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The Partial Mediator Role of Satisficing Decision-Making Style Between Trait Emotional Intelligence and Compassion Fatigue in Healthcare Professionals

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Abstract

Background: Compassion fatigue (CF) represents a relevant issue for healthcare professionals. Currently, it is still unclear which psychological mechanism might lead to CF and which might protect workers from that. Decision-making styles, as well as emotional intelligence, might partially account for the presence of CF. Specifically, we hypothesized that a satisficing decision-making style would mediate the relationship between emotional intelligence and CF.

Methods: A cross-sectional online survey was conducted on physicians and nurses from Italian Medical Departments. Three self-reported questionnaires were administered to collect data in accordance with our aims. A mediation model with Structural Equation Modeling on the relationship between trait emotional intelligence (TEI) and CF through the maximizing decision-making style was performed.

Results: We found a significant relationship between TEI and CF ($\beta = -0.28$, SE = 0.04, $p < .001$). The maximizing style partially mediated this relationship ($\beta = -0.04$, SE = 0.01, $p < .001$). Moreover, negative relationships were found between sex (male), working hours, sleep quality, and CF. Conversely, a positive relationship between age and CF was demonstrated.

Conclusions: Being emotionally intelligent resulted as a protective factor for developing CF, while the decision-making styles shaped the risk of developing CF.

Keywords

compassion fatigue, emotion, emotional intelligence, decision-making, personality, satisficer, maximizer, healthcare professionals

Introduction

In recent years, *compassion fatigue* has gained increased attention and has become an important challenge in the healthcare field (Nolte et al., 2017).

For the first time, compassion fatigue was defined by Joison (Joinson, 1992) in nursing, referring to a state of exhaustion and negative changes in cognitive schemes and beliefs due to the empathetic and overdemanding involvement with patients in suffering (Boyle, 2015). Other terms were used interchangeably to represent the same condition (Bride et al., 2007); the main ones were "vicarious traumatization" (McCann & Pearlman, 1990) and "secondary traumatic stress" (Figley, 1995). All of these definitions were included in one strain construct as "empathy-based stress" (Rauvola et al., 2019): "*a process of trauma exposure (i.e., a stressor) combined with the experience of empathy (i.e., an individually- and contextually-driven affective reaction) that results in empathy-based strain, adverse occupational health reactions, and other work-relevant outcomes (p. 3)*". However, as Figley (1995) suggested, the concept of compassion encompasses different emotional states that move from work satisfaction to extreme fatigue, tension, and preoccupation. Not only, but this notion also permits focusing the attention on the subjective cost of the empathy of who gives care (Swain, 2014). Accruing evidence (Cocker & Joss, 2016; Dasan et al., 2015; Nolte et al., 2017; Sabo, 2008) have stressed

the detrimental effect of compassion fatigue on healthcare providers since it exposes them to the risk of developing secondary traumatic stress disorder and other negative consequences (e.g., anxiety, depression, sleep disorders). Specifically, in the Italian context, it has been demonstrated that environmental strains (e.g., time pressure), as well as the imbalance between work and life (i.e., lack of reconciliation of work and private life), seem to exacerbate the compassion fatigue levels, increasing the cognitive overloading perceived and, consequently as a vicious cycle, reducing the time for debriefing and rising the stress perceived (Cetrano et al., 2017).

Moreover, compassion fatigue has been demonstrated to impact cognitive abilities directly. More specifically, it seems to cause impairment at the level of decision-making processes increasing the risk of incurring medical errors. For example, a recent study (Sabanciogullari et al., 2021) revealed that the nurses' tendency to make clinical errors (e.g., infections during hospitalization, inadequate monitoring of patients, lack of communication, incorrect or inappropriate materials use) are related to their compassion fatigue levels. Coherently, nurses with a low level of compassion fatigue were more likely to make fewer mistakes related to nursing practice (i.e., medication and transfusion, hospital infections, patient monitoring, material-equipment safety, fall prevention, and communication issues) and to ensure patients' safety more than those with high levels of distress and fatigue (Sabanciogullari et al., 2021). Additionally, it has been demonstrated that under acute stress conditions, individuals tend to make decisions using an experiential system processing the information in a non-analytic way, and consequently engaging in poorer and riskier decisions (Masiero et al., 2018; Michailidis & Banks, 2016; Porcelli & Delgado, 2009; 2017; van den Bos et al., 2009). This cognitive shifting might be explained considering the dual-process theory of reasoning (Kahneman & Frederick, 2002). This theory suggests the use of two different systems during the decision-making process: System 1 is characterized by rapid, parallel, and automatic processes; while System 2 is based on the systematic and analytical elaboration of the information and makes use of the central working memory system (Croskerry, 2009; Evans, 2003). Consistently, a high-stress level might obstruct rational and explicit processes, resulting in more automatic and implicit ones (Masiero et al., 2018) since System 2 fails to adequately monitor the automatic process (System 1) when individuals are under stress. This process results in an oversimplification of alternatives, concentration loss, and difficulty perceiving new information in a decisional context (Croskerry, 2009; Morris, 2005). Even though compassion fatigue is a common condition among healthcare professionals (ranging from 7% to 86%) (Cavanagh et al., 2020; Van Mol et al., 2015), not all of them are at risk of developing it, encountering related negative psychological (e.g., secondary traumatic stress disorder, etc.) and cognitive (i.e., the collapse communication between system 1 and system 2) consequences. Therefore, it is fundamental to investigate the psychological factors that could act as protective or risk factors to understand such variability better.

Emotions play a key role in clinical decision-making and are usually impaired in healthcare providers suffering from compassion fatigue and burnout (Bechara & Damasio, 2005; Kozlowski et al., 2017; Lerner et al., 2015; Mazzocco et al., 2019). According to the

Broaden-and-Build Theory (Fredrickson & Branigan, 2005), positive emotions are protective factors for building and growing psychological flexibility, including the decision-making process; conversely, negative ones restrict through-action repertories. In the clinical setting, a tendency to experience negative emotions has been demonstrated to impact patient safety outcomes (Heyhoe et al., 2016). In particular, it seems to increase the risk of making medical errors (e.g., patient falls, hospital-acquired infections, medication errors), leading healthcare professionals to experience more emotional distress for the errors made (Heyhoe et al., 2016). As Gerard and colleagues (Gerard, 2017) suggested, compassion fatigue is not solely generated by compassion per *se* (i.e., the empathetic engagement of healthcare professionals with patients suffering). Still, it is prevalently related to anxiety avoidance of negative emotions (Gerard, 2017). For this reason, a high ability to recognize one's own and others' emotions and manage them is a crucial protective factor against the risk of developing compassion fatigue. Goleman (1995) defined this ability as *emotional intelligence*: the self-perceived capacity to recognize, assess, and manage your feelings and emotions and those of others. Several studies have demonstrated the role of emotional intelligence among healthcare professionals in treating, caring, and communicating with patients efficiently (Faguy, 2012; Nightingale et al., 2018) and in reducing distress, including compassion fatigue (Amir et al., 2019; Beauvais et al., 2017; Kabunga et al., 2020; Yearwood, 2021; Zeidner et al., 2013). A recent review by Kozlowski and colleagues (Kozlowski et al., 2017) also highlighted that emotionally intelligent healthcare professionals – who were more competent to recognize, assess, and manage their own negative emotions and those of their patients (e.g., fear, anxiety, regret, hostility, discomfort) – were more likely to make efficient decisions. The authors also suggested that this ability positively affect clinical decision-making, enhancing caring behaviors and reducing biases during decisions. However, as Petrides (2010) suggested, Goleman's model of emotional intelligence (1995) has some limitations, one of which is related to the lack of its operalization. Petrides (2010) pointed out that the *trait emotional intelligence* is the only operational definition that recognizes the subjective experience of emotions. In particular, the trait of emotional intelligence is a constellation of emotional self-perceptions situated in the lower level of personality hierarchies. The trait emotional intelligence links the emotional intelligence construct to mainstream research (Petrides, 2010) on differential psychology areas such as nursing (Quoidbach & Hansenne, 2009). Still, it is essential to investigate how such a fundamental psychological trait affects the well-being of healthcare workers.

Overall, emotions impact the decision-making process, but the response tendencies to decisions might also affect the individual's emotional and psychological state. Schwartz et al. (2002) suggested that these response tendencies may be positioned in a continuum from satisficing to maximizing. Maximizers optimize their choice by searching for more alternatives, while satisficers select options that meet their minimum criteria. As explained by the "*maximization paradox*" (Dar-Nimrod et al., 2009), searching for the "best" option (maximizing tendency) has been demonstrated to be associated with more depression, unhappiness, lower optimism and self-esteem, and life unsatisfaction (Schwartz, 2004; Schwartz et al., 2002). Therefore, this tendency acts as a risk factor for health, increasing the probability of making sub-optimal

decisions. For example, a study on healthcare professionals stressed that rational and avoidant decision-making styles seem to predict all dimensions of burnout (depersonalization, emotional exhaustion, professional inefficacy, and disillusionment), consequently reducing spontaneity and intuition but also these styles result in difficulty in identifying feelings (Masiero et al., 2018).

Notwithstanding, evidence on the relationship between decision-making styles and compassion fatigue is still in infancy. This study investigates the relationships between emotional intelligence, maximizing/ or satisficing decision-making style, and compassion fatigue. Consistently, we hypothesized that a satisficing decision-making style (i.e., the tendency to which a person tends to pursue not the "best" option but the "good enough" when making choices) would mediate the relationship between emotional intelligence and compassion fatigue. In other words, we expected that healthcare professionals who were more in touch with their own emotions (i.e., who had a higher global trait emotional intelligence) would be not at risk of developing compassion fatigue both directly and through the adoption of a satisficing decision-making style.

Method

Procedure

From December 2019 to February 2020, a cross-sectional online survey was conducted on healthcare professionals from Medical Departments of different Italian hospitals. Participants were recruited by posting a link on social media. A posthoc power analysis was conducted to determine statistical power in a mediation model. For that, we followed the simulation procedure of Fritz and MacKinnon (Fritz & MacKinnon, 2007), considering Baron and Kenny's test in which a sample of 425 is deemed to be sufficient to achieve a power of 0.8 with a size of 0.14 (for the direct effect of X on Y adjusted for M), 0.39 (for the path a: the effect of X on Y), and 0.10 (for the path b: the effect of M on Y). Participants' inclusion criteria were as follows: (1) physicians, nurses, or healthcare assistants; (2) working in different Medical Departments of Italian hospitals; (3) Italian mother tongue. Participation was voluntary and completely anonymous, and after signing the informed consent, they were asked to complete a validated and standardized battery of questionnaires. Participants did not receive any compensation. The study was conducted according to the Declaration of Helsinki.

Measures

Decision-making styles were assessed using the Maximization scale (Schwartz et al., 2002), a 13-item self-report questionnaire on a seven-point Likert scale (from 1 = "completely disagree" to 7 = "completely agree"). These items assess the degree to which a person tends to optimize when making choices. Three subscales compose the maximization scale ($\alpha = 0.71$): high standards, alternative search, and decision difficulty. A final score was created by calculating the average of 13 items, with higher

Table 1. Descriptive Statistics of the Scales and Results of the Reliability Analysis.

	M (SD)	Skewness (SE)	Kurtosis (SE)	α (rs)
Maximization summed scale	3.540 (0.905)	0.276 (0.097)	0.057 (0.194)	0.74 (0.16)
High standards	4.477 (1.115)	−0.134 (0.097)	0.026 (0.194)	0.49 (0.26)
Alternative search	3.374 (1.187)	0.286 (0.097)	−0.266 (0.194)	0.67 (0.30)
Decision difficulty	3.087 (1.363)	0.455 (0.097)	−0.463 (0.194)	0.70 (0.44)
Global trait emotional intelligence	5.022 (0.752)	−0.408 (0.097)	0.074 (0.194)	0.89 (0.16)
Emotionality	5.197 (0.865)	−0.319 (0.097)	0.015 (0.194)	0.63 (0.34)
Self-control	4.621 (0.972)	−0.183 (0.097)	−0.059 (0.194)	0.67 (0.30)
Sociability	4.674 (0.970)	−0.334 (0.097)	0.222 (0.194)	0.70 (0.38)
Well-being	5.346 (1.043)	−0.817 (0.097)	0.436 (0.194)	0.83 (0.48)
Compassion fatigue	2.024 (0.647)	0.840 (0.097)	0.615 (0.194)	0.76 (0.30)

scores indicating the maximizing tendency (i.e., to pursue the "best" option); conversely, lower scores indicate that an individual is a satisficer, who seeks not the "best" option, but a "good enough". For descriptive statistics and Cronbach's alpha, see Table 1.

Compassion fatigue (CF) was assessed using a subscale of the Italian version of the Professional Quality of Life Scale (I-proQoL) (Palestini et al., 2009), based on the revision of the original one (Stamm, 2010). The I-proQoL is a 22-item self-report questionnaire on a five-point Likert scale (from 1 = "never" to 5 = "always"). These items assess the quality of life of healthcare professionals considering three specific dimensions: compassion satisfaction ($\alpha = 0.84$), compassion fatigue ($\alpha = 0.74$), and burnout ($\alpha = 0.80$). A final score was created for the CF dimension by calculating the average of seven items, with higher scores indicating secondary traumatization. For descriptive statistics and Cronbach's alpha, see Table 1.

Trait Emotional Intelligence (TEI) was measured by the Italian version of the Trait Emotional Intelligence Questionnaire – Short Form (I-TEIQue-SF) (Di Fabio, 2013), based on the original one (Petrides, 2009). Since testing emotional intelligence as a quotient does not capture at all the subjectivity of emotional experience, we decided to measure TEI following Petrides (Petrides, 2010) because only a person with direct access to the information that is necessary for making such a judgment could evaluate their emotional experience. The I-TEIQue is a 30-item self-report questionnaire on a 7-point Likert scale (from 1 = "completely disagree" to 7 = "completely agree"). These items assess the global TEI ($\alpha = 0.93$) composed of 15 facets which load onto four factors: Well-Being (trait optimism, happiness, and self-esteem), Self-Control (emotion regulation, low impulsiveness, stress management), Emotionality (trait empathy, emotion perception, emotion expression, relationships), and Sociability (emotion management, assertiveness, social awareness). The remaining two facets (adaptability and self-motivation) contribute directly to global TEI. A final global

TEI score was created by calculating the average of the 30-items. For descriptive statistics and Cronbach's alpha, see Table 1.

Statistical Analysis

First, the data were screened for missing values. The missing values were less than 5% and completely at random (MCAR: χ^2 (4013) = 3127.19, p = 1) (Dong & Peng, 2013; Little & Rubin, 2002). Complete data was imputed following the multiple imputation approach valid with MCAR (Scheffer, 2002). Next, univariate distributions (i.e., kurtosis and skewness), multicollinearity, and homoscedasticity were examined. Non-normality of multivariate distributions ($p < .001$ for skewness; $p = .96$ for kurtosis) was handled with the maximum likelihood estimation (MLR) with robust (Huber-White) standard errors, and a scaled test statistic that is equal to the Yuan-Bentler test statistic (Lai, 2018) and performed well with large sample sizes (Hox et al., 2010). The goodness of fit indices was also considered: comparative fit index (CFI > 0.90), root mean square error of approximation (RMSEA) = 0.08, and standardized root mean residual (SRMR) < 0.08 (Hu & Bentler, 1999). However, if the RMSEA is less than .158, an incremental measure of fit may not be informative and, for that reason, could not be computed; or otherwise, one will obtain too small a value of the CFI (Kenny, 2020). Finally, before testing the mediation model with SEM, spearman's bivariate correlations were calculated between the main variables (maximizing decision-making style, TEI, and CF) and the covariates (age, gender, working hours, and sleep quality). Age and occupational seniority were correlated in the sample (r = 0.92, $p < .01$), so this control serves as a proxy for professional experience, and only age was included in the mediation model. All analyses were conducted in SPSS v. 26 and Rstudio software v.1.2.5019 with the lavaan package (Rosseel, 2012).

Results

Participant's Characteristics

Six hundred 30 healthcare professionals (480 females, M_{age}= 40.34, sd = 10.99; 150 males, M_{age} = 46.23 sd = 12.12) from different Medical Departments (internal medicine, surgery, emergency medicine, pediatrics, oncology, physical medicine and rehabilitation, psychiatry, others) of Italian hospitals completed the survey. Four hundred nine participants were nurses (64.9%), and 221 were physicians (35.1%). Socio-demographic data, occupational seniority, hours worked per week, and sleep quality are reported in Table 2. Concerning marital status, we obtained answers from 610 participants: 40.8% were single, 5.9% were in a stable relationship, of which 4.9% were cohabiting, 44.3% were married, 5.4% were divorced, and 0.6% were widowed.

Table 2. Characteristics of the Total Sample (n = 630).

Participants' Characteristics	Total Sample (n = 630) M (SD)	Physicians (n = 221) M (SD)	Nurses (n = 409) M (SD)
Age	41.74 (11.54)	46.51 (10.94)	39.16 (11.04)
Sex	—	—	—
Female, n (%)	480 (76.2)	120 (54.3)	360 (88.0)
Male, n (%)	150 (23.8)	101 (45.7)	49 (12.0)
Seniority (in years)	16.10 (11.76)	18.51 (11.56)	14.80 (11.68)
Working hours per week	39.40 (8.07)	44.52 (8.98)	36.63 (5.91)
Sleep quality	5.72 (2.08)[a]	6.38 (1.98)[a]	5.36 (2.03)[a]

[a]sleep quality was measured with a Likert scale from 1 (no sleep) to 10 (completely rest).

Spearman's Correlations Between Main Variables and the Covariates

Spearman's bivariate correlations revealed significant correlations between the main variables (maximizing decision-making style, TEI, and CF) and the main variables and the covariates (age, gender, working hours, and sleep quality). In particular, negative correlations were found between TEI and CF and between TEI and a maximizing decision-making style. Conversely, a positive correlation was discovered between a maximizing tendency and CF. Moreover, sex (male), working hours, and sleep quality was negatively correlated with CF. Likewise, increasing age, years of experience, and sleep quality decreased the trend of a maximation tendency, while global TEI was positively correlated with sleep quality, age, and seniority. See Table 3.

The Mediation Model of Compassion Fatigue

As shown in figure 1, all paths were statistically significant, controlling for the socio-demographic (age, gender, and sleep quality) and work-related (working hours) characteristics. A significant relationship between TEI and CF ($\beta = -0.28$, SE = 0.04, $p < .001$), partially mediated by the maximizing style ($\beta = -0.04$, SE = 0.01, $p < 0.001$), was found. The estimated model had a discrete model fit: χ^2 (4) = 48.28, $p < .001$; CFI = 0.86; RMSEA = 0.13 (90LO = 0.10, 90HI = 0.16, PCLOSE = 0.00); SRMR = 0.04. Due to the RMSEA being less than 0.158, the CFI is not informative (Kenny et al., 2014)4, and for that reason, it should not be considered. Considering the adjusted R^2, this model explained 25% of the variance.

Discussion

The current study investigated the relationships between TEI, maximizing and satisficing decision-making styles, and CF, in a large sample of healthcare professionals applying a mediation analysis with SEM. Although CF and emotional intelligence is

Table 3. Spearman's Bivariate Correlations.

	1	2	3	4	5	6	7	8
1. Sex (male)	—							
2. Age	0.201**	—						
3. Seniority (in years)	0.148**	0.920**	—					
4. Working hours per week	0.253**	0.151**	0.101*	—				
5. Sleep quality	0.155**	0.162**	0.100*	0.048	—			
6. Maximization summed scale	0.010	−0.246**	−0.215**	−0.038	−0.223**	—		
7. Global TEI	0.052	0.124**	0.084*	0.098*	0.265**	−0.347**	—	
8. Compassion fatigue	−0.148**	−0.045	−0.015	−129**	−0.295**	0.263**	−0.403**	—

TEI = Trait Emotional Intelligence; *$p < .05$, **$p < .01$.

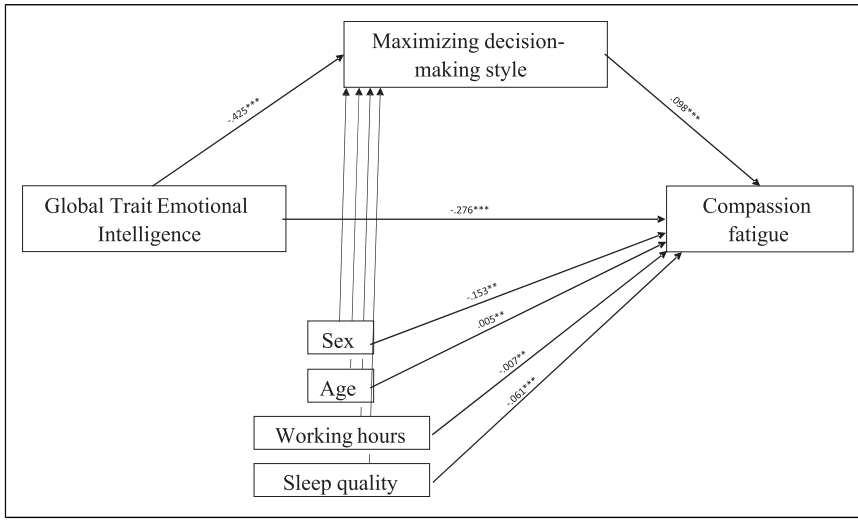

Figure 1. Pathway of a partially mediation process between global trait emotional intelligence, maximizing decision-making style and compassion fatigue. As shown, the maximizing decision-making style is a significant partial meditator of the relationship between trait emotional intelligence and compassion fatigue. All the paths are significant at $^{**}p < .01$, $^{***}p < .001$.

frequently studied in healthcare professionals (Kozlowski et al., 2017), little is known about their association with decision-making styles. Furthermore, to our knowledge, no prior studies investigated the mediation effect of the decision-making styles (maximizer vs satisfier) between TEI and CF. Thus, our research provides novel insights into identifying cognitive and emotional factors that might increase or reduce the risk of developing CF in healthcare professionals.

Firstly, results confirmed that healthcare professionals with a higher TEI had a lower level of CF, as previously demonstrated by other studies (Amir et al., 2019; Beauvais et al., 2017; Kabunga et al., 2020; Yearwood, 2021; Zeidner et al., 2013). Coherently with the results observed by Foster (2016), emotionally intelligent people tended to show lower levels of maximizing tendency. Generally, maximizers reported high expectations (i.e., not accepting compromises and having high expectancies towards a choice to make), high decisional conflicts, and searching for more information when making a choice.

Second, a novel finding concerns the association between maximizing tendency and the risk of developing CF. In particular, people characterized by the attitude to optimize their choice have a higher risk of developing CF, and vice versa for those who tend to adopt a satisficing tendency. As explained by the "*maximization paradox*" (Dar-Nimrod et al., 2009), maximizers are more likely to face a greater risk for detrimental psychological effects, such as depression, unhappiness, lower optimism and self-esteem, and life unsatisfaction (Schwartz, 2004; Schwartz et al., 2002). This

process could be explained by the fact that they devote more time and energy when making a choice, consequently increasing cognitive overloading and decisional conflict.

Furthermore, another remarkable result revealed that satisficing decision-making style is a partial mediator between TEI and CF in physicians and nurses. Global TEI (composed of four traits: optimism, emotionality, self-control, and sociability) has a protective role for healthcare professionals at risk of developing CF both directly and indirectly. Mainly, TEI reduces the risk of developing CF (*direct effect*) and seems to mitigate the adverse effects of adopting a maximization tendency (*indirect effect*). This observed relationship might be explained by the fact that decision-makers who can handle their emotions also tend to deal easily with complex decisions by focusing their attention only on the relevant information and reducing the overwhelm and fatigue caused by challenging decisions such as routinary clinical decisions (Soltwisch, 2015). Coherently, emotionally intelligent individuals may also find less decision difficulty, regret, self-blame, and more adaptation due to their capacity to weigh alternatives and see other viewpoints (Schwartz et al., 2002; Soltwisch & Krahnke, 2016).

According to the new perspective of CF (Gerard, 2017), we expected that individuals more at risk of developing CF have a low ability to manage their negative emotions properly (e.g., hostility, envy), consequently repression and avoidance of the same emotions. On the other hand, individuals with high TEI (who are optimistic, self-controlled, emotionally self-regulated, and assertive) can manage their emotions and those of their patients with consequent reduction of anxiety avoidance, the mechanism behind vulnerability for CF. This result is in line with other studies that have pointed out the key role of emotions in the modulation of decision-making in health professionals working in emergency departments exposed to a significant level of stress, suggesting that avoidant decision-making style is a significant predictor of professional inefficacy and emotional exhaustion (Masiero et al., 2018).

Finally, our results confirmed previous findings ((Lee et al., 2021; Palestini et al., 2009), suggesting that healthcare professionals more at risk of developing CF were females with higher age and poorer sleep quality. Contrarywise, we did not find a positive effect of working hours on the risk of developing CF. Working hours is a feature mainly related to the work environment, and it has been demonstrated to be a risk factor in burnout syndrome (Gómez-García et al., 2016; Stimpfel et al., 2012). However, CF and burnout are not the same conditions for two principal reasons: at first, for the acute onset of CF compared to the chronic one of burnout; second, CF could be developed even with one exposure to trauma in the absence of work-related issues (e.g., working hours, low level of worker support, insufficient communication). For example, a cohort study on oncology nurses revealed that healthcare professionals who experienced a healthy and supportive work environment showed a higher compassion satisfaction independently of the weekly hours (Wu et al., 2016). However, CF may exacerbate burnout syndrome (Bhutani et al., 2012; Sabo, 2008) when an individual's vulnerability is associated with organizational issues.

Limitations

The present study presents some limitations that reduced the generalizability of our results. Firstly, the predictive limitation related to the cross-sectional design because of the simultaneous assessment of the exposure and the outcome (Carlson & Morrison, 2009). Second, the measures used to investigate our primary aims are mainly self-reported questionnaires requiring a consistent time to fill them. We speculate that this might have reduced the participants' compliance favoring some response sets. For that reason, social desirability should also be taken into account. The last limitation concerns the sample's composition. In particular, women were more than men, and nurses outnumbered physicians. Future research is needed to overcome these limitations.

Conclusion and Future Directions

This study sheds light on CF's psychological (TEI) and cognitive (satisficing decision-making style) protective factors in healthcare professionals. Indeed, CF seems to be modulated both by having developed, at a *psycho-emotional level*, an emotionally stable trait and having set a satisficing decision-making style at a *cognitive level*. Results highlight the importance of recognizing the maladaptive defense mechanism behind the risk of developing CF (i.e., anxiety avoidance) to understand better the potential benefit of TEI and a satisficing decision-making style in preventing the transmission of painful experiences from one individual to another. For this reason, tailored training and psycho-educational interventions should be implemented to increase awareness of healthcare professionals about the potential risks or protective factors related to CF and allow the development of skills useful for managing and coping with critical/traumatic situations efficiently. Furthermore, these interventions would permit a good patient-doctor relationship, reducing medical errors and improving care (Masiero et al., 2018). Future research is needed to investigate the effectiveness of such fundamental interventions for improving knowledge and awareness to cope with traumatic/stressful situations. Moreover, we would like to stress the importance of considering an important construct studied for decades: leadership styles. A growing body of research pointed out the impact of leadership styles on the work-related well-being of healthcare professionals, especially nurses (Niinihuhta & Häggman-Laitila, 2022). It would be interesting to investigate deeply the relationships between leadership styles and the variables previously discussed. Also, it would be interesting to control the impact of the COVID19 on the work-related well-being of Italian healthcare professionals since the Italian context was demonstrated to be one of the European countries most affected by the pandemic (Lluch et al., 2022).

Authors' Note

C.F. is a PhD student within the European School of Molecular Medicine (SEMM).

Author Contributions

Study design, concepts, and participants management: MM, IC; statistical analysis: CF; manuscript drafting and writing: CF, SFMP, MM, IC, GP. All authors revised and approved the final version of the manuscript.

Declaration of Conflicting Interests

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