Title

Beyond Resilience: Promotive and Protective Traits That Facilitate Recovery During Crisis

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Abstract

Resilience functions to promote psychological growth and buffer against the effects of negative events. Individual traits that promote optimal mental health beyond resilience, however, remain poorly understood. The current study addresses this gap through a positive psychology perspective. We examine how promotive traits – courage, optimism, hope, and protective traits – nostalgia, wisdom, and spirituality promote well-being and buffer against negative emotional states. We hypothesized that promotive traits will be positively related to well-being while protective traits will be negatively related to negative emotional states. Six-hundred and twenty-six (626) Malaysians responded to an online survey at the end of the country's second wave of the COVID-19 pandemic (June-September 2020). We conducted a series of regression analyses, controlling for resilience, socio-economic status, age, and perceptions towards government crisis management efforts. Results indicate that courage, optimism and hope positively predicted well-being. The strongest promotive trait contributing to well-being is hope. Results also showed that the only significant protective trait against negative emotional states is spirituality. Interestingly, nostalgia and wisdom positively predicted negative emotional states. Findings indicate that beyond resilience, courage, optimism, hope and spirituality are the strongest predictors of well-being and protect against negative emotional states amidst the COVID-19 pandemic. The findings are of theoretical relevance for resilience and positive psychology research, and practically beneficial in informing mental health interventions.

Keywords: *resilience, positive psychology, adversity, COVID-19*

Resilience in Times of Crises

Considerable research has emphasized the importance of resilience in the face of adversity and crises. Masten, Cutuli, Herbers and Reed (2009, p. 118) define resilience as, “a class of phenomena characterized by patterns of positive adaptation in the context of significant adversity or risk.” Much of the literature on resilience revolves around the central theme of “bouncing back,” encompassing a broad range of continued, sustained action in the face of adversity. Despite these varying definitions, Fletcher and Sarkar (2013) highlight scholars’ agreement that resilience revolves around two central concepts – adversity and positive adaptation. These authors also differentiate resilience from coping. Coping is a “temporary period of psychopathology followed by gradual restoration to healthy levels of functioning (p. 16).” Resilience, by comparison, is an individual’s ability to maintain healthy levels of functioning despite adversity.

Studies have examined the importance of resilience as an important psychological ability that buffers against adverse psychological outcomes during armed conflict (Riolfi, Savicki & Cepani, 2002), terrorist attacks (Fredrickson, Tugade, Waugh & Larkin, 2003) and global economic recessions (Economou et al. 2013; Obschonka et al. 2016). Rutter (1987) proposes that resilience benefits individuals through at least four key mechanisms – by (i) buffering against the risk’s effect, (ii) reducing the negative chain reactions from the event, (iii) establishing and maintaining self-esteem and self-efficacy, and (iv) opening up opportunities for the individual. Connor and Davidson (2003) highlight that individuals high on resilience are adaptable to change, view stress as a challenge and opportunity to develop a realistic sense of control of having choices. Developments in resilience science also highlight these mechanisms, distinguishing between promotive and protective factors. Yates, Tyrell and Masten (2015) classify promotive factors as those that support positive development in individuals, while protective factors are those that mitigate risks brought about by adversity.

Masten (2015) argues that resilience research considers the importance of time, as this influences patterns of adaptation and acculturation during crises. Ungar (2013) stresses the importance of understanding resilience within context. That is, how resilient individuals are under a given set of adverse circumstances depends on the nature and quality of the environment. The efficacy of factors contributing to resilience further varies both at the individual and cultural

levels. The importance of acknowledging contextual factors shaping resilience is also reflected in the development of resilience measures. The Connor-Davidson Resilience Scale (CD-RISC; Connor & Davidson, 2003; Campbell-Sills & Stein, 2007) for instance, captures individual-level characteristics such as the ability to stay focused under pressure, ability to handle unpleasant feelings, and resistance against discouragement from failure. The CD-RISC has also been validated in Asian samples (Yu & Zhang, 2007; Baek, Lee, Joo, Lee & Choi, 2010), suggesting that the stability and measurability of this construct across cultures and converging with Ungar's (2013) claims of some shared similarity in characteristics of resilient individuals across cultures.

The literature suggests that resilience is crucial in both promoting positive adaptation, and in protecting against the adverse effects of adversity. We assess these relationships, examining how individuals' resilience promotes their well-being and protects against negative emotional states such as depression, anxiety, and stress. Our study is contextualized within the ongoing COVID-19 health crisis and employs a representative, multi-ethnic sample of Malaysians during the second wave of the pandemic. We first assessed the extent to which resilience affects respondents' levels of well-being and reports of negative emotional states (depressive, anxiety, and stress) during the ongoing pandemic. Our first goal is thus to assess how resilience affects well-being and negative emotional states during an unprecedented global pandemic, given how the pandemic is likely to cause fluctuations in resilience and decrements in well-being (Killgore et al. 2020). Assessing the benefits of resilience in a non-Western sample is essential, given the psychological impact of the ongoing global pandemic situation. At the time of writing, there are limited published studies on resilience factors within Asia. Such a study contributes to an understanding of how promotive and protective traits shape resilience across cultures.

We predict that adversities such as the global COVID-19 pandemic will challenge physical and mental health. It should be evident that resilience can help improve well-being during this time. Conversely, resilience should also be negatively associated with the negative emotional states experienced during this time. We hypothesize:

Hypothesis 1a: There is a positive relationship between resilience and well-being.

Hypothesis 1b: There is a negative relationship between resilience with negative emotional states.

Beyond Resilience: Promotive and Protective Traits

The psychological study of resilience during times of adversity is not without its limits. Luthar, Sawyer and Brown (2006) highlight key issues in existing resilience research that are pertinent to the current study. Of specific note is the observation that few studies have clarified, or distinguished between the protective, promotive and vulnerability factors contributing to resilience. Indeed, the theme of ‘bouncing back’ as central to most definitions of resilience appears to emphasize the ‘protective’ aspect of resilience instead of a more holistic definition that also captures promotive factors.

We address this limitation of resilience research by adopting a positive psychology perspective. Seligman (1998) argues that the positive psychology perspective frames psychological interventions and treatments to encompass both the nurturance of skills, strengths, and virtues in addition to the acknowledgement of weaknesses and problems. Importantly, positive psychology does not discount the importance of protective factors to resilience – we argue that both promotive and protective factors as central to sustained, authentic growth and sense of well-being. The overarching aim of this study is to examine, in light of the COVID-19 pandemic, how promotive and protective traits – above and beyond that of resilience – contribute to well-being and buffers against negative emotional states. We focus on six psychological traits identified in the positive psychology literature and classify them into two broad categories: (i) promotive traits, which are attributes that drive future orientation and growth, and (ii) protective traits, which are attributes that allow individuals to draw from experience and understandings in protecting against negative emotional states. The three promotive traits are courage, optimism, and hope. The three protective traits are nostalgia, wisdom, and spirituality. These traits remain underexplored as key psychological qualities that can serve to increase well-being and buffer against negative emotional states amidst crisis and adversity.

Promotive Traits: Traits that Drive Future Orientation and Growth

Promotive traits are differentiated from protective traits in that they are oriented toward the future, as opposed to present goals. The future-focused nature of promotive traits should thus serve as key motivation goals for approach-oriented behaviours, active goal setting, and ultimately, growth. The three promotive traits of interest are courage, optimism, and hope.

Courage

Psychological courage refers to the strength to face one's destructive habits and challenges (Putnam, 1997). Rachman (1984) considers courage to be the psychological perseverance in the face of fear. Peterson and Seligman (2004) conceptualize courage as a core human virtue comprising valour, authenticity, enthusiasm/zest, and industry/perseverance. Recent conceptualizations of courage, however, proposes that courage is essentially an "attitude towards facing intimidating situations" (Biswas-Diener, 2012, p. 5). Work by O'Byrne, Lopez, and Peterson (2000) distinguishes between three forms of courage – physical, moral, and vital courage. Arguably the most relevant form of courage for the present study is vital courage – the perseverance through disease or disability when the outcome is ambiguous. Campos (2012, p. 209) considers courageous behaviour that is attained by "risking positive change," coinciding with Fagin-Jones and Midlarsky's (2007) that individual courage is often tested under corrupt times. Psychological courage encourages individuals to shift away from defining the problem as an insurmountable obstacle (Finfgeld, 1995; 1998). Numerous studies also indicate that highly courageous individuals also report lower levels of trait anxiety (Muris, Mayer & Schubert, 2010), adopt more adaptive coping styles (Magnano, Paolillo, Platania & Santisi, 2017) and have higher levels of confidence (Martin, 2011) and may even prompt the development of mastery, competence, accomplishment, and feelings of growth (Haase, 1987). We propose that psychological courage will serve to promote well-being in situations of crises and adversity.

Optimism

Scheier and Carver (1985, p. 219) define optimism as "the stable tendency to believe that good rather than bad things will happen." This definition implies that optimism is a generalized outcome expectancy that involves perceptions about being able to move toward desirable goals and away from undesirable ones. These characteristics essentially make optimism an intrinsically future-oriented trait (Carver & Scheier, 2018). Research evidence suggests that individuals high on trait optimism are more likely to take on a more problem-solving approach and are more planful than their pessimistic counterparts (Fontaine, Manstead & Wagner, 1993). Carver and Scheier (1998) and Carver, Scheier and Segerstrom (2010) further propose that under uncontrollable circumstances, optimists are more likely to 'control their plights.' Compared with

optimists, pessimists are likely to be more avoidant and employ denial tactics in the face of challenges, leading to an aggravation of their problems. Past studies also indicate that trait optimism is more likely to predict coping in general (Nes & Segerstrom, 2006), endurance of traumatic events (Thomas, Britt, Odle-Dusseau & Bliese, 2011), coping with terminal illnesses and chronic pain (Colby & Shifren, 2013) and dealing with health issues in later life (Ruthig, Hanson, Pedersen, Weber & Chipperfield, 2011). The implications of assessing trait optimism are also important since this trait can be conceptualized as a cultivatable strength. Work on learned optimism, specifically, suggests changing one's perceptions of goal-attainment ability is associated with more effective coping with life stresses (Nolen-Hoeksema, 2000) and superior physical health (Peterson, 2000). Trait optimism should thus be positively associated with well-being.

Hope

Snyder (2002) conceptualizes hope as 'goal-directed thinking' in which an individual utilizes pathways thinking (the perceived capacity to find routes to desired goals) and agency thinking (requisite motivations to use those routes). Pathways thinking is one of the core aspects of hope and relates to the production of alternative routes when original ones are blocked (Snyder et al., 1991). Individuals who are higher on trait hope are also those to be higher in agency thinking – they endorse and focus their thoughts on statements that motivate action (Snyder et al. 1998). Hope theory proposes that the successful pursuit of desired goals results in positive emotions and continued goal pursuit efforts (Snyder, Rand & Sigmon, 2002). Recent work has also considered hope to be an emotion and is considered to be one of the few pleasantly-valanced emotions that arise under appraisal of situations being demanding or stressful (Bruininks & Malle, 2005). Findings from past research indicate that hope predicts lowered stress and negative emotions, which over time builds resilience (Ong, Edwards & Bergeman, 2006), along with coping and guarding against dysphoria (Chang & DeSimone, 2001). Hope's positive effects on resilience are found to be consistent across studies employing clinical and non-clinical samples (Ong, Standiford & Deshpande, 2018). The promotion-oriented nature of hope has also seen this psychological strength to be associated with greater use of problem-solving abilities (Snyder et al. 2002; Chang, 1998). A meta-analysis by Alacorn, Bowling and Khazon (2013) indicates that hope is significantly associated with positive

affectivity and generalized self-efficacy, further evidencing its growth and promotion-oriented effects. Finally, a recent study by Munoz, Hanks and Hellman (2020) suggest that hope contributes to flourishing among childhood trauma survivors beyond that of resilience. The evidence here suggests that hope should translate to enhanced well-being under adversity.

Hypothesis 2a: Controlling for resilience, there is a positive relationship between promotive traits (courage, optimism, and hope) and well-being.

Protective Traits: Traits that Draw from Past Experience and Understandings

In contrast with promotive traits, we refer to protective traits as psychological strengths that encourage individuals to tap into, harness and reflect on existing strengths that cultivate resilience and sustain well-being in situations of crisis and adversity. These protective traits are distinguished from tendencies to engage in maladaptive fixations on past events or experiences (i.e. they are distinguished from ruminative tendencies or trait worry). Rather, these protective traits serve to remind individuals of existing psychological resources that can help limit the detrimental effects of adversity. The three protective traits of interest are nostalgia, wisdom, and spirituality.

Nostalgia

Nostalgia is broadly defined as the sentimental longing for the past (Pearsall, 1998). While initial conceptualizations of this emotion are associated with homesickness and spending time away from home, recent research has identified that both positive and negative affect are apparent in nostalgic recollections (Routledge, Wildschut, Sedikides & Juhl, 2013a). Wildschut, Sedikides, Arndt, and Routledge (2006) propose that while both positive and negative elements are experienced in nostalgic recollections, nostalgia is ultimately a positive emotion. Zhou and colleagues (2012) propose that nostalgia is ‘triggered by coldness but results in warmth.’ These authors argue that both positive and negative elements are juxtaposed to create a central theme of redemption – in that the negative patterns and memories progresses from undesirable feeling states (suffering, pain, exclusion) to a positive and desirable one (acceptance, euphoria, triumph). The findings align with work detailing the appraisal theme of nostalgia, in which the emotion is found to be elicited by events that are appraised as pleasant, irretrievably lost, temporally distant,

and unique (Van Tilburg et al. 2019), justifying its inclusion as a protective trait in this study. Recent psychological research indicates that nostalgia enhances positive self-regard by affirming one's connections with others – the emotion is always experienced in relation to social connectedness (Wildschut et al. 2006). Zhou, Sedikides, Wildschut and Gao (2008) find that in contrast with loneliness, nostalgia increases perceived social support. In the context of crises, however, nostalgia serves an important influence by assisting in meaning-making. When people are pressed to find meaning, they reflect nostalgically on treasured past experiences such as family functions and personal accomplishments (Routledge, Sedikides, Wildschut & Juhl, 2013b). Extending on this, Juhl, Routledge, Arndt, Sedikides and Wildschut (2010) find that individuals high on trait nostalgia were also less likely to react to existential threats, experiencing lower levels of death anxiety as a result. Routledge, Arndt, Sedikides and Wildschut (2008) showed that trait nostalgia also buffered against the effects of mortality salience – individuals high on trait nostalgia perceived life as being more meaningful, even under conditions when their existence and survival is threatened. These findings suggest that nostalgia is an important resource for individuals under situations of existential threat (Sedikides & Wildschut, 2018). As such, trait nostalgia will likely protect against the effects of depression, anxiety, and stress.

Wisdom

Jeste and colleagues (2010, p. 668) define wisdom as, "...a uniquely human form of cognitive and emotional development that is experience-driven; a personal quality, albeit a rare one, that can be learned, increases with age, can be measured, and is not likely to be enhanced with medication." Baltes and Staudinger's (1993) analysis of cultural-historical and philosophical writings on wisdom highlight a few characteristics of this trait relevant to the current study. The author finds that wisdom aids in addressing important and difficult matters in life, involves special, or superior knowledge, judgment, and advice, and reflects knowledge with extraordinary scope, depth, and balance applicable to specific life situations. These views align with recent developments on theories of wisdom. Grossmann (2017) highlights research showing how wisdom promotes 'ego-decentering,' shifting one's thinking from self-interests to one that exemplifies intellectual humility and recognition of uncertainty and change. While cross-cultural differences exist in the conceptualization of wisdom (see Yang, 2008), most conceptualizations agree that wisdom is difficult to achieve – but easily recognized. Complementing these implicit

theories of wisdom are studies focusing on behavioural manifestations of the construct. These explicit theories of wisdom emphasize the organization and application of pragmatic knowledge (Sternberg, 2003). Baltes and Staudinger, (2000, p. 124) conceptualize wisdom simply as, “expertise in the conduct and meaning of life.” To date, limited evidence exists on the direct effects of wisdom, particularly under conditions of extreme stress or adversity. An exception to this is Demirci and colleagues’ (2019) findings in that wisdom, as a character strength, was shown to decrease psychological vulnerability in high school students. Both implicit and explicit theories of wisdom consider wisdom’s effects on enhanced reasoning ability, sagacity, perspicuity, and judgment to be prototypical of wise individuals (see Sternberg, 1985). In this regard, we argue that wisdom can serve to direct behaviours that are calculated and reasoned, instead of those that are excessively emotion-driven or self-serving. Such deliberation is arguably more important in crises which often prompts impulsivity and over-reactivity instead. Wisdom will likely serve as a protective trait, limiting the effects of negative emotional states on individuals during crises.

Spirituality

Hill and colleagues (2000, p. 66) define spirituality as, “the feelings, thoughts, and behaviours that arise from a search for the sacred.” Zinnbauer and colleagues (1997) contrast spirituality and religiosity, differentiating the concepts based on the focus for each. Spirituality focuses on personal qualities of connection and relationship with a Higher Power, while religiosity focuses on organizational or institutional beliefs and practices. Pargament (1999, p. 6) refers to spirituality as the “loftier side of life... a search for meaning, unity, for connectedness, transcendence, for the higher of human potential.” Research on the influences of spirituality on well-being shows that the construct is negatively related to depression among adolescents and older adults (Laird et al. 2019; Barton & Miller, 2015). Ciarrocchi, Dy-Liacco, and Deneke (2008) find that levels of spiritual commitment and meaning-making predict incremental variance in hope and optimism. Spirituality may even have beneficial impacts on physical health. Tartaro, Luecken, and Gunn (2005) find that self-reported spirituality is associated with lowered levels of cortisol response and serves as a protective effect against the neuroendocrine consequences of stress. The concept of spirituality is also of practical significance. Goldstein’s (2007) study of three-week spirituality interventions (though the cultivating of sacred moments)

showed that relative to the control group, those who ‘sanctified’ cherished moments or objects reported greater levels of psychological and subjective well-being and stress reduction. The sanctification process here pertains to a “process through which aspects of life are perceived as having divine character or significance” (Pargament & Mahoney, 2005, p. 180). These findings overall suggest that spirituality may serve as a protective trait, shifting individuals’ focus on material possessions and wants toward meaning and greater significance in one’s life. This should then lead to reductions, or at least, buffer levels of negative emotional states in individuals.

Hypothesis 2b: Controlling for resilience, there is a negative relationship between protective traits (nostalgia, wisdom, and spirituality) and negative emotional states.

METHOD

Design and Context

We employed an online survey for data collection. Respondents provided self-reports of resilience, well-being and negative emotional states, promotive and protective traits, as well as demographic factors. Data collection took place over four months, from June to September 2020. Data were collected from a period in which the country was easing restrictions associated with the COVID-19 pandemic and reverting to a recovery period. As of 14th December 2020, and at the time of writing, Malaysia has since reverted to stricter government-imposed restrictions (referred to as the Movement Control Order, MCO) and is experiencing the third wave of the COVID-19 pandemic.

Sample

A total of 952 Malaysians from across Peninsula and East Malaysia responded to the survey. A total of 626 complete responses was obtained, yielding a 65.75% completion rate. For the analysis, only respondents who completed up to and including the ‘Ratings of Government Efforts’ were included. Respondents’ age ranged from 19 to 65, averaging 32.66 years ($SD = 10.11$) and comprised 340 men (54.31%) and 272 (43.45%) women. Twelve (12) respondents indicated ‘prefer not to say,’ while 2 did not respond to the question about their gender. The

majority of respondents were Malay ($n = 319$, 50.96%). There were 182 Chinese (29.12%) and 49 Indian respondents (7.83%). Mixed-race respondents comprised 4.79% ($n = 30$) while 5 respondents identified as members of an indigenous community (.80%). 39 respondents (6.23%) responded with ‘others.’ The sample overall adequately reflects the demographic composition of Malaysia.

Procedure

Responses were collected through the assistance of a market research company. We employed this approach given the need to collect the data on time. Individuals interested in and willing to volunteer for the study first provided their informed consent before proceeding with answering the questionnaires. To incentivize participation, we offered respondents the chance to win an RM50 (approx. \$12) food voucher. Completion of the survey took approximately 20 minutes.

Measures: Focal Variables

Resilience

Resilience was assessed using the 10-item Connor-Davidson Resilience Scale (CD-RISC; Campbell-Sills & Stein, 2007). This measure of resilience is reported to be reliable at $\alpha = .85$ and is scaled from 0 = not true at all to 4 = true nearly all the time. The CD-RISC comprises items such as, “I am someone who can stay focused under pressure,” and “I am able to adapt to change.”

Courage

Courage was assessed using the Norton and Weiss (2009) courage scale. This 12-item measure is scaled from 1 = never to 7 = always and comprises statements such as, “Even if I feel terrified, I will stay in that situation until I have done what I need to do” and “Other people describe me as courageous” with a reliability of .92.

Optimism

Optimism was measured using the revised Life Orientation Test (LOT-R; Scheier, Carver & Bridges, 1994). This 6-item measure consists of items such as, “In uncertain times, I usually expect the best” and “Overall, I expect more good things to happen to me than bad.” This

measure adopts a 4-point Likert scale ranging from 0 = strongly disagree to 4 = strongly agree and is reported to be reliable at .78.

Hope

Snyder and colleagues' (1991) 12-item adult hope scale was used to assess trait hope. This measure consists of items assessing the pathways and agency components and is consistent with Snyder's hope theory (2002). An example item for pathways is, "There are lots of ways around any problem" while an example item for agency is, "I meet the goals I set for myself." The measure is scaled from 1 = definitely false to 4 = definitely true. Snyder and colleagues (1991) report the reliability of their measure to range from .74 to .84.

Nostalgia

Trait nostalgia was assessed using a 10-item measure by Barrett and colleagues (2010). The measure assesses the value to which respondents place value on nostalgic experiences, along with how frequently they experience this emotion. Respondents provide their level of agreement to questions such as, "How significant is it for you to experience nostalgia" and "How prone are you to feeling nostalgic" on 7-point Likert scales ranging from 1 = not at all to 7 = very frequently. This scale is reported to be reliable at .93.

Wisdom

Wisdom was assessed using Glück and colleagues' (2013) 20-item Brief Wisdom Screening Scale (BWSS). This measure comprises factors based on previous measures of wisdom. Factors forming this new measure include self-transcendence, reminiscence and reflectiveness, openness, and critical life experience. An example item for self-transcendence is, "I feel that my individual is part of a greater whole," while an example item for critical life experience is, "I have dealt with a great many different kinds of people during my lifetime." We follow Glück and colleagues' (2013) recommendation to scale this measure on a 5-point Likert scale, where 1 = strongly disagree and 5 = strongly agree. The BWSS is reliable at .87.

Spirituality

Spirituality was measured using the 12-item Spiritual Well-being Scale (FACIT-Sp) by Peterman, Fitchett, Brady, Hernandez and Cella (2002). Sample items from this measure include, "I am able to reach deep down into myself for comfort" and "I find strength in my faith or spiritual beliefs." The measure is assessed on a 4-point Likert scale, where 0 = not at all and 4 = very much. The FACIT-sp is reliable at .81.

Measures: Outcome Variables

Well-Being

Well-being was assessed using the Mental Health Continuum-Short Form (MHC-SF; Lamers, Westerhof, Bohlmeijer, ten Klooster & Keyes, 2011). This measure comprises 14 items and assesses the frequency in which respondents report feeling emotional well-being, psychological well-being, and social-well-being. The measure adopts a 6-point Likert scale, ranging from 1 = never to 6 = every day. Lamers and colleagues (2011) consider the MHC-SF to capture positive mental health, as opposed to mental illness. We operationalize well-being via the MHC-SF given that the measure is developed from measures of satisfaction with life (Diener et al. 1985), psychological well-being (Ryff, 1995; Ryff & Keyes, 1995) and social well-being (Keyes, 1998). Well-being is thus reflected in ratings of how happy respondents feel (emotional well-being), how good they are at managing the responsibilities of their daily life (psychological well-being) and the degree to which they feel they belonged to a community (social well-being). Lamers and colleagues report the MHC-SF to be reliable at .89.

Negative Emotional States

Negative emotional states were assessed using the short-form version of the Depression Anxiety Stress Scales (DASS-21; Lovibond & Lovibond, 1995). The short-form version of this measure has shown reliability alphas ranging from .82 to .94 (as reported by Antony, Bieling, Cox, Enns & Swinson, 1998; Henry & Crawford, 2005) and is scaled from 0 = not true at all to 4 = true nearly all the time. An example item for depression is, “I felt that life was not worthwhile,” an example item for stress is, “I found myself getting upset rather easily,” and an example item for anxiety is, “I was worried about situations in which I might panic and make a fool of myself.”

Measures: Control Variables

Age

We assessed for possible age differences in light of evidence from socioemotional selectivity theory, which suggests that individuals in the later years of their lives tend to focus less on negative emotions and engage more deeply with the positive aspects of their lives

(Carstensen, 1998; Carstensen & Charles, 1998). Carstensen, Fung, and Charles (2003) and Reed and Carstensen (2012) also show that older individuals have a positivity bias in recalling positive material more quickly than negative material. Age may also influence the extent to which individuals can draw upon psychological strengths and resources such as wisdom (Jeste et al. 2010), toward achieving goals during crises.

Gender

We assessed gender differences in the present study. Evidence indicates, for instance, that men score higher on optimism than women (Helweg-Larsen, Harding & Klein, 2011). Maselko and Kubzansky (2006) find that women generally report higher levels of spirituality than men.

Socioeconomic Status (SES)

Heinonen and colleagues (2006) find socio-economic status to influence dispositional optimism and pessimism. The extent to which individuals may be able to draw on the necessary psychological strengths to build resilience, and their overall subjective assessments of their well-being, may therefore be dependent on their SES. SES was assessed using Kilpatrick and Cantril's (1960) self-anchoring scale, which is the number selected by respondents on a visual representation of a ladder. The number selected corresponds to the individual's self-reported socio-economic status and implies that the respondent is of a higher SES and standing. The assessment of SES is crucial, given evidence that individuals economically disadvantaged individuals are more susceptible to COVID-19 risk factors as a result of poor housing conditions, limited opportunities to work from home, unstable employment and income, and having limited access to healthcare services (Patel et al., 2020).

Rating of Government Efforts in Managing the Outbreak

A 3-item researcher-generated measure was used to assess respondents' ratings on their national government's efforts toward managing the COVID-19 outbreak. Respondents were asked, "Please rate your government's efforts toward managing the pandemic situation in terms of (i) containment and infection control (e.g., health directives and responses), (ii) maintaining public safety (e.g., movement control, lockdowns) and (iii) buffering mental health (e.g., providing counselling or psychological support). We scaled this measure on a 5-point Likert scale, ranging from 1 = highly dissatisfied and 5 = highly satisfied.

RESULTS

Descriptive Statistics, Scale Reliability and Pairwise Comparisons

Descriptive statistics, scale reliabilities and pairwise comparisons for all variables in the study are presented in Table 1. All measures were reliable at $\alpha = .74$ and higher. Simple linear relationships indicate that age is significantly correlated with optimism, hope, nostalgia, and spirituality at $r = -.09, p < .05$ and greater. Age is also correlated with scores on the MHC-SF and DASS-21 at $r = -.11, p < .01$ and greater. Results also indicate that SES was positively correlated with all traits, except nostalgia, at $r = .15, p < .01$ and greater, and with both outcome measures at $r = -.19, p < .01$ and greater. Perceptions of government efforts in managing the pandemic were positively associated with all traits at $r = .14, p < .01$ and greater and with scores on the MHC-SF at $r = .36, p < .01$ and greater. We thus controlled for age, SES, and perceptions of government efforts (for tests involving the MHC-SF) in the hypothesis tests.

Results showed that there were significant differences between the Malay and Chinese ethnic sub-groups on nostalgia ($M_{\text{Malay}} = 4.78, SD_{\text{Malay}} = 1.31; M_{\text{Chinese}} = 4.29, SD_{\text{Chinese}} = 1.27, F = 3.97, p < .01, \eta^2 = .03$) and spirituality ($M_{\text{Malay}} = 3.57, SD_{\text{Malay}} = .76; M_{\text{Chinese}} = 3.12, SD_{\text{Chinese}} = .65, F = 7.35, p < .01, \eta^2 = .06$). There were also between group differences between these two ethnic groups on scores on the MHC-SF ($M_{\text{Malay}} = 4.06, SD_{\text{Malay}} = 1.13; M_{\text{Chinese}} = 3.67, SD_{\text{Chinese}} = 1.06, F = 3.23, p < .01, \eta^2 = .03$) but no difference between all groups on the DASS-21. Given the small-moderate effect sizes of these differences, we opted not to control for ethnicity in the analyses. Our rationale is also informed by the overarching goal of assessing for similarities across ethnic groups, focusing on how focal variables, instead of these minor systematic differences, shape resilience and well-being outcomes. Independent samples t-tests also show that there were no significant gender differences across any of the focal variables in the study.

 Insert Table 1 about here

Hypothesis Tests

Hypothesis 1a: There is a Positive Relationship between Resilience and Well-being

Controlling for respondent age, socioeconomic status, and perceptions towards government efforts in managing the pandemic, resilience significantly and positively predicts the overall well-being, $\beta = .33$, $p < .01$; 95% CI [.42, .63]. The overall regression model fit is $R^2 = .38$, $F(4, 617) = 97.20$, $p < .01$. This supports Hypothesis 1a. The inclusion of resilience explains an additional 9.5% of the variance on top of age, SES, and perceptions of government efforts.

Hypothesis 1b: There is a Negative Relationship between Resilience with Depression, Anxiety, and Stress

Controlling for respondent age and socioeconomic status, resilience did not significantly correlate with scores on the DASS-21, $\beta = -.05$, $p = .07$; 95% CI [-.20, .01]. Perceptions of government efforts was not included as a control since this variable is not associated with scores on the DASS-21. The overall regression model fit is $R^2 = .05$, $F(3, 618) = 10.35$, $p < .01$. Inclusion of resilience explains an additional 4.3% of the variance on top of age and SES. The results indicate a lack of support for Hypothesis 1b but raise interesting implications for the current study, suggesting that factors beyond resilience may instead serve a protective function in limiting negative emotional experiences during crises. Results for the test of Hypothesis 1a and 1b are presented in Table 2.

Insert Table 2 about here

Hypothesis 2a: Controlling for Resilience, there is a Positive Relationship between Promotive Traits (Courage, Optimism, and Hope) and Well-being

We conducted hierarchical regressions for each of the three promotive traits in this study. In step 1, we entered age, SES, perceptions of government efforts and resilience in the regression model. In step 2, we entered the promotive trait variable – courage, optimism, and hope. We ran separate tests for each variable. The dependent variable was well-being, as measured by the MHC-SF.

Courage. Results indicate that courage significantly predicts well-being, $\beta = .22$, $p < .01$; 95% CI [.22, .43]. The overall regression model fit is $R^2 = .42$, $F(5, 616) = 89.48$, $p < .01$. The

model explains 41.6% of the total variance, of which 3.4% is attributed to the inclusion of the courage variable.

Optimism. Results indicate that optimism significantly predicts well-being, $\beta = .24$, $p < .01$; 95% CI [.46, .79]. The overall regression model fit is $R^2 = .43$, $F(5, 616) = 95.76$, $p < .01$. The model explains 43.3% of the total variance, of which 5.1% is attributed to the inclusion of the optimism variable.

Hope. Results indicate that hope significantly predicts well-being, $\beta = .33$, $p < .01$; 95% CI [.59, .92]. The overall regression model fit is $R^2 = .45$, $F(5, 616) = 103.67$, $p < .01$. The model explains 45.3% of the total variance, of which 7.0% is attributed to the inclusion of the hope variable.

Summary: Hypothesis 2a Tests

Results from the regression analyses indicate that after controlling for age, SES, and perceptions of government efforts, the three promotive traits – courage, optimism, and hope, all contribute to well-being beyond that explained by resilience. Resilience, nonetheless, remains a significant influence in the model even with the inclusion of these promotive traits. The results support Hypothesis 2a and are presented in Table 3.

Insert Table 3 about here

Hypothesis 2b: Controlling for Resilience, there is a Negative Relationship between Protective Traits (Nostalgia, Wisdom, and Spirituality) and Negative Emotional States.

We conducted a similar set of analyses to test for Hypotheses 2b. In step 1, we entered age, SES, and resilience in the regression model. In step 2, we entered the protective trait variable – nostalgia, wisdom, and spirituality. We ran separate tests for each variable. The dependent variable is negative emotional state, as measured by the DASS-21.

Nostalgia. Nostalgia is *positively* associated with negative emotional states, $\beta = .20$, $p < .01$; 95% CI [.08, .20]. The overall regression model fit is $R^2 = .08$, $F(4, 617) = 14.15$, $p < .01$. The model explains 8.0% of the total variance, of which 3.6% is attributed to the inclusion of the nostalgia variable.

Wisdom. Wisdom is *positively* associated with negative emotional states, $\beta = .14$, $p < .01$; 95% CI [.07, .34]. The overall regression model fit is $R^2 = .06$, $F(4, 617) = 10.03$, $p < .01$. The

model explains 6.0% of the total variance, of which 1.3% is attributed to the inclusion of the wisdom variable.

Spirituality. Spirituality is negatively associated with negative emotional, $\beta = -.10$, $p < .05$; 95% CI [-.24, -.02]. The overall regression model fit is $R^2 = .05$, $F(4, 617) = 9.10$, $p < .01$. The model explains 5.0% of the total variance, of which 0.8% is attributed to the inclusion of the spirituality variable.

Summary: Hypothesis 2b Tests

Results from the regression analyses indicate that controlling for age, SES, and resilience, only one protective trait – spirituality, led to reductions in negative emotional states. Interestingly, and counter-intuitively, nostalgia and wisdom were positively associated with negative emotional states. The results are perhaps more surprising given that trait nostalgia has been shown to increase well-being. These effects may be conditional on individuals' age (Routledge et al. 2013a) and with claims that age increases wisdom and availability of psychological resources needed to thrive (Steptoe, Deaton & Stone, 2015). In summary, only spirituality predicts negative emotional states when resilience is controlled for in the analyses. Resilience still predicts negative emotional states when nostalgia and wisdom are included in the regression model. Results are presented in Table 4. In sum, the results do not support Hypothesis 2b.

 Insert Table 4 about here

Post-hoc Tests

We ran a hierarchical regression including all promotive traits as predictors of well-being as measured by the MHC-SF. The overall regression model fit is $R^2 = .48$, $F(7, 614) = 84.02$, $p < .01$. The model explains 48.3% of the total variance, of which 6.9% is attributed to the inclusion of promotive traits. Controlling for resilience, courage, hope, and optimism have significant and positive influences on well-being at $\beta = .10$, $p < .01$; 95% CI [.04, .25] and greater. The strongest promotive trait and predictor of well-being is hope, at $\beta = .25$, $p < .01$; 95% CI [.39, .73]. Results are presented in Table 5.

 Insert Table 5 about here

We ran the second hierarchical regression including protective traits as predictors of negative emotional states as measured by the DASS-21. The overall regression model fit is $R^2 = .11$, $F(6, 615) = 13.51$, $p < .01$. The model explains 10.8% of the total variance, of which 6.9% is attributed to the inclusion of protective psychological strengths variables. Controlling for resilience, nostalgia and wisdom were significantly and positively related to negative emotional states at $\beta = .15$, $p < .01$; 95% CI [.08, .38] and greater. Only spirituality emerged as a significant protective trait against negative emotional states at $\beta = -.22$, $p < .01$; 95% CI [-.40; -.16]. Results are presented in Table 6.

Insert Table 6 about here

DISCUSSION

Summary of Results and Key Findings

In this study, we examined promotive and protective psychological traits – beyond resilience, that contribute to enhanced well-being and buffer against negative emotional states during the COVID-19 pandemic. Our study was based on a representative sample of Malaysians, who responded to an online survey assessing resilience, three promotive traits (courage, optimism, hope), three protective traits (nostalgia, wisdom, spirituality), and two outcome variables – well-being and negative emotional states. We assessed, and then controlled for socio-demographic factors that influenced these focal variables. Data was collected from Malaysians from June to September 2020, during which respondents were experiencing a brief respite from the pandemic. During this time, the country was easing restrictions and reverting to a recovery phase from the pandemic – before the third wave of infections in early October 2020. Findings should be interpreted in light of this context and time.

Results from the regression analyses indicate that controlling for age, SES, and perceptions of governmental efforts, resilience predicts well-being, supporting Hypothesis 1a. Results also indicate that SES and resilience are both comparable in their magnitude of effect on well-being. Unexpectedly, however, results did not support the hypothesis that resilience would

negatively predict depressive, anxiety, and stress symptoms. Contrary to previous studies on how resilience may buffer against depression (Waugh & Kostner, 2015) and the intuitive negative relationship between resilience and negative emotional state, we found that once we controlled for age and SES, resilience was not significantly associated with decrements in negative emotional states. SES appeared as a stronger influence on negative emotional states than resilience. No support was found for Hypothesis 1b. The results suggest that factors beyond resilience and variables assessed in this study were more likely to contribute protective effects against mental illnesses in the current context. We note that the current regression model examining the effects of protective traits explains a modest 10.8% of the total variance in negative emotional states. Our data suggest that our range of traits examined do a better job in explaining higher levels of well-being than it does in buffering against negative emotional states beyond that of socio-demographic factors.

Results from the regression analyses and test for Hypothesis 2a indicate that courage, optimism, and hope – the three promotive traits, were significant in predicting higher-quality well-being outcomes. That is, all three variables predicted higher levels of emotional, psychological, and social well-being. Results also indicate that controlling for resilience and socio-demographic variables, hope most strongly predicted well-being, supporting Hypothesis 2a. We ran a similar set of tests for Hypothesis 2b and found only spirituality to be a significant protective trait against depressive, anxiety, and stress symptoms. The results may be attributable to the religiosity of respondents; with the majority of Malaysians (96.6%) professing to have a religious faith (CIA World Factbook, 2021). We acknowledge that religiosity and spirituality are not synonymous (Zinnbauer et al. 1997) but given the correlations between these constructs from previous studies, it seems plausible that responses reflected participants relying on religious and spiritual practices to help them cope with adversity during this time.

Unexpectedly, results revealed that both nostalgia and wisdom *increased* negative emotional states, contrary to established understandings that these are generally desirable psychological traits. There are, however, some possible explanations for why this may have occurred. In the case of nostalgia, evidence suggests that the benefits of nostalgia are dependent on individual differences and the presence of strong social support. Verplanken (2012), for instance, found that chronic worriers are less likely to find nostalgic recollection beneficial to their well-being. Recently, Newman and Sach (2020) found that nostalgia exacerbated feelings

of loneliness, and this led to decrements in emotional well-being. Studies have found high levels of loneliness related to the Covid-19 pandemic (Fiorillo et al., 2020; Grossman, Hoffman, Palgi & Shrira, 2021), which could be due to the prolonged physical isolation during quarantine. Lykes and Kemmelmeier (2014) suggested that the feeling of loneliness is likely higher in collectivistic societies, where sensitivity to social exclusion is stronger than in individualistic ones. Newman and colleagues (2020) showed that the daily experience of nostalgia was rated as being less pleasant than nostalgic recollections generated on request during experimental conditions. This explanation makes sense in light of the context. Given the regulations imposed by the government that have effectively restricted social events among respondents, those who were more nostalgic might have recalled – and subsequently, reminded of the limited opportunities for social interactions during this time. These daily, unprompted nostalgic recollections of past social events may have instead increased feelings of loneliness, detachment, or isolation, leading to diminished mental health. The results also dovetail with research indicating that nostalgia's effects may also depend on individual attachment style (Juhl, Sand & Routledge, 2012; Wildschut et al. 2010). These findings suggest that individual differences in how individuals relate to others also influence how, or if nostalgia buffers against negative emotional states.

The results also seem counter-intuitive to findings that wisdom serves a protective function and increases subjective well-being (Ardelt & Jeste, 2018). We offer two possible reasons for these unexpected findings. First, it may be possible that the association between wisdom and negative emotional states is mediated by external factors not examined in the current study. Etezadi and Pushkar (2013), for instance, find that wisdom predicts emotional well-being through perceived control and life engagement. The current adverse situation, in the form of global health crises, may not be an adverse event that is perceived by respondents as being controllable. Further, Zacher, McKenna and Rooney (2013) found that the relationship between wisdom and reductions in negative affect were explained – partly, by emotional intelligence. The authors propose an intriguing possibility, that the relationship between adverse events and wisdom may be due to reverse causality. That is, adverse events may increase negative emotional experiences, but this, in turn, increases wisdom over time. These findings suggest that the effects of wisdom are more nuanced than initially predicted. Second, the nature of our sample also provides some clues for why we did not find evidence for wisdom's protective effects. Our sample consisted primarily of young to middle-aged Malaysian adults averaging 32.67 years old.

While this was representative of the country's demographics, only a small percentage of respondents (29 respondents; 4.6% of the total sample) were aged 55 or older, which would classify them as older adults. As such, it is perhaps unsurprising, given the sample, that respondents were not able to draw from sufficient life experiences to make sense of or help them cope with the current adverse circumstances.

Limitations and Suggestions for Future Research

Our findings should also be interpreted in light of limitations imposed on by our method and design. First, the cross-sectional design of our study restricts us from drawing strong inferences of causality. As such, it is equally possible that the promotive and protective traits examined in this study are themselves consequences instead of predictors of resilience or well-being and negative emotional states. Results from the bivariate correlations indicate that resilience and all promotive and protective traits were significantly associated with resilience and in the expected direction of influence. To this end, the results do show that traits drawn from the positive psychology literature do contribute to elevated well-being and buffers against negative emotional states alongside that of resilience. Further research can nonetheless examine how other positive psychology constructs such as mindfulness and self-compassion can assist in building resilience toward promoting well-being or protecting against negative emotional states during crises (Wong & Yeung, 2017; Neff & McGehee, 2010). While the focus of the current study was on individual traits, future studies should also consider traits that contribute to meaningful and healthy relationships (Reis & Gable, 2003). It is firmly established by the resilience literature, for instance, that social support is an important factor in buffering against stress and adversity (Lee et al., 2013). Perhaps this is more so within a collectivist society. Future studies might examine the relative contributions of individual traits and social support towards resilience.

Second, while we employed a representative sample, controlling for socio-demographic factors, and ruled out extraneous variables that may have influenced the results, it is crucial to note that the data is still representative of only one specific time during the pandemic in Malaysia. The data collected reflects responses amidst the initial loosening of restrictions, and the results should be interpreted given these circumstances. It is important to stress that since October 2020, cases of the novel coronavirus spiked again, leading to the third wave of the pandemic in the country. We are not aware of other studies assessing comparable psychological

variables at the onset of the third wave of the pandemic in the country. It is, however, reasonable to expect that resilience, levels of mental health, and the role of promotive and protective traits would vary during this time. Studies adopting longitudinal designs, for instance, have shown levels of mental health to fluctuate during the pandemic (Planchuelo-Gómez et al. 2020; Robinson & Daly, 2020). We stress, however, that there can be confidence in our results given our main focus on promotive and protective traits. While evidence exists that they are malleable and changeable over time (e.g. Segerstrom, 2007), they are unlikely to change dramatically over the four months in which data were collected. Further studies can nonetheless adopt approaches that allow for the assessment of how promotive and protective traits change alongside resilience and well-being across time.

Theoretical Implications

The limitations of our study notwithstanding, our study contributes to research on resilience from a positive psychology perspective. We examine constructs from the positive psychology literature – courage, hope, optimism, nostalgia, wisdom, and spirituality and assess their roles in shaping resilience. The findings here answer calls for resilience research to acknowledge, account for, and assess for the influence of context and culture, and how this dynamic system of adaptability is helped or hindered by the environment (Yates et al., 2015). While not the main foci of the study, we showed how resilience among Malaysians is strongly influenced by their SES, and how the promotive and preventive traits are influenced by perceptions of the governments' efforts in mitigating the effects of the pandemic. To this end, we show how individual-level traits, socio-demographic standing, and perceptions shape resilience during the ongoing COVID-19 pandemic.

We also add to the literature by providing initial evidence for how positive psychology constructs can be conceptualized and understood as promotive or preventive traits against adversity (Luthar, Lyman & Crossman, 2014). Notably from our findings, we showed that not all promotive or protective traits have universally positive effects on well-being or in buffering against negative emotional states. For instance, the finding that spirituality, but not nostalgia or wisdom limits depressive, stress, and anxiety symptoms highlights the need to understand protective traits in context. For instance, spirituality may be a more important protective trait among more religiously oriented cultures. In a recent case study of Vietnam, Small and Blanc

(2020) highlighted how the concept of “tam giao” – a coexistence of religious and philosophical Taoism, Buddhism, and Confucianism – can help build resilience through promoting transparency, communication, and mitigating stigmatization (p. 1). The principle here also alludes to the importance of collectivism and interdependence, suggesting that factors contributing to resilience in Asian contexts vary from that identified and established by findings employing Western samples. Our findings contribute to culturally-nuanced understandings of resilience theory and the development of culturally-sensitive models of resilience.

Practical Implications

Findings from this study can contribute to the design of positive psychology interventions that encourage the cultivation of promotive and protective resources that increase resilience. Results suggest that mental health interventions that revolve around the cultivation of courage, optimism, hope, and spirituality may be particularly effective in building, or at the very least, complementing interventions designed to increase resilience among Malaysians during the pandemic or future crises more generally. These may take the form of personalized therapeutic interventions or mental health initiatives directed towards the community at large. Meta-analytic evidence shows positive psychology interventions are effective in enhancing well-being and reducing depression (Bolier et al. 2013; Sin & Lyubomirsky, 2009). A more recent meta-analysis by Carr and colleagues (2020) sampling across 41 countries showed that positive psychology interventions had small to medium effects on well-being and buffered against the adverse mental health outcomes. The authors also highlight that the interventions were especially effective for clinical participants in non-Western countries. Considering evidence from these meta-analyses, findings from the current study suggest that mental health interventions aimed at cultivating courage, hope, optimism, and spirituality can be effective complements to government-led health initiatives and policies to help Malaysians weather the adversity brought upon by the pandemic and for subsequent future nation-wide crises events.

Conclusion

In this study, we examined how promotive and protective psychological traits predict well-being and buffer against negative emotional states during the COVID-19 pandemic. We tested our hypotheses employing a representative sample of Malaysians during the country's

initial (and short-lived) recovery phase, before the third wave of infections. Our study showed that beyond resilience, and controlling for socio-demographic factors, that courage, hope, optimism, and spirituality contribute to well-being and helped buffer against adverse mental health outcomes. Findings from our study contribute to the refinement of resilience theory from a positive psychology perspective and in the development of context- and culturally-sensitive models of resilience.

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Table 1.

Descriptive statistics, reliabilities and pairwise correlations.

	Mean	S.D	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
1. Age	32.66	10.11	—																			
2. Gender	1.58	0.53	-.17***	—																		
3. Ethnicity	1.94	1.36	-.04	.15***	—																	
4. Socio-Economic Status	5.74	2.11	.13**	-.09*	-.08*	—																
5. Perception of Govt. Efforts	3.69	0.95	.05	.06	.00	.13**	(.88)															
6. Resilience	3.37	0.74	.08	-.02	.09*	.17***	.29***	(.92)														
7. Courage	4.35	0.79	.06	.01	.09*	.15***	.26***	.51***	(.87)													
8. Optimism	2.67	0.45	.12**	.05	-.01	.17***	.14***	.28***	.35***	(.74)												
9. Hope	2.89	0.53	.11**	.01	.05	.29***	.34***	.55***	.54***	.39***	(.87)											
10. Nostalgia	4.63	1.35	-.09*	.02	.00	.06	.24***	.23***	.17***	.01	.24***	(.91)										
11. Wisdom	3.49	0.63	.04	.04	.08	.20***	.38***	.52***	.52***	.21***	.62***	.38***	(.91)									
12. Spirituality	3.44	0.76	.15***	-.01	-.03	.29***	.37***	.45***	.42***	.33***	.55***	.30***	.55***	(.89)								
13. DASS-21	2.62	0.96	-.11**	-.01	-.01	-.19***	-.05	-.10*	-.20***	-.39***	-.14***	.17***	.03	-.16***	(.96)							
14. Depression	2.57	1.09	-.13**	-.01	-.01	-.20***	-.09*	-.13**	-.25***	-.44***	-.20***	.13**	-.02	-.23***	.95***	(.93)						
15. Anxiety	2.59	0.96	-.05	-.03	-.02	-.15***	.00	-.06	-.13**	-.31***	-.06	.19***	.06	-.06	.94***	.82***	(.88)					
16. Stress	2.71	0.98	-.12**	.01	.01	-.19***	-.04	-.09*	-.18***	-.37***	-.12**	.16***	.05	-.16***	.96***	.89***	.86***	(.91)				
17. Mental Health (MHC-SF)	3.91	1.19	.18***	-.02	-.06	.43***	.36***	.46***	.44***	.40***	.57***	.15***	.52***	.68***	-.29***	-.34***	-.18***	-.28***	(.96)			
18. Emotional Well-Being	4.14	1.24	.15***	.03	-.05	.37***	.37***	.46***	.42***	.38***	.54***	.16***	.47***	.63***	-.30***	-.37***	-.20***	-.29***	.87***	(.92)		
19. Social Well-Being	3.58	1.32	.18***	-.06	-.07	.42***	.33***	.39***	.37***	.32***	.48***	.14***	.44***	.61***	-.22***	-.27***	-.12**	-.24***	.93***	.75***	(.91)	
20. Psychological Well-Being	4.06	1.27	.16***	-.01	-.04	.39***	.33***	.43***	.43***	.42***	.57***	.13***	.53***	.66***	-.28***	-.34***	-.19***	-.27***	.95***	.77***	.80***	(.94)

Note. $N = 626$; * $p < .05$; ** $p < .01$; *** $p < .001$

Table 2

Results of Hierarchical Regression Analysis for Hypotheses 1a and 1b

	<i>DV = Well-being</i>		<i>DV = Negative Emotional States</i>	
Step 1: Control Variables	β [95% CI]	SE	β [95% CI]	SE
Age	.11*** [.01, .02]	.00	-.83* [-.02, .00]	.00
SES	.37*** [.12, .25]	.02	-.18*** [-.12, -.05]	.02
Gov Efforts	.31*** [.30, .47]	.04	-	-
Adjusted R^2	.29**		.04***	
F	84.96***		13.802**	
Step 2: Resilience	β [95% CI]	SE	β [95% CI]	SE
Age	.10** [.00, .02]	.00	-.08* [-.02, .00]	.00
SES	.33*** [.15, .22]	.02	-.17*** [-.11, -.04]	.02
Gov Efforts	.22*** [.20, .36]	.04	-	-
Resilience	.33*** [.42, .63]	.05	-.05 [-.20, .01]	.02
Adjusted R^2	.38***		.05	
ΔR^2	.095		.043	
F	97.20**		10.35***	
ΔF	95.12***		3.35	

Note. * $p < .05$; ** $p < .01$; *** $p < .001$

Table 3

Results of Hierarchical Regression Analyses 2a (Individual Promotive Traits)

Step 1: Control Variables and Resilience		β [95% CI]		SE					
	Age		.10		.00				
	SES		.32		.02				
	Gov Efforts		.22		.04				
	Resilience		.33		.05				
Adjusted R^2				.38***					
F				97.20***					
Step 2: Promotive Trait Variable		β [95% CI]		SE		β [95% CI]		SE	
	Age	.10***	[.00, .02]	.00	.08**	[.00, .02]	.00	.08**	[.00, .02]
	SES	.32***	[.14, .21]	.02	.30***	[.14, .20]	.02	.27***	[.11, .19]
	Gov Efforts	.20***	[.17, .33]	.04	.21***	[.18, .34]	.04	.16***	[.12, .28]
	Resilience	.22***	[.24, .47]	.06	.27***	[.32, .53]	.05	.17***	[.16, .40]
	Courage	.22***	[.22, .43]	.05	-	-	-	-	-
	Optimism	-	-	-	.24***	[.46, .79]	.09	-	-
	Hope	-	-	-	-	-	-	.33***	[.59, .92]
Adjusted R^2		.42***				.43***		.45***	
ΔR^2		.034				.051		.070	
F		89.48***				95.76***		103.67***	
ΔF		36.33***				55.59***		79.86***	

Note. DV = Well-being (MHC-SF); * $p < .05$; ** $p < .01$; *** $p < .001$

Table 4

Results of Hierarchical Regression Analyses 2b (Individual Protective Traits)

Step 1: Control Variables and Resilience		β [95% CI]		SE			
	Age	-.08* [-.02, .00]		.00			
	SES	-.17*** [-.11, -.04]		.02			
	Resilience	-.07 [-.20, .01]		.05			
Adjusted R ²				.04***			
F				10.352			
Step 2: Protective Trait Variable		β [95% CI]	SE	β [95% CI]	SE	β [95% CI]	SE
	Age	-.06 [-.01, .00]	.00	-.08 [-.02, .00]	.00	-.07 [-.01, .00]	.00
	SES	-.18*** [-.11, -.04]	.02	-.18*** [-.12, -.05]	.02	-.14*** [-.10, -.03]	.02
	Resilience	-.11*** [-.03, -.05]	.05	-.14*** [-.30, -.07]	.06	-.03 [-.15, .01]	.06
	Nostalgia	.20*** [.08, .20]	.03	-	-	-	-
	Wisdom	-	-	.13*** [.07, .34]	.07	-	-
	Spirituality	-	-	-	-	-.10* [-.24, -.02]	.06
Adjusted R ²		.08***		.06**		.05*	
ΔR ²		.036		.013		.008	
F		14.15***		10.03***		9.09*	
ΔF		24.37***		8.664**		5.126*	

Note. DV = Negative Emotional States (DASS-21); * $p < .05$; ** $p < .01$; *** $p < .001$

Table 5

Results of Hierarchical Regression Analyses for All Promotive Traits

Step 1: Control Variables and Resilience		β [95% CI]	SE
Age		.10*** [.00, .02]	.00
SES		.33*** [.15, .22]	.02
Gov Efforts		.22*** [.19, .36]	.04
Resilience		.33*** [.41, .63]	.05
Adjusted R ²		.38***	
F		97.20***	
Step 2: Promotive Psychological Traits		β [95% CI]	SE
Age		.07* [.00, .02]	.00
SES		.26*** [.11, .18]	.02
Gov Efforts		.16*** [.12, .27]	.04
Resilience		.12*** [.08, .32]	.06
Courage		.10** [.04, .25]	.06
Optimism		.16*** [.27, .60]	.08
Hope		.25*** [.39, .73]	.09
Adjusted R ²		.48***	
ΔR^2		.069	
F		84.02***	
ΔF		41.14***	

Note. DV = Well-being (MHC-SF); * $p < .05$; ** $p < .01$; *** $p < .001$

Table 6

Results of Hierarchical Regression Analyses for All Protective Traits

Step 1: Control Variables and Resilience		β [95% CI]	SE
	Age	-.08* [-.01, .00]	.00
	SES	-.17*** [-.11, -.04]	.09
	Resilience	-.07 [-.20, .01]	.05
	Adjusted R ²	.04***	
	F	10.352	
Step 2: Protective Psychological Traits		β [95% CI]	SE
	Age	-.04 [-.01, .00]	.00
	SES	-.14*** [-.10, -.03]	.02
	Resilience	-.011* [-.26, -.03]	.06
	Nostalgia	.20*** [.09, .20]	.03
	Wisdom	.15** [.08, .38]	.08
	Spirituality	-.22*** [-.40, -.16]	.06
	Adjusted R ²	.11***	
	ΔR^2	.07	
	F	13.51***	
	ΔF	15.910***	

Note. DV = Negative Emotional States (DASS-21) ; * $p < .05$; ** $p < .01$; *** $p < .001$