

A SINGLE ITEM MEASURE OF NEGATIVE COPING: ASSOCIATIONS WITH WELL-BEING

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Article Received on 17/01/2025

Article Revised on 07/02/2025

Article Accepted on 27/02/2025

ABSTRACT

Background: Individual differences in coping styles are important features of well-being. Certain coping styles are considered positive (e.g. problem-solving; seeking social support), whereas others, such as avoidance, wishful thinking and self-blame, are associated with negative outcomes. Many questionnaires measure coping styles, and the present study examined a single question in a sample of secondary school students and compared effects with those seen using the Student Well-being Process Questionnaire (SWPQ) negative coping scale. **Methods:** Eighty-two secondary school students completed the study, which involved an online survey measuring negative coping, well-being predictors and outcomes. **Results:** The three negative coping questions from the SWPQ loaded on a single factor, and a total negative coping score was used in the analyses. The single item and total negative coping scores were significantly correlated and showed similar associations with well-being outcomes (positive correlations with negative outcomes and negative associations with positive outcomes). When other established predictors of well-being were included in the analyses, the single-item negative coping measure remained significantly associated with negative well-being, perceived stress, anxiety and depression. **Conclusions:** A single-item negative coping question was associated with the three-item negative coping scale from the SWPQ and showed the expected associations with well-being outcomes. This question can now be used in shorter versions of the SWPQ.

KEYWORDS: Well-being; Students; Social support; Stressors; Negative coping; Psychological capital; Perceived stress; Negative well-being; Positive well-being; Life satisfaction; Depression; Flourishing.

INTRODUCTION

Many authors consider coping a key process in the relationship between psychosocial stressors and health outcomes. Coping is an important stage in the transactional stress models of Folkman and Lazarus^[1] and Cox^[2] and coping behaviours are proposed to occur after secondary appraisal. As coping behaviours vary between individuals and appear to often have trait-like characteristics, coping can also be conceived of as an individual difference variable. While coping behaviours or strategies are often viewed as stable, dispositional characteristics of individuals, Parkes^[3] states that situational and environmental factors are also important in determining coping behaviours. In transactional theories, individuals are assumed to be able to select from a range of coping options, which they choose and implement in response to different situations based on current threats and past experiences.^[2]

Folkman et al.^[4] proposed a classification that has proved popular in research on coping behaviours. Of the range

of behaviours used to cope with threatening or stressful situations, Folkman et al.^[4] suggested that coping could be divided into one of two significant categories of response: either problem-focused behaviours, which involve rational efforts to solve the problem, make plans of action, etc., or emotion-focused coping, which aims to deal with the problem by managing emotional states or making emotional responses (e.g. venting frustrations, getting upset, avoidance behaviours, etc). The former was proposed to be adaptive for many situations, particularly those for which outcomes could potentially be changed, and the latter for situations which could not be changed (e.g. the death of a loved one), However, the exclusive use of emotion-focused behaviours was proposed to be counterproductive and related to negative health outcomes. Other classifications of types of coping behaviour include Vigilance/Avoidance^[5], with the former related to an excessive focus on the threat-related aspects of a stressor, and the latter where attention is averted from threatening cues, and the similar

conceptualisation of Monitoring/Blunting,^[5] and Positive/Negative coping.

The problem-focused and emotion-focused distinction^[4] has proved perhaps the most popular in coping research. However, it has been criticised as being too simple by many^[6], and alternative, more complex classifications for coping behaviours have been suggested, such as by Carver, Scheier, and Weintraub^[7], and others, who have suggested that a five or six-factor structure for coping is a better representation of how people cope. Folkman *et al.*^[4] and Schaubroeck^[8] claim that the relation between events and health status is mediated by coping processes, and according to Cox and Ferguson^[2], mediation is a key process in primary appraisal. This suggests that knowledge of past coping success and an individual's coping repertoire can influence the appraised threat of a situation. Cox and Ferguson^[2] also state that coping is a key moderator in the stress-outcome relationship and that individual differences in coping tactics and abilities influence different health outcomes.

There is much evidence relating to the links between coping behaviours and health outcomes. For example, Healy and McKay^[9] found that avoidance coping related to poor mental health and active problem-solving related to satisfaction in nurses. However, Cooper *et al.*^[10] state that there are inconsistencies in the findings, and others claim that much-coping research is disappointing and knowledge is still limited today on the contribution of coping and how it relates to stressors and strain. Briner, Harris and Daniels^[11] state that there is much research but a very narrow range of methods used. Dewe *et al.*^[12] also claim that a major issue in the field is the failure to establish a consistent research framework for the measurement and identification of coping strategies, and thus, more research remains to be done.

The Well-being Process Questionnaire (WPQ)^[13,14] was developed from the Demands Resources Individual Effects (DRIVE) stress model.^[15,16] The DRIVE model included coping styles, which were retained when the WPQ was initially used with occupational samples.^[17-33] A version which also included coping styles was then developed for use with university student samples (the SWPQ).^[34-52] The two coping styles were called negative coping, which included avoidance, wishful thinking and self-blame, and positive coping, which included problem-solving and seeking social support. The Well-being Process Questionnaire (WPQ) also included other predictor variables such as psychological capital and more positive outcome variables (happiness, life satisfaction and positive affect). Recent studies have generally replicated the effects of the established predictors, with negative outcomes being most strongly predicted by stressors and negative coping. In contrast, positive outcomes were predicted by psychological capital and social support. New outcome variables (e.g., flourishing and physical health) and predictors (e.g., workload, work-life balance, flow, and daytime

sleepiness) have also been included in the questionnaire. Results obtained from university students have also been replicated with samples from a secondary school.^[53-58]

One central approach in developing the WPQ was using short scales or single items to assess the different concepts, which allowed the inclusion of many variables in surveys. The present study aimed to develop a single negative coping question and examine its associations with the longer measure of negative coping in the SWPQ, and associations well-being outcomes.

METHODS

Ethical committee approval

The study was approved by the Ethical Committee of the School of Psychology, Cardiff University, and carried out with the informed consent of the participants.

Participants

Participants were recruited from a secondary school in South Wales. Eighty-two secondary school students (48.2% male; 50% aged 12-13, 50% aged 13-14) completed the study.

Materials

The participants completed an online survey containing questions about negative coping, predictors of well-being and well-being outcomes.

Negative Coping

The original Student WPQ negative coping measures covered avoidance, self-blame and wishful thinking.

The actual questions were

Avoidance

When I find myself in stressful situations, I try to avoid the problem (e.g. I keep things to myself, I go on as if nothing has happened, I try to make myself feel better by eating/drinking/smoking).

Strongly Disagree 1 2 3 4 5 6 7 8 9 10 Strongly Agree.

Self-Blame

When I find myself in stressful situations, I blame myself (e.g. I criticise or lecture myself, and I realise I brought the problem on myself).

Strongly Disagree 1 2 3 4 5 6 7 8 9 10 Strongly Agree.

Wishful thinking

When I find myself in stressful situations, I wish for things to improve (e.g., I hope a miracle will happen, I wish I could change things about myself or my circumstances, or I daydream about a better situation).

Strongly Disagree 1 2 3 4 5 6 7 8 9 10 Strongly Agree.

Single-item negative coping question

When I am in a stressful situation, I blame myself or wish for things to improve or avoid the problem.

Strongly Disagree 1 2 3 4 5 6 7 8 9 10 Strongly Agree.

Well-being questions

The Short-form Well-Being Process Questionnaire (SFWPQ)^[55] was used. It included questions about the well-being predictors and measures of the well-being outcomes.

Analysis strategy

Factor analyses were carried out on the three negative coping questions to examine if they loaded on a single factor. If this was the case, a total negative coping score would be used in the analyses. Correlational analyses examined associations between the total negative coping score, the single psychological capital item, and well-being outcome measures. Finally, a MANOVA, including the established predictors of well-being, was performed to examine whether outcome variables

remained significantly associated with the single-item negative coping question.

RESULTS

Factor analysis

The self-blame, avoidance and wishful thinking scores loaded on a single factor, explaining 46.7% of the variance. Table 1 shows the correlations between the total negative coping score, the single-item negative coping score, and the well-being outcomes. The two negative scores were significantly correlated and associated with the well-being outcomes in the predicted directions (significantly associated with positive outcomes and negatively correlated with negative outcomes). The correlations with negative outcomes were more substantial than those with the positive items, and the correlations with flourishing were not significant.

Table 1: Correlations (Pearson r) between the negative coping scores and well-being outcomes.

	Single-item negative coping	Total negative coping score
Total negative coping score	0.62 p < 0.001	
Positive well-being	-0.26 p < 0.05	-0.31 p < 0.01
Negative well-being	0.54 p < 0.001	0.50 p < 0.001
Perceived stress	0.52 p < 0.001	0.49 p < 0.05
Life satisfaction	-0.38 p < 0.001	-0.28 p < 0.001
Anxiety	0.57 p < 0.001	0.62 p < 0.001
Depression	0.53 p < 0.001	0.54 p < 0.05
Flourishing	-0.18 p > 0.05	-0.17 p > 0.05

A MANOVA was then carried out, including all the well-being outcomes, the single-item negative coping variable, and the established predictors of well-being. This analysis aimed to identify which associations with the single negative coping score remained significant when the established predictors were co-varied. Negative coping had a significant overall effect (Wilks Lambda = 0.72 p < 0.005). The effects on negative well-being, perceived stress, anxiety and depression remained significant (all p's < 0.01), but the positive well-being outcomes were no longer significant.

DISCUSSION

The well-being process model includes strong predictors of positive well-being outcomes (e.g. psychological capital; social support) and negative well-being outcomes (e.g., stressors, negative coping). Some predictors (e.g. psychological capital) are significantly associated with both positive and negative outcomes, whereas negative coping is usually only associated with negative outcomes such as stress, anxiety and depression. These predictors and outcomes have been measured using single questions to avoid fatigue when completing the questionnaire. The present study reduced the measurement of negative coping to a single question. This question was significantly correlated with the original SWPQ negative coping score based on three questions. The single negative coping question was also significantly associated with positive and negative well-being outcomes. Multivariate analysis showed that the

single negative coping measure was only significantly related to negative well-being, perceived stress, anxiety and depression when other established predictors (stressors, negative coping and psychological capital) were included in the model. These results show that negative coping can be measured with a single question. Using single questions to measure the concepts means that many predictors and outcomes can be included in the questionnaire. Similar research has identified single-question measures of stressors,^[60] social support,^[61] and psychological capital.^[62] Further research is required to determine whether these results from a sample of secondary school students are obtained from samples differing in age (e.g., university students and workers).

CONCLUSION

Negative coping consists of behaviours such as avoidance, self-blame and wishful thinking. It is a key component of well-being and is usually associated with negative outcomes such as stress, anxiety and depression. The present study developed a single question measuring negative well-being and compared effects with those seen using the Student Well-being Process Questionnaire (SWPQ) negative coping scale. Eighty-two secondary school students completed an online survey measuring negative coping, well-being predictors and outcomes. The three negative coping questions from the SWPQ loaded on a single factor. Therefore, a total negative coping score was used in the subsequent analyses. The single item and total negative coping scores were highly

correlated and showed similar associations with well-being outcomes (positive associations with negative outcomes and positive correlations with negative outcomes). When other established predictors of well-being were included as covariates, the single-item negative coping measure remained significantly associated with negative well-being, perceived stress, anxiety and depression. In summary, a single negative coping question was associated with the three-item negative coping scale from the SWPQ and showed the expected associations with well-being outcomes. This question can now be included in shorter versions of the SWPQ.

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