Title: An Evaluation of Compassion-Focused Therapy within Adult Mental Health Inpatient settings

Short title: Evaluating Compassion-Focused Therapy

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Abstract

Objectives: This study aimed to examine the effectiveness of a Compassion Focused Therapy (CFT) group in improving patient outcomes compared to those receiving treatment as usual (TAU) with a trans-diagnostic population who are inpatients within an acute psychiatric ward.

Design: Quantitative data was gathered as part of routine clinical practise within three adult psychiatric wards using the Clinical Outcomes in Routine Evaluation-Outcome Measure (CORE-OM) at admission and discharge and non-standardized Likert scales pre- and post-group sessions.

Method: Between April - August 2017, the Acute Psychology Service (APS) gathered CORE-OM admission and discharge data from inpatients across three acute wards (n =32) whilst 249 pre/post group data sets were gathered from CFT group work undertaken on the inpatient wards. Current inpatients self-allocated to receive either CFT or TAU based on their desire for psychological involvement. Those self-allocating to receive psychological involvement (n=19) were compare to those who did not (n=13) across the four subdomains of the CORE-OM: Wellbeing, Functioning, Problem/Symptoms and Risk. The Likert scales included sub-domains to evaluate changes in self-compassion, compassion to others and threat. Those receiving CFT group work also received TAU.

Results: Significant improvements to all CORE-OM subdomains were observed for those receiving CFT group input, in particular the Wellbeing and Functioning subdomains. Those receiving TAU only noted a significant improvement in the area of Risk whilst levels of Wellbeing were identical at admission and discharge with no improvements noted. Pre/post group results indicated significant results for areas of self-compassion and compassion to others, whilst results by session for the threat subdomain are mixed dependant on session. Overall, all areas noted significant improvements. Session content was observed to be most effective for breathing and Mindfulness based sessions and those utilising imagery techniques.

Conclusion: Compassion Focused Therapy appears to be an effective group intervention for a trans-diagnostic population within adult in-patient settings. Patient outcomes are positively improved across a range of areas whilst undertaking psychological input in the form of CFT group work whilst also receiving TAU during an inpatient admission. The use of the CFT model to address trans-diagnostic difficulties supports targeting underlying psychological constructs in comparison to symptom treatment alone.

Keywords:
Compassion Focused Therapy, CFT, Transdiagnostic, inpatient, adult acute psychiatric ward, Group CFT, Treatment as usual, TAU, Inpatient psychological treatment, Group treatment, Group therapy

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Introduction

The landscape of acute adult mental health environments has altered over the last three decades with reduced bed numbers and an emphasis on home treatment. This has resulted in admission thresholds increasing and admission lengths decreasing; concentrating the inpatient population to those with the most severe difficulties (Fausett, 2015; French, Smith, Shiers, Reed & Raid, 2010). This can create a number of challenges such as unpredictable length of stay, varying trans-diagnostic populations with complex needs and a changeable environment. For patients, this can contribute to distress, conflict, helplessness and an increased sense of threat (British Psychological Society, 2012; Crossley & Jones, 2011; Ross, Bowers & Stewart, 2012). The impact upon staff is equally significant, with increased risk of staff burnout and injury, reducing the quality of staff-patient therapeutic relationships (Berr, Haddock, Kellett, Roberts, Drake & Barrowclough, 2016; Daffern, Howells & Ogloff, 2017; Totman, Lewando Hundt, Wearne, Paul & Johnson, 2011).

With this in mind, there are clear challenges in the provision of psychological therapy within inpatient settings. Traditionally inpatient environments have been dominated by the ‘medical model’ and psychological approaches have been ad hoc. Reduced availability of therapies by appropriately trained staff has also been highlighted as an issue (Gilbert, Rose & Slade, 2016; Schizophrenia Commission, 2012, British Psychological Society, 2012; Daffern, Howells & Ogloff, 2017, Holmes, 2002). The use of drug-based treatments often contraindicate the underlying philosophies which encourage self-soothing techniques, the normalisation of distress or collaborative interventions psychological approaches encourage (Clarke 2009, Heriot-Maitland, Vidal, Ball & Irons, 2014).
Despite the many barriers, the need for psychological intervention during inpatient admission is widely recognised, as is increasing access to therapeutic services for this particular client group (British Psychological Society, 2012).

Well run therapeutic groups can provide a valuable source of social interaction, reducing withdrawal, isolation and enable the individual to develop new skills (Heriot-Maitland, Vidal, Ball & Irons 2014; Yalom, 1983;). The provision of cost-effective psychological treatments, for both patient and staff attendance may address some of the challenges that acute populations face. Within the current climate, encouraging trans-diagnostic group work is argued to increase the therapeutic staff-patient relationship by reducing depersonalisation and the sense of criticism felt within the patient setting (Berry et al, 2016; Janner, 2006). Whilst the evidence-base for inpatient group work is limited, the literature available is suggestive of the important role trans-diagnostic group work may play in increasing the quality of care and creating a positive therapeutic environment for recovery work (Berry et al, 2016; Heriot-Maitland Vidal, Ball & Irons, 2014; Holmes, 2002; McManus, Tsivos, Woodward, Fraser & Hartwell, 2018).

In considering a psychological approach that could be applied within an inpatient setting with a diverse population, Compassion Focused Therapy (CFT) appears to be a promising intervention. CFT is an evolutionary and neuro-physiologically informed approach to psychotherapy. It aims to promote a compassionate motivational system and address difficulties surrounding self-criticism and shame that is felt to be central to many mental health difficulties (Gilbert, 2009; Gilbert, 2014; Gilbert & Proctor, 2006; Tangney & Dearing, 2003; Whelton & Greenberg, 2005). CFT focuses on our current understanding of emotional systems (threat and self-protection; drive and resource-seeking; soothing and connecting system); and contextualises mental difficulties as an imbalance in these systems. CFT aims to try and bring these systems into balance, whilst
helping to increase a sense of self-compassion (and reduce feelings of shame). A recent systematic review (Inwood and Ferrari, 2018) suggested that emotional regulation significantly mediated the relationship between self-compassion and mental health. There is also support in the literature to suggest that there is a connection between compassion and heart rate variability (HRV; Matos, Duarte, Pinto-Gouveia, Petrocchi, Basran and Gilbert, 2017; Bello, Carnevali, Petrocchi, Thayer, Gilbert and Ottaviani, 2020). This is important as HRV is associated with improved psychological wellbeing and quality of life.

‘CFT has been shown to be an effective intervention in treating a broad spectrum of clinical areas including, psychosis (Braehler, Gumley, Harper, Wallace, Norrie & Gilbert, 2012); acquired brain injury (O’Neill & McMillan, 2012); depression and anxiety (Noorbala, Borjali, Ahmadian-Attari & Noorbala, 2013); Post Traumatic Stress Disorder (Beaumont, Galpin, & Jenkins, 2012); Forensic populations (Laithwaite, O’Hanlon, Collins, Doyle, Abraham, Porter & Gumley, 2009); and individuals with an Eating Disorder (Gale, Gilbert, Read & Goss, 2012; Kelly, Wisniewski, Martin-Wagar, and Hoffman, 2016). A recent Systematic Review of CFT (Craig, Hiskey and Spector, 2020) found that CFT was as effective as other psychological interventions and more effective than no interventions. Their systematic review also suggested that Group CFT was supported by more evidence than individual CFT.

Studies into group CFT with diverse populations have reported reductions in self-reports of depression, anxiety, self-criticism, shame and inferiority (Gibert & Proctor, 2006, Braehler et al, 2013). Cuppage, Baird, Gibson, Booth & Hevey (2018) undertook a CFT group with a trans-diagnostic population. They found that, in comparison to Treatment as Usual (TAU); the CFT group produced significantly greater improvements in psychopathology; and the improvements in psychopathology were predicted by improvements in shame and self-criticism.
There is evidence to indicate that improvements have also been maintained two months to a year after treatment (Cuppage et al, 2018; Judge, Cleghorn, McEwan & Gilbert, 2012; Lucre and Corten 2013).

The evidence that CFT may be an effective treatment for trans-diagnostic client groups is an important consideration for inpatient services. Whilst only a small number of studies utilise the acute inpatient clinical populations as a part of routine clinical practise to draw upon CFT’s potential effectiveness, Heriot-Maitland, Vidal, Ball & Irons (2014) reported significant reduction in distress and increase in calmness following a modified open trans-diagnostic CFT group intervention within an inpatient environment. They concluded that CFT group treatment programmes were not only well received but also feasible with such a population and environment, despite difficulties with erratic attendance and conflicting appointments.

Craig et al (2020) highlight a number of limitations in the current CFT evidence-base, including a lack of studies into individual treatment; variability in session content across studies and the lack of an adequate therapeutic control in the research. In addition, some of the research reported is based upon case reviews and observational studies, supporting the need for further investigation into the applicability of CFT. The research into CFT within acute services setting is also limited.

Despite the limitations noted, research is suggestive of the applicability of CFT group interventions for a range of clinical settings including acute inpatients wards.
Our aims are to add to the emerging evidence-base surrounding the use of CFT groups within adult acute wards. In particular, to determine whether CFT groups improved inpatients outcomes compared to Treatment as Usual (TAU) with a trans-diagnostic population.

**Method**

**Design**

Quantitative data were gathered from psychiatric inpatients over a four-month period to compare outcome measures of those receiving TAU with those undertaking psychological input in the form of CFT. Baseline psychometric measures (Clinical Outcome of Routine Environments – Outcome Measure; CORE-OM) were requested at admission and discharge alongside pre/post session measures (Likert scales) collected at each session of the CFT group. Patients self-allocated to receive psychological input and no data gathered was mandatory at any stage.

**Ethical Considerations & Consent**

The University Health Board’s Research and Development department confirmed the study was part of routine service evaluation, so full ethical approval was not required.

The therapeutic groups on the inpatient wards were voluntary, so individuals could opt into the group or not. In addition, individuals could choose to leave the group at any time. This information was provided to every attendee at the start of each session. In addition, data collection was anonymised across all wards, so no personally identifiable information was collected. As a result of the above, formal written consent was not obtained (as it was within routine clinical practice).
Settings and Participants

Three adult psychiatric wards ran a daily CFT group over a four-month period between April and August 2017. As demonstrated in Figure 1 below, 197 adult psychiatric inpatients were admitted across the wards from which 32 completed both admission and discharge CORE-OM. Nineteen undertook CFT and 13 self-allocated to receive TAU. Participants were a trans-diagnostic population aged between 18 and 60 and a mixture of males (n=13) and females (n=19). Both CFT and TAU groups were mixed gender.

Inclusion and Exclusion Criteria

Figure 1: Participation rates CFT vs TAU
The CFT Groups were open to all individuals admitted to the inpatient wards. The only restrictions to attendance were if an individual posed a significant risk of violence or if they were unable to adhere to group rules. If individuals were not able to attend the group sessions, their presentation would be reviewed on a daily basis, and invited to the group once the risks had dissipated and mental state had stabilised.

Procedure

The piloting stage identified that initial pre/post measures were too long and posed difficulties for those with reduced literacy abilities. A six-item Likert scale was developed.

It was also noted that certain days of the week proved difficult for attendance due to competing ward demands. Therefore, a group timetable was developed to avoid the same session being affected every week.

Data in the form of the CORE-OM was requested at admission and discharge. The six-item Likert Scale was requested pre/post each group session.

Individuals were able to leave the group at any time however if the group did become disruptive, individuals were asked to leave by facilitators (this did not prevent attendance in future). Group times were advertised on each ward – these are ward dependant to provide the most accessible service to the population.

CFT – Group Programme Treatment

Individuals attending the CFT Group sessions also received TAU as well as the group sessions.

The inpatient CFT group programme was developed by the Acute Psychology Service based on
the work of Paul Gilbert. Six “stand alone” sessions have been provided in order to offer value to attendees no matter how many or little sessions they attended. Key elements of each session are outlined in Table 1 (below):

<table>
<thead>
<tr>
<th>SESSION</th>
<th>SESSION SUMMARY</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Psychoeducation: what is CFT? Evolutionary theory, Old brain vs New brain, definitions.</td>
</tr>
<tr>
<td>2</td>
<td>Understanding Models: principles of the three regulation systems model</td>
</tr>
<tr>
<td>3</td>
<td>Mindfulness and Soothing Rhythm Breathing</td>
</tr>
<tr>
<td>4</td>
<td>Imagery: Compassionate Friend Skills and our inner voice</td>
</tr>
<tr>
<td>5</td>
<td>Imagery: Compassionate Colour and Safe Place Imagery</td>
</tr>
<tr>
<td>6</td>
<td>Imagery: Compassionate Other and Compassionate Self Imagery</td>
</tr>
</tbody>
</table>

*Table 1: Key elements of group content*

Each session was formatted as follows:

- Handouts and pre session measures
- Welcome message and information about the group
- Group Rules
- Breathing/relaxation exercise
- Session specific content was delivered
- Closing and take way messages
- Breathing/relaxation exercises
- Post session measures

Each session lasted approximately one hour. The group was run in a cyclic pattern between Monday and Friday (e.g. repeating every week). Individuals could repeat sessions during their admission, so attendance was not set to just one cycle of treatment.

*Treatment as Usual (TAU)*
Individuals who declined psychological input or who were not able to attend (see exclusion criteria) received psychiatric treatment as usual from their Multidisciplinary team (MDT) only. This includes regular psychiatric reviews, medication (where deemed appropriate), and occupational therapy input.

**Psychometric Measures**

*Clinical Outcomes in Routine Environments – Outcome Measure (CORE-OM)*

The CORE-OM is a 34-item self-report measure that is used as an assessment and screening tool. The CORE-OM measures domains of: Problem, Functioning, Wellbeing and Risk. A higher score on the CORE-OM is indicative of more severe difficulties in each of the areas.

*Session by session Likert Scale*

The APS developed a 6-item (0-10) Likert Scale as part of the pre/post group evaluation. The scale measured the individual’s perception of: 1) Self-Compassion; 2) Compassion to others; 3) Sense of Threat.

A higher score on Self-Compassion and Compassion to Others reflected a greater sense of compassion. The Threat scores were reversed, suggesting a lower score on Threat indicated a higher sense of threat. The reason for reversing the threat scores was to be able to calculate the total score. (combining threat, self-compassion and compassion to others)
Data

*Data Protection*

The APS is fully compliant with the Data Protection Act. Information about each session attendance is recorded on the University Health Board system.

*Data Analysis*

The data was cleansed for any irregularities or those with incomplete sets of scores (those without a complete set of admission and discharge score). Only individuals with both admission and discharge CORE-OM scores were then selected.

A preliminary analysis was conducted to determine the suitability of parametric rests. Normal distribution was explored utilising a mean, median and mode analysis following which the Shapiro-Wilk test of normality indicated that the results were not normally distributed. Non-parametric test (Wilcoxon-signed rank and Mann-Whitney U tests) were therefore identified to most accurately analyse the variables and data available. Effect size analysis was also conducted.

*Results*

*Demographic and Attendance*

Between April and August 2017, 197 admissions were recorded across three acute psychiatric wards, 45.68% (n=90) of all admissions self-allocated for psychological input and attended CFT group work irrespective of psychometrics completion.
Overall 449 group sessions were attended; the minimum number of sessions attended was one, the maximum attended was twenty-five. 352 sets of Likert results were collected from the groups; 70.44% (n=249) of data were complete (both pre and post session data sets).

Admission and Discharge Outcomes

Table 2, below, shows CORE-OM mean scores at admission and discharge for both TAU and CFT Group. A Shapiro-Wilk test indicated that the data are not normally distributed; D (31) = .050, \( p > .05 \) therefore a Wilcoxon-Signed Ranks test was used to analyse the differences between admission and discharge scores. Both groups showed a significant reduction in the Total CORE-OM scores, when comparing discharge with admission scores. There was a smaller total reduction for the TAU group (mean 21.41->18.55; \( Z = -2.028, p = .043, d = -0.35 \)) compared to the CFT group (mean 24.01->15.89; \( Z = -3.702, p = .000, d = -0.90 \)). It is notable that the CFT group revealed higher levels of overall distress at admission and lower overall distress rating at discharge than the TAU group cross all subdomains, with a large size effect observed following analysis.

<table>
<thead>
<tr>
<th>CORE-OM Domains</th>
<th>TAU Group (N=13)</th>
<th>CFT Group (N=19)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Admission</td>
<td>Discharge</td>
</tr>
<tr>
<td>Problem</td>
<td>25.06</td>
<td>22.37</td>
</tr>
<tr>
<td>Functioning</td>
<td>20.87</td>
<td>18.01</td>
</tr>
<tr>
<td>Wellbeing</td>
<td>22.82</td>
<td>22.82</td>
</tr>
<tr>
<td>Risk</td>
<td>14.1</td>
<td>8.97</td>
</tr>
<tr>
<td>Total</td>
<td>21.4</td>
<td>18.55</td>
</tr>
</tbody>
</table>

Table 2: CORE-OM mean scores at admission and discharge for both CFT and TAU groups (and difference in scores between admission and discharge)
The only significant result for the TAU group sub-domains was for Risk (mean 14.1->8.97; Z = -2.028, \( p = .017 \), \( d = 0.52 \)) with a medium effect size. All remaining subdomain differences for the TAU group were not significant. For those who attended CFT, significant differences were observed in all subdomain areas, the greatest being Wellbeing (mean 30.66->19.74; Z = -3.556, \( p = .000 \), \( d = 1.33 \)). A similar reduction of distress was observed in both functioning (mean 21.79->13.14; Z = -3.664, \( p = .000 \), \( d = 0.99 \)) and Risk (mean 16.06->7.81; Z = -3.182, \( p = .001 \), \( d = 0.82 \)) closely followed by Problem/symptoms (mean 28.68->21.32; Z = -3.575, \( p = .000 \), \( d = 0.76 \)). Large size effects were observed for all subdomains aside from the ‘Problem’ category.

Table 3 below provides analysis of the differences between CFT and TAU scores. A Shapiro-Wilk test indicated that the data are not normally distributed (D (128) = .000, \( p > .05 \)) therefore a Mann Whitney U test was used to analyse the differences.

<table>
<thead>
<tr>
<th>CORE-OM SUBDOMAIN</th>
<th>MANN WHITNEY U</th>
<th>EFFECT SIZE</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Z</td>
<td>U</td>
</tr>
<tr>
<td>Problem/Presentation</td>
<td>-2.189</td>
<td>65.500</td>
</tr>
<tr>
<td>Functioning</td>
<td>-2.630</td>
<td>55.000</td>
</tr>
<tr>
<td>Wellbeing</td>
<td>-3.622</td>
<td>29.500</td>
</tr>
<tr>
<td>Risk</td>
<td>-0.890</td>
<td>100.500</td>
</tr>
<tr>
<td>Totals</td>
<td>-2.341</td>
<td>62.500</td>
</tr>
</tbody>
</table>

*Table 3: Analyses of differences between TAU & CFT CORE scores by subdomain.*

Significant differences were noted between CFT and TAU CORE-OM scores across all domains aside from Risk. The largest difference was observed between Wellbeing domain scores (U (32) = 29.500, Z = -3.622, \( p = .000 \), \( d = 1.41 \)) effect size analysis identified a large difference. This is
followed by Functioning (U (32) = 55.000, Z = -2.630, p = .009, d = 0.66) and Problem (U (32) = 65.000, Z = -2.189, p = .029, d = 0.5) both with medium effect size. Total scores observed a significant difference and medium effect size (U (32) = 62.500, Z = -2.341, p = .019, d = 0.61).

Results indicate that TAU may be helpful in reducing Risk, all other domains showed little improvement without the addition of psychological input. CFT input reduced distress in all CORE-OM subdomain areas significantly, particularly wellbeing and functioning supporting a more holistic approach to mental health difficulties within acute ward environments.

Group Intervention Outcomes

A 10-point Likert scale captured pre/post session scores for Threat, Self-Compassion and Compassion to Others. Higher scores on the compassion scales indicated a greater sense of compassion (to self and others), whereas a higher score on the threat scale indicated a lower sense of threat. Mean ratings and their differences are outlined in Table 4 below:

<table>
<thead>
<tr>
<th>SESSION</th>
<th>N</th>
<th>THREAT</th>
<th>SELF COMPASSION</th>
<th>COMPASSION OTHER</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>PRE POST</td>
<td>PRE POST</td>
<td>PRE POST</td>
<td>PRE POST</td>
</tr>
<tr>
<td>1: Introduction to CFT</td>
<td>44</td>
<td>5.52 5.80(0.28)</td>
<td>4.6 5.65(1.05)</td>
<td>6.71 7.3(0.59)</td>
<td>16.83 18.74(1.91)</td>
</tr>
<tr>
<td>2: Three systems model</td>
<td>49</td>
<td>5.6 5.69(0.09)</td>
<td>4.15 4.99(0.84)</td>
<td>5.76 6.3(0.54)</td>
<td>15.51 16.98(1.47)</td>
</tr>
<tr>
<td>3: Mindfulness/breathing</td>
<td>45</td>
<td>5.08 6.16(1.08)</td>
<td>4.2 5.32(1.12)</td>
<td>6.08 6.57(0.49)</td>
<td>15.35 18.04(2.69)</td>
</tr>
<tr>
<td>4: Compassionate Imagery</td>
<td>37</td>
<td>4.71 5.62(0.91)</td>
<td>4.57 5.65(1.08)</td>
<td>5.95 6.59(0.65)</td>
<td>15.23 17.82(2.63)</td>
</tr>
<tr>
<td>5: Compassionate Imagery</td>
<td>37</td>
<td>5.41 5.99(0.58)</td>
<td>4.62 5.91(1.29)</td>
<td>6.01 6.58(0.57)</td>
<td>16.03 18.48(2.45)</td>
</tr>
<tr>
<td>6: Compassionate Imagery</td>
<td>37</td>
<td>5.13 5.83(0.70)</td>
<td>4.97 5.7(0.73)</td>
<td>5.96 6.46(0.50)</td>
<td>16.06 17.99(1.93)</td>
</tr>
<tr>
<td>TOTAL</td>
<td>249</td>
<td>5.26 5.85(0.59)</td>
<td>4.49 5.51(1.02)</td>
<td>6.08 6.63(0.55)</td>
<td>15.83 17.99(2.16)</td>
</tr>
</tbody>
</table>

Table 4: CFT Mean pre and post ratings scores for in-patients receiving CFT group work (scores in brackets indicate the difference in pre/post scores)

As can be seen from table 4, Threat, Self-Compassion and Compassion to others scores all improved following group sessions. A Shapiro-Wilk test indicated that the data are not normally distributed (Totals (D (249) = .001, p > .05); Threat (D (249) = .000, p > .05; Self Compassion (D (249) = .000, p > .05); Compassion to others (D (249) = .00, p > .05) therefore a Wilcoxon-
Signed Ranks test was used to compare ratings by session and sub-domain. This revealed a significant increase in self-compassion across all sessions (mean 4.49->5.51; Z = -9.150, p = .000, d=-0.24), a significant reduction in threat for sessions three to six (mean 5.26->5.85; Z = -5.230, p=.000, d = -0.19) and a significant increase in compassion to others (mean 6.08->6.63; Z = - 6.900, p = .000, d = -0.18). Sessions with a focus on mindfulness (session 3 (mean 15.35->18.04; Z = -4.880, p = .000) and imagery (session 5 (16.03->18.48; Z = -4.360, p = .000) were noted to improve total differences the most. However, effect size was noted to be small across all sessions and all subdomains. Pre session mean scores were highest for the Compassion to others domain whilst Self Compassion pre-session scores were the lowest but observed the greatest improvement.

**Discussion**

The primary aim of this research was to explore the effectiveness of a group-based CFT intervention within an acute mental health inpatient setting. The option to self-allocate to receive psychological input (CFT) or not (TAU) was provided to avoid ethical issues surrounding restricting treatment as part of routine clinical practises as would be observed with the use of a randomised control trial (RCT).

Comparisons between admission and discharge CORE-OM’s for both CFT and TAU groups found significant improvements on discharge for those receiving psychological input supporting the positive impact of CFT work.

CORE-OM scores were observed to be higher at admission for those who self-allocated for CFT; demonstrating a greater level of distress than those who received TAU. At discharge, the CFT
group showed significant reductions in all sub-domain and total scores unlike their counterparts with overall lower levels of distress for the CFT group. The only subdomain area that significantly reduced for the TAU group was the risk category suggesting that hospital admission may be beneficial to maintain an individual’s safety without the addition of psychological input. Additionally, wellbeing scores for the TAU group were identical at admission and discharge showing no improvement in relation to Wellbeing during admission. For the CFT group, wellbeing was observed to be the area of greatest significant improvement between admission and discharge. Another key area of interest is the Problem subdomain; this area focuses on the distress caused to individuals by symptoms. For the TAU group, the reduction was minimal suggesting that TAU may not effectively manage distress related to psychopathology symptoms.

Given the high turnover in an acute ward environment, groups were open and operated in a cyclical nature. Whilst there were differences observed for the Likert measures, not all were significant and those that were significant showed a small effect size. It is possible that a non-standardized measure may be responsible. However, it is also possible that the Likert scale does not capture the complexity of the individual’s experiences, unlike the CORE-OM. Levels of self-compassion were positively impacted across all sessions; self-compassion pre-session scores were noted to be the lowest across all three of the sub-domains measured (Self-compassion Compassion to Others and Threat) and also observed the greatest increase following the group sessions. Mean sub-domain scores demonstrated that whilst compassion toward others was relatively high, developing compassion for the self was the biggest difficulty prior to psychological input.

**Implications**
This study has provided additional research to add to the emerging literature examining the effectiveness of a CFT group for adults with complex mental health difficulties. A systematic review (Craig, Hiskey and Spector, 2020) suggested that CFT was an effective psychological therapy. The current research is in keeping with this finding. In particular, the current research provides evidence that CFT is an acceptable and effective treatment within acute adult mental health services.

The specific goal of targeting levels of self-compassion, compassion to others and threat have been noted to contribute to a reduction of distress associated with a range of mental health difficulties (Clarke, 2009, Gilbert & Proctor, 2006; Craig, Hiskey and Spector, 2020; Tangney & Dearing, 2003; Whelton & Greenberg, 2005) which is also supported by the data gathered within this research. There is available research evidencing an improvement in levels of self-criticism and shame positively impacts specific diagnostic categories (Braehler et al., 2012; O’Neill & McMillan, 2012; Noorbala, Borjali, Ahmadian-Attari & Noorbala, 2013; Beaumont, Galpin, & Jenkins, 2012). Whilst specific diagnostic categories were examined in the current research; the groups were ‘trans-diagnostic’ and there was a significant improvement in presentation (based upon the CORE-OM) for those attending the sessions. This supports existing research.

Whilst a number of difficulties emerged in the process of designing and managing a therapeutic group within an acute environment due to a range of factors (inconsistent attendance, unpredictable length of admission and compliance to psychometric measure completion and conflicting appointment for other multidisciplinary involvement); it enabled a greater focus on underlying psychological constructs of compassion and threat, moving away from a focus on specific symptom-based management as seen in existing diagnostic-specific research. This supports the rationale for providing this modality of input and enabling the inpatient population
to easily access psychological input during their admission. In addition, it may support the evidence that emotional regulation can be associated with improved compassion and mental health (Inwood and Ferrari, 2018).

A key focus of CFT work is reducing self-criticism and a sense of threat via the development of compassion experienced during skills-based practises undertaken within the groups (Gilbert, 2009). Current findings suggest that whilst CFT group involvement targeted areas surrounding compassion and reducing a sense of threat; this may have impacted positively on other areas which are associated with improved mental health (such as CORE-OM subdomain areas).

One key implication noted is improvements across all subdomain areas of the CORE-OM at discharge for those who had received CFT. Large improvement in wellbeing, functioning problems and risk were all observed and may add to the weight of provision of psychological therapies within adult acute wards and indicate that treatment for mental health difficulties is significantly improved with the inclusion of psychological treatment alongside TAU.

**Limitations**

There are limitations which should be considered when interpreting these results. Firstly, a RCT could not be achieved due to the clinical and ethical implication of denying inpatients psychological treatment. The CFT group formed a part of routine clinical practise within the acute wards. Therefore, a more naturalistic design was utilised leading to reduced control. However, this does add weight to the feasibility of a trans-diagnostic CFT group within acute environments. The use of a TAU group has been noted to be preferential when RCT cannot be
used (Schulz, Altman & Moher, 2010). Follow-up studies could further provide support for the longer-term benefits of CFT input.

Individuals self-allocated for psychological input based on their desire to attend, which could fluctuate during admission. Based on this, attrition rates were difficult to measure. Individual differences were also not measured or managed due to ethical principles of denying input, this led to groups of mixed ability with some being more psychologically-minded than others and potentially impacting the validity of any improvements noted. Self-selection for input may also have impacted the CFT group results. Motivation for change was not examined as a variable within this research however may be a valuable area of focus in future studies.

The completion rate of admission and discharge CORE-OM was low in comparison to actual number of admissions and discharges. CORE-OM psychometrics were not mandatory and we were unable to restrict input to only those who had completed these. The same applied to group Likert measures with many individuals attending but not completing. Whilst the CORE-OM psychometric is a standardised measure, the Likert scale utilised was not. During the piloting stage negative feedback was received regarding the length and time taken to complete the standardized measures therefore it was reduced to make it more accessible. Such changes could account for the small effect size noted in the group data.

A number of limitations arose due to the naturalistic nature of the research and the group structure being open. Firstly, as attendance was not mandatory many individuals may not have completed the entire cycle of sessions. Secondly, some individuals may have repeated the same sessions several times but not attended others. Thirdly, as individuals could join the group at any time, they may not have undertaken the sessions in the order intended. The researchers tried to mitigate for these factors by running the group as a rolling programme and developing each
session to be ‘stand-alone’. However, it is unknown whether these factors impacted the benefits of CFT work or small effect size noted within the group data (table 4). Psychometric and Likert measures were also not mandatory therefore many individuals who completed the groups did not complete the measures. In addition, the group data was documented via week commencing dates and therefore we were unable to measure individuals’ first and last session scores to document their individual progress. Each session was accompanied by breathing and relaxation therefore we cannot separate the possible soothing effects of this from the content of the sessions, which may have impacted the results. Despite this, it may provide some supporting evidence to support the role for emotional regulation in self-compassion and mental health (Inwood & Ferrari, 2018).

Variations between wards were also evident; some wards were busy enough to run daily groups, others were not. This varied daily per ward often based on the inpatient mix, mental health stability and risk.

**Future Research**

A more robust research design could allow for the process of change in individuals compassion and threat levels to be examined to a greater degree alongside evaluating the underlying theory of the CFT model.

Whilst the current study identified that CFT can be effective for a trans-diagnostic population, replication on a greater scale would be necessary with the inclusion of follow up evaluations to fully examine long-term implications for this modality. Longitudinal research could be helpful to identify whether readmission rates are reduced following CFT work; an increase in self-
compasion and reduced sense of threat may enable individuals to maintain their wellbeing in the community for longer periods.

Examination of the group Likert mean results identified that some group sessions were more successful than others; particularly sessions based around mindfulness and breathing (session 3) and Compassionate Imagery (session 4). There were small differences between the three compassionate imagery sessions (sessions 4, 5 and 6). Further investigation relating to session content is required; whether order of undertaking the session’s impacted improvement and whether equally positive results could be garnered from standalone imagery work without prior model learning. Similarly, further research could be valuable in determining whether there were any additional benefits from individuals attending the programme on repeated occasions.

**Conclusion**

The findings indicate that an open CFT groups in addition to TAU improved overall psychopathology outcomes for a trans-diagnostic population with complex mental health difficulties. Additionally, this research identifies that changing the framework from specific diagnostic categories and more towards the underlying psychological constructs associated with wellbeing can provide a valuable framework for mental health services. This may help to guide other clinicians in the establishment of future therapeutic groups and conduct further research to add to this exciting evidence-base.
References


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