socially responsible and productive in our communities.

A basic income security would help individuals make longer-term decisions on work, lessen fear in the precariousness of work, and increase a sense of self-control and autonomy. However, this opens up the question of whether a right to work would impose a duty from the state to provide work? Would this be an obligation imposed on employers, local authorities, central government, or in Standing's case from an "international body required to ensure the right to work is respected for everyone residing in a particular area?" (Standing, 2005, p96). This would be an unfreedom imposed on some bodies which Standing acknowledges stating "one would need a very complex evaluative and judgmental apparatus to impose on Governments and employers some obligation to provide jobs, if the *right* was to be made more than a political gesture" (Standing, 2005, p96). An ethically responsible state would have the duty to ensure a contributive culture and right to contribute from citizens who seek work from their social contract.

Along with the problem of distribution of work Standing criticises the notion of the inability to work which he argues arises from administrative procedures because the right to work must also accompany the right to income for those who cannot work which "implies a dichotomy that is not only arbitrary but steers thinking towards selectivity, constitutionality, and discretionary administrative procedures" (Standing, 2005, p97). A distinction between those able and those unable to work is for Standing "socially determined and probably politically motivated" (Standing, 2005, p97). I do not consider there to be a problem with those able and unable to work because of the principle on incentive, which for me would be offered to those who choose to work receiving something extra. I understand that the incentive case may not be applicable in many aspects of UBI, but the work and extra cash would not

necessarily be a deterrent were it freely chosen. I include those able and unable in the incentive category because they could volunteer as their form of work and add to the economy in different ways to laborious work. Guy Standing acknowledges that even the most impaired handicapped individual could have "accommodating modifications to workplaces that could transform a barrier into an opportunity" (Standing, 2005, p97). It must be this kind of thinking that would allow a citizen to pursue the good life and a life in which they can feel they can contribute should they choose to do so. It is for this reason, Standing argues that basic income would not be a 'panacea' or a solution for all the difficulties, but must be seen as "part of a package of policies and institutional changes that would redress the misdistribution of income in modern society, unequal access to resources, and multiplying unequal insecurities" (Standing, 2005, p95). As a society we must accept that our current welfare state limits freedom, and to unshackle the potential for unconditioned contribution we accept that paid work is not the only format of contribution to a healthy society. GDP over happiness must be turned on its head and a basic income must meet a universal floor for all. During basic income's inception it will not be distributed equally due to the financial inequality of capitalism. Not only would this be financially inadequate but morally wrong as it does not redress the inequalities of capitalism, nor would it provide a basic security for the future of technological unemployment (were that what citizens desired). If citizens were to choose the latter, they must benefit from it then by having a stake in this automation through robot taxes or via UBS's or a sovereign wealth fund as already stated.

Standing states that the "primary rationale for a basic income (is)...that would be a means of promoting an egalitarian work-based society, not a sufficient means but a necessary condition for it" (Standing, 2005, p101). UBI then, is not a solution to poverty but rather the right to a basic income and would "secure the right to basic security, in which women and men could pursue a creative working life of occupation" (Standing, 2005, p95). This is part of Standing's 'strategy' to provide real freedom so that individuals can make their own rational choices about work, "and from time to time, how not to work" (Standing, 2005, p95). Citizens can have the freedom to contribute, participate, and work when it suits them and will be

incentivised by their states' government(s) when required through managed longterm planning to sustainably implement a universal basic income.

4.7: Defining the most suitable Format of Basic Income

The difference in the implementation of a UBI to the basic income format I present is the universality of basic income at inception. Whilst I acknowledge and commend the égalité of the proposal and believe it should be the final achievement of such a proposal, I do not believe it is just, if applied in its pure format without necessary amendments. Such necessary amendments must tackle the economic consequences of inequality as a pure UBI cannot tackle overall inequality if applied universally within the context of modern-day advanced capitalism. A basic income must be available to all those who need it and is universal in that it is open to all citizens or residents that require an income floor. However, it must only be universal through access and implementation to those that fall below the minimum independently verified defined line at inception. Every citizen can theoretically fall below the poverty line or the minimum amount, so it is universally applicable to all citizens in a given society.

4.7.1: Defining Basic Citizens Income

A basic citizens income is universal to all citizens and members of a society that provides a guaranteed income to all. A basic citizens income has the primary objective of improving lives with the ideal to build an income distribution system that ensures nobody is economically insecure. It would be one of the primary investments from the state in their domicile and resident citizens.

4.7.2: Basic:

A basic citizens income would be an independently agreed amount that provide a basic security in the way of a financial floor that guarantees financial security that can be allocated sustainably. The idea allows for the basic income to start at a level that is independently verified as the basic amount to meet DLS and would rise or lower as resources were reallocated and as the national economy grows. If the

state's economy rose and productivity was good for the year, the payment of basic income could increase. This would partially incentivise citizens to want to be more contributory and productive to their state or local economy.

4.7.3: Cash:

The payment would be made in the form of direct debit to the citizen's national bank account. Cash can be replaced or substituted for other items or goods such as UBS, so long as it does not compromise the ability of the individual to make their own choice on how to spend it. It ideally should not be paternal or in the form of food stamps or vouchers for example. As shown above, the rational citizen best understands their needs and ought to have the freedom to exercise their liberty to choose what they do with their basic citizens income.

Where and when cash cannot be used, the state must invest in their citizenry with UBS that must meet or get as close as feasibly possible to meet citizens DLS as set above for advanced capitalist nations.

4.7.4: Individual:

The basic income payments would be paid to each individual with slightly more for those with children under the age of 18. The payment would be made to every individual regardless of race, gender, disability, marital, or household status and contributory status. It would be paid into citizens national bank account that every citizen would be provided with at the age of 18.

It is important to highlight that the basic income concept precludes any additional supplements that would be viewed as investments from government to cover for special needs or disability. The intention must be to provide everybody with equal basic income provision to give financial security. Anybody with a medically accepted disability involving extra costs of living and/or a lower probability of being able to earn income should receive a 'disability benefit' to meet basic needs to live as according to Scope "life costs you £583 more on average a month if you're disabled" (John & Thomas & Touchet, 2019). This would include homes being created or

upgraded specifically for the needs of disabled citizens through universal basic services.

4.7.5: Regular:

The individuals should know that the money they receive would be paid at regular intervals, most likely monthly, and would be paid as part of a citizen's right. This would be unlike many existing benefits that are made uncertain and subject to deductions or variations in value. As such, it would be paid automatically into the citizens registered account. For the individual, this would mean that the perceived value would be greater than the same amount if paid via behaviour tests.

4.7.6: Unconditional:

Basic citizens income should be paid without the imposition of behavioural conditions such as seeking employment. This is a fundamental difference from the general trend that has resulted in arbitrary rules that often punish and penalise citizens. It would be unconditional in terms of past activity, present activity, and future use of basic income money. However, citizens that lose their rights when sent to jail would not receive a basic income whilst completing their criminal sentence. These citizens should start to receive it prior to release so they can finance future accommodation and plan their return to society.

4.7.7: Quasi-Universal:

The basic citizens income would be paid to every legal resident, with the pragmatic rule of entitlement for legal immigrants. The term citizen has been highlighted in chapter 3 and not everybody migrating to the UK would be initially entitled to it, and not every UK citizen would be entitled to it as noted above in the case of prisoners. The several million Britons holding British passports living or working abroad would gain entitlement upon return to reside in the UK.

The term citizen's basic income has been used to imply that all non-citizens living and working in Britain would be excluded, which would be unfair, as they are often contributory citizens that often consider themselves citizens of the state. A simple

rule could be that someone would qualify if they had been in the country legally for an allotted period of time.

4.7.8: Independently Verified and Accessible:

The basic income payment must be independently verified and aligned with institutions like the Bank of England, National Audit Office, Office for Budgetary responsibility (OBR), HMRC, and the government department that takes responsibility for basic citizens income. The figure must be clearly accessible for citizens to understand the amount of basic income they would receive from year to year and from area to area. This would improve lives for those recipients who reside in cities, towns, regions, areas, or communities that are not profitable for free market capitalism. A basic income would not gentrify or move people out of their homes, cities, or areas they call home. The choice of where they want to live or call home becomes their free choice.

A mix of universal basic services should be accompanied in communities to accommodate where an income to citizens cannot fix, such as infrastructure for example. The basic income format portrayed differs from the ESS definition of UBI simply on universality, but the format I propose here goes further to equalising a threshold for citizens who do not earn enough to meet the independently accepted minimum, they would then be topped up by basic income. Those that earned more than the basic citizens income can retain much of the money they earn, however, this will still be taxed to ensure a sustainable basic income for all citizens.

Therefore, like the ESS definition, this format is (1) paid by government (and governmental bodies such as HMRC) to citizens that do not earn enough on a monthly basis to cover living costs, (2) primarily financed by taxes, and a redistribution of resources through universal basic services and the implementation of a sovereign wealth fund (3) replacing many other social benefits (4) guaranteeing a minimum standard of living, (5) with no variation depending on whether recipients are working and (6) allowing people to retain money earned from contribution to the state or community.

4.8: Why this format of Basic Income is best suited

Whilst there are long-standing debates around the normative merits and economic effects of a UBI, the existing literature does not sufficiently address or tie together the factors of twenty-first century capitalism with the necessary evolution of the British state, future technological advancements in automation, the welfare state, and the necessary policies to accompany a basic income to allow the state to sufficiently invest in, protect, and provide for its citizens.

The problems with a pure UBI are fivefold 1) a pure UBI does nothing to tackle the problems of income inequality (let alone wealth inequality), and neither is a pure UBI egalitarian in application because of this, 2) a pure UBI cannot be economically adequate for all recipients due to it being such a low figure when distributed to all, this is highlighted by Martinelli as the adequacy problem 3) economically a pure UBI will only produce a rise in inflation and prices of everyday goods and services, thereby weakening the objective of a basic income to tackle the social problems it ought to fix, 4) the affordability argument in the current state of government(s) budgets, nor should it be financed solely through taxes, 5) a pure UBI would not fix the intrinsic problems of capitalism, whilst universally, people would have a right to a payment, they are subsidised rather than having an actual stake in society.

The format proposed here incorporate the key elements of universality to tackle the issues of capitalism that have detrimental effects on workers and non-workers but is not universal in the form of a blanket universal basic income that requires everyone to become recipients of an amount that does not differentiate between economic circumstances. Instead, the basic citizens income proposed would be economically sustainable because it would not be universally available for every citizen in its inception. The reason being that not all citizens initially require a basic income, but it would be available for those that do, without conditions. The conditionality element of the basic citizens income I propose would be constructed solely on financial terms. In application this means a resident citizen earning or living on less than the independently agreed amount would receive a top up through a basic citizens income to meet decent living standards (DLS). The basic needs should be set

depending on the state's finances of what can be provided to its citizens. However, the basic needs cannot be viewed as something to simply be met, but sought to raise year on year, decade on decade, to ensure that citizens can seek productive contributions for their communities and themselves, ensuring their wellbeing and happiness become primary motives for the state's government(s) to attain. A basic citizens income would go some way to helping the state achieve this for its citizenry. The basic citizens income called for in this research would be flexible, easily accessible, regularly distributed, agile, allocated fairly, and independently agreed upon to meet the basic needs mark set independently of government(s) by regulators.

A permanent common dividend would not alone fund a basic income but would give citizens a stake that they if they chose to do so, can contribute towards, and give them a higher stake which would benefit not only the individual citizen but the community and entity (be it a business, organisation, co-operative, multi-national, or project). Those citizens who already work and contribute to the state would also receive a stake in society. A permanent commons dividend, in which national investment funds would be built from levies on commercial intrusions into the commons, boosted by contributions from taxes, digital information levies, and others would give every citizen a percentage stake in their nation and future.

As stated above, if you were a stakeholder in an entity, you would likely support it, whether working for it, purchasing from it, advertising it, or contributing towards its preservation. This would include a stake and the preservation for all citizens and future generations in things like national parks, beaches, lakes, natural resources, the NHS, schools for children and lifelong learning for adults, railways, mines, museums, national institutions, automation, robots, and other infrastructure for example. The key point is that the optimum way of building a basic income system would be to build a capital fund and pay out a commons dividend that would rise gradually as the fund grew. There ought to be incentives on people's desires to own their home, provide a life of high quality for their children and themselves, travel, and experience a sustainable good life. If we work hard, we get rewarded. This is not true of advanced capitalism and in the UK specifically, the past two decades

have shown an expansion of in-work benefits and rising risk groups such as lone parents, carers, stringent eligibility restrictions which have pushed vulnerable people into extreme hardship causing profound anxiety and stress. The willingness to work remains the basis of entitlement to a social income in the UK and the only way to get out of poverty. An ethically responsible state must not only see from a historical standpoint but from future forecasts that employment alone cannot alleviate poverty, yet money can. If the money is there, then the argument is there for a basic income as a floor. The reasonable citizen must accept this premise to guarantee future sustainability not only for themselves, but their country and future generations.

4.9: Financing a Basic Citizens Income

I want to set out from the outset that financing a basic income requires its own thesis and further research as the funding aspect can be achieved through multiple routes. The axiom that "an unaffordable UBI would be inadequate, and an adequate UBI would be unaffordable" must be understood from the outset that the affordability argument of basic income is not a fact to agree or disagree with (Martinelli, 2017, p43). Like the creation of the NHS, it is a choice that put the needs of the citizen first during a time of post-war economic hardship. Similarly dealing with national debt, wealth inequality, poverty, homelessness, and reversing climate change are political choices also. The UK is one of the wealthiest nation-states in the world and has the ability through its sovereign fiat currency to afford and theoretically attain what it wants under the right circumstances. The basic citizens income proposed in this chapter can be financed through taxes and made available through policy amendments to the internal contradictions of capitalism. Allocating basic resources and primary goods for citizens allows for a greater contribution back to the tax threshold and we can consolidate the resources we already have and redistribute them in a financially egalitarian way. To do so requires a truly revolutionary reconfiguration to the current tax system.

Taxes ought to be used as useful tools to change behaviours of what economists call *bads* (in contrast to goods). These are things we want to see less of, such as

pollution, environmental degradation, overconsumption of unhealthy foods and alcohol, smoking, inequality, and exploitative capitalism. Under an ethically responsible state taxes ought to be used to amend and change behaviours that are detrimental to the citizen and the state. Any tax rates could be initially set low and increased gradually to allow time for adjustment. Proceeds of taxation would be returned to citizens in the form of UBI or benefiting citizens' lives though UBS in infrastructure, education, or healthcare.

The taxation elements described here are necessary and overdue for fundamental reformation, not only to rebalance the current economic system, but to create a financially egalitarian society so all citizens can enjoy and pursue fulfilling lives whether employed, contributing, participating or not for the state's ultimate purpose in obtaining and retaining a sustainable utopia for its citizenry whereby they are protected, provided for, and invested in, to the highest standards of physical, social, and mental wellbeing.

4.9.2: The Digitisation of Finance and CBDC's

The Bank of England confirmed that in "in 2017, debit cards overtook cash as the most frequently used payment method in the UK", yet there is over £70 Billion of notes in circulation which is twice as many banknotes and coins as a decade earlier (Bank of England, 2021). The role of digitisation this century can prove to be vitally important for a transparent and financially egalitarian state and society. The characteristics of a Central Banks Digital Currency (CBDC) is a high-security digital instrument like paper bank notes, it is a means of payment, a unit of account, and a store of value. Like paper currency, each unit is uniquely identifiable to prevent counterfeit. A CBDC differs from virtual currency or cryptocurrency and most CBDC implementations will likely not use a distributed ledger like blockchain as it would be issued by a state. A Digital Fiat Currency (DFC) is the digital currency issued by a central bank and is part of the base money supply, together with other forms of the currency. As such, DFC is a liability of the central bank just as physical currency is. However, it is a digital bearer instrument that can be stored, transferred, and transmitted by all kinds of digital payment system and services for transparency. The

digitisation of finance makes it easier for economies to track transfers. Government(s) would be in a better place to understand what goes on, who has what, needs what, and a clearer knowledge of their economies and what the needs of citizens are. The digitisation would tackle tax evasion, money laundering, criminal activity, and financing terrorist or criminal organisations. These developments will optimise efficiencies and create new opportunities for businesses and government(s).

Proposals for a CBDC in relation to a basic income could involve the inception of universal bank accounts at the central banks for all citizens. Every citizen would receive a bank account where their basic income would be credited each month. This could be implemented using a database run by the central bank, government(s), as well as other approved regulatory entities that would keep a record with the appropriate privacy and cryptographic protections of the amount of money held by every entity, such as citizens, businesses, and other organisations. A CBDC and established DFC would allow for the state to properly understand and allocate finances into organisations and individual's accounts via HMRC. By digitalising the fiat currency government(s) can transparently achieve tax collection and distribution to eradicate tax avoidance and tax evasion.

4.9.3: Eradicating Tax Evasion and Tax Avoidance; Establishing Unitary Taxation

As stated in this work all nations and states must unite internationally to regulate and eliminate tax avoidance and evasion by their citizenry and businesses. Compliance in the state receiving tax is necessary for a thriving nation-state. The World Economic Forum found that "if the top 1,000 corporations in the world were fairly taxed, it would allow states and government's a modest UBI to be tightly and reasonably dispensed across their world" (Wignaraja & Horvath, 2020). In the UK foreign multinational subsidiaries report "50 percent lower ratio of taxable profits to total assets" compared "to domestic standalones" (Bilicka, 2019, p2930 & p2942). In the US, "91 companies on the Fortune 500 index, including Amazon, Chevron and IBM, paid an effective federal tax rate of zero in 2018" (Kinder & Agyemang, 2020). Tax havens collectively "cost governments between \$500 and \$600 billion a year in lost corporate tax revenue" (Shaxson, 2019, p7). Developing countries are harder hit in relative terms given their smaller tax bases. In the UK "nearly a third of the companies that received coronavirus loans from the Bank of England are either based in, or substantially owned by, a tax haven resident" (Kinder & Agyemang, 2020). Political inertia domestically and internationally enables this to endure. International regulation and action must be taken by all states to eradicate the problems of tax evasion and avoidance.

What domestic government(s) can do is implement unitary taxation. Under unitary taxation, government(s) could treat a multinational corporation as a group made up of all its local branches, instead of treating each local branch as an individual entity separated from the global chain. The profits that the multinational corporation declare as a group are then apportioned to each country where it operates based on how much of its real economic activity took place in that country. A unitary approach requires multinational corporations to contribute tax based on where they employ workers, do business, and make their sales which would ensure corporations pay their share for the wealth created locally. In the case of unitary taxation this would not stop companies moving their headquarters to countries offering lower taxes on corporate profits but instead will enable the country where a business is operating in to effectively pay taxes on their profits in that nation, where they gain profits. This will enable the nation to fairly obtain taxes from the business gaining profits from that nation's citizens.

As stated above financing a basic income entails amendments to the tax system and taxing *bads* as opposed to goods can attain a greater tax threshold and remove parts of society that pose a threat to the state and its citizenry through capitalism. I discussed the inclusion of a robot tax in chapter 3 and NIT is this chapter and are not repeated here as part of the financing a basic income but can easily be applied by government(s). This leads to the implementation of wealth taxes, a carbon tax to tackle climate change as well as a global financial transactions tax (FTT) as other lucrative ways to not only finance a basic income for citizens but provide protection for all citizens from the negative aspects of modern advanced capitalism.

4.9.3.1: Financial Transaction Tax (FTT)

A global financial transaction tax with radically stronger financial regulation would go some way to challenging the state-finance nexus and to deflate and inevitably remove the market of stocks and shares. A financial transaction tax on each unique instance of the buying and selling of financial assets such as stocks, bonds, or derivatives would contribute to the tax base and help finance a basic income. If an investor sells or purchases an asset, they would be charged a percentage that should be high enough to stifle reliance on fictitious capital. The automated payment transaction tax (APT tax) uses modern technology to automatically assess and collect taxes when transactions are settled through electronic technology of the banking payments system. An FTT can be similarly taxed by government(s) and use unitary taxation so assets can be taxed internationally. This must be done in line with other states and regulated by an international authority. An FTT would be a progressive tax as wealthy individuals often hold and trade a disproportionate share of financial assets but it has to be transparent as it would affect producers, pensioners, consumers, and investors in a number of indirect ways. If implemented the FTT must be paid in the country where the financial operator is established and should be based on residence plus issuance meaning it would cover all transactions. Any proposal of FTT must cover the full range of asset classes including the purchase and sale of stocks, bonds, commodities, unit trusts, mutual funds, and derivatives such as futures and options. Whilst this can be done domestically by government(s) and state(s), there is the necessity to have international regulation and oversight that affects all nations' economies and currencies. International regulation is integral to the proper taxation of any FTT and there must be an international regulator for the collection of any format of a carbon tax.

4.9.3.2: Carbon Tax

A carbon tax would provide an important way to raise revenue and reverse climate change to acceptable levels. Data from the OECD reveals "70 per cent of energyrelated CO2 emissions, across rich and developing countries, are entirely untaxed" (Kinder & Agyemang, 2020). A carbon tax is an effective and necessary solution that

can be levied on the amount of carbon in any fuel source. This tax would effectively change the price of everything in the economy, in turn affecting what people consume and how they behave. A carbon tax would change the way we buy food as food produced locally automatically becomes more affordable than food flown across the world. For companies it would create incentives to invest in greener technologies. It would not rely on self-restraint, trying to meet targets, trading emissions permits or having to do complicated calculations of the companies' carbon footprint in its every action. A carbon tax domestically would benefit the state's macroeconomy as well as local economies benefitting regions to be more selfsufficient and sustainable. An international carbon tax must also be imposed by institutions such as the IMF, WTO, and the United Nations (UN). A carbon tax imposed internationally will truly counteract the detrimental effects of capitalism on our planet's climate. These international institutions will be vital to ensure the planets health as well as rebalancing wealth across the globe. Institutions like the IMF, World Bank and WTO must rectify imbalances or face replacement by institutions that do. An ethically responsible state cannot be complicit or sign up to those that do not act ethically in relation to issues such as climate change, poverty, and wealth inequality.

4.9.1: The role of Tax Collectors: HMRC

In the case of the United Kingdom, it is right and best suited that HMRC rather than the government of the day have responsibility for the distribution of the basic income scheme. HMRC is a non-ministerial department of the UK government and is responsible for the collection of taxes, the payment of some forms of state support already and the administration of other regulatory regimes including the national minimum wage. The government(s) would be the initial regulators of basic income until a regulatory body is established to ensure a minimum basic income is being sustained by government(s) whose role would be to incentivise citizens to retain a basic income through contribution and participation in the wider circular economy. This would directly affect the Department for Work and Pensions and I would argue that this department would need to be redesigned to help train, upskill, and reskill citizens who wanted to contribute and participate in wider projects for the benefit of

the state, UBS, SWF, and basic income. HMRC is suitable as it has the necessary levers, history, and knowledge to conduct the implementation and retention of basic income successfully. HMRC is already responsible for the administration and collection of direct taxes and distributing monies. HMRC's remit makes it best placed to calculate, administrate, and distribute a basic citizens income.

To properly legitimise a basic income, the state needs fair taxation and work with countries across the globe to stop individuals and corporations from evading and avoiding taxes. We as citizens must all pay our fair share to contribute to public interest goods, services, and institutions. All tax avoiders and evaders must be understood as enemies of the state who seek individual gain over public interest goods. With good conscience, government(s) can no longer privatise profits and socialise losses. Multinational corporations must pay their fair share. Apple, Amazon, Google, and Facebook generate vast profits and pay limited amounts in taxes, after taking advantage of legal loopholes in tax systems. Societies are clearly wronged and broken when government(s) are deprived of funds, they should justifiably have to construct a better state. With this in mind and in line with the trajectory of modern technology, government(s) and state(s) should consider the full digitisation of finance to protect their currencies and ensure the transparent collection of taxes.

4.9.3.3: Wealth Tax

There are three ways to tax wealth. Wealth could be taxed from one generation to the next in the form of inheritance tax, or you can tax people's stock of wealth annually through property taxes, or finally taxing income from wealth through capital gains or dividends. Many countries tax inheritance and income from wealth but only a few taxes the stock of wealth itself. As wealth inequality is far greater than income inequality, taxing inherited wealth or unearned wealth and redistributing it instead is vital, not only for equalising opportunity in society but to equalise society. Thomas Piketty argues in *Capital and Ideology* that people should only have temporary ownership of their wealth and that it should be taxed away over time through

inheritance and property taxes to fund a capital endowment for every adult over the age of 25. In the case of France, he proposes that "every young person should receive around €120,000 to ensure that capital circulates throughout society and expands opportunities early in life when they are needed most" (Piketty, 2020). Amendments to wealth taxes or levies improves economic efficiency by utilising the assets that go untaxed to incentivise new outlets of opportunity to generate higher returns elsewhere.

A wealth tax annually would allow governments to increase efficiency and promote economic growth and reduce inequality at the same time. The base on which a wealth tax could be levied could include all the wealth somebody owns after a single property to include financial wealth such as shares, bonds, bank deposits, and to include valuables like art, jewellery, fine wine, classic cars, trusts, private jets, and ownership stakes in private businesses. From all of these you could deduct the debts somebody owes like a mortgage on their house, loans, money they may have borrowed and finally you could deduct a tax-free allowance. After these calculations have been made you would arrive at the taxable wealth on which an annual rate could be levied.

A wealth tax is necessary not only from a moral perspective but from an economic standpoint. There cannot be a problem with people becoming wealthy however where problems arise are from the unfair distribution of wealth and the passing of wealth through inheritance which leads to my next proposal for contribution towards the financing of a basic income and stake in society for all citizens.

4.9.4: Inheritance Abolition and the Removal of Trusts

As stated above financing a basic income entails amendments to the capitalist system removing elements of modern advanced capitalism that pose a threat to the state, citizenry, and even the capitalist system itself. The removal of capitalism will not and cannot come all at once. Instead, it must be removed methodically to do as little damage to the state and citizenry as possible. The removal of trusts which are untransparent ways of managing assets (money, investments, land or buildings) for people. A transfer of assets into a trust can include buildings, land or money, and they are taxed differently, and calculations are complex. The removal of trusts and the abolition of inheritance would completely change the capitalist system. Inheritance and dynastic wealth are monetary inheritance passed on to generations that did not earn it. Removing financial gains from inheritance removes the contradictory forms of capitalism such as intergenerational wealth which stifles competition.

The argument regarding libertarian claims who in the name of freedom oppose redistribution as forced labour because you cannot be said to own yourself if you do not own the product of your own labour. Wealth through inheritance is a bigger problem for the libertarian who ought to argue the freedom of the wealth recipient who is gaining wealth primarily by a genetic predisposition. Inheritance cannot be accepted as the product of one's own labour; it clearly is not.

The ethically responsible state would equalise opportunities for its citizenry and can do so through the abolition of inheritance and removal of trusts that stifle economies and citizens. The abolition of inheritance would lead to a more equal society and raise opportunities for citizens to have a stake in their societies. Recipients of an inheritance are more likely to own a home than those who do not regardless of the size of the inheritance. Having a home must be understood as a human right. The ethically responsible state could ensure support and protection for its citizens by ensuring through distribution that all members of the state have access to a home of their own through the abolition of inheritance.

4.9.5: One House per Person Policy and the Eradication of Landlordism

The aim of the ethically responsible state and government(s) should be as John Maynard Keynes wrote in 1936, "the euthanasia of the rentier and, consequently, the euthanasia of the cumulative oppressive power of the capitalist to exploit the scarcity-value of capital" in the economy (Keynes, 1936, p186). Keynes believed that:

"The rentier aspect of capitalism as a transitional phase which will disappear when it has done its work. And with the disappearance of its rentier aspect much else in it

besides will suffer a sea-change. It will be, moreover, a great advantage of the order of events which I am advocating, that the euthanasia of the rentier, of the functionless investor, will be nothing sudden, merely a gradual but prolonged continuance of what we have seen recently in Great Britain, and will need no revolution" (Keynes, 1936, p186).

To reset and remove rentier capitalism within any nation-state, government(s) could allow an allotted period (government cycle) such as several years for landlords to put non-residency properties up for sale ergo eradicating private individuals owning multiple dwellings. Those that are not sold would fall into government hands or could be bought by government(s) at market value. All forms thereafter for renting would be done through government itself, local authorities, or governmental agencies instead of private landlords. The reason for this is because ownership matters. The rentier culture is a significant issue in modern capitalism that in 1907 Keir Hardie stated, "socialism proposes to abolish capitalism and landlordism" (Hardie, 1907, p11) Citizens that rent from a private landlord, pay higher rent than those in council or social housing, and will often make higher monthly rent payments than mortgage holders. The problem with rentier capitalism is not just that "property is theft" according to Pierre-Joseph Proudhon, but also that it is unsustainable, nor justifiable in line with the ecological crisis (Proudhon, 1840). If we are to properly consider the sustainability of our planet, why should government(s) and state(s) allow the depletion of green spaces to be built on for 'buy to rent' or unaffordable low-standard unsustainable homes. Government(s) cannot be neutral and must increase the taxes on property and rental profits to end private landlordism. For decent living standards every family must have access to high standard accommodation as a basic human right. This can be achieved by earning or contributing enough to apply for housing from the state that ought to take up the space left by the rentier class and offer the option for new renters who have not yet earned or contributed enough to purchase their own home. An individual can only live in one home at a time and logically should have no use for multiple homes when profit-seeking is removed. Housing and the concept of owning your own home must be understood as a human right for all, not an investment opportunity for some. The

covid-19 pandemic confirmed that homelessness has been a political choice by government(s) of every colour. The UK government provided the funding and resources to get every homeless person off the streets during the pandemic proving it is possible to end rough sleeping and always has been. All government(s) can and must end rough sleeping and homelessness permanently through political will by providing accommodation and further support for their homeless citizens.

To alleviate housing crises in the future, an ethically responsible state must step in, not only to eliminate landlordism and the rentier culture, but the land banking of developers, and those who hoard multiple homes. Not only would this tackle the housing crisis but would contribute to universal basic services, allowing citizens a greater stake in their country to own their own home. In the case of owning a home and a business site or building for purposes of business, this ought to be acceptable in that its primary motive is productivity and has the purpose of offering a business, work, and a contribution to the community. Government(s) in this aspect ought to be able to invest in businesses and their premises to lower business rates to keep businesses part of communities rather than have them close or move online. Otherwise, this becomes again an empty building that government then ought to utilise, destroy and rebuild for something new, or seek to remodel. In either case there should not be an ability for those that own to seek payment from rent. The euthanasia of the rentier culture would be inevitable within an ethically responsible state and contribute towards universal basic services.

The euthanasia of rentier capitalism and landlordism would completely change the idea of private ownership and freedom of the capitalist. As stated above the entire capitalist system must be eased out by ethically responsible state(s). It will be difficult for individual nations to detach themselves, but it will be necessary for the state and its government(s) to protect their citizenry. State(s) will have to reset their economics and their economies. Government(s) can begin by writing off their national debts which are burdensome to properly protect, provide for, and invest in their citizens.

4.9.6: Writing off National Debt

The UK state has considerable responsibility for the mounting debt crisis in the UK. When debt was a problem for the banks in 2008, government(s) and central banks intervened to lift the burden of bad debts. If this was good enough for the banks, then it is good enough for the people. Johnna Montgomerie calls for a similar longterm refinancing scheme to lift the debt burden from citizens in Should we abolish *household debt?* Montgomerie proposes that the government set up a household cancellation fund that starts with half of the money it used to bailout the banks (£500bn) and the guarantees (£2tn) it provides, and then uses this fund to cancel out debt that is particularly harmful to the economy (Montgomerie, 2019). This fund would target debts such as discharged debt (non-performing loans) that lenders sold to debt collectors at a discount; student debt which Montgomerie likens to sub-prime mortgages, loans made to people with "no income, no job or assets" and loading young people with debt is bad for society and harmful to individuals (Montgomerie, 2019). High-cost debt of loans originating from the financial crisis and their associated high interest, high fees, and penalties (often added to the amount borrowed) would also be refinanced by cutting the costs of these loans with lenders having to absorb the losses suffered in future revenue streams. Montgomerie proposes that targeting specific types of debt through government-funded long-term refinancing will spread the benefits of the scheme across different segments and types of households. Advanced capitalist societies have become debt-dependent economies, where the profit from credit and fictitious capital is privatised within the financial services sector, but the losses generated from debt-induced crises are socialised to citizens. This will continue to happen when government(s), central banks, institutions, and citizens keep expecting things to change within the context of a capitalist economy. It is therefore, not just a critically important humanitarian gesture to alleviate the poverty and hardship that so many are experiencing, but also sound economics. Lifting this burden of debt will ensure that the money that would have been spent on interest payments is now spent in the wider economy.

Johnna Montgomerie identifies that:

"the process of understanding the effects of debt and of locating the harm it can generate begins with the everyday life experiences of those people who have

personal experience of debt dependence: they cannot buy a home without taking on more debt than they can afford; they can get a university degree only by taking on more debt than they will earn upon graduation; they borrow to get through a family member's illness or period of unemployment; credit cards get them to the end of each month: or they live on their overdraft. For many, debt is a necessity, not an option" (Montgomerie, 2019, p3)

The debt trap begins for young adults early and are indoctrinated into the capitalist economic system that is culturally accepted by those that have come before them. Capitalism as a way of life begins for those who either go to university or cannot because of financial constraints. So, either they build up further debt to get a better paid job or obtain any job just to get a salary to survive. Therefore, it will be essential at some point in the future for government(s) to wipe off debts. This is not necessarily a bad thing for citizens if government(s) were to clear its debts. An ethically responsible state could do this and remove all internal or external sources of payday lenders and loan sharks. The removal of private payday lenders outright from the state protects citizens from exploitative loan sharks. The abolition of privately-run payday loan lenders can and should be replaced and allocated through the state in line with its role as protector-investor. In doing so, the state protects its fiat currency from foreign or non-domicile currencies that threaten not only fiat currencies but market valorisation.

Ann Pettifor explains in *The Production of Money* that big commercial banks and unchartered, non-regulated bank-like institutions, such as shadow banks "create money each time, they agree a loan or extend a line of credit" (Pettifor, 2017). The money is denominated in the same terms (Dollars, Euros, Pounds) as the public currency, but national governments today do not limit how much of it is created. The era of finance capitalism, asset bubbles, and misguided valorisation must come to an end. What Modern Monetary Theory (MMT) shows is that there is a position to take on the writing of off debts, even national debts. Whilst this is not the fairest for many and debts ideally should be paid to creditors, we must understand that if this causes a greater problem for citizens at large, the state must act on a utilitarian basis to protect the greatest number of people, of which, writing off the national debt is the best outcome.

4.9.7: Modern Monetary Theory

Modern Monetary Theory (MMT) is a macroeconomic theory that describes currency as a public monopoly and unemployment as evidence that a currency monopolist is overly restricting the supply of the financial assets needed to pay taxes and satisfy saving desires. The principle of this theory is that a government that issues its own fiat money can pay for goods, services, and financial assets without a need to first collect money in the form of taxes or debt issuance in advance for such purposes. This is possible because a government with its own fiat currency cannot be forced to default on debt denominated in its own currency. The premise of the MMT is that governments can create new money by using fiscal policy such as in the case of quantitative easing (QE). However, QE is unlikely to have the effects advocates hope for because under MMT, QE and the purchasing power of government(s), debt by central banks is simply an asset swap, exchanging interest-bearing currency. The net result of this procedure is not to inject new investment into the real economy, but instead drive-up asset prices, shifting money from government bonds into other assets such as equities that enhance economic inequality. The Bank of England's analysis of QE confirmed that QE has disproportionately benefitted the wealthiest as "holders of financial assets such as equities [were] made better off by the support of accommodative monetary policy" (Bikas, 2018).

The primary risk within the theory once the economy reaches full employment, is inflation. Inflation would accelerate once the real resources such as labour, capital and natural resources of the economy are utilised at full employment. However, this could be addressed by government increasing taxes on the private sector and bolstering a job guarantee that provides a non-accelerating inflation buffer employment ratio (NAIBER) to act as an inflation control mechanism to control such inflation. The purpose of MMT taxation is to drive up demand for the fiat currency, which if spread around through a basic income would reduce income inequality and raise the purchasing power of the citizens of the state.

Stephanie Kelton argues in The Deficit Myth: How to Build a Better Economy that concern with national deficits is rooted not in the sense but in sensibility. While it may feel right to argue a government is simply a large household and must balance budgets against revenues, Kelton insists that the reverse is true. Unlike individuals, firms, or even local authorities, a government like that of the US or the UK for example issues the money it spends. A country that controls its own currency, which is not the case of all governments or member countries of the Eurozone for example. However, those countries that are sovereign states with their own fiat currency can never become bankrupt in their own currency. With this logic, if the UK government, for example, spends pound sterling on the British people then public deficits equal non-governmental surplus. Governments are clearly not private households and describing them as such is purely ideological. Money is a social phenomenon, and we must know it serves to divide and distinguish as it does to unite and link. Kelton argues that if people change how they think about public money, they can constitute a new polity (Kelton, 2020). A nation can recognise that the deficits in education, healthcare, the environment, and infrastructure are the only elements that really matter. Kelton confirms that:

"MMT isn't a blank check. It doesn't grant us carte blanche when it comes to funding new programs. And it is not a plot to grow the size of government. As an analytical framework, MMT is about identifying the untapped potential in our economy...If there are millions of people looking for paid work and our economy has the capacity to produce more goods and services without raising prices, then we have the fiscal space to bring those resources into productive employment" (Kelton, 2020, p235).

Kelton recognises that how we choose this fiscal space is a political matter arguing that "MMT can be used to defend policies that are traditionally more liberal (e.g., Medicare for all, free college, or middle-class tax cuts) or more conservative (e.g., military spending or corporate tax cuts)" (Kelton, 2020, p235). Inflation is required from time to time but can be managed by institutions like the Bank of England or US Treasury. Kelton rightly calls for an end of relying on democratically unaccountable central bankers who target what they believe to be the right mix of inflation and unemployment. Instead, Kelton states "to build an economy for the people, responsibility for maintaining employment and income security must become the responsibility of elected representatives of the people" (Kelton, 2020, p236).

MMT purports that if we have the real resources needed to have building materials to fix infrastructure, or if we have people who want to become doctors, nurses, or teachers, and if we can produce all the food we need, then the money can always be made available to attain these goals. This is the beauty of having a sovereign currency. The question how we pay for it all, can simply be answered as the Bank of England (instructed by the government) already pays all its bills using nothing but a mouse and keyboard to click to add the required funds. Taxes subtract spending power from the rest of us, but they do not pay the bills. As an electorate, we must understand what it means to live in a country where government(s) is the currency monopolist. Any UK Prime Minister or US President should never deceive their constituents by stating the country or state has run out of money. A currency-issuing state can afford to buy whatever is for sale in its own unit of account. The government's spending capacity is infinite, but the economies' productive capacity is not. There are limits to what we ought to do:

"*MMT urges us to respect our material and ecological constraints and to ask, how we will resource it? Budgeting through an MMT lens would have us replace the artificial budget constraint that tells us to live within our financial means with inflation constraint that tells us to live within our biological and material means*" (Kelton, 2020, p256).

An accountable ethically responsible state can reset the capitalist system domestically by writing off national debts, reallocating resources, ensuring everyone has a stake in society including the human right to own your own home. Financing a basic income can be further brought about through tax amendments, resource allocation, and the easing out of the capitalist model by utilising new forms of economic formats with MMT and quantitative easing (QE) for the people including value creation through dutiful contribution in a post-scarcity economy. Hyman Minsky believed, "economies evolve, and so, too, must economic policy" (Cassidy, 2008).

4.10: Chapter Summary

This chapter formally introduced Universal Basic Income (UBI) defined by the European Science Survey, contextualising the formats of UBI by considering the five factors covering universality versus means-tested, regular or one-off payments and cash transfers or alternative formats such as universal basic services (UBS). Consideration was given to variable features like a sovereign wealth fund (SWF) which can be set up by any ethically responsible state with all formats being offered as part of a social contract with citizens.

The basic income proposed considered the freedom versus equality argument wherein basic income and work had to be understood through participation income and dutiful contribution. Contribution as stated above must be decoupled from work and income. Unpaid work is still contribution and contribution, therefore, has value to society, communities, fellow citizens, and the state even when decoupled from income. Decoupling means basic income alleviates the exploitation of labour through work and instead turns it on its head giving citizens and sectors the ability to reject work and contribute in other ways. The reason recipients would contribute is because they would have the ability to receive a higher basic income, or better universal basic services based on the contribution to their communities, local economies, and the national economy based on contribution to the overall state.

This chapter found the most suitable format of basic income to meet the equality and freedom principles while also making it affordable and applicable within a capitalist setting is the citizens basic income. This format meets the universality principle as it is applicable to all citizens residing within the state. The basic citizens income would be delivered regularly, through direct debit to the citizens given bank account, paid without the imposition of behavioural conditions, and universally applicable to all residing citizens who fell below an independently verified level. In doing so it allows for decent living standards (DLS) and essential requirements for wellbeing to be met. The findings behind this leads to the affordability issue raised by Martinelli that an unaffordable UBI would be inadequate, and an adequate UBI would be unaffordable. Allowing UBS as part of the format enables the state and its government(s) to allocate resources to areas of deprivation to tackle regional inequality by instilling primary goods and a basic income for citizens.

The chapter highlights that the affordability argument of basic income is not a fact to agree or disagree with. Like the creation of the NHS, it is a choice that put the needs of the citizen first during a time of post-war economic hardship. Similarly dealing with national debt, wealth inequality, poverty, homelessness, and reversing climate change are political choices also.

The chapter concludes offering proposals towards the financing of a basic income to guarantee protection, provision, and investment from the state long-term. The roadmap of policies and amendments to capitalism such as effective tax collection, the digitisation of finance, the alleviation of exploitative labour, and economic amendments to the capitalist system through the eradication of inheritance and the implementation of progressive economic policies like QE for the people, MMT, and writing off debts must be utilised to reach and attain a sustainable basic citizens income.

Conclusions of the Study

5.1: Summary of the Argument

This thesis began as a political theory to highlight the contradictions of capitalism within the parameters of roboticization and technological automation. Technological automation is the paradoxical crisis of capitalism. Axiomatically I have argued that the labour theory of value (LTV) directly contradicts the idea that capitalism can automate and replace the value creation from human labour. It is from this premise that the tendency for the rate of profit to fall (TRPF) ensues as capitalists are driven by the coercive laws of competition to out compete each other lowering profits to such an extent that it causes the ultimate crisis of capitalism.

Predicated on the impact of future full automation on LTV and the resulting TRPF in capitalist economies this thesis sought to answer whether the fundamental economic behaviours of our advanced socio-economic system should be replaced from both economic and moral standpoints. This is contextualised against the backdrop of an ecological crisis, low growth, high debt, unemployment, stagnant wage growth, persistent crises, and vast wealth inequality across our economic system. If the need for profit and the power of the ruling class were taken away, capitalism would cease to exist.

This work understands that there is the need for a contingency plan following the downfall of the capitalist economic system. Moving out of capitalism will eventually happen and government(s) and nation-states will inevitably do this over time. The Covid-19 Coronavirus pandemic exposed fundamental flaws in advanced capitalist economies. This is not down to pandemics, inflation, crises, or mismanagement, but an economic system riddled with debt-soaked capital wherein financialisaton and fictitious capital has been relied upon as an integral part of keeping the system afloat. What this thesis has argued is that we can create a new economic and financial model that is stable and sustainable, inclusive, cooperative, secure, fair, and progressive. This can most easily be done through representative government(s) and the state utilising sustainable growth by redistributing what we

already have in a sustainable circular economic way as opposed to a concentration of wealth in a small segment of society.

It is based on this premise that this thesis sought the normative methodological approach to understand whether the state must evolve to further protect, provide for, and invest in its citizenry with the long-term aim to attain a sustainable post-scarcity utopia. The government would have the duopoly of democratically acting for both the citizenry and the representative of the state to protect, provide for, and invest in their citizenry to attain sustainability in the long-term future for the state's existence and its citizenry to attain the good life. Citizens who agree membership of said state would consent to its authority through an expressed social contract. I investigate in this work if this can guarantee the principle of a basic citizens income ensuring protection, provision, and investment from an ethically responsible state. Outside of capitalism we would still have hospitals to provide healthcare, schools to educate, farms to feed everyone, land to provide housing for all, technology, and machines to provide sustainable development, and citizens to fill any of the gaps.

How this can be achieved, is approached through the lens of the citizen-state nexus wherein it is understood the state has the hegemonic power to change its society and the economic system it employs. The defining feature of the state is sovereignty, its absolute and unrestricted power. The state commands supreme power in that it stands above all other associations and groups in society, its laws demand the compliance of all those who live within the given territory of a state.

The role of the evolutionary state sought to understand whether an expressed social contract could be offered by the state and what the aspects would be for a reasonable citizen to accept, sign, and desire to be a dutiful contributing member to their state and wider society. The contemporary theories of political obligation for citizens and state highlighted the variety of formats as to why and how political obligation takes place. Natural duty, consent, gratitude, fair play, and membership/association were considered before concluding that a hybrid of the above positions is necessary if the citizenry of an ethically responsible state is to agree to any expressed social contract. The aim of the social contract theory is to show that members of society have reason to endorse and comply with the

fundamental social rules, laws, institutions, and/or principles of the state(s). This too was the legitimacy of the state as an institutional authority that had to regularly consult with its citizenry.

This led to the argument that an expressed social contract would ensure all members of the state become stakeholders in their state, society, and community. An acceptable version for the vast majority of citizens legitimises the potential for a utopian ethically responsible state or neocommunist state as most citizens would not sign up to be worse off. Any agreement with an ethically responsible state would require the state to provide protection and investment in its citizenry. The most succinct and effective way it could do this is by providing some variant of universal basic income (UBI), universal basic services (UBS), and sovereign wealth fund (SWF) to protect citizens financially, provide UBS and primary goods for all citizens allowing for decent living standards (DLS), and finally investment in citizens and future generations to pursue the good life to obtain the essential requirements of physical and social wellbeing.

The reformation and evolution of the ethically responsible state takes the lead role in organising a new social contract and, as a result, a far more democratic and legitimate polity than the one that currently exists in the UK. The existing research on this topic primarily envisions a major role for social democracy and/or new social movements in this regard. The normative approach taken in this research to enhanced democratic legitimacy is original when linked to the debates on UBI improving on them by elaborating a new evolutionary role for the state.

One of the main aims of this research was to investigate whether a basic citizens income could guarantee protection, provision, and investment from an ethically responsible state. There are long-standing debates around the normative merits and economic effects of a Universal Basic Income (UBI), wherein the existing literature has not sufficiently addressed or tied together the factors of twenty-first century capitalism with the necessary evolution of the British state, future technological advancements in automation, the welfare state, and the necessary policies to accompany any format of basic income. The linkage between the democratic legitimacy of an expressed social contract brought about by an ethically responsible

state and a citizen's basic income brings originality to the research contribution and a relevant addition to the UBI literature outlining and identifying the novel position achieved in this body of work.

The argument for UBI considered the implications on work, the welfare state, and the state finding that a universally applicable basic income to all members of the state could provide a buffer between the transition from modern advanced capitalism and full automation to a post-scarcity economy orchestrated by an ethically responsible state. It was concluded in chapter 4 that the affordability argument of basic income is not a fact to agree or disagree with but a political choice. However, it is necessary to provide a sustainable economic plan to finance any format of basic income. From the axiom that an unaffordable UBI would be inadequate, and an adequate UBI would be unaffordable confirmed that a UBI is not feasible in its purest form.

The most suitable format of basic income to meet the equality and freedom principles while also being affordable and applicable within a capitalist setting is the citizens basic income. The basic citizens income would be delivered regularly, through direct debit to the citizens given bank account, paid without the imposition of behavioural conditions, and universally applicable to all residing citizens who fell below an independently verified level. In doing so it allows for decent living standards (DLS) and essential requirements for wellbeing to be met.

The thesis ends providing a range of proposals to contribute towards the financing of a basic citizens income to guarantee protection, provision, and investment from the state long-term. The roadmap of policies and amendments to capitalism such as effective tax collection, the digitisation of finance, the alleviation of exploitative labour, and economic amendments to the capitalist system through the eradication of inheritance and the implementation of progressive economic policies like QE for the people, MMT, and writing off debts must be utilised to reach and attain a sustainable basic citizens income. Technological automation has the potential to allow us as citizens to create a utopian state. An ethically responsible state can bring about a post-scarcity economy and ease out capitalism to realise that this political theory is attainable, retainable, and sustainable. This work from the outset unapologetically sought a modern-day utopia that provides citizens within their given state a sustainable post-scarcity economy wherein citizens have access to the highest available basic material requirements, primary goods, and decent living standards (DLS) for the essential requirements of physical and social wellbeing. The minimum requirements for an early utopiandirected ethically responsible state. A basic citizens income is the first step to move out of the epoch of capitalism and into a post-capitalist world.

5.2: Possibilities for Future Research

Having described my findings, contribution to the literature, and summary of the arguments made, I consider that the possibilities for future research can be taken in several directions. Further research on the policy proposals presented in this thesis can be developed in a variety of ways. From a post-capitalist framework blueprint to the development of a legally binding flexible social contract, as well as institutional regulation on the global stage. There are varying directions for future research that based on the findings can be focused but are not limited to the following areas:

1. Post-capitalism: Further research as to how to untether the state from the state-finance nexus and financialisaton. The economic consequences of post-capitalism should be further developed and researched including the impact of modern monetary theory linked within the ethically responsible state. Research on the implications for government(s) who seek to write off national debt when seeking to move out of a capitalist model that would also entail untethering itself from a global stock market which will likely cause knock-on effects.

2. On the ethically responsible state: To what point can the state balance the usage of automation without it negatively affecting tax or work and contribution from citizens. Any or all formats of a robot tax will be required and as clearly stated within this thesis, however the definition of a 'robot' is crucial because it will have significant impacts on how they will be taxed. Another aspect is how the state embeds a post-scarcity economy model to effectively allocate resources. New formats of regulation will have to be introduced including on RAS, basic income, and the social contract.

3. An expressed social contract: There is wide-ranging potential for future research into many aspects of an expressed contract including studies to understand from a vast swathe of citizens what they would like to have within any format of an expressed social contract. This research could be run in focus groups and interview led which could entail quantitative large-N empirical data analysis. Another aspect for further investigation comes from the state around a default contract for visitors to the state that can be applied to those who tacitly remain in the state but refuse to sign an expressed contract. The legal frameworks, guidelines, and mechanisms surrounding such a contract would also require further research and analysis.

4. A guaranteed citizens basic income: Further research on formats of a basic income to be independently verified and allocated alongside its impact in relation to the welfare state. Research must also be conducted when incorporating universal basic services (UBS) as part of any format that enables the state and its government(s) to allocate resources to areas of deprivation to tackle regional inequality. The instillation and understanding as to whether primary goods and decent living standards (DLS) are met. Another area of research linked to a citizen's basic income would include the range and impact of contribution by members of the state, as there will perhaps be demands from citizens or the state for jobs and contribution strategies for citizens who want to work and contribute within their communities. If the state needs to finance a basic income there may be points where it needs to drive and incentivise citizens to contribute more in a single year than a previous one.

5. Prospects of utopia: I do believe further research ought to be conducted on what can be a democratically acceptable version of utopia. In this research thesis I used the term neocommunism as a new form of communism arguing an acceptable version of a neocommunist state would be a stakeholder society that is democratically legitimised through an expressed social contract. It is a topic for further consideration and development. Research too, perhaps should also be conducted on the use of the term communism, including neocommunism because of the negative aspects surrounding the term. We have not seen pure or true communism and the definition of this term has been besmirched and misrepresented

by the experiments in some states. The term is the closest to utopia in description, but any format of neocommunism would for me have to incorporate big government(s), and an ethically responsible state.

6. Policy mechanisms: Further research into the policy mechanisms highlighted in this work should be conducted to explore the impact of both domestic and international policy for government(s). International regulation on the implications for tax policies including evasion, avoidance, and unitary taxes to evaluate the impact through its regulatory frameworks on different taxation policies and how a global approach can be achieved. The policy transfer mechanisms to ensure countries implement the recommendations that international regulators and agencies develop can be problematic for the state and further research will be beneficial on this subject. This research problem is intimately linked to the governance mechanisms that each state possesses, which I highlighted in the third and fourth chapter. Further research can and ought to be conducted on the social policies I highlighted on inheritance, the removal of trusts, one house per person policy, and removal of profit-seeking landlords.

Due to the wide-ranging nature of this thesis, there have been limitations on what can be covered to the necessary level within the research. It is partly because of this reason that I believe there are several avenues that future research can be conducted based off the ideas, proposals, and findings within this body of work.

Appendix

Glossary

Advanced Capitalism – Advanced capitalism pertains in a society in which the capitalist model (see Capitalism) has been integrated and developed deeply, extensively, and for a prolonged period. Advanced capitalism distinguishes such societies from previous historical forms of capitalism, such as mercantilism (see Mercantilism) and industrial capitalism, and partially overlaps with the concepts of a developed country of the post-industrial age and of finance capitalism. In this work I use Jürgen Habermas's four features to characterise advanced capitalism: 1) concentration of industrial activity in a few large firms, 2) the constant reliance on the state (see the State) to stabilise the economic system, 3) a formally democratic government that legitimises the activities of the state and dissipates opposition to the system, 4) the use of nominal wage increases to pacify the most restless segments of the work force.

Agriculture – The cultivation of crops and the tending of animals for the purpose of supplying food. Agriculture encompasses crop and livestock production, aquaculture, fisheries and forestry for food and non-food products. It was the key development in the rise of sedentary human civilization whereby farming of domesticated species created food surpluses that enabled people to live in cities. For millennia, this was mankind's primary economic activity.

Agritech (Agri-tech) – Is the application of technology to produce more with less, to make the farming process more efficient, from field monitoring to the food supply chain itself.

Anthropocene – A proposed geological age, or more technically, epoch, viewed as the period during which human activity has been the dominant influence on climate and the environment. There is ongoing debate as to when the Anthropocene would begin, but many suggest the 1950s since it would coincide with the presence in future rocks of an abundance of plastics and radioactive isotopes from nuclear weapons testing.

Artificial General Intelligence (AGI) – Is the type of artificial intelligence (AI) (see Artificial Intelligence) that matches or surpasses human capabilities across a wide range of cognitive tasks. AGI is also known as strong AI, full AI, human-level AI, or general intelligence action. Strong AI is often reserved for computer programs that experience sentience or consciousness. This sentience, consciousness, or superintelligence gives potential for singularity (see Singularity). Creating AGI is a primary goal of AI research and of companies such as OpenAI, Anthropic, and DeepMind.

Artificial Intelligence (AI) – Is the branch of computer science developing machines to have the problem-solving and decision-making capabilities to complete tasks that would otherwise require human intelligence. AI is a sub-category of automation (see Automation). AI algorithms can tackle learning, perception, problem-solving, language-understanding and/or logical reasoning. AI often, but not always, involves some level of machine learning (ML) (see Machine Learning), where an algorithm is trained to respond to a particular input in a certain way by using inputs and outputs. The key aspect that differentiates AI from more conventional programming is the word, 'intelligence', that means the software learns and self-improves. Many robots and autonomous systems (see Robots and Autonomous Systems) have non-AI programs and simply carry out a defined sequence of instructions. AI programs can and will mimic some level of human intelligence. AI and robotics (RAS) are not synonymous and are in fact two separate fields but do share a space together when discussing the development of artificially intelligent robots.

Austerity – Is a term used to describe efforts to reduce the share of public spending in GDP, particularly in the 2010s. When the economy is already weak, Keynesian economists view austerity programmes as a mistake, because they reduce demand. There are three primary types of austerity measures: higher taxes to fund spending, raising taxes while cutting spending, and lower taxes and lower government spending.

Autarky – Simply translated to self-sufficiency. Authoritarian regimes sometimes pursue a policy of autarky in order to reduce their dependence on other countries.

Automation – Describes a wide range of varying technologies that reduces human intervention in processes. Automation has provided many benefits in the workplace like reducing waste, savings in electricity and material costs, and improvements to quality, accuracy, and precision. Automation in this work refers to the use of artificial intelligence (AI), robots, machines, computers, or other technology instead of humans to do a job or a task.

Authoritarian Capitalism – Is an economic system in which a capitalist market economy exists alongside an authoritarian government. Related to and overlapping with state capitalism, a system in which the state undertakes commercial activity, authoritarian capitalism combines private property and the functioning of market forces with repression of dissent, restrictions on freedom of speech and either a lack of elections or an electoral system with a single dominant political party.

Bank of England (BoE) – The central bank (see Central Bank) of the United Kingdom and the model on which most modern central banks have been based. The Bank of England was privately owned by stockholders from its foundation in 1694 until it was nationalised in 1946.

Bank Run – A bank run or run on the bank occurs when many clients withdraw their money from a bank, because they believe the bank may fail in the near future. In other words, it is when, in a fractional-reserve banking system (where banks normally only keep a small proportion of their assets as cash), numerous customers withdraw cash from deposit accounts with a financial institution at the same time because they believe that the financial institution is, or might become, insolvent.

Basic Income (BI) – Basic income (also known as Citizens Income) in this work is a distributed regular income that meets citizens' basic needs. A basic income must meet Rawls's 'Social Primary Goods' (see Primary Goods) to attain financial selfrespect and an income that a state can sustainably provide to offer basic security (see basic security). The format of basic income I call for in this work is one in which a basic income replaces the full system of welfare in the United Kingdom made easier by the implementation of Universal Credit (see Universal Credit) that initially meets an equilibrium, so all citizens are upheld to a decent standard of living

reflective of the economic success of the nation-state. The basic income figure that would be applicable to all UK citizens would be independently calculated and formulated to be sustainable (see Sustainability). The basic income I seek to introduce is not universal in the way a proper universal basic income (see Universal Basic Income) would be, due to the moral and economic arguments made in this work. However, all citizens regardless of income must have provision from the state in the form of universal basic services (see Universal Basic Services) after time.

Basic Security – The concept developed by Guy Standing that provides an equal society in which basic income security should be a *right*. The concept of basic security is what leads Standing to consider the claims for equal security where everybody needs a sense of basic security to "function rationally, in order to be responsible, and in order to develop competencies and capabilities" (Standing, 2005, p91). Without this basic security it is unfair to expect too much from anybody. It is for this reason and based on this premise that Basic security is "the essence of real freedom" as well as an "economic and social right" (Standing, 2005, p91).

Behavioural Economics – Studies the effects of psychological, cognitive, emotional, cultural and social factors on the decisions of individuals or institutions, such as how those decisions vary from those implied by classical economic theory. Behavioural models typically integrate insights from psychology, neuroscience and microeconomic theory. The study of behavioural economics includes how market decisions are made and the mechanisms that drive public opinion.

Big Data – A field that treats ways to analyse, systematically extract information from, or otherwise deal with data (see Data) sets that are too large or complex to be dealt with by traditional data-processing application software. Big data includes capturing data, data analysis, data storage, search, sharing, transfer, visualisation, querying, updating, information privacy, and data source. Big data was originally associated with three key concepts: volume, variety, and velocity. Current usage of the term 'big data' tends to refer to the use of predictive analytics, user behaviour analytics, or other advanced data analytics methods that extract value from big data, and seldom to a particular size of data set. **Biodiversity (biological diversity)** – A term that attempts to sum up the variety of life in the world. It is a function of the number of species, all the different kinds of animals, plants, fungi, micro-organisms like bacteria, and the number, or abundance, that exists of each of those species. The greater the biodiversity, the more the biosphere can deal with change, maintain balance, and support life.

Blockchain – A digital ledger that can record transactions between parties in a reliable way, stored on several computers across a peer-to-peer network, both making it efficient and reducing the potential for error and corruption. It was initially developed to enable cryptocurrencies, like Bitcoin, to operate efficiently. But the same technology can be used to trace supply chains, and hence can verify whether a product has come from a reliable or sustainable source.

Boom – A state of rapid economic expansion, as opposed to bust (see Bust).

Brexit – A portmanteau term of 'British Exit' to describe the withdrawal of the United Kingdom (UK) from the European Union (EU) and the European Atomic Energy Community (EAEC or Euratom) following a UK-wide referendum held in June 2016. The UK is the first and only country to have left the EU after 47 years of being a member state and its predecessor the European Communities.

Bubble – The concept that asset prices can rise far higher than can be justified by their fundamentals, such as the expected cashflows that will derive from them.

Business Cycle – The term to describe the way that economies tend to expand and contract over time. The business cycle is linked to boom and bust (see Boom and Bust).

Bust – A sudden economic contraction, also known as a recession (see Recession).

Capital – In economics, capital goods or capital are durable produced goods that are in turn used as productive inputs for further production of goods and services. Capital can be increased by the use of the factors of production, which however excludes certain durable goods like homes and personal automobiles that are not used in the production of saleable goods and services.

Capitalism – An economic and political system in which a country's trade and industry are controlled by private ownership of the means of production (see means of production) for profit (see profit), rather than by the state. The central characteristics of capitalism include capital accumulation (see capital accumulation), competitive markets (see free market), a price system, private property and the recognition of property rights, voluntary exchange, and wage labour (see Wage Labour). Capitalism takes a variety of forms and regularly changes to circumvent its barriers.

Capital Accumulation – Capital accumulation, often referred to as the accumulation of capital, is the dynamic that motivates the pursuit of profit, involving the investment of money or any financial asset with the goal of increasing the initial monetary value of said asset as a financial return whether in the form of profit, rent, interest, royalties, or capital gains. The aim of capital accumulation is to find new ways to accumulate more capital. The process of capital accumulation forms the basis of capitalism and is one of the defining characteristics of a capitalist economic system. For the historical accumulation of capital (see Primitive Accumulation of Capital).

Capital Flight – In economics, capital flight occurs when assets or money rapidly flow out of a country, due to an event of economic consequence or as the result of a political event such as regime change or economic globalisation.

Carbon Tax – A tax levied on the burning of carbon-based fuels (coal, oil, and gas) to have polluters pay for the climate damage caused by the greenhouse gas emissions from their activities. The aim of the tax is to penalise heavy emitters and encourage alternative approaches that do not contribute to global warming.

Cartel – Is a group of independent market participants who collude with each other in order to fix the price, or restrict the supply, of a good or service to improve their profits and dominate the market. A cartel is an organisation formed by producers to limit competition and increase prices by creating artificial shortages through low production quotas, stockpiling, and marketing quotas. **Central Bank** – An institution that manages the currency and monetary policy of a state or formal monetary union and oversees their commercial banking system. In contrast to a commercial bank, a central bank (reserve bank or monetary authority) possesses a monopoly increasing the monetary base. Most central banks have supervisory and regulatory powers to ensure the stability of member institutions, to prevent bank runs, and to discourage reckless or fraudulent behaviour by member banks.

Central Bank Digital Currency (CBDC) – A CBDC has been used to refer to various proposals involving digital currency issued by a central bank. Whilst a CBDC is not well defined it is envisioned to be a new form of central bank money that is different from balances in traditional reserve or settlement accounts. Central bank digital currencies are also known as digital fiat currencies or digital base money.

Circular Economy (Cyclical Economy) – An economic system that aims to eliminate waste and the continual use of resources. Circular economies employ sharing, reuse, repair, refurbishment, remanufacturing, and recycling to create a close-loop system. All waste becomes food for the next process; hence, it contrasts with the traditional capitalist linear economy, which has a take-make-use-discard model of production.

Citizenship – The citizen and citizenship are the status of a person recognised under the law of a country of belonging to thereof. International law recognises citizenship as having membership to a sovereign state (country). Each state is free to determine the conditions under which it will recognise persons as its citizens, and the conditions under which that status can be withdrawn. In this thesis, citizenship can be understood as a political status, one's sense of belonging to a community, and set of social practices that define the relationship between the individual and the state. It is citizenship that provides the framework of the kind of society one aspires to live and what constitutes as the 'good life' and how the relationship between the individual and the state facilitates that.

Citizen-State Nexus – Is the overarching link between the State and the Citizen. The citizen-state nexus in this work is met through an expressed legally binding social contract between the citizen of a state. The contract guarantees this binding nexus which is facilitated through government(s) as the actor and facilitator between the state and the citizenry.

Climate Change – Includes both global warming driven by human-induced emissions of greenhouse gases and the resulting large-scale shifts in weather patterns. Since the mid-20th century humans have had an unprecedented impact on Earth's climate system and caused change on a global scale. The largest driver is the emission of greenhouse gases and fossil fuel burning (coal, oil, and natural gas) for energy consumption as the main source of emissions, with additional contributions from agriculture, deforestation, and manufacturing.

Cloud Robotics – Was coined by James Kuffner in 2010 as a general term encompassing the concepts of information sharing, distributed intelligence, and fleet learning that is possible via networked robots and modern cloud computing.

In the field of robotics, it invokes cloud technologies such as cloud computing, cloud storage (see Cloud Storage), and other internet technologies that are centred on the benefits of converged infrastructure and shared services for robotics. When connected to the Cloud, robots can benefit from the computation, storage, and communication resources of modern data centre in the cloud, which can process and share information from individual and various robots or agent (other machines, smart objects, humans etc).

Cloud Storage – Is a model of computer data (see Data) storage in which data, said to be on 'the cloud', is stored remotely in logical pools and is accessible to users over a network, typically the Internet. The physical storage spans multiple servers (sometimes in multiple locations), and the physical environment is typically owned and managed by a cloud computing provider. These cloud storage providers are responsible for keeping the data available and accessible, and the physical environment secured, protected, and running. People and organisations buy or lease storage capacity from the providers to store user, organisation, or application data.

Collateralised Debt Obligation (CDO) – A debt security collateralised by a variety of debt obligations including bonds and loans of different maturities and credit quality.

Commodity – In economics, a commodity is an economic good, usually a resource, that has full or substantial fungibility: that is, the market treats instances of the good as equivalent or nearly so with no regard to who produced them. Marx understands commodity to have a value, a use value (see Use Value), exchange value (see Exchange Value), and a price (see Price).

Communism – Is a socio-political, economic, and philosophical ideology with the goal of establishing a communist society ordered around the common ownership of the means of production, distribution, exchange, and allocation of resources and products to everyone in society. Communism also involves the absence of social classes, money, and the state. Karl Marx used the term communism and socialism interchangeably. Neither Marx nor Marxism lays out a blueprint of a communist society per se rather presenting an analysis that concludes the means by which its implementation will be triggered, distinguishing its fundamental characteristics as based on the derivation of real-life conditions.

Marx identified two phases of communism that would follow his predicted overthrow of capitalism: the first would be a transitional system in which the working class would control the government and economy yet still find it necessary to pay people according to how long, hard, or well they worked, and the second would be fully realised communism—a society without class divisions or government, in which the production and distribution of goods would be based upon the principle: "From each according to his ability, to each according to his needs" (Marx, 1875)

During the 20th century, communist governments espousing Marxist-Leninism and its variants came into power in parts of the world, firstly in the Soviet Union with the Russian Revolution of 1917, and then in parts of Eastern Europe, Asia, and a few other regions following World War II. These governments were characterised by one-party rule and suppression of opposition and dissent. Following the dissolution of the Soviet Union in 1991, several communist governments repudiated or

abolished communism altogether. Only a small number of communist espousing governments remain namely China, Laos, Vietnam, and Cuba.

None of the governments claiming to be communist obtained the goal of establishing a communist society ordered around the common ownership of the means of production, distribution, exchange, and allocation of resources and products to everyone in society. Pure or True Communism has never been established by any state or government to this date.

Competition – Is a rivalry where two or more parties strive for a common goal which cannot be shared: where one's gain is the other's loss (an example of which is a zero-sum game) (see Game Theory). Competition can arise between entities such as organisms, individuals, economic and social groups. It is a concept at the heart of economics. Firms compete to sell the best goods and services to consumers, and to attract the best workers. The aim is to allocate resources in the most efficient manner.

Compound Interest – The addition of interest (see Interest) to the principal sum of a loan or deposit. Compound interest in other words is interest on interest. It is the result of reinvesting interest, rather than paying it out, so that interest in the next period is then earned on the principal sum plus previously accumulated interest.

Conglomerate – A large company that has diversified across a range of countries and business areas, normally through making acquisitions. A conglomerate usually has a parent company that owns and controls many subsidiaries, which are legally independent but financially and strategically dependent on the parent company.

Conservancy – An area that aims to protect the natural habitat, however, in the context of this work, refers also to a protected area managed in a sustainable and economically viable manner.

Consumer Price Index (CPI) – Measures changes in the price level of a weighted average market basket or consumer goods and services purchased by households. The consumer price index is a statistical estimate constructed using the prices of a sample of representative items whose prices are collected periodically.

Consumption – Is the spending of money on goods and services by households. Consumers can either spend their income or save it. When consumers are cautious, they spend less and save more. This can have adverse economic effects as consumption is usually the largest component of aggregate demand, ahead of public spending and investment.

Contribution – Contribution, in this work, is used to describe how citizens partake in their duty to contribute towards the state and their fellow citizens. Contribution in this work must be viewed as decoupled from work and income. Unpaid work is still contribution and contribution, therefore, has value to society, communities, fellow citizens, and the state even when it is decoupled from income.

Cosmocracy – Is the concept of a single political authority for all humanity. Cosmocracy is linked in this work to World Government (see World Government).

Creative Destruction – Is a concept developed by Joseph Schumpeter, to explain economic innovation. It derives from the work of Karl Marx and popularised it as a theory of economic innovation and the business cycle. Also known as Schumpeter's gale describes that the creative-destructive forces unleashed by capitalism would eventually lead to its demise as a system. Despite this, the term subsequently gained popularity within mainstream economics as a description of processes such as downsizing in order to increase the efficiency and dynamism of a company.

Credit – Is a catch-all term for the extension of loans to individuals, companies or organisations. The term is also used more generally to refer to the total amount of debt in an economy, as in credit crunch and credit expansion. More narrowly, a credit is a sum added to a bank account, as opposed to a debit.

Credit-Default Swap - Is a credit derivative contract between two counterparties. The buyer makes periodic payments to the seller, and in return receives a payoff if an underlying financial instrument defaults, typically a bond or loan.

Crony Capitalism – Sometimes called cronyism, is an economic system in which businesses thrive not as a result of free enterprise, but rather from their connections with political leaders rather than prowess in a competitive market. This is often

achieved by the manipulation of relationships with state power by business interests rather than unfettered competition in obtaining permits, government grants, tax breaks, or other forms of state intervention over resources where business interests exercise undue influence over the state's deployment of public goods, for example, mining concessions for primary commodities or contracts for public works. Money is then made not merely by making a profit in the market, but through profiteering by rent seeking using this monopoly or oligopoly.

Cryptocurrency – Is a decentralised digital currency designed to work as a medium of exchange through a computer network that is not reliant on any central authority, such as a government or bank, to uphold or maintain it.

Culture – Culture refers to a collection of behaviours, habits, and skills that can be passed from one to another. A culture undergoes its own form of evolution and change over time. For humankind, cultural evolution is now the dominant form of evolution.

Currency – The monetary unit of a nation state, or group of states. In the modern era, most currencies are allowed to rise and fall in value against each other and are traded in the foreign exchange market.

Data – The

Decent Standard of Living or Decent Living Standards (DLS) – Are the material conditions for achieving basic human wellbeing, along with indicators and quantitative thresholds, which can be operationalised for societies based on local customs and preferences. The DLS aim is for a set of material conditions that people everywhere ought to have, no matter what their intentions or conception of a good life and is to essential human flourishing and genuine life. The DLS builds upon the standard of living (see standard of living) referring to the quantity and quality of material goods and services available to a given population associated with gross domestic product (see GDP).

In this work a decent standard of living is met when the basic security (see basic security), social primary goods (see primary goods) and essential requirements for

wellbeing (see essential requirements for wellbeing) are met. Building on the social primary goods would entail citizens having to focus on their own physical and mental wellbeing and pursuing happiness in their own lives. DLS ought to be applied fairly to varying levels of states and nations in their own evolutionary development. A DLS as defined in this work can be achieved by advanced and developed countries.

Deflation – Is a decrease in the general price level of goods and services. Deflation occurs when the inflation rate falls below 0% (a negative inflation rate). Deflation tends to be a problem in the modern era since it tends to be associated with falling nominal incomes. Since debt repayments are fixed in nominal terms, deflation often leads to a crisis as debtors struggle to repay their loans.

Democracy – The form of government in which the people have the authority to deliberate and decide legislation (direct democracy), or to choose governing officials to do so (representative democracy). The notion of democracy has evolved over time. The most common form of democracy today is representative democracy (see representative democracy), as in the United Kingdom, where the eligible voters elect government officials to govern on their behalf such as in a parliamentary or presidential democracy.

Demographic Transition – A phenomenon occurring in nations in which there is a shift over time from high birth rates and high infant death rates in societies with minimal technology, education, and economic development, to low birth and death rates in societies with advanced technology, education, and economic development.

Depression – A prolonged and sharp fall in economic output, associated with a high level of unemployment (see Great Depression).

Deregulation – Is the process of removing or reducing state regulations, typically in the economic sphere. It is the repeal of governmental regulation of the economy. It became common in advanced industrial economies in the 1970s and 1980s, as a result of new trends in economic thinking about the inefficiencies of government regulation, and the risk that regulatory agencies would be controlled by the regulated industry to its benefit, and thereby hurt consumers and the wider economy.

Developed Countries – A term used for nations who industrialised early and where incomes per person are high, relative to the global average.

Digital Economy – Refers to an economy that is based on digital computing technologies, although we increasingly perceive this as conducting business through markets based on the internet and the World Wide Web. The digital economy is also referred to as the internet economy, new economy, or web economy. The digital economy is intertwined with the traditional economy, making a clear delineation harder. The digital economy results from billions of everyday online connections among people, businesses, devices, data, and processes. It is based on the interconnectedness of people, machines, and organisations that results from the Internet, mobile technology, and the internet of things (IoT) (see internet of things).

Division of Labour – Is the separation of the tasks in any economic system or organisation so that participants may specialise (specialisation). Individuals, organizations, and nations are endowed with or acquire specialized capabilities, and either form combinations or trade to take advantage of the capabilities of others in addition to their own.

Dystopia – A dystopia is a community or society that is the antonym of a utopia (see utopia) that is undesirable or frightening. Dystopias are often characterised by dehumanisation, tyrannical governments, or environmental disaster or other characteristics associated with a cataclysmic decline in society.

E-Government - (short for electronic government), is the use of technological communications devices, such as computers and the internet, to provide public services to citizens and other persons in a country or region. E-governments offer new capabilities and opportunities for more direct and convenient citizen access to government, and for government provision of services directly to citizens.

Egalitarian Society – A political philosophy that builds from the concept of social equality, prioritising it for all people. The doctrine of egalitarianism is characterised by the idea that all humans are equal in fundamental worth or moral status and that all citizens of the state should be accorded exactly equal rights. The term egalitarianism has two distinct definitions in modern English, either as a political

doctrine that all people should be treated as equals and have the same political, social, economic, and civil rights, or as a social philosophy advocating the removal of economic inequalities among people, economic egalitarianism (see economic egalitarianism), or the decentralisation of power. In this work, an egalitarian society is a fundamental element towards achieving utopia (see Utopia).

Economic Egalitarianism – An economy characterised by social ownership. In this work, economic egalitarianism is a priority aim for the ethically responsible state making full use of distributive justice to equalise society for citizens financially as well as giving citizens a stake in society (see stakeholder society). The surplus product generated by industry would be accrued to the population as opposed to a class of private owners, thereby, granting each individual increased autonomy and greater equality in society and in their relationships with fellow citizens.

Economic Equilibrium – is understood in economics as a situation in which economic forces such as supply, and demand (see supply and demand) are balanced. In the absence of external influences, the (equilibrium) values of economic variables will not change. The standard text of perfect competition is reached when equilibrium occurs at the point when quantity demanded, and quantity supplied are equal. Market equilibrium is the condition where a market price is established through competition such as the amount of goods or services sought by buyers is equal to the amount of goods or services produced by sellers.

Epoch – In chronology and periodisation an epoch is an instant in time chosen as the origin of a particular calendar era. An epoch serves as a reference point from which time is measured.

Equities – Long-term capital raised from investors in the form of shares (see Shares). The shareholders are the owners of the company and share in its assets and profits; to take over a company, a rival must make an offer that satisfies its shareholders.

Equity (Economic Equality) - is the concept of fairness in economics, particularly in relation to taxation and welfare economics. It refers to a movement that strives to provide equal life chances regardless of identity, to provide all citizens with a basic

and equal minimum of income, goods, and services or to increase funds and commitment for redistribution.

Essential Requirements for Wellbeing – Are the advancements of basic needs and central capabilities of physical social wellbeing. The essential requirements for physical and social wellbeing are part of the decent living standards (see decent standard of living) applied to Household, Community, National, and natural resource requirements for DLS.

• Household:

Physical Wellbeing: Good quality nutrition (total calories, protein, and micronutrients) with access to cold storage (refrigerator), clothing (sufficient to environment, and washing machine), shelter with modern heating/cooling equipment depending on climate (sufficient floor space, and access to outside space, meeting high standards of hygiene), basic amenities (electricity, water, and sanitation) and access to leisure.

Social Wellbeing: Access to phone, computer, or television gaining access to highquality and accurate information, access to good internet connection, access to public transport or vehicle (electric or alternative sustainable solution in the longterm), freedom to gather and protest.

• Community:

Physical Wellbeing: Hospitals and health clinics, access to physicians, gyms, clean air, green spaces.

Social Wellbeing: Good schools, teachers, public transportation, libraries, parks, and green spaces.

• National:

Physical Wellbeing: Utilities networks, roads, public spaces, health care expenditure.

Social Wellbeing: Education expenditure, accurate information infrastructure, and access to national parks, green spaces, and institutional transparency.

• Natural Resources:

Physical Wellbeing: Energy (gas and electric), water, phosphorus, clean air, and access to national environmental sites and public spaces (beaches, national parks, and historical sites).

Social Wellbeing: National libraries, historical information, transparency from public institutions, animal welfare and environmental preservation.

Ethics of Responsibility – The concept from Hans Jonas's The Imperative of *Responsibility – In Search of an Ethics for the Technological Age* (1984) which argues that the golden promises of modern technology have turned into a threat, and that technology is inseparably linked with the threat. According to Jonas, the characteristics of the modern technological civilisation have changed the nature of our moral obligations. The concept of responsibility is given a new dimension by Jonas to traditional ethical theory because it is inadequate when considering future generations. Jonas does this by expressing a reformulation of Immanuel Kant's categorical imperative and to act so that the effects of your action are compatible with the permanence of genuine human life. We must, therefore, ensure that the effects of our actions do not destroy future genuine human life. To ensure genuine human life means to protect future humanity's autonomy, dignity, integrity, and vulnerability, which in turn, requires the preservation of nature so that future generations can have the best possible living conditions. Man cannot be fully human without nature; the destruction of nature is a threat to man's own 'essence'. This thesis builds on Jonas's work to propose how an ethically responsible state (see ethically responsible state) can be achieved for the citizen and the state (commonly represented by government) through the expressed binding of citizen and state.

Ethically Responsible State – The Ethically Responsible State in this work is a state (represented by the elected government of the day) which provides long-term, future-orientated, and sustainable - *Protection, Provision*, and *Investment* to its citizenry. The government of an ethically responsible state has the duopoly of acting both for the citizen and representative of the state to protect the state and invest in it to attain sustainability in the long-term for the state's survival and the citizenry to

pursue happiness and genuine human life. In this work, I am arguing from a normative ethical outlook on what the role of the state should be and the duties it should have in relation to its citizens as well as the role of the citizen considering these duties and responsibilities. In short, I argue here that the state should provide the necessities for its citizens out of a duty of responsibility to its citizenry in the form of *Protection, Provision, and Investment*.

Exchange Value – (*Tauschwert*) refers to one of the four major attributes of a commodity, i.e., an item or service produced for, and sold on the market, the other three attributes being use value (see Use Value), economic value, and price. For Marx a commodity (see Commodity) has the following:

- A value, represented by the socially necessary labour time to produce it;
- A use value;
- An exchange value, which is the proportion at which a commodity can be exchanged for other entities;
- A price (an actual selling price, or an imputed ideal price).

Federal Reserve - Board of seven members that oversee the Federal Reserve System's financial and monetary policies. Commonly referred to as 'The Fed'.

Federal Reserve System - The central bank of the United States of America (US). Sets and maintains the financial and monetary policies of the United States. America's central bank divides the country into 12 Reserve districts, each with its own regional Federal Reserve bank. These are overseen by the Federal Reserve Board, consisting of seven governors based in Washington, DC.

Feudalism – Feudalism, or the feudal society, is the epoch preceding capitalism. It is a historiographical term used to describe the combination of the legal, economic, military, religious, and cultural customs that flourished in medieval Europe between the 9th and 15th centuries. It was a way of structuring society around relationships that were derived from the holding of land in exchange for service or labour.

Marx used the term in his analysis of society's economic and political development by describing feudalism or the feudal mode of production as the order coming before capitalism, in which the power of the ruling class (aristocracy) lay in their control of arable land, leading to a class society based on the exploitation of the peasants (subjects) who farmed lands, typically under serfdom and principally by means of labour to produce money and rents. In feudalism and early capitalism, the conservation of private property, its inheritance, distribution, accumulation, and investment were of crucial significance for the continuity and reproduction of relations of production through private property.

Fiat Currency – Is a type of currency that is not backed by a commodity, such as gold or silver. It is typically designated by the issuing government to be legal tender. It is simply a medium of exchange whereby the issuer does not promise to redeem in a commodity, and is based on confidence.

Finance Capitalism – Is characterised by a predominance of the pursuit of profit from the purchase sale and sale of, or investment in currencies and financial products such as bonds, stocks, futures, and other derivatives. It also entails the lending of money at interest and is seen by Marxist as being exploitative by supplying income to non-labourers. Finance capitalism is a form of capitalism where the intermediation of saving to investment becomes a dominant function in the economy. Finance capitalism and the role of financialisation (see financialisation) has led to a preference for speculation and Casino Capitalism over investment for entrepreneurial growth in the global economy.

Financialisation – is the term used to describe the development of financial capitalism during the period from 1980 to the present, in which debt-to-equity ratios increased and financial services accounted for increasing share of national income relative to other sectors. Financialisation describes an economic process by which exchange is facilitated through the intermediation of financial instruments (see financial instruments).

Financial Instruments – Monetary contracts between parties that can be created, traded, modified, and settled. They can be cash (currency), evidence of an ownership interest in an entity or a contractual right to receive or deliver in the form

of currency (forex); debt (bonds, loans); equity (shares); or derivatives (options, forwards, futures).

Fourth Industrial Revolution (Industry 4.0) – The fourth industrial revolution is conceptualised by rapid change to technology, industries, societal patterns, and processes in the 21st century due to increasing interconnectivity and smart automation. A part of this industrial change is the joining of technologies like artificial intelligence (see artificial intelligence), gene editing, and advanced robotics that represents a social, economic, and political shift from the digital age of the late 1990s and early 2000s to an era of embedded connectivity, information transparency, technical assistance, and decentralised decisions.

Free Market – A system in which the prices of goods and services are selfregulated by buyers and sellers negotiating in an open market. In a free market, the laws and forces of supply and demand are free from any intervention by a government or other authority, and from all forms of economic privilege, monopolies, and artificial scarcities. The free market is a central characteristic of capitalism.

Free-software license – A notice that grants the recipient of a piece of software extensive rights to modify and redistribute that software. Such actions are usually prohibited by copyright law, but the rights-holder (usually the author) of a piece of software can remove these restrictions by accompanying the software with a software license which grants the recipient these rights.

Full Employment – Is a situation in which there is no cyclical or deficient-demand unemployment. Full employment does not entail the disappearance of all unemployment, as other kinds of unemployment, namely structural, misemployment, and frictional, may remain.

Game Theory – Is the study of mathematical models of strategic interactions among rational agents. It has applications in all fields of social science, economics, as well as in logic, systems science and computer science. The technique analyses how people, firms and governments behave in situations they must consider what others are likely to do and might respond to what they do. **Gig Economy** – Is a labour market made up of temporary, short-term, flexible jobs that are commonplace, where companies tend to hire independent contractors, freelancers, on-call workers, and online platform workers known as gig workers (see gig workers) instead of full-time employees. There are many similarities between gig economy work and zero-hours contracts (see Zero-hours Contract), as both treat workers as contractors with no guarantee of pay. However, the difference comes in that gig economy roles will be paid per piece, while zero-hours contracts are paid per hour, but with no set minimum. The etymology of gig has two modern, informal meanings: any paid job or role, especially for a musician or a performer and any job, especially one that is temporary.

Gig Worker - A gig worker works on a short-term, project basis, in temporary positions or on short-term contracts as an independent contractor who enters into formal agreements with on-demand companies to provide services to the company's clients. A gig worker is referred to by the company as an independent contractor rather than employee. An employee would legally require companies to provide the full suite of employee benefits (time-and-a-half for overtime, paid sick time, employer-provided health care, bargaining rights, and unemployment insurance - among others).

Gini Coefficient – In economics, the Gini coefficient (also known as the Gini index or Gini ratio) which was developed by statistician Corrando Gini is a measure of statistical dispersion intended to represent the income inequality or wealth inequality within a nation or any other group of people. The Gini coefficient is a single number aimed at measuring the degree of inequality in a distribution of income/wealth. In terms of income-ordered population percentiles, the Gini coefficient is the cumulative shortfall from equal share of the total income up to each percentile. That summed shortfall is then divided by the value it would have in the case of complete equality.

Globalisation – Is the process of interaction and integration among people, companies, and governments worldwide. The term globalization first appeared in the early 20th century describing the unprecedented international connectivity of the post-Cold War world. Economically, globalisation involves goods, services, data, technology, and the economic resources of capital. The expansion of global markets

liberalises the economic activities of the exchange of goods and funds. Removal of cross-border trade barriers has made the formation of global markets more feasible. Advances in transportation, like the steam locomotive, steamship, jet engine, and container ships, and developments in telecommunication infrastructure, like the telegraph, Internet, mobile phones, and smartphones, have been major factors in globalisation and have generated further interdependence of economic and cultural activities around the globe.

GNU General Public License (GPL) – A series of widely used free software licenses (see free-software licenses) that guarantee end users freedom to run, study, share, and modify the software. The GNU free-software, mass collaboration project's goal is to give computer users freedom and control in their use of their computers and computing devices by collaboratively developing and publishing software that gives everyone the rights to freely run the software, copy and distribute it, study it, and modify it. The GPL series are all copyleft licenses, which means that any derivative work must be distributed under the same or equivalent license terms.

Gold Standard – The international system, used in the late 19th and early 20th centuries, that linked the amount of domestic currency in circulation (and the exchange rate) to a country's gold reserves.

Government – The system or group of people governing an organised community, generally a state (see state). Government is a means by which organisational policies are enforced, as well as a mechanism for determining policy. A government is formed (in a democratic setting) following a fairly contested electoral contest. The victorious party or parties form a government or coalition and has the duty to be the representative form of the state and citizenry combined (domestically and internationally). The government in this work has the role of representing the state and citizens that elected them by ensuring that the state's role of provider, protector, and investor is made in line with what is affordable for the state of the nation.

Government(s) – In this work is used to show where a government (of the time) singularly ought to act but can be applicable to other governments with (s) of the future and towards other governments in different countries. Whilst this work is intended for a UK audience the usage of government(s) is used to show multiple and separate governments can apply policies or practices as argued for in this work.

Government Bonds - A government bond or sovereign bond is an instrument of indebtedness (a bond) issued by a national government to support government spending. Debt issued by governments is often the most important instrument in a country's financial markets because most governments can be relied upon to repay the debt. It is regarded as a risk-free asset and is a core part of the portfolios of insurance companies and pension funds. Government bonds can be denominated in a foreign currency or the government's domestic currency.

Great Depression – The era in the 1930s when economic output and volumes of international trade collapsed. The depression was a challenge to classical economics which held that market forces would eventually bring the economy back to growth and eventually led to the adoption of Keynesian economics (see Keynesian Economics) after the second world war.

Great Gatsby Curve - The great Gatsby curve charts the relationship between inequality and intergenerational social immobility in several countries around the world.

Green Growth – A path of economic growth that uses resources in a sustainable manner. It is used to provide an alternative concept to traditional economic growth, which typically does not account for environmental damage.

Gross Domestic Product (GDP) – A measure of productivity that summarises all the values of goods and services produced by a nation or sector over a given period. While it can be used as a measure of the productivity of a nation, Simon Kuznets, who developed gross domestic product, warned that it should not be used as a measure of the welfare of a nation.

Gross National Income (GNI) – Previously known as gross national product (GNP), is the total domestic and foreign output claimed by residents of a country, consisting of gross domestic product (GDP), plus factor incomes earned by foreign residents, minus income earned in the domestic economy by non-residents.

Her Majesty's Revenue and Customs (HMRC) – Her Majesty's Revenue and Customs (HMRC) is the non-ministerial department of the United Kingdom government responsible for the collection of taxes, the payment of some forms of state support, the administration of other regulatory regimes including the national minimum wage, and the issuance of national insurance numbers. In this work, HMRC would be tasked with the calculations and distribution of the basic income called for in this thesis.

Hunter-gatherer – A culture in which human society collects its food from the wild. It was the culture of all humans for 90% of our history, until farming was invented at the start of the Holocene geological epoch.

Human Capital – Is a concept used by social scientists to designate personal attributes considered useful in the production process. It encompasses employee knowledge, skills, know-how, good health, and education. Human capital has a substantial impact on individual earnings.

Human Development Index (HDI) – The HDI was created to emphasise that people and their capabilities should be the ultimate criteria for assessing the development of a country, not economic growth alone. The HDI can be used to question national policy choices, asking how two countries with the same level of gross national income (GNI) per capita can end up with different human development outcomes. The Human Development Index (HDI) is a summary measure of average achievement in key dimensions of human development: a long and healthy life, being knowledgeable and have a decent standard of living. The health dimension is assessed by life expectancy at birth, the education dimension is measured by mean of years of schooling for adults aged 25 years and more and expected years of schooling for children of school entering age. The standard of living dimension is measured by gross national income per capita. The HDI simplifies and captures only part of what human development entails. It does not reflect on inequalities, poverty, human security, empowerment, etc.

Hyperinflation – is very high and typically accelerating inflation (see inflation). Hyperinflation quickly erodes the real value of the local currency, as the prices of all goods increase. This causes people to minimise their holdings in that currency as they usually switch to more stable foreign currencies, in recent history often the US dollar (USD).

Hysteresis – A term borrowed from physics, where it refers to a lagged effect. In economics, hysteresis is the dependence of the state of a system on its history. Hysteresis is used extensively in the area of labour economics, specifically with reference to the unemployment rate. Theories based on hysteresis cause severe economic downturns (recession) and/or persistent stagnation (slow demand growth, usually after a recession) cause unemployed individuals to lose their job skills (commonly developed on the job) or to find that their skills have become obsolete, causing individuals to become demotivated, disillusioned or depressed or lose job-seeking skills.

When some negative shock reduces employment in a company or industry, fewer employed workers then remain. As usually the employed workers have the power to set wages, their reduced number incentivizes them to bargain for even higher wages when the economy again gets better instead of letting the wage be at the equilibrium wage level, where the supply and demand of workers would match. This causes hysteresis: the unemployment becomes permanently higher after negative shocks.

Imagination Age – A theoretical period beyond the Information Age (see information age) where creativity and imagination become the primary creators of economic value. The imagination age delegates knowledge work, thinking, and analysis to machines, leaving human workers with everything that cannot yet be automated: imagination, creativity, social and emotional intelligence. The concept holds that technologies like virtual reality and user created content will change the way humans interact with each other and create economic and social structures. The

Imagination Age would be a society and culture dominated by an imagination economy. The idea relies on a key Marxist concept that culture is a superstructure fully conditioned by the economic substructure.

Industrial Revolution – was the transition period of new manufacturing processes in Great Britain, continental Europe, and the United States from 1760 to 1840. This transition included going from hand production methods to machines, new chemical manufacturing, and iron production processes, the increasing use of steam and waterpower, the development of machine tools and the rise of the mechanised factory system. The Industrial Revolution marks a major turning point in history; almost every aspect of daily life was influenced in some way. The industrial revolution can be viewed as the emergence of the modern capitalist economy.

Inequality – Occurs when resources in a given society are distributed unevenly, typically through norms of allocation, that engender specific patterns along lines of socially defined categories of persons. Economic inequality is usually described on the basis of the unequal distribution of income or wealth and is always prominent under capitalist settings.

Inflation – A general rise in the price level in an economy over a period of time. The common measure of inflation is the inflation rate, the annualised percentage change in a general price index, usually the consumer price index (see consumer price index), over time.

Information Age – (Also known as the Digital Age, Computer Age, and New Media Age) is a historical period that began in the mid-20th century, characterised by a rapid epochal shift from traditional industry established by the industrial revolution to an economy primarily based up information technology. The Information Age was formed by capitalising on computer microminiaturisation advances, which led to modernised information and communication upon broader usage becoming the driving force of social evolution. The Information Age precedes the imagination age (see Imagination Age).

Inheritance – In this work, inheritance is viewed as an inherent problem in societies that is a blatant attack on the equality of opportunity and whilst it operates

within the capitalist system, it is not a trait of the capitalist economic model. Inheritance is a breach of the capitalist mantra of competition and open opportunity in the marketplace.

Inheritance Tax – An inheritance tax is a transfer tax paid by an individual who inherits money or property from a person who has died, whereas an estate tax is a levy (see Levy) on the estate (money and property) of a person who has died. International tax law distinguishes between an estate tax and an inheritance tax as an estate tax is assessed on the assets of the deceased whilst an inheritance tax is assessed on the legacies received by the estate's beneficiaries. This distinction is not always observed as the United Kingdom's inheritance tax is a tax on the assets of the deceased and is therefore an estate tax.

Intellectual Property – An asset created solely by human intelligence and creativity. Examples include copyrights, patents and trademarks.

Interest – Interest is the monetary charge for the privilege of borrowing money, typically expressed as an annual percentage rate (APR). Interest is the amount of money a lender or financial institution receives for lending out money. Interest, put simply, is the money paid regularly at a particular rate for the use of money lent, or for delaying the repayment of a debt.

International Monetary Fund (IMF) - An international financial institution based in Washington D.C. consisting of 190 countries working to foster global monetary cooperation, secure financial stability, facilitate international trade, promote high employment and sustainable economic growth, and reduce poverty around the world while periodically depending on the World Bank for its resources.

Internet of Things (IoT) – Describes the network of physical objects also known as 'things' that are embedded with software, sensors, and other technologies for the purpose of connecting and exchanging data with other devices and systems over the Internet. The evolution of technologies and the convergence of multiple technologies through real-time analytics, machine learning, ubiquitous computing, commodity sensors, and embedded systems that collectively enable the Internet of things. **Investment** – In this work refers directly to the State and its representative government(s) to invest in its citizens. An ethically responsible state would invest in its citizens through SWF's, UBS's, basic income, and enabling a stakeholder society as a minimum within a social contract that guarantees state investment for citizens.

Invisible Hand – Is a metaphor used by Adam Smith to describe how an individual may be "led by an invisible hand to promote an end which was no part of his intention" (Smith, 1776, p349). This has been interpreted in the modern era to suggest that individuals who act in their own self-interest may end up promoting the good of society as a whole.

Keynesian Economics – Derives from Economist, John Maynard Keynes. Under classical economics, governments did little to manage the economic cycle, which they believed would right itself. But Keynes argued, in the face of the Great Depression, that a recession could dent the animal spirits of businesspeople and discourage consumers from spending. Governments, rather than balance their budgets, could borrow to spend money and this spending would revive demand. Following the Second World War, many governments adopted a Keynesian approach and used fiscal policy to manage the economic cycle.

Kleptocracy – Describes a government whose corrupt leaders (kleptocrats) use political power to appropriate the wealth of the people and land they govern, often by embezzling or misappropriating funds at the expense of the wider population. Thievocracy means literally the rule by thievery and is a term used synonymously to kleptocracy.

Labour – Intentional activity people perform to support themselves, others, or the needs and wants of the wider community. Labour and wage labour (see wage labour) includes all physical and mental resources, including entrepreneurial capacity and management skills, which are needed to produce products and services. Production is the act of making goods and services by applying labour power. Labour in this work is used synonymously with the term work.

Labour Theory of Value (LTV) – LTV is mentioned by Adam Smith, David Ricardo, and Karl Marx wherein the value of a good depends on the labour put into it. The

LTV is a major pillar within Marxian economics as the value of a commodity can be objectively measured by the average number of socially necessary labour hours required to produce the commodity. The LTV is crucial to this thesis in relation to capitalism as the coercive laws of competition force business, capitalists, and states to replace human capital with automation and thereby create the paradox of capitalisms inevitable demise.

Lag phase – An initial phase on a growth curve in which there is little net growth due to some restricting factor or factors.

Laissez-Faire Capitalism – An economic theory that opposes government intervention in business affairs. The driving principle of *laissez-faire*, a French term that translates to 'leave alone', is that the less the government is involved in the economy, the better off business will be, and by extension, society as a whole. Laissez-faire economics is a key part of free-market (see free market) capitalism.

Late Capitalism – Late capitalism (or late-stage capitalism) refers to the historical epoch since 1940, including the post-World War II economic expansion called the golden age of capitalism. The term late capitalism was first used by German economist Werner Sombart referring to the perceived absurdities, contradictions, crises, injustices, and inequality created by modern business development.

Lender of Last Resort – A role played by central banks during financial crises. There can be moments when depositors and creditors lose faith in the banking system, with the risk that the banks will collapse. By acting as lender of last resort to banks that would be solvent in the medium term, a central bank can reduce the economic damage.

Levy – Is an amount of money, such as tax (see Tax), that has to be paid to a government or organisation.

Liberalism – A political and moral philosophy based on liberty, consent of the governed, and equality before the law. Liberalism is famously difficult to define as liberalism can mean different things to different political groupings. Liberals espouse a wide array of views depending on their understanding of liberal principles, but they

generally support individual rights (including civil rights and human rights), democracy (see democracy), secularism, freedom of speech, freedom of the press, freedom of religion, private property (see private property), and a market economy (see market economy). The new form of liberalism espoused in Neoliberalism (see neoliberalism) focuses on the economic and freedom aspects of liberalism such as private property and the free market (see free market).

Liquidity Trap – is a situation, described in Keynesian economics, whereby after the rate of interest has fallen to a certain level, liquidity preference may become virtually absolute in the sense that almost everyone prefers holding cash. This is caused when people hoard cash because they expect an adverse event such as deflation, insufficient aggregate demand, or war.

Log phase – A phase on a growth curve characterised by logarithmic or exponential growth.

The London Interbank Offered Rate (**LIBOR**) - LIBOR is a daily reference rate based on the interest rates at which banks borrow unsecured funds from other banks in the London wholesale money market (or interbank market).

Machine Learning (ML) – Machine learning (ML) is the study of computer algorithms that improve automatically through experience and using data. Machine learning is seen as a part of artificial intelligence (see artificial intelligence) as machine learning algorithms build a model based on sample data, known as data training, to make predictions or decisions without being explicitly programmed to do so.

Macroeconomics – The branch of economics dealing with the performance, structure, behaviour, and decision-making of an economy as a whole. Macroeconomics considers interest rates, taxes, and government spending to regulate an economy's economic growth and stability. This includes regional, national, and global economies. **Marginal Cost** – The cost of producing an extra unit of something. When production is increased, the marginal cost of producing an extra item can be significantly lower than the average cost of production.

Market Economy – An economic system in which the decisions regarding investment, production, and distribution are guided by the price signals created by the forces of supply and demand (see supply and demand). The major characteristic of a market economy is the existence of factor markets that play a dominant role in the allocation of capital and the factors of production.

Market Failure – In neoclassical economics, market failure is a situation in which the allocation of goods and services by a free market is not Pareto efficient (see Pareto efficiency), often leading to a net loss of economic value. Market failures can be viewed as scenarios where individuals' pursuit of pure self-interest leads to results that are not efficient or fails to account for real-world costs. Market failures can occur if an industry is dominated by a monopoly or monopsony, or in the presence of asymmetric information.

Mass Production – Also known as flow production or continuous production, is the production of substantial amounts of standardised products in a constant flow, including and especially on assembly lines. Mass production was one of the breakthroughs in 20th-century manufacturing and is often associated with the Ford Motor Company. Together with job production and batch production, it is one of the three main production methods.

Means of Production – The means of production (also known as capital goods or productive property) are physical and non-physical inputs used in the production of goods and services with economic value. These include raw materials, facilities, machinery, and the tools used in the production of goods and services.

Mercantilism – An economic policy designed to maximise the exports and minimise the imports for an economy. Mercantilism promotes imperialism, tariffs, and subsidies on traded goods to achieve said goal. Mercantilism was dominant in modernised parts of Europe, and some areas in Africa from the 16th to 19th centuries, a period of proto-industrialisation. It promotes government regulation of a nation's economy for the purpose of augmenting state power at the expense of rival national powers.

Means-tested and non-means-tested benefits - Means-tested allocations (such as unemployment aid, disability benefits, rent rebates, and food stamps) describe transfers to individuals and families below a certain income and wealth level. Need must be proven by those receiving them. Non-means-tested transfers do not require proof from the claimant; they often include cost-free social services provided by public authorities.

Metadata – Metadata or metainformation is data that provides information about other data, but not the content of the data itself. There are many distinct types of metadata including;

- Administrative metadata is the information to help manage a resource, like resource type, permissions, and when and how it was created.
- Descriptive metadata includes the descriptive information about a resource. It is used for discovery and identification. It includes elements such as title, abstract, author, and keywords.
- Legal metadata provides information about the creator, copyright holder, and public licensing, if provided.
- Reference metadata is the information about the contents and quality of statistical data.
- Statistical metadata, which is also called process data, may describe processes that collect, process, or produce statistical data.
- Structural metadata is metadata about containers of data and indicates how compound objects are put together, for example, how pages are ordered to form chapters. It describes the types, versions, relationships, and other characteristics of digital materials.

Metadata is not strictly bound to one of these categories, as it can describe a piece of data in many other ways.

Microeconomics – The branch of economics that studies the behaviour of individuals and firms in making decisions regarding the allocation of scarce resources

and the interactions among these individuals and firms. Microeconomics shows conditions under which free markets lead to desirable allocations. It analyses market failure, where markets fail to produce efficient results.

Minimum Wage – Is the lowest remuneration that employers can legally pay their employees—the price floor below which employees may not sell their labour. As a result, minimum wages increase the cost of labour, companies often try to avoid minimum wage laws by using gig workers, by moving labour to locations with lower or non-existent minimum wages, or by automating job functions.

Minsky Moment – A Minsky moment is a sudden, major collapse of asset values which marks the end of the growth phase of a cycle in credit markets or business activity. Named after Hyman Minsky who developed a financial instability hypothesis. According to the hypothesis, the rapid instability occurs because long periods of steady prosperity and investment gains encourage a diminished perception of overall market risk, which promotes the leveraged risk of investing borrowed money instead of cash. By the end, they will be buying regardless of underlying valuations. At some point, confidence will falter and investors will rush to sell and repay their debts, causing prices to collapse.

Misemployment – Wrong or unsuitable employment of people. Misemployment is employed labour who receive a wage but make no contribution to human welfare, the common good, or flourishing. Misemployment also understands that much of workers skills are not truly realised or utilised in the capitalist system of employment.

Mixed Economy – A mixed economy is a largely market-based capitalist economy consisting of both private and public ownership of the means of production and economic interventionism through macroeconomic policies intended to correct market failures, reduce employment, and keep inflation low. The degree of intervention in markets differs among countries and governments as most modern capitalist economies are defined as mixed economies to some degree.

Modern Monetary Theory (MMT) – Is a heterodox macroeconomic theory that describes currency as a public monopoly and unemployment as evidence that a

currency monopolist is overly restricting the supply of financial assets needed to pay taxes and satisfy savings desires. MMT states a sovereign nation with its own fiat currency, with public debt denominated in its own currency and a floating exchange rate cannot go broke. The only limit on public spending is inflation, and this is not a binding constraint. In some versions of MMT, the price level is set by the government.

Monetary Policy – Used normally by central banks, of interest rates and other tools to try to influence the economy. Interest rates are raised when the bank is trying to control inflation and lowered when inflation is low and it is trying to revive the economy. QE (see Quantitative Easing), has been deployed regularly by central banks and government(s) which is designed to bring down long-term rates or bond yields.

Money – Is any item or verifiable record that is generally accepted as payment for goods and services and repayment of debts, such as taxes, in a particular country or socio-economic context. Money can be any token that is accepted as payment. Examples have included seashells and the giant stones on the island of Yap. Money is often linked to precious metals but modern money is largely fiat currency and is electronic in form. Whatever its form, money needs to be a reasonably stable store of value and an acceptable medium of exchange.

Monopoly – A monopoly exists when a specific person or enterprise is the only supplier of a particular commodity. Monopolies are characterised by a lack of economic competition to produce the good or service, a lack of viable substitute goods, and the possibility of a high monopoly price well above the seller's marginal cost that leads to a high monopoly profit.

Moral Hazard – Is the risk that a situation where an economic actor has an incentive to increase its exposure to risk because it does not bear the full costs of that risk. This becomes a problem for central banks when they act as a lender of last resort for banks; knowing they will be rescued in a crisis; bank executives may take more risks.

Nationalisation – Is the process of transforming privately-owned assets into public assets by bringing them under the public ownership of a national government or state. Under communism, all large businesses are state-owned and the previous private owners are rarely compensated. In a social democracy, the state tends to focus on certain industries, notably utilities (power generation, water etc), those deemed to be strategically important (steel, coal) and loss-making businesses that employ a lot of workers. Nationalisation was common after 1945 but was reversed under the privatisation programmes of the 1980s and 1990s.

National Debt – Is the sum of government debt, usually expressed as a proportion of GDP (see GDP). Changes in government debt over time reflect primarily borrowing due to past government deficits. Government debt is typically measured as the gross debt of the general government sector that is in the form of liabilities that are debt instruments. A debt instrument is a financial claim that requires payment of interest and/or principal by the debtor to the creditor in the future. Examples include debt securities (such as bonds and bills), loans, and government employee pension obligations.

Nation-State(s) – Nation-states are organised political communities with government and geographical boundaries recognised by international law.

Negative Income Tax - is a guaranteed minimum income plan or public subsidy provided to people with low incomes, ideally replacing complex welfare bureaucracy. Negative income tax would allow claimants to receive income through the simple filing of tax returns. But unlike other return-filers who would make payments to the tax authorities, beneficiaries would receive payments ('negative taxes') from the tax authority, based on how far their incomes fell below the threshold for tax liability.

Neoclassical Economics – Is the approach to economics in which production, valuation, and consumption of goods and services are observed as driven by the supply and demand model (see supply and demand). The value of a good or service is, therefore, determined through a hypothetical maximisation of utility by incomeconstrained individuals and of profits by firms facing production costs and employing available information and factors of production.

Neoliberalism – The term used to describe the 20th century resurgence of 19th century ideas associated with economic liberalism and free-market capitalism. Neoliberalism is associated with policies of economic liberalisation, including privatisation, deregulation, free trade, globalisation, austerity, and reductions in government spending to increase the role of the private sector in the economy and society.

Neural Network – Artificial neural networks are used for solving artificial intelligence (AI) problems; modelling connections of biological neurons as weights between nodes. These artificial networks may be used for predictive modelling, adaptive control and applications where they can be trained via a dataset. Self-learning resulting from experience can occur within networks, which can derive conclusions from a complex and seemingly unrelated set of information.

OECD – The Organisation for Economic Co-operation and Development was created in 1961 and has acted as a club for developed nations, compiling reports on individual economies and serving as a hub for research on policy options and economic data.

Oligopoly – An oligopoly is a market from wherein a market or industry is dominated by a small group or large sellers (oligopolists). Oligopolies can result from various forms of collusion that reduce market competition which then leads to higher prices for consumers and lower wages for the employees of oligopolies. Oligopolists act like a monopoly (see monopoly) and ultimately gain a market power.

Open-Design movement – The open-design movement involves the development of physical products, machines, and systems through use of publicly shared design information which includes the making of both free and open-source software (FOSS) as well as open-source hardware. The process is generally facilitated by the internet and often performed without monetary compensation. The goals and philosophy of the movement are identical to that of the open-source movement, but are implemented for the development of physical products rather than software.

Pareto Efficiency – Named after Vilfredo Pareto describes a situation in which resources are distributed so that it is not possible to make anyone better off without

making someone else worse off. In theory, if Pareto efficiency is not achieved, this is a case of market failure since it is possible to improve the allocation of resources.

Peak human – The point at which the human population stops increasing. The United Nation's (UN) Population Division currently predicts that peak human will happen in the early twenty-second century at 11 billion people. However, by lifting people out of poverty and empowering women, it is forecast we could reach peak human as soon as 2060 at just 8.9 billion people.

Perpetual growth – The assumption that underpins our current economic model, the gross domestic product (GDP) (see gross domestic product) will continue to increase, year on year, forever. In reality, many developed economies have very low increases in GDP each year, between 0 and 2%, but that is of course, still growth.

Plutocracy – A plutocracy is a society that is ruled or controlled by people of great wealth or income. Unlike systems such as democracy, liberalism, socialism, communism, or anarchism, plutocracy is not rooted in an established political philosophy.

Polity – A polity is an identifiable political entity or any group of people who have a collective identity, that are organised by some form of institutionalised social relations and have the capacity to mobilise resources. A polity can be any group of people organised for governance (e.g., corporate board or trade union), the government of a country, or a sovereign state.

Post-capitalism – A state in which the economic system can no longer be described as capitalist or by the varying forms of capitalism. Post-capitalist societies do not exist however these societies may come about as a result of spontaneous human evolution as capitalism becomes obsolete. Post-capitalism in this work is used to describe the process in which the inherent traits and contradictions of capitalism will force its own demise and, thus, diminish over time naturally.

Post-Scarcity Economy – A theoretical economic situation in which most goods can be produced in great abundance with minimal human labour needed, so that they become available to all very cheaply or even freely. Post-scarcity does not yet

mean the elimination of scarcity for all goods and services, but that all people can easily have their basic survival needs met along with some significant proportion of their desires for goods and services.

Poverty – Measurements of poverty can be absolute or relative. In the former case, individuals or households have insufficient income to afford the basics of life: food, shelter, heat, clothing. Extreme poverty is the most severe type of poverty characterized by severe deprivation of basic human needs, including food, safe drinking water, sanitation facilities, health, shelter, education and information. It depends not only on income but also access to services.

Poverty Trap – A mechanism which makes it difficult for people to escape poverty. When individuals lack income or capital to escape poverty, they may also find it difficult to acquire it, creating a self-reinforcing cycle of poverty.

Precariat – A term given to workers in low-paid jobs, often part-time or on zerohours contracts, whose employment and income are insecure, especially when considered as a class. The precariat class are often linked to work in the gig economy (see Gig Economy).

Price – The cost of a good or service to customers which ought to be set by the balance of supply and demand (see Supply and Demand).

Primitive Accumulation of Capital – The primitive accumulation of capital concerns the origins of capital historically concerned with taking land and expelling a resident population. This was normally accomplished through violence, war, enslavement, and colonialism before releasing the land into the privatised mainstream of capital accumulation. However, in this thesis, primitive accumulation is not simply a historical process but in line with David Harvey's assessment that primitive accumulation is 'accumulation by dispossession'. Accumulation by dispossession is an ongoing process within the process of capital accumulation on a global scale.

Primary Goods - Are presented in the book *A Theory of Justice* (1971) by the American philosopher John Rawls. In the first edition of *A Theory of Justice*, these

goods are supposed to be desirable for every human being, just as they are also useful for them. Thus, primary goods are the common base for the unanimous selection of the justice principle in the original position (see Veil of Ignorance).

Primary goods are subdivided in two categories:

- Natural primary goods include intelligence, imagination, health, speed etc.
- Social primary goods include rights (civil rights and political rights), liberties, income and wealth, the social bases of self-respect, etc.

In the second edition of *A Theory of Justice*, primary goods are stated to be those that the citizens need as free people and as members of the society.

Private Property – The legal designation for the ownership of property by nongovernmental legal entities. Private property is distinguishable from public property, which is owned by a state entity, and from collective or cooperative property, which is owned by a group of non-governmental entities. Private property in the means of production is a central element of capitalism.

Private Sector – Activities not controlled by government that range from a oneman business to giant corporations.

Privatisation – In its most simple terms privatisation is the transfer of assets or firms from the public sector (see Public Sector) to the private sector (see Private Sector).

Productivity – In economics, productivity measures the level of output for a given level of inputs. This is most commonly expressed as output per worker hour. Boosting productivity is the key to long-term economic growth, which is why there has been much concern about the sluggish performance of productivity in the developed world since the financial crisis of 2007-09.

Profit – Used synonymously with income or earning distributed to the owner in a profitable market production process. The difference between a company's revenues and its costs. Profits lie at the heart of the capitalist system and are one of the key

motives for business formation. Profit is in essence a capitalistic term denoted to make financial gain off something or someone else.

Progressivism – The political philosophy in support of social reforms. Progressivism is based on the idea of progress in which advancements in science, technology, economic development, and social organisation are vital to the improvement of the human condition. Progressivism in the 21st century can be viewed through social or political movements that aim to represent the interests of ordinary people through political change and the support of progressive government actions.

Progressive Taxation – A system in which higher marginal rates of taxation apply to higher incomes.

Protectionism – A policy that attempts to promote companies based in the domestic country and discriminates against those abroad. This can be done via taxes or tariffs or via regulations that exclude or hobble imports. Protectionism is often politically popular because it appears to safeguard workers' jobs, and many companies will lobby politicians to exclude foreign competitors.

Psephology – The etymology of psephology draws from the Greek word for pebble as the ancient Greeks used pebbles to cast their votes in urns or wine cups. Today psephology is the branch of political science studying elections and trends in voting.

Public Sector – The part of the economy which is controlled, or owned by the government.

Quantitative Easing (QE) – Quantitative Easing (QE) is a monetary policy whereby a central bank purchases at scale government bonds (see government bonds) or other financial assets in order to inject money into the economy to expand economic activity. QE is considered an unconventional form of monetary policy that is usually used when inflation is low or negative, and when standard monetary policy instruments have become ineffective.

Recession – A recession is a business cycle contraction in which there is a general decline in economic activity. Recessions generally occur when there is a widespread drop in spending (an adverse demand shock) that can be triggered by various

events, such as a financial crisis, an external trade shock, an adverse supply shock, the bursting of an economic bubble, or large-scale anthropogenic or natural disaster. The United Kingdom defines a recession as negative economic growth for two consecutive quarters.

Reflation – Reflationary policies designed to stimulate the economy. This may involve fiscal policy (cutting taxes and/or increasing public spending) or monetary policy (cutting interest rates and/or quantitative easing). Both approaches are likely to get a higher inflation rate, although this is not a problem if the economy is experiencing low inflation or deflation.

Renewables (renewable energy) – Energy from sources that naturally replenish themselves on a human timescale such as solar, wind, bioenergy, tidal, wave power, hydroelectric power, and geothermal heat. Renewables are typically lower, or zero, carbon replacements for fossil fuels.

Rent – The income paid to a landowner for the use of land or buildings.

Rent-seeking – Is the act of growing one's existing wealth without creating new wealth by manipulating the social or political environment. Rent-seeking activities have negative effects on the rest of society. This results in reduced economic efficiency through the misallocation of resources, reduced wealth creation, lost government revenue, heightened income inequality, and potential national decline. The term is used to describe the practice of grabbing a bigger slice of the cake without adding more value. The most basic private-sector example of rent-seeking is a protection racket, in which criminals demand a cut of (say) a bar-owner's or shopkeeper's revenue.

Representative Democracy – The form of democracy where elected individuals represent a group of people, in contrast to direct democracy. Most of the modern Western-style democracies function as some type of representative democracy. The United Kingdom has a unitary parliamentary constitutional monarchy. Representative democracy can function as an element of both the parliamentary and the presidential systems of government.

Reservation Wage – The lowest wage at which a worker will accept employment.

Reserve Currency – A currency held by central banks for use in emergencies. The central bank might need reserves to defend the currency of its home nation (by selling the foreign currency and buying the domestic one). Or it might lend its reserves to domestic banks should they need them.

Robotics and Autonomous Systems (RAS) – Robotics and Autonomous Systems in this thesis refer to autonomous robots that perform behaviours or tasks with a high degree of autonomy (without external influence). Robotics is the branch of technology that deals with physical robots that are usually able to carry out a series of actions autonomously, or semi-autonomously. Robots interact with the physical world via sensors and actuators, such robots are programmable and are usually autonomous or semi-autonomous. In this thesis, robotics includes, but is not limited to, computer coded software, algorithms, programs, machines, and electronic persons that replace humans performing repetitive tasks, regardless of such performance being carried out or not by physical machines.

Robot Tax – A robot tax is a legislative strategy to disincentivise the replacement of workers by robots and bolster the social safety net for those who are displaced. If robots were made tax-compliant then government spending can continue even as taxable income for human workers decreases.

Scarcity – Is an economic concept entails the limited availability of a commodity, which may be in demand in the market or by the commons. Scarcity also includes an individual's lack of resources to buy commodities. The opposite of scarcity is abundance and is used and referred to in this work in the context of a post-scarcity economy (see post-scarcity economy).

Shadow Banks – Are financial services companies that are not part of the regulated banking system but are still involved in lending and derivatives trading. The expansion of shadow banks in the early 2000s resulted in the credit expansion that eventually triggered the 2007-09 financial crisis.

Shares – An alternative term for equities (see Equities). When you buy or receive shares you effectively become a part owner of that business.

Short-termism – Refers to an excessive focus on short-term results at the expense of long-term interests. This can apply to businesses if they pay too much attention to quarterly profits targets, or politically to government(s) prioritising their electoral cycle rather than the long-term health of the state and citizens they represent. Political short-termism can be exemplified by tackling climate change or tackling national debts.

Shifting Baseline Syndrome – The tendency for the concept of what is 'normal' or 'natural' to change over time due to experiences of subsequent generations.

Singularity – Technological singularity is a hypothetical future point in time at which technological growth becomes uncontrollable and irreversible, resulting in unforeseeable changes to human civilization. The consequences of singularity occur through artificial superintelligence (see superintelligence) which has the potential to result in human extinction.

Small and Medium-sized Enterprises (SME's) – SMEs are businesses whose personnel numbers fall below certain limits. In any given national economy, SMEs sometimes outnumber large companies by a wide margin and employ many more people. In the UK, a company is defined as being SME if it meets two out of three criteria: it has a turnover of less than £25m, it has fewer than 250 employees, and it has gross assets of less than £12.5m. A very small business in the UK can be referred to as a micro-entity if they have a turnover of £632,000 or less, a balance sheet of £316,000 or less, or employs 10 people or less.

Socialism – Is a political philosophy and movement encompassing a range of economic and social systems, characterised by social ownership of the means of production, as opposed to private ownership. Socialists believe in some forms of collective ownership but not the near-complete abolition of the private sector imposed under communism (see Communism). They will attempt to redistribute wealth through taxes on the rich and welfare for the poor, but not to eliminate all income differentials.

Social Contract – The social contract is a theory or model in political philosophy that concerns the legitimacy of the authority of the state over the individual. Social contract arguments typically posit that individuals have consented, either explicitly or tacitly, to surrender some of their freedoms and submit to the authority (of the ruler, or to the decision of a majority) in exchange for protection of their remaining rights or maintenance of the social order.

Sovereignty – Is the supreme authority within a territory (see state sovereignty). Sovereignty entails hierarchy within the state, as well as external autonomy for states. In any state, sovereignty is assigned to the person, body, or institution that has the ultimate authority over other people in order to establish a law or change an existing law. In political theory and this work, sovereignty is a substantive term that designates supreme legitimate authority over yet in line with its polity (see polity).

Sovereign Wealth Fund (SWF) – Is a state-owned investment fund that invests in real and financial assets such as bonds, stocks, real estate, precious metals, and other natural resources, or in alternative investments such as a private equity fund, or hedge funds. Among the largest are those of China, Norway, Abu Dhabi and Kuwait. SWF's give countries a chance to diversify their assets, and protect themselves against an economic downturn or a decline in a key industry. A SWF is used in this work to portray how government(s) representing the state ought to invest sustainably in their citizens benefitting the state and citizenry. The citizens would be the primary recipients of a SWF following a social contract nexus with the state as they would become members of the SWF and inevitably stakeholders in their society.

Stagflation – The term is a portmanteau of stagnation (see Stagnation) and inflation (see Inflation). Stagflation is a combination of high inflation and high unemployment wherein the economic growth rate slows or stagnates.

Stagnation – A prolonged period of little or no economic growth.

Stakeholder Capitalism – Is the idea that businesses should serve a wider community than just their shareholders, including their workers, suppliers and society at large. In this work stakeholder capitalism would be better for the economy

in the long run rather than the focus on short-term profit; who eventually run into trouble under capitalism settings. It is for this reason that there would be a transitional phase of stakeholder capitalism to a stakeholder society (see Stakeholder Society).

Stakeholder Society – The stakeholder society in this work refers to citizens of a state receiving a stake in society. The percentage of the stake could be extremely small so that it may not even be seen as valuable, however it is the concept of ownership that gives value to the citizen in each society of which the ownership exists. The capitalist model puts the ownership in the hands of the few and the ownership you as a citizen take is of individual responsibility. Were the citizen given a stake then they have true responsibility and would seek to benefit their overall stake in society. Citizens should demand a stake in national institutions, nationalised businesses, infrastructure, and green spaces. Government(s) should provide citizens with a stake in their own society.

In the fields such as management, law, and human resources, stakeholder theory suggests that the stakeholder's needs should be put at the beginning of any action. In line with stakeholder theory this work argues that an expressed social contract would specify and state what the citizen is entitled to and what they receive from the state for being a citizen of said state.

Standard of Living – Is the level of income, comfort, services available, generally applied to a society or location, rather than to an individual. The standard of living is considered to contribute to an individual's quality of life and is generally concerned with objective metrics outside an individual's personal control, such as economic, societal, political, and environmental matters. Standard of living is measured by standards such as inflation-adjusted income per person and poverty rate. Other measures such as access and quality of healthcare, income growth inequality, and educational standards are also used.

The State – The state is a sovereign political establishment of a given territory, an association of people or other units who have organised together for mutual benefit. A state can be distinguished from a government as the state is the organisation

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while the government (see government) is the group of people, the administrative bureaucracy that controls the state apparatus at a given time. The government(s) are the means through which state power is employed. The term 'State' has no academic definition but can be referred to a set of different, but interrelated and often overlapping, theories about a certain range of political phenomena. In this work, the state is represented by the citizens and the government of the day. The role of the state is most important as it is the provider, protector, and investor in its citizenry.

State Capitalism – Is an economic system in which the state intervenes and undertakes business and commercial (i.e., for-profit) economic activity and where the means of production are nationalised as state-owned enterprises (including the processes of capital accumulation, centralised management, and wage labour).

State of Nature – The state of nature is used in moral and political philosophy, and in social contract theories to highlight the hypothetical life of people before societies came into existence. In some versions of social contract theory, there are no rights in the state of nature, only freedoms, and it is the contract that creates rights and obligations, or in other versions does the opposite as the contract imposes restrictions upon individuals curtailing their natural rights.

State Sovereignty – Is a principle in international law that each state has exclusive sovereignty over its territory. This principle underpins the modern international system of sovereign states and is enshrined in the United Nations Charter stating "nothing [...] shall authorise the United Nations to intervene in matters which are essentially within the domestic jurisdiction of any state" (Kostopoulos, 2021). Every state, no matter how large or small, has an equal right to sovereignty.

Stock market – The term used to describe all trading in shares or equities.

Subsidy – Money paid by government either to consumers or businesses. When government gives subsidies to consumers it is to encourage them to buy products, or to keep commodity prices down. Whereas, when government gives subsidies to businesses it is to keep those businesses from going bust (saving existing jobs) or to set up in a certain area (creating new jobs). Government(s) often subsidises

upskilling, reskilling, and education for citizens and businesses to get into work or stay in work.

Superintelligence – Is a hypothetical agent that possesses intelligence surpassing that of the brightest human minds. Superintelligence is associated with technological singularity (see Singularity) which is believed to follow shortly after the development of artificial general intelligence.

Supply and Demand – In microeconomics supply and demand is an economic model of price determination in a market. It postulates that, holding all else equal, in a competitive market, the unit price for a particular good, or other traded item such as labour or financial assets, will vary until it settles at a point where the quantity demanded (at the current price) will equal the quantity supplied (at the current price), resulting in an economic equilibrium (see economic equilibrium) for price and quantity transacted. It forms the theoretical basis of modern economics.

In macroeconomics also, the aggregate demand-aggregate supply model has been used to depict how the quantity of total output and the aggregate price level may be determined in equilibrium.

Surplus Value – Is the difference between the amount raised through a sale of a product and the amount it cost to manufacture it: i.e. the amount raised through sale of the product minus the cost of the materials, plant and labour power. Marx uses the term *Mehrwert* to describe the yield, profit or return on production capital invested, i.e. the amount of the increase in the value of capital. Marx's use of *Mehrwert* has always been translated as 'surplus value', distinguishing it from 'value-added' (see Valorisation).

Sustainability Revolution – A predicted, coming industrial revolution in which the driver is a wave of innovation focused upon sustainability (see sustainable). It will feature renewables, low-impact transport, a zero-waste circular economy, carbon capture and storage, nature-based solutions, alt-proteins, clean meat, regenerative agriculture, vertical farming, etc. It promises an opportunity for green growth and aspirational future.

Sustainable (sustainability) – The ability for something to be long-lasting and where applicable to continue indefinitely. Sustainability, in this thesis, is integral to the state and for its citizenry to attain a sustainable utopia (see sustainable utopia). An ethically responsible state must also commit to the necessary ecological sustainability as without it there will be no species existence. It is the responsibility of mankind to ensure the sustainability of all other species on Earth.

Sustainable Utopia – A sustainable utopia (see Utopia) in this work is a utopia that is long-lasting, continues indefinitely, and remains sustainable socially, politically, and economically for citizens and the state. A sustainable utopia is thus, a community or society that possesses highly desirable or near perfect qualities for its members, that can be sustained long-term.

Systemic Risk (Systematic Risk) – Is the risk of collapse of an entire financial system or entire market, as opposed to the risk associated with any one individual entity, group or component of a system, that can be contained therein without harming the entire system. The risk of damage or collapse of the entire financial system is understood under capitalism (see Capitalism). Regulators have had to reconsider this subject in the aftermath of the financial crisis of 2007-09 when some banks and companies were deemed 'too big to fail'.

Tax – A tax is a compulsory financial charge or some other type of levy (see Levy) imposed on a taxpayer (individual or legal entity) by a governmental organisation to collectively fund government spending, public expenditure, or as a way to regulate and reduce negative externalities.

Tax Avoidance – Occurs when individuals or businesses do everything legally possible to reduce their tax bill. In a world of free capital movement and competing tax jurisdictions, multinational companies find it very easy to avoid taxes.

Tax Evasion – Occurs by paying less tax than is legally required. Tax evasion is punished with fines and sometimes imprisonment but that requires the evaders to be caught.

Tax Haven – A jurisdiction that imposes little or no tax on corporations and wealthy individuals.

Tendency of the Rate of Profit to Fall (TRPF) – Is a theory in the crisis theory of political economy whereby according to which the rate of profit—the ratio of the profit to the amount of invested capital—decreases over time.

Tipping Point – A threshold that, when exceeded, can lead to an abrupt, large, often self-amplifying and potentially, irreversible change in the system.

Tragedy of the commons – Refers to the idea that if individuals have access to a public resource, they will exploit it, without considering the common good. Small farmers let their animals graze on the common (since it is free) until all the vegetation is destroyed; over centuries, humans have overfished the oceans. Avoiding this problem either requires regulation or market pricing to discourage overuse.

Trade Unions – Workers' associations that campaign for better employment rights, conditions, and wages.

Trusts – In law, trust is a relationship in which the holder of property (or any other transferable right) gives it to another person or entity who must keep and use it solely for another's benefit. In a trust, assets are held and managed by one person or people (the trustee) to benefit another person or people (the beneficiary). The person providing the assets is called the settlor. Different kinds of assets can be put in trust such as cash, a business(es), or property(s).

Unemployment – Is being out of work when you want a job. After the Great Depression, many countries adopted policies to try to keep unemployment down and many offered income support to those who were out of work.

United Nations (UN) – Is an intergovernmental organisation that succeeded the League of Nations following World War II that was established with the aim of maintaining international peace and security, developing friendly relations among nations, achieving international cooperation, and as a centre for harmonising the

actions of nations. The UN is recognised as the largest and most familiar international organisation. The UN's mission is to preserve world peace.

Universal Basic Income (UBI) – Term used for a variety of schemes to reduce poverty which involve giving all citizens an income that is enough to support them. Depending on the scheme design, the UBI would replace all or part of the benefit system. In this work I use the 2016 European Science Survey definition which defines a universal basic income as an income (1) paid by government to everyone on a monthly basis to cover living costs, (2) financed by taxes, (3) replacing many other social benefits to (4) guarantee a minimum standard of living, (5) with no variation depending on whether recipients are working and (6) allowing people to keep money earned from work or other sources.

Universal Basic Services (UBS) – Are a form of social security in which all citizens or residents of a community, region, or country receive unconditional access to a range of free, basic, public services, funded through taxes and provided by a government or public institution. Universal basic services include, but are not limited to, shelter, sustenance, health and care, education, transport, legal services, and information. UBS are provided on the basis that they are necessary to sustain and enable each citizen's material safety, opportunity to contribute, or participate in the decision-making process of their community, region, or country, even if they lack any financial income. The content of UBS varies according to the resources available to the community, region, or society and their political definitions of what is considered basic provision.

Universal Credit (UC) – An amalgamated payment made by the UK government to help with living costs. It is paid monthly or twice a month for some people in Scotland. Universal credit (UC) can also be given to people on low income, out of work, or cannot work. UC was introduced in 2013 to simplify the welfare system by 'rolling' six means-tested benefits (income-based jobseeker's allowance (JSA), income-related employment and support allowance (ESA) housing benefit, income support) and tax credits (working tax credit and child tax credit) into a single monthly payment called universal credit. **Upskilling** – Is the process of employees learning, retraining, or being taught more advanced skills to improve performance and progression.

Utilitarian(ism) – Utilitarianism is a family of normative ethical theories that prescribe actions that maximise happiness and well-being for all affected individuals. Utilitarian(ism), in this thesis, is understood and used as 'the greatest outcome for the greatest number'.

Unitary Taxation – Is a method of splitting the total pre-tax profit earned by a multinational between the tax jurisdictions where it does business. This tax attributes a portion of a multinational's total worldwide profit (or loss) to each jurisdiction, based on factors such as the proportion of sales, assets or payroll in that jurisdiction.

Use Value – Or value in use (*Gebrauchswert*) is a concept in classical political economy and Marxist economics. It refers to the tangible features of a commodity (a tradeable object) which can satisfy some human requirement, want or need, or which serves a useful purpose. In Karl Marx's critique of political economy, any product has a labour-value and a use-value, and if it is traded as a commodity in markets, it additionally has an exchange value (see Exchange Value), most often expressed as a money-price.

Utopia – The "word 'utopia' is derived from two sources, the Greek *ou topos*, meaning 'no place', and the Greek *eu topos*, meaning 'good place'. In everyday language, a utopia is an ideal or perfect society" (Heywood, 2004, p364). Utopia describes an imaginary community or society that possesses highly desirable or near perfect qualities for its members. Sir Thomas More coined the term in his 1516 book *Utopia*, describing a fictional island society in the New World. Utopia in this work is perhaps most easily understood using the antonym opposite of a utopia which is dystopia (see Dystopia). Utopia is what this work aims to try to set in motion and achieve.

Valorisation – Valorisation of capital is the increase in the value of capital assets through the application of value-forming labour in production. Valorisation was used by Karl Marx as *Verwertung* in its original German and Marx first uses the term in

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chapter 4 of Capital Vol. 1, when he discusses the capitalist activity of buying commodities in order to sell them and realise more value than existed before: "This increment or excess over the original value I call 'surplus-value'. The value originally advanced, therefore, not only remains intact while in circulation, but adds to itself a surplus-value, or expands itself" [valorisation] and it is "this movement that converts it into capital" (Marx, 1867, p106).

Veil of Ignorance – The veil of ignorance also known as the original position (OP) is a thought experiment developed by John Rawls to discover the principles that should structure a society of free, equal and more people. In the original position, you are asked to consider which principles you would select for the basic structure of society, but you must select as if you had no knowledge ahead of time what position you would end up having in that society. This choice is made behind a 'veil of ignorance', which would prevent you from knowing your ethnicity, social status, gender, and crucially, your individual idea of how to lead a good life. Ideally, this would force participants to select principles rationally and impartially.

Wages – The return for labour. As well as a weekly or monthly payment, workers are often entitled to other benefits such as pensions, health insurance, sick pay, and paternity pay. Some workers also receive overtime pay and performance-related bonuses. Although, in theory, wages are a matter of negotiation between employers and employees, some states have minimum wage levels. Trade unions in many sectors negotiate on the workers' behalf.

Wage Labour – The contract of employment in which an individual sells their labour (see labour) for a period of time (be it hourly, for a day, couple of months, years, or whole career of the worker) in return for a money-wage or salary and a continuing relationship with the employer. Wage labour can take many other forms and these transactions usually occur in a labour market where wages are market determined.

Washington Consensus – A term, developed by John Williamson to describe the advice often given to developing countries by bodies like the International Monetary

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Fund (see IMF) and the World Bank (see World Bank). The advice involved deregulation, trade liberalisation, privatisation and fiscal restraint.

Wealth Tax – A wealth tax (also known as equity tax or a capital tax) is a tax on an entity's holdings of assets including the total value of personal assets, including cash, bank deposits, real estate, assets in insurance and pension plans, ownership of unincorporated businesses, financial securities, and personal trusts (an on-off levy on wealth is a capital levy). The wealth tax used in this thesis is based on the observations made by Thomas Piketty that economic inequality is increasing and proposes wealth taxes as a countermeasure. His central feature in *Capital in the 21st Century* that inequality is not an accident but a feature of capitalism that can only be reversed through state intervention. Piketty's thesis is the notion that when the rate of return on capital (r) is greater than the rate of economic growth (g) over the long term, the result is the concentration of wealth, and this unequal distribution of wealth causes social and economic instability. Piketty proposes a global system of progressive wealth taxes to help reduce inequality and avoid the trend towards a vast majority of wealth coming under the control of a tiny minority.

The World Bank – The World Bank is an international financial institution based in Washington D.C. that provides loans and grants to governments of low and middleincome countries for the purpose of pursuing capital projects. The World Bank is comprised of two institutions: The International Bank for Reconstruction and Development (IBRD), and the International Developmental Agency (IDA). The World Bank has stated its goal is the reduction of poverty.

World Government – Sometimes referred to as global government or cosmocracy (see Cosmocracy) is the concept of a single political authority with jurisdiction over all of Earth and humanity. It generally entails some form of government through a single state or polity with jurisdiction over the entire world. Global government has been proposed and attempted since antiquity. The inception of the United Nations (see United Nations) in the mid-20th century remains the closest approximation to a world government.

World Trade Organisation (WTO) – The WTO is an intergovernmental organisation that regulates and facilitates international trade between nations. The WTO facilitates trade in goods, services, and intellectual property among participating countries by providing a framework for negotiating trade agreements, which usually aim to reduce or eliminate tariffs, quotas, and other restrictions.

Zero-hours Contract – Is a type of employment contract between an employer and an employee whereby the employer is not obliged to provide any minimum number of working hours to the employee. The term 'zero-hour contract' is primarily used in the United Kingdom.

Zombie Economy – In political economy, a zombie economy is an economy that needs bailouts in order to operate, or an indebted economy that is able to repay the interest on its debts but not repay the principal. A zombie company is, therefore, an indebted business, that although generating cash, after covering costs, fixed costs (wages, rent and rates) they only have enough funds to service the interest on their loans, but not the debt itself.

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