Review Journal of Social Psychology & Social Works

http://socialworksreview.com

ISSN-E: 3006-4724 Volume: 3
ISSN-P: 3006-4716 Issue: 3 (July - September, 2025)

# Psychological Distress Moderates the Relationship between Personality Traits and Health Anxiety among Emerging Adults

**Ammara Iqbal**[1], **Maria Shahid**[2], **Arsheen Shafique**[3], **Qodsia Bano**[4]

1. M.Phil. Scholar, Department of Applied Psychology, The Islamia University of Bahawalpur, Pakistan. Email: ammaraiqbal96@gmail.com
2. M.Phil. Scholar, Department of Applied Psychology, The Islamia University of Bahawalpur, Pakistan. Email: mariashahid427@gmail.com
3. M.Phil. Scholar, Department of Applied Psychology, The Islamia University of Bahawalpur, Pakistan. Email: arsheenshafique@gmail.com
4. ADCP Scholar, Department of Applied Psychology, Bahauddin Zakariya University Multan. Email: qodsiabano@gmail.com

**DOI: https://doi.org/10.71145/rjsp.v3i3.402**

**Abstract**

Individual's unique personality traits not only predispose individuals to certain conditions but also shape their perceptions, coping mechanisms and ultimately their overall well-being. Some personality traits serve as double barreled which fuel psychological health while also influencing resilience and coping at the same time. This study aims to examine the association between personality traits and health anxiety among emerging adults and it also aimed to check the moderating role of psychological distress with each big five personality traits (Emotional stability, Extraversion, openness to experience, Agreeableness and Conscientiousness). To investigate variables of interest, a cross-sectional design with purposive sampling was used. Data of 264 participants was collated. Statistical analyses were applied to scrutinize the data. Correlational analysis in terms of personality traits with other main variables showed that psychological distress has a significant negative correlation with personality traits and positive correlations with health anxiety (r=.73). Moderation analysis through the structural assessment model exhibits that psychological distress significantly moderates the relationship between personality traits and health anxiety. Distress is a significant moderator while personality traits act as protective factors in terms of higher distress. The study's implications rely on using healthy coping strategies and modifying the developmental factors of personality.

**Keywords:** Personality Traits, Health Anxiety, Personality Development, Psychological Distress, Perceptions

## Introduction

Personality refers to the enduring characteristics and behavior that comprise a person's unique adjustment to life, including major traits, interests, drives, values, self-concept, abilities, and emotional patterns (American Psychological Association, 2018). Personality is generally viewed as a complex, dynamic integration or totality shaped by many forces, including hereditary and constitutional tendencies; physical maturation; early training; identification with significant individuals and groups; culturally conditioned values and roles; and critical experiences and relationships (McAdams, 2015). Health anxiety is a common reaction that occurs when body feelings or changes are thought to be signs of a serious disease (Asmundson et al., 2010). It is the occurrence in which people/individuals are extremely anxious about their

health and the way their anxiety assumes serious illness (Griem et al., 2016). Moser et al. (2008) described it as a cognitive manifestation of the propensity to become ill. The origination of this illness anxiety type was found in the individual experiences that include health problems and their cognitive perceptions that consist on biases towards health, which further leads to more attention towards health and meditation of health concerns (Owens et al., 2004; Marcus et al., 2004). The cognitive biases developed in individuals and further triggered due to any health related occurrence, this increase their anxiety and they rush to the health care centres frequently (Ridolfi & Crowther, 2013). According to several studies, health anxiety is a dimensional construct (Ferguson, 2009; Longley et al., 2010), ranging from low to high levels of worry about health. Asmundson et al. (2012) show that health anxiety is a bifid construct, with some people having high levels of anxiety and others having low levels Individuals who fulfill diagnostic criteria for hypochondriasis are likely to have significant levels of health anxiety. In hypochondriasis, health worry is intense and maladaptive, unresponsive to reassurance, present for a long time, and leads to clinical levels of suffering or impairment. The big five or five-factor model of personality has been studied in terms of negative affectivity and health anxiety. It is proposed that one third of depression is varied by the contribution of big five traits (Quilty et al., 2013). The three contributing factors were neuroticism, extraversion and conscientiousness. Neuroticism is being as vulnerability factor and the other two as protective factors (Kotov et al., 2010). During the course of pandemic, a study reported that neuroticism predict anxiety and depression while keeping in control the other variables including stress and demographics (Lee et al., 2020). According to the Big Five, health anxiety is most strongly associated with neuroticism and conscientiousness (Ferguson, 2004; Cox et al., 2000). Personality disorders are common in hypochondriasis. According to the study by Sakai et al. (2010), among the patients with health anxiety, seventy-six percent have one or more personality disorders and the most common was OCD (Obsessive-Compulsive disorder). Another study reported that the common personality disorders in health anxiety are obsessive-compulsive, avoidant, and paranoid (Fallon et al., 2012). These comorbidities suggest that personality traits and health anxiety are related to each other. Hypochondriasis is characterised by a set of beliefs and attitudes towards sickness. In addition to these distinguishing symptoms, general medical patients with hypochondriasis have exhibited a variety of other characteristics (Barsky et al., 1983). There are substantial associations between such individuals and depressed, anxiety, and somatic symptoms, as well as high rates of comorbid depression, anxiety, and other somatoform illnesses.Furthermore, these individuals had a high neuroticism score, an amplified perceptual style, and a higher risk of personality disorders than non-hypochondriacal patients. Such patients have been demonstrated to be high users of medical services but have expressed dissatisfaction with the care they have received (Barsky & Wayshak, 1990). The study reported that the prevalence of health anxiety in non-clinical populations is high and unrelated to demographic variables but some personality traits may become the source of development (Noyes et al., 1999).

Psychological distress can be defined as uncomfortable feelings or emotions that are experienced by an individual in an overwhelming state, which can critically affect daily life activities. It can result in negative symptoms like anxiety, sadness, and lack of interest in daily activities. Psychological distress can come through many events that a person experiences, the traumatic events like the death of a loved one, natural disasters, or a severe accident, work-life stress, and relationship stress. They exceed the individual's ability to cope and cause them incompetent which causes stress and then it affects physiological functioning and ultimately to the diseases that may be medical or psychological (Lazarus, 1998).

**Literature Review**

Psychological distress encompasses a range of negative mental health states, including anxiety, depression, and stress. Personality traits, such as neuroticism (tendency towards negative emotions) and extraversion (tendency towards positive emotions), can influence an individual's susceptibility to psychological distress (Chong et al., 2004; Wheaton et al., 2012; Wu et al., 2009; Yip et al., 2010). Health anxiety, characterized by excessive worry about physical health, can exacerbate psychological distress and contribute to a vicious cycle of fear and avoidance. For example, individuals high in neuroticism may be more prone to interpreting bodily sensations as signs of serious illness, leading to heightened health anxiety. This anxiety can then trigger a cascade of negative thoughts and emotions, further intensifying psychological distress. Kamali et al. (2024) examined the relationship between personality traits and health anxiety among nurses. In this cross-sectional research, stratified random sampling was used and the data from 600 participants were analyzed using descriptive and inferential statistics. Findings revealed that health anxiety and neuroticism are positively and significantly related to each other, while extraversion and openness to experience have negative correlation with health anxiety. Moreover, it was concluded that health anxiety is more predicted in people with neurotic traits of personality. A meta-synthesis analyzed 36 meta-analyses to examine the predicting role of personality traits in causing health anxiety. 150 meta-analytic effects provided participants that fulfilled the criteria for inclusion. Findings revealed that big five personality traits moderately associated with health patterns, personality health relations are prominent when mental health outcomes are reported as compared to when physical health outcomes are reported. The moderating effects were greater for the traits agreeableness, conscientiousness and neuroticism (Strikhouser et al., 2017). Longitudinal research was carried out to investigate the relationship between psychological distress and personality traits. The sample was collected over four time points in thirteen years. The variance into between-person and within-person was partitioned through a cross-legged panel model. Results showed that emotional disability decreased with increase in distress which have negative impact on personality trajectories. Furthermore, there is bidirectional relationship between extraversion and conscientiousness with psychological distress (Joshanlo, 2023). Bore et al. (2016) conducted cross-sectional research to investigate predictors of psychological distress and well-being of medical students. Findings showed that the level of psychological distress is higher among females as compared to males. Among the 20 significant predictors of psychological distress, the common ones are social support and personality traits. For medical students, emotional resilience skills training can reduce psychological distress.

**Objectives of the Study**

1. To find out the relationship between personality traits (extraversion, conscientiousness, openness, agreeableness, neuroticism), health anxiety, and psychological distress among emerging adults
2. To investigate the impact of personality traits (extraversion, conscientiousness, openness, agreeableness, neuroticism) on health anxiety among emerging adults
3. To investigate the moderating role of psychological distress between personality traits (extraversion, conscientiousness, openness, agreeableness, neuroticism) and health anxiety in emerging adults
4. To examine the demographic differences (gender, history of physical/psychological issues, family history of physical/psychological issues) in personality traits, health anxiety, and psychological distress.

**Hypotheses of the Study**

1. There would be a significant relationship between Personality Traits, Health Anxiety, and psychological distress among Emerging Adults
2. Personality traits would predict health anxiety among emerging adults
3. Psychological Distress moderates the relationship between Personality Traits and Health Anxiety in emerging adults
    a) Psychological distress moderates the relationship between Extraversion and Health Anxiety
    b) Psychological distress moderates the relationship between Openness to Experience and Health Anxiety
    c) Psychological distress moderates the relationship between Emotional stability and health anxiety
    d) Psychological distress moderates the relationship between Conscientiousness and health anxiety
    e) Psychological distress moderates the relationship between Agreeableness and health anxiety
4. There exist gender differences in levels of health anxiety and psychological distress
5. Health Anxiety and psychological distress would be higher in individuals having a previous individual/family history of any physical/psychological issues.

**Method of the Study**

To check the objectives and hypothesis of this study the following scientific steps were taken by the researcher.

**Participants of the Study**

This study's participants were Emerging Adults aged 18-29. Both males and females were part of the study. The demographic variables were age, gender, qualification, birth order, any chronic physical/psychological illness, family history of physical/psychological illness, and socio-economic status.

**Research Design**

This study was quantitative in nature with cross-section research design.

**Sampling Method and Sample Size**

The total sample size of this study was (N=264) and data was collected by using non-probability, purposive sampling technique

**Measurement Scales**

To measure psychological distress, a self-report questionnaire developed by Kessler and Mroczek (1992) was used. This scale consists of 10 questions that measure emotional states each with a five-level response scale that can be used to identify and screen the level of distress.To measure personality traits, a ten-item personality inventory (TIPI) was used. This scale was developed by Samuel Gosling (2003). To measure health anxiety, a short health anxiety inventory was used. This scale was developed by Salkovskis et al. (2002). It consists of 18 items that assess health anxiety independent of physical health status. This scale can be used in both healthy individuals and physically ill individuals. Each item has different response options depending upon the level of health concerns.

**Results**

**Table 1 Path Analysis**

| | Original Sample (O) | Sample Mean (M) | Standard Deviation (STDEV) | T Statistics (\|O/STDEV\|) | P Values |
|---|---|---|---|---|---|
| Agreeableness -> Health Anxiety | -0.127 | -0.122 | 0.051 | 6.498 | 0.034 |
| Conscientiousness -> Health Anxiety | -0.777 | -0.811 | 0.046 | 8.687 | 0.013 |
| Emotional Stability -> Health Anxiety | -0.127 | -0.128 | 0.057 | 7.461 | 0.002 |
| Extraversion -> Health Anxiety | -0.334 | -0.329 | 0.054 | 9.620 | 0.003 |
| Openness to experience -> Health Anxiety | -0.339 | -0.346 | 0.044 | 13.883 | 0.003 |
| Psychological Distress -> Health Anxiety | 0.689 | 0.698 | 0.038 | 18.009 | 0.001 |
| Psychological Distress x Agreeableness -> Health Anxiety | 0.351 | 0.342 | 0.049 | 6.035 | 0.005 |
| Psychological Distress x Conscientiousness -> Health Anxiety | 0.346 | 0.352 | 0.043 | 7.074 | 0.005 |
| Psychological Distress x Emotional Stability -> Health Anxiety | 0.255 | 0.255 | 0.056 | 5.088 | 0.001 |
| Psychological Distress x Extraversion -> Health Anxiety | 0.232 | 0.222 | 0.048 | 9.661 | 0.003 |
| Psychological Distress x Openness to experience -> Health Anxiety | 0.340 | 0.334 | 0.049 | 12.822 | 0.004 |

The structural model results indicate that personality traits negatively predict health anxiety with agreeableness ($\beta = -0.127$, $p = 0.034$), conscientiousness ($\beta = -0.077$, $p = 0.013$), emotional stability ($\beta = -0.127$, $p = 0.002$), extraversion ($\beta = -0.338$, $p = 0.026$), and openness to experience ($\beta = -0.339$, $p = 0.013$) having an influence on the health anxiety. Instead, health anxiety is strongly increased by psychological distress ($\beta = 0.689$, $p = 0.001$). However, these relationships are moderated by psychological distress such that extraversion, agreeableness, conscientiousness, emotional stability, and openness to experience do not play a protective role. This shows how distress management can help to manage health anxiety.

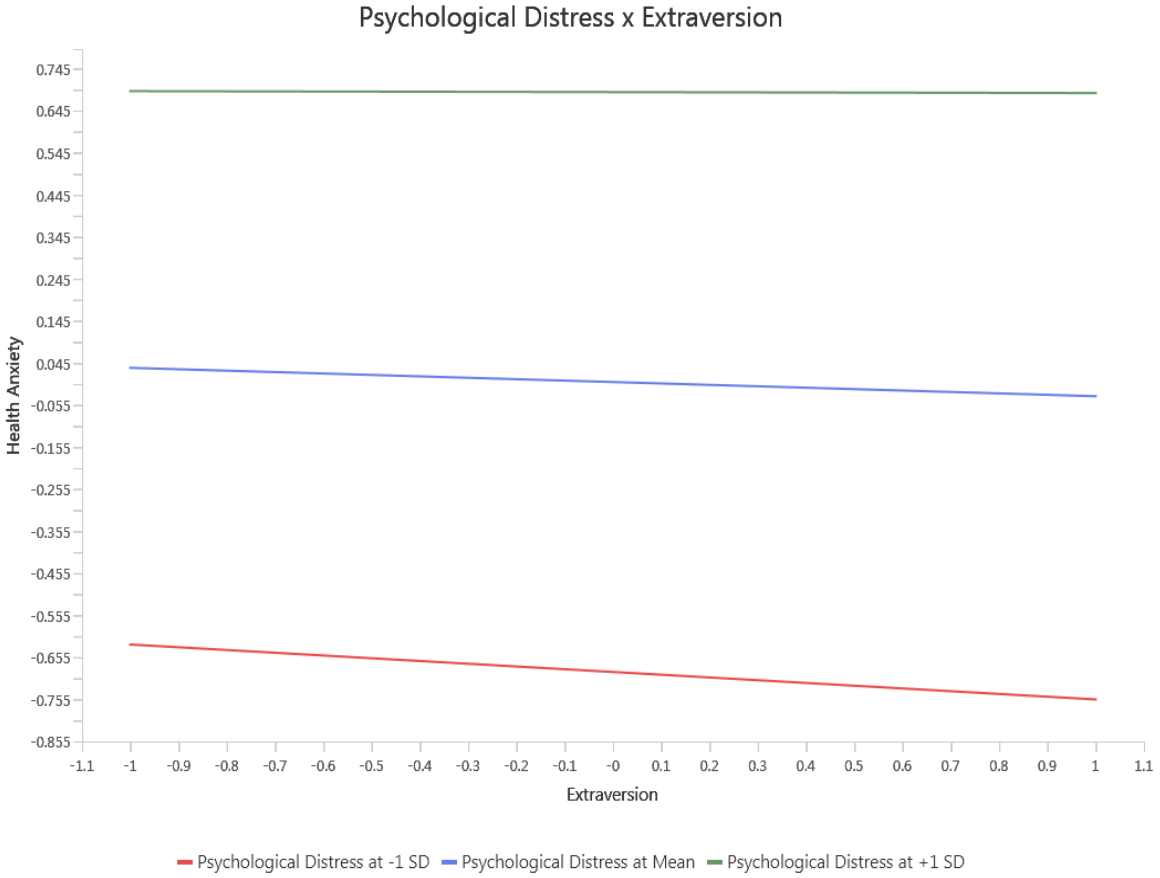
Table 2 Explanatory Power Assessment ($R^2$, $f^2$, and $Q^2$ Values)

| Construct | $R^2$ | $R^2$ Adjusted | $f^2$ (Effect Size) | $Q^2$ (Predictive Relevance) |
|---|---|---|---|---|
| Health Anxiety | 0.602 | 0.584 | | 0.509 |
| Agreeableness | | | 0.314 | |
| Conscientiousness | | | 0.313 | |
| Emotional Stability | | | 0.311 | |
| Extraversion | | | 0.422 | |
| Health Anxiety | | | | |
| Openness to experience | | | 0.542 | |
| Psychological Distress | | | 0.932 | |
| Psychological Distress **x** Agreeableness | | | 0.503 | |
| Psychological Distress **x** Conscientiousness | | | 0.525 | |
| Psychological Distress **x** Emotional Stability | | | 0.665 | |
| Psychological Distress **x** Extraversion | | | 0.453 | |
| Psychological Distress **x** Openness to experience | | | 0.463 | |

The $R^2$ value for the health anxiety model (i.e. explanatory power) = 0.602 and the adjusted $R^2$ value = 0.584 for explaining its variance, indicating that 60.2% of variance in the health anxiety

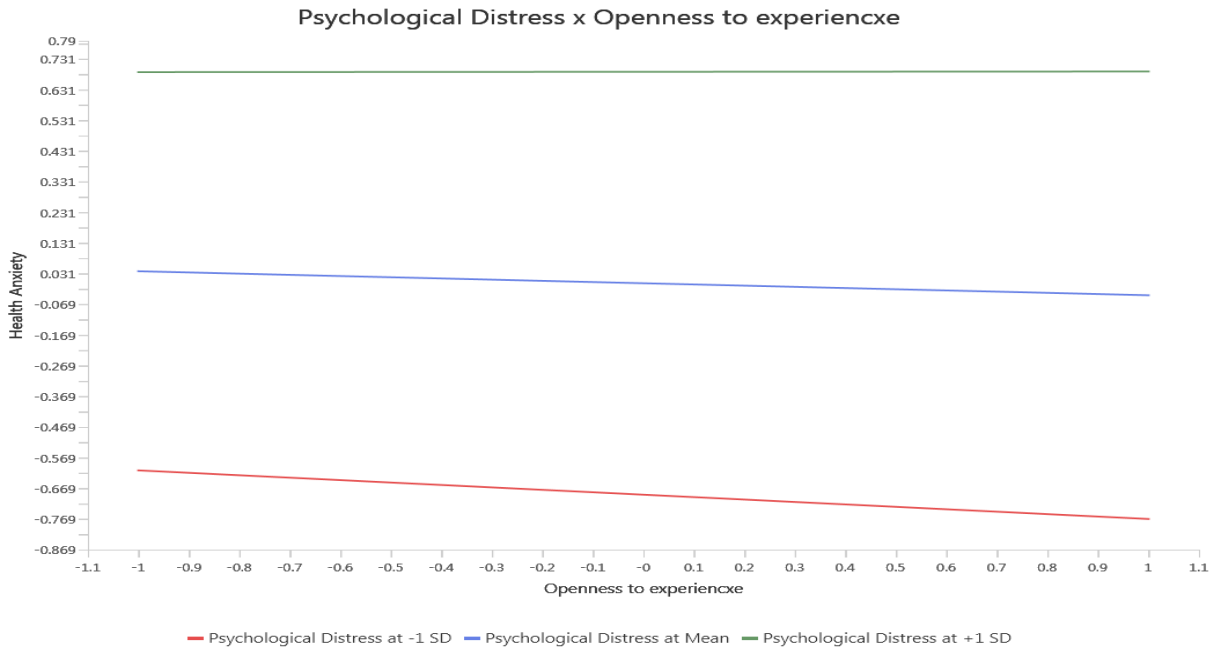
model was explained by the predictors. This result is confirmed by the $Q^2 = 0.509$ value of the model. Heightened levels of health anxiety is, first, best explained by the presence of high psychological distress ($f^2 = 0.932$), followed by open disposition to experience ($f^2 = 0.542$) and extraversion ($f^2 = 0.422$). The psychological distress also showed the moderating effects, and the interaction was the strongest for emotional stability (0.665), then for conscientiousness (0.525), then for agreeableness (0.503), implying their important role in determining health anxiety.

Figure 1 Moderation Graph



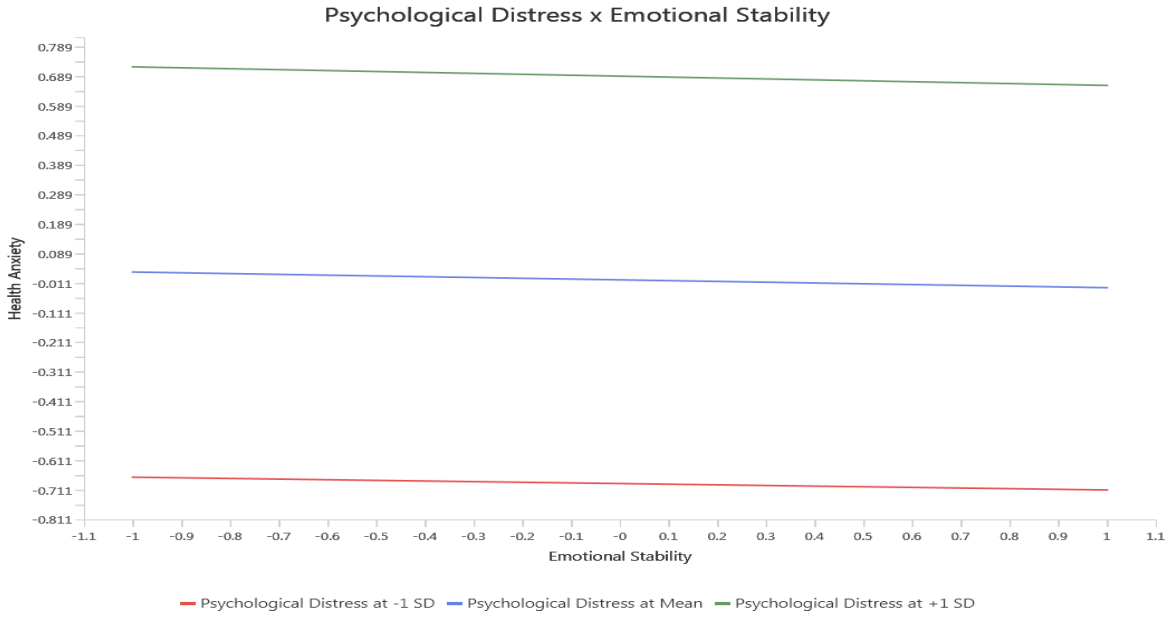

As the graph presents, the relationship between extraversion and health anxiety is moderated by psychological distress. High extraversion is related to low health anxiety (+1 SD, green line), but this relationship is stronger if psychological distress is elevated (+1 SD). For other levels of distress (-1 SD, red line), extraversion's effect of reducing health anxiety is weaker. Overall this indicates that health anxiety is protected to a stronger extent by extraversion for those who are experiencing a higher level of psychological distress.

Figure 2 Moderation Graph




The graph illustrates that psychological distress moderates between openness to experience and health anxiety. However, higher openness is associated with thinner health anxiety, but the effect is more pronounced at elevated levels of psychological distress (+1 SD, green line). Openness has a weaker effect of reducing health anxiety at lower distress levels (i.e. -1 SD, red line). The results of this suggest that the stronger level of protective factor against health anxiety for higher level of psychological distress lies in openness to experience.

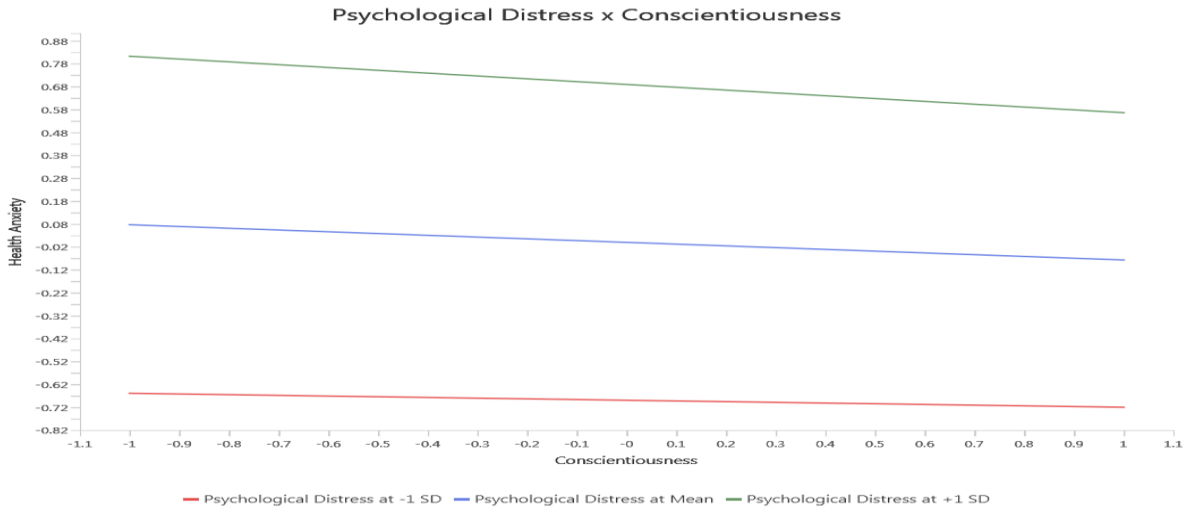
Figure 3 Moderation Graph




The results are shown on the graph where the line for psychological distress level changes the relationship between emotional stability and health anxiety. Positive health anxiety, however, only occurs at higher levels of psychological distress (+1 SD, green line). Less negative distress (i.e., -1SD, red line) results in weaker effect of emotional stability on reduced health anxiety.

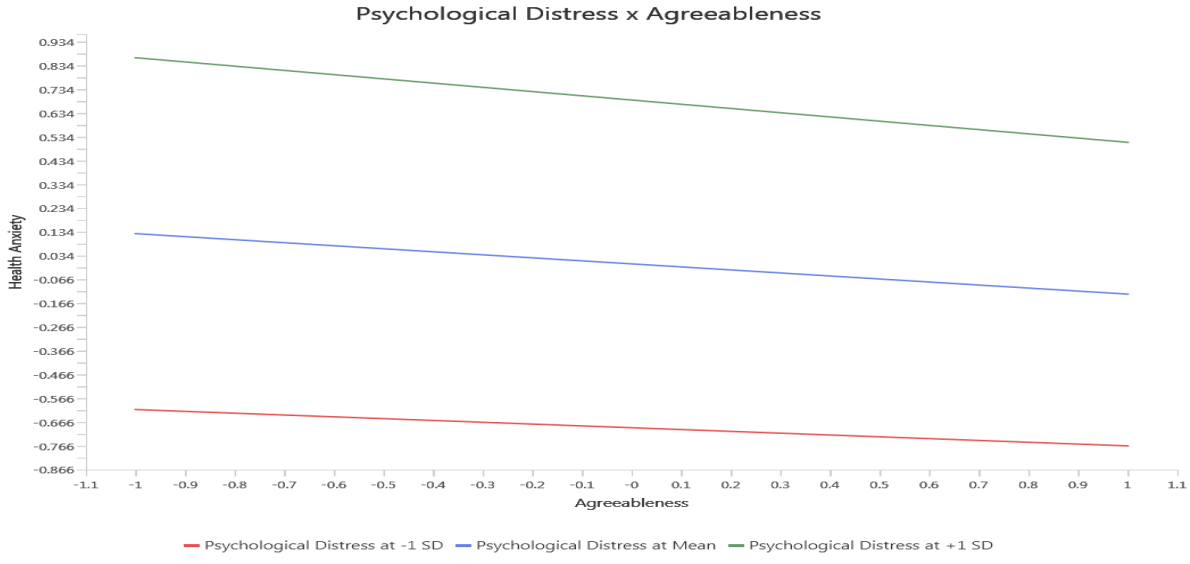
This implies that health anxiety is more strongly shielded against for people with high psychological propensity for distress.

Figure 4 Moderation Graph




Psychological distress moderates the relationship between conscientiousness and health anxiety, the graph shows. But they prove that health anxiety is lower when people are higher in conscientiousness (+1 standard deviation, green line), and that high level of psychological distress moderates this relationship. Conscientiousness weakens the reduction in health anxiety at lower distress levels (-1 SD, red line). This indicates that high psychological distress is a stronger protective factor of health anxiety for individuals who are high in conscientiousness.

Figure 5 Moderation Graph




The plot shows that psychological distress moderates the relationship between agreeableness and health anxiety. While higher agreeableness is normally associated with lower health anxiety, this effect varies as a function of levels of the distress. Agreeable individuals have the largest drop in health anxiety, reflected among responders in the largest negative relationship (+1 SD, green line) when distress is high (+1 SD, green line). Agreeableness has a weaker effect when distress is low (-1 SD, red line). This points to the effect of psychological distress

on the effect of agreeableness on health anxiety: agreeableness is more helpful to reduce health anxiety under high distress conditions.

able 3 Independent Sample t-Test
*Comparison of Psychological Distress, Personality Traits, and Health Anxiety across Family History*

| Variables | No Family History (n = 199) | | Family History (n = 65) | | p | t | Cohen's d |
|---|---|---|---|---|---|---|---|
| | M | SD | M | SD | | | |
| Psychological Distress | 27.02 | 8.009 | 31.09 | 5.550 | < .001 | -3.814 | 0.583 |
| Health Anxiety | 21.47 | 10.976 | 28.89 | 9.018 | < .001 | -4.935 | 0.743 |
| Extraversion | 8.02 | 2.60 | 7.76 | 2.22 | .002 | 5.844 | 0.383 |
| Agreeableness | 9.10 | 2.17 | 8.10 | 2.43 | .008 | 5.859 | 0.128 |
| Conscientiousness | 8.58 | 2.63 | 7.83 | 2.08 | .003 | 4.833 | 0.035 |
| Emotional Stability | 8.57 | 2.55 | 7.78 | 1.90 | .002 | 4.383 | 0.282 |
| Openness to experience | 8.75 | 2.45 | 8.15 | 2.25 | .001 | 3.935 | 0.383 |

Note. N=264

An independent samples t-test was conducted to examine differences in psychological distress, health anxiety, and personality traits based on family history. These results suggest that individuals had higher values of psychological distress (M=31.09) and health anxiety (M=28.89) than control group (M=27.02, M=21.47). Family history individuals scored lower in extraversion (M = 7.76 vs. 8.02), agreeableness (M = 8.10 vs. 9.10), conscientiousness (M = 7.83 vs. 8.58), emotional stability (M = 7.78 vs. 8.57), and openness to experience (M = 8.15 vs. 8.75), thus indicating a more reserved and emotionally reactive personality.

Table 4 Independent Sample t-Test for Psychological Distress, Personality Traits, and Health Anxietyacross Chronic Illness

| Variables | No Chronic Illness (n = 210) | | Chronic Illness (n = 54) | | p | t | Cohen's d |
|---|---|---|---|---|---|---|---|
| | M | SD | M | SD | | | |
| Psychological Distress | 26.88 | 7.867 | 32.44 | 4.796 | .001 | -4.961 | 0.872 |
| Health Anxiety | 21.49 | 10.886 | 30.31 | 8.296 | .001 | -5.553 | 0.938 |
| Extraversion | 7.96 | 2.55 | 7.94 | 2.37 | .02 | 4.33 | 0.439 |
| Agreeableness | 9.00 | 2.31 | 8.27 | 2.38 | .04 | 3.47 | 0.293 |
| Conscientiousness | 8.52 | 2.61 | 7.88 | 2.13 | .001 | 45.47 | 0.582 |
| Emotional Stability | 8.46 | 2.49 | 8.07 | 2.12 | .04 | 2.56 | 0.383 |
| Openness to experience | 8.74 | 2.48 | 8.07 | 2.09 | .01 | 3.45 | 0.143 |

Note. N=264

The individuals with chronic illness also reported higher psychological distress (M = 32.44) and health anxiety (M = 30.31) compared to those without chronic illness (M = 26.88; M = 21.49). For instance, for their personality dimension, those who are chronically ill have lower extraversion (M = 7.94 vs. 7.96), agreeableness (M = 8.27 vs. 9.00), conscientiousness (M = 7.88 vs. 8.52), emotional stability (M = 8.07 vs. 8.46), and openness to experience (M = 8.07 vs. 8.74).

Table 5 Independent Sample t-Testfor Psychological Distress, Personality Traits, and Health Anxietybetween Male and Female

| Variables | Male (n = 51) | | Female (n = 213) | | p | t | Cohen's d |
|---|---|---|---|---|---|---|---|
| | M | SD | M | SD | | | |
| Psychological Distress | 25.22 | 8.411 | 28.66 | 7.375 | .00 | -2.89 | .431 |
| Health Anxiety | 19.72 | 10.457 | 24.08 | 10.966 | .01 | -2.55 | .388 |
| Extraversion | 7.44 | 2.61 | 8.07 | 2.48 | .01 | 3.28 | .3342 |
| Agreeableness | 8.64 | 2.63 | 8.89 | 2.19 | .02 | 2.53 | .393 |
| Conscientiousness | 8.68 | 2.62 | 8.35 | 2.48 | .002 | 4.38 | .039 |
| Emotional Stability | 9.10 | 2.77 | 8.22 | 2.31 | .022 | 2.61 | .028 |
| Openness to experience | 8.76 | 2.84 | 8.56 | 2.31 | .001 | 3.24 | .0373 |

Note. N=264

Males reported higher psychological distress (M = 25.22) and health anxiety (M = 19.72) than females (M = 28.66, M = 24.08). Females were higher in extraversion (M=8.07 vs 7.44), agreeableness (M=8.89 vs 8.64) and openness to experience (M=8.56 vs 8.76) than males, but slightly more conscientiousness (M= 8.68 vs 8.35) and emotional stability (M=9.10 vs 8.22) than males, which indicated that there were possible gender differences.

**Discussion**

The current study aimed to investigate the link between personality traits, health anxiety, and psychological distress among emerging adults. It also aimed to investigate the moderating role of psychological distress with each personality trait and health anxiety in south Punjab. Finally, it was hypothesized that psychological distress moderates the five personality traits (Extraversion, Neuroticism, Openness, Agreeableness, Conscientiousness) and health anxiety. At first, demographic variable information of the sample was found in which percentages of demographics included in the study were calculated. The duration, percentages, and number of participants of particular demographic characteristics were calculated using descriptive statistics. Total main demographic variables are arranged in order of percentages and frequencies which makes data meaningful. The inferential statistic included was a correlation between study variables and the regression analysis to comprehend the effect of independent variables on dependent variables and the moderation analysis to check the moderating role of psychological distress with five personality traits. The first hypothesis states that "There would be a significant relationship between Psychological distress, Personality Traits, and Health Anxiety among emerging adults". The results supported the hypothesis (as shown in Table 3). Significant correlations are found between Psychological Distress and Agreeableness (r = -.260), Conscientiousness (r = -.287), Emotional Stability (r = -.300), Openness to Experiences (r = -.303) , but also strongly positive with Health Anxiety (r = .730). results are in line with previous research stating that health anxiety is significantly and positively related to neuroticism or emotional stability and extraversion is negatively correlated with health anxiety (Zhang et al., 2014). Another study reported that conscientiousness and openness to experience

are positively related to modern health anxiety and also found to be significant predictors of it (Furnham et al., 2012). Literature also supports psychological distress and personality correlations reporting that high neuroticism is related to higher psychological distress (Mckenzie et al., 2012). Psychological distress is highly correlated with health-related quality of life and personality variables (Paika et al., 2010). The second hypothesis states that "Personality traits would predict health anxiety among emerging adults". this hypothesis was supported as shown in (Table 4). Regression analysis showed 19.1% of variance by personality traits. It was found that Agreeableness, Conscientiousness, Emotional stability, and Openness to Experience negatively predict health anxiety. The results were in line with previous research. Anxiety sensitivity (exposed by the trait of emotional stability or neuroticism) and intolerance of uncertainty are predictors of health anxiety (Gerlimatos & Edelstein, 2012). Another research reported that negative affectivity, detachment, low disinhibition, and anxiousness are significant predictors of high health anxiety (Skjernov et al., 2020). The third hypothesis stated that "Psychological distress moderates the relationship between personality traits and health anxiety" was supported in this study as shown in structural assessment model and moderations graphs for each trait separately. Subhypothesis 3 (a) states that psychological distress moderates the relationship between personality traits and health anxiety is confirmed by moderation graph (Figure 2) which represents that extraversion and health anxiety is moderated by psychological distress. Psychological distress negatively moderates this relationship as high psychological distress lowers extraversion and increases health anxiety. Results are consistent with previous researches that psychological distress is the cause of high health anxiety. This trait work as protective factor for health but as psychological distress increases it decreases the extraverted traits of individuals and leads to more health anxiety. A study reported that extraversion is negatively related to anxiety (Jylha, 2006).

Sub-hypothesis 3(b) states the moderation of psychological distress with openness to experience and health anxiety. This hypothesis was supported in this research as shown in (figure 3). Higher openness is associated with thinner health anxiety, but the effect is more pronounced at elevated levels of psychological distress. Openness has a weaker effect on reducing health anxiety at lower distress levels. The results of this suggest that the stronger level of protective factor against health anxiety for a higher level of psychological distress lies in openness to experience. Results are in line with previous research reporting that openness to experience is negatively related to health anxiety (Kamali et al., 2024). The third sub-hypothesis (3c) states the moderation of psychological distress in emotional stability and health anxiety was supported in this study as shown in (figure 4). Positive health anxiety, however, only occurs at higher levels of psychological distress. Less negative distress results in weaker effect of emotional stability on reduced health anxiety. This implies that health anxiety is more strongly shielded against for people with high psychological propensity for distress. Results were in line with previous research, Alizadeh et al. (2018) reported that neuroticism (emotional instability) is the best predictor of psychological problems such as stress, anxiety, and depression while other personality traits can work as protective factors.

Subhypothesis (3d) states that psychological distress moderates the relationship between conscientiousness and health anxiety was supported and results showed (figure 5) that health anxiety is lower when people are higher in conscientiousness, and that a high level of psychological distress moderates this relationship. Conscientiousness weakens the reduction in health anxiety at lower distress levels. This indicates that high psychological distress is a stronger protective factor of health anxiety for individuals who are high in conscientiousness. The last sub-hypothesis states that psychological distress moderates the relationship between agreeableness and health anxiety was supported in this study and shown in (figure 6). While higher agreeableness is normally associated with lower health anxiety, this effect varies as a

function of levels of distress. Agreeable individuals have the largest drop in health anxiety, reflected among responders in the largest negative relationship when distress is high. Agreeableness has a weaker effect when distress is low (-1 SD, red line). This points to the effect of psychological distress on the effect of agreeableness on health anxiety: agreeableness is more helpful to reduce health anxiety under high-distress conditions. Results are in line with previous research that states Agreeableness and conscientiousness were found to be negatively related to anxiety and depression (Nikcevic et al., 2021). The fourth hypothesis states that "there exists a gender difference in the level of health anxiety and psychological distress". Results from one sample t-test (Table 8) support the hypotheses Findings show that females have higher scores on health anxiety and psychological distress than the males. Matud et al. (2015) state that women had reported more psychological distress as compared to men, regardless of some common features in both groups, there exist a gender difference in psychological distress and this stress is attributed to more childcare activities and less enjoyment in life. The fifth hypothesis states that "individuals having a previous personal or family history of any medical/psychological issue have more health anxiety and psychological distress". Results support the hypothesis (as shown in the table 6) Findings shows that Psychological distress and health anxiety in people with family history of mental health were reported higher than the individuals without such history. On the contrary, people with underlying family history had lower personality trait scores than those without. literature also supports the hypothesis that family history of psychological illness increase risk of health anxiety. Research reports that The tendency toward a correlation between the occurrence of Health Anxiety in adulthood and the transfer of Health Anxiety and sickness beliefs, childhood illness experiences, and an anxious attachment style across generations (Thorgaard et al., 2018).

## Conclusion

In summary, the current research proved that personality traits, health anxiety, and psychological distress are highly related to each other in South Punjab's emerging adults. The results proved that psychological distress moderated the link between the Big Five personality traits and health anxiety significantly, identifying that personality traits like extraversion, agreeableness, conscientiousness, emotional stability, and openness act as protective factors but their buffering effects diminish when there is high psychological distress. Furthermore, regression analysis validated that personality facets strongly predict health anxiety, and gender differences and family history of medical or psychological conditions are significant predictors of distress and anxiety levels, with females and those with family history reporting greater vulnerability. Together, the findings support the previous literature in affirming that not only individual personality dispositions but also contextual and psychological stressors contribute to the shaping of health anxiety, thus highlighting the necessity for specific interventions aimed at enhancing adaptive qualities, mitigating distress, and early intervention for high-risk groups.

## Reference


Alizadeh, Z., Feizi, A., Rejali, M., Afshar, H., Keshteli, A. H., & Adibi, P. (2018). The predictive value of personality traits for psychological problems (stress, anxiety and depression): Results from a large population based study. Journal of epidemiology and global health, 8(3), 124-133.

American Psychiatric Association. (2018). Diagnostic and statistical manual of mental disorders (5th ed., text rev.).

Asmundson, G. J. G., & Le Bouthillier, D. (2012). Somatic symptom and related disorders.

Asmundson, G. J. G., Abramowitz, J. S., Richter, A. A., & Whedon, M. (2010). Health anxiety:

Barsky, A. (8). & Klerman, G.(1990). Overview: hypochondriasis. Bodily complaints and somatic styles. American journal of psychiatry, 140, 275-283.

Bore, M., Kelly, B., & Nair, B. (2016). Potential predictors of psychological distress and well-being in medical students: a cross-sectional pilot study. Advances in medical education and practice, 125-135.

Chong, S. A., et al. (2004). Personality and mental health in young adulthood: a longitudinal study. Journal of Personality and Social Psychology, 86(1), 113-129.

Cox, B. J., Borger, S. C., Asmundson, G. J., & Taylor, S. (2000). Dimensions of hypochondriasis and the five-factor model of personality. Personality and individual differences, 29(1), 99-108.

Fallon, B. A., Harper, K. M., Landa, A., Pavlicova, M., Schneier, F. R., Carson, A., ... & Liebowitz, M. R. (2012). Personality disorders in hypochondriasis: prevalence and comparison with two anxiety disorders. Psychosomatics, 53(6), 566-574.

Ferguson, E. (2004). Personality as a predictor of hypochondriacal concerns: Results from two longitudinal studies. Journal of psychosomatic research, 56(3), 307-312.

Ferguson, E. (2009). A taxometric analysis of health anxiety. Psychological Medicine, 39, 277–285.

Furnham, A., Strait, L., & Hughes, D. J. (2012). Modern health worries and personality. Personality and Mental Health, 6(3), 242-254.Garbóczy, S., Szemán-Nagy, A., Ahmad, M. S., Harsányi, S., Ocsenás, D., Rekenyi, V., ... & Kolozsvári, L. R. (2021). Health anxiety, perceived stress, and coping styles in the shadow of the COVID-19. BMC psychology, 9, 1-13.

Gerolimatos, L. A., & Edelstein, B. A. (2012). Predictors of health anxiety among older and young adults. International Psychogeriatrics, 24(12), 1998-2008.

Gosling, S. D., Rentfrow, P. J., & Swann, W. B., Jr. (2003). A very brief measure of the Big-Five personality domains. *Journal of Research in Personality, 37*(6), 504–528. https://doi.org/10.1016/S0092-6566(03)00046-1

Griem, J., Stone, J., Carson, A., & Kopelman, M. D. (2016). Psychologic/functional forms of memory disorder. Handbook of clinical neurology, 139, 407-417.

Joshanloo, M. (2023). Longitudinal relationship between psychological distress and personality traits. Stress and Health.

Jylhä, P., & Isometsä, E. (2006). The relationship of neuroticism and extraversion to symptoms of anxiety and depression in the general population. Depression and anxiety, 23(5), 281-289.

Kamali, M., Mousavi, S. K., Akbari, F., Khodabandeh, M., & Moharramkhani, M. (2024). Relationship Between Personality Traits and Health Anxiety Among Nurses. Journal of Holistic Nursing And Midwifery, 34(2), 159-166.

Kessler, R. C., & Mroczek, D. K. (1992). *An update of the development of mental health screening scales for the National Health Interview Survey*. University of Michigan, Institute for Social Research.

Kotov, R., Gamez, W., Schmidt, F., & Watson, D. (2010). Linking "big" personality traits to anxiety, depressive, and substance use disorders: a meta-analysis. Psychological bulletin, 136(5), 768.

Lazarus, R. S., & Folkman, S. (1989). Hassles and uplifts scales. Palo Alto, CA: Consulting psychological press

Lee, S. A., Jobe, M. C., Mathis, A. A., & Gibbons, J. A. (2020). Incremental validity of coronaphobia: Coronavirus anxiety explains depression, generalized anxiety, and death anxiety. Journal of anxiety disorders, 74, 102268.

Longley, S. L., Calamari, J. E., Wu, K., & Wade, M. (2010). Anxiety as a context for understanding associations between hypochondriasis, obsessive-compulsive, and panic attack symptoms. Behavior therapy, 41(4), 461-474.

Marcus, D. K., Hughes, K. T., & Arnau, R. C. (2004). Health anxiety, rumination, and negative affect: A mediational analysis. Journal of Psychosomatic Research, 64(5),

Matud, M. P., Bethencourt, J. M., & Ibáñez, I. (2015). Gender differences in psychological distress in Spain. International Journal of Social Psychiatry, 61(6), 560-568.

McAdams, D. P. (2015). A conceptual history of personality psychology. In Handbook of personality psychology (pp. 3-39). Academic Press.

McKenzie, S. H., Jayasinghe, U. W., Fanaian, M., Passey, M., Lyle, D., Davies, G. P., & Harris, M. F. (2012). Socio-demographic factors, behaviour and personality: associations with psychological distress. European journal of preventive cardiology, 19(2), 250-257.

Nikčević, A. V., Marino, C., Kolubinski, D. C., Leach, D., & Spada, M. M. (2021). Modelling the contribution of the Big Five personality traits, health anxiety, and COVID-19 psychological distress to generalised anxiety and depressive symptoms during the COVID-19 pandemic. Journal of affective disorders, 279, 578-584.

Noyes Jr, R., Happel, R. L., & Yagla, S. J. (1999). Correlates of hypochondriasis in a nonclinical population. Psychosomatics, 40(6), 461-469.

Owens, K. M., Asmundson, G. J., Hadjistavropoulos, T., & Owens, T. J. (2004). Attentional bias toward illness threat in individuals with elevated health anxiety. Cognitive Therapy and Research, 28, 57-66.

Paika, V., Almyroudi, A., Tomenson, B., Creed, F., Kampletsas, E. O., Siafaka, V., ... & Hyphantis, T. (2010). Personality variables are associated with colorectal cancer patients' quality of life independent of psychological distress and disease severity. Psycho-Oncology: Journal of the Psychological, Social and Behavioral Dimensions of Cancer, 19(3), 273-282.

Quilty, L. C., Pelletier, M., DeYoung, C. G., & Bagby, R. M. (2013). Hierarchical personality traits and the distinction between unipolar and bipolar disorders. Journal of affective disorders, 147(1-3), 247-254.

Ridolfi, D. R., & Crowther, J. H. (2013). The link between women's body image disturbances and body-focused cancer screening behaviors: A critical review of the literature and a new integrated model for women. Body image, 10(2), 149-162.

Sakai, R., Nestoriuc, Y., Nolido, N. V., & Barsky, A. J. (2010). The prevalence of personality disorders in hypochondriasis. The Journal of clinical psychiatry, 71(1), 15476.

Salkovskis, P. M. (2002). A cognitive-behavioral theory of hypochondriasis. In G. C. L. Davey & A. Wells (Eds.), Worry and its psychological disorders: Theory, assessment and treatment (pp. 207-230). Wiley.

Salkovskis, P. M., Rimes, K. A., Warwick, H. M. C., & Clark, D. M. (2002). The Health Anxiety Inventory: Development and validation of scales for the measurement of health anxiety and hypochondriasis. *Psychological Medicine*, *32*(5), 843–853. https://doi.org/10.1017/S0033291702005822

Skjernov, M., Bach, B., Fink, P., Fallon, B., Soegaard, U., & Simonsen, E. (2020). DSM-5 personality disorders and traits in patients with severe health anxiety. The Journal of Nervous and Mental Disease, 208(2), 108-117.

Strickhouser, J. E., Zell, E., & Krizan, Z. (2017). Does personality predict health and well-being? A metasynthesis. Health psychology, 36(8), 797.

Thorgaard, M. V., Frostholm, L., & Rask, C. U. (2018). Childhood and family factors in the development of health anxiety: A systematic review. Children's Health Care, 47(2), 198-238.

Wheaton, B., et al. (2012). The role of personality in mental health: A life-course perspective. Annual Review of Clinical Psychology, 8, 293-318.

Wu, J., et al. (2009). The association between personality traits and mental health outcomes: A meta-analysis. Personality and Individual Differences, 46(6), 531-540.

Yip, A. W. C., et al. (2010). The role of personality traits in mental health: A meta-analytic review. Clinical Psychology Review, 30(2), 151-157.
Zhang, Y., Zhao, Y., Mao, S., Li, G., & Yuan, Y. (2014). Investigation of health anxiety and its related factors in nursing students. Neuropsychiatric disease and treatment, 1223-1234.