Predictors of patient-centered care provision among nurses in acute care setting

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Abstract
Aim: The study was conducted to assess the predictors of patient-centred care provision among nurses working in an acute care setting. We hypothesized that higher structural empowerment and compassion satisfaction and lower burnout would predict the provision of patient-centred care.

Background: Patient-centred care is a crucial aspect of quality health care and the heart of nursing care. Although previous studies have highlighted some determinants of patient-centred care provision among nurses, there remains a gap in understanding the factors that predict the provision of patient-centred care.

Methods: A cross-sectional predictive design was used. Through random sampling, 255 nurses were recruited from five hospitals providing acute care services in Saudi Arabia.

Results: Multiple linear regression revealed that compassion satisfaction ($\beta = 0.260$ [95% CI: 0.201–0.645]), burnout ($\beta = -0.266$ [95% CI: −0.998 to −0.403]) and structural empowerment ($\beta = 0.273$ [95% CI: 0.462–1.427]) jointly explained significant variance (27.5%) in the provision of patient-centred care by nurses.

Conclusions: The study findings reveal that lower burnout, higher compassion satisfaction and structural empowerment increase nurses' provision of patient-centred care.

Implications for Nursing Management: Leadership and managerial strategies that not only address compassion satisfaction and burnout but also empower nurses are crucial for the provision of patient-centred care by nurses.

Key words: acute care, burnout, compassion satisfaction, patient-centered care, Saudi nurses, structural empowerment

1 | INTRODUCTION

Patient-centred care refers to the provision of care based on a holistic approach that is respectful of and aligned with individual patients' requests, values and cultural background to empower and emancipate them (El-Alti, Sandman, & Munthe, 2019; Håkansson et al., 2019). It allows each patient to be an active member in dialogues and consultations that manifest a clear partnership, solidarity, empathy and collaboration...
in care-related decision-making (Agreli, Peduzzi, & Silva, 2016). Patient-centred care is an essential component of high-quality care (Institute of Medicine, 2001). It results in favourable clinical (Delaney, 2018) and economic outcomes ( Pirhonen et al., 2019) and positively influences patients’ satisfaction, self-management (Delaney, 2018) and health-related quality of life (Lor, Crooks, & Tluczek, 2016).

The nurse–patient relationship is at the heart of nursing (Peplau, 1997), and patient-centred care approaches are consistent with nursing values and theories, such as the Watson caring theory (Lusk & Fater, 2013). Nurses are seen as leaders in the provision of patient-centred care (Peters, 2019), but organisational strategic vision, support and empowerment from administrators ( Luxford, Safran, & Delbanc, 2011), shared decision-making ( Håkansson et al., 2019), work environment and culture ( Sharp, Mcallister, & Broadbent, 2018), and organisational citizenship behaviour ( Mahooti, Vasli, & Asadi, 2018) are important precursors for delivering patient-centred care. Stressed workplace conditions that lead to burnout may be a barrier to delivering patient-centred care (Post & Roess, 2017). It is likely that only nurses who are satisfied and not burned out provide patient-centred care ( Hower et al., 2019).

The literature has highlighted the fact that, in nursing, satisfaction and fulfilment from helping patient are considered compassion satisfaction ( Sacco & Copel, 2018), but its relationship with providing patient-centred care has not been studied. While a few studies have investigated the facilitators and barriers of patient-centred care provision, these studies have been conducted in long-term care ( Elfstrand Corlin, Kajonius, & Kazemi, 2017; Rajamohan, Porock, & Chang, 2019). Thus, further research related to the factors predicting the provision of patient-centred care by nurses in acute care settings is required. Identifying these factors is important for managers and leaders to advance the health care system. Thus, the current study aimed to assess the effect of burnout, structural empowerment and compassion satisfaction on provision of patient-centred care.

2 | BACKGROUND

In the domains of several research agencies, health care organisations, and regulation and policymakers, a shift has occurred from the use of the traditional, paternalistic approach to a patient-centred care approach ( Delaney, 2018; Paparella, 2016). Patient-centred care has a set of attributes, including respect, wholeness, empowerment, collaboration, coordination, effective communication and personalized care ( Lor et al., 2016). The approach of patient-centred care is significant for the delivery of high-quality care ( Jarrar, Minai, Al-Bsheish, Meri, & Jaber, 2019). It leads to patient satisfaction and effective treatments and reduces the number of emergency department visits, inpatient days and diagnostic tests ( Delaney, 2018; Kullberg, Sharp, Johansson, Brandberg, & Bergenmar, 2019). A clinical trial in which nurses implemented patient-centred care interventions showed a significant improvement in diabetic patients’ blood sugar ( Jutterström, Hörnsten, Sandström, Stenlund, & Isaksson, 2016). In long-term care, patient-centred care increases interactions among clients, decreases clients’ agitation and enhances clients’ well-being ( Chenoweth et al., 2019).

The implementation of patient-centred care leads to lower turnover and higher job satisfaction ( Rajamohan et al., 2019). It also improves patient and staff relationships, cultural orientation and quality of life ( Lor et al., 2016). The existing literature focuses on factors that hinder or facilitate the provision of patient-centred care. Leaders’ cooperation ( Chenoweth et al., 2015), an organisation’s philosophy ( Moore et al., 2017), time constraints ( van Mol et al., 2017), decision-making centralization ( Nkrumah & Abekah-Nkrumah, 2019), staff stress and perceptions of the work environment ( Chenoweth et al., 2015; Nkrumah & Abekah-Nkrumah, 2019) have all been found to be important factors when using the patient-centred care approach.

Although organisational behaviour and commitment affect nurses’ ability to provide patient-centred care ( Mahooti et al., 2018), the influence of structural empowerment on providing patient-centred care has not been investigated. Structural empowerment is about the structures of workplace that support staff in achieving their work objectives ( Kanter, 1993). Empowered staff can obtain information, opportunities, support and adequate resources at work to grow and learn. Workplaces that provide discretion, as a feature central to the organisational aim and mission, promote access to such empowering structures. Previous studies have revealed that structural empowerment affects patient safety ( Dirik & Intepeler, 2017), the quality of care ( Asif, Jameel, Hussain, Hwang, & Sahito, 2019), job performance ( Wong & Laschinger, 2013) and work engagement ( Amor, Vázquez, & Faíña, 2020). However, there is a gap in understanding the effect of structural empowerment on patient-centred care.

Exposure to stressors increases the risk of burnout ( Sun, Lin, Zhang, Li, & Cao, 2018), which is a psychological status that is resulted from an exposure to severe stress, such as heavy workload, debilitation, maladministration and unfairness ( Maslach, 1982). Burnout occurs when an employee has difficulties performing their assigned job effectively due to feelings of hopelessness ( Mooney et al., 2017); it may cause nurses to become insensitive towards patients’ suffering because there is a negative association between burnout and nurses’ empathy ( Salvarani et al., 2019). Burnout limits nurses’ ability to provide appropriate and safe care ( Salyers et al., 2017). Each unit of increase in burnout was found to be associated with an increase in infections by 1.32 times, medication errors by 1.47 times and providing fair to poor quality of care by 2.63 times ( Nantsupawat, Nantsupawat, Kunaviktikul, Turale, & Poghosyan, 2016). Although patient-centred care is one domain of quality care, previous studies have not specifically examined the impact of nurses’ burnout on delivering patient-centred care ( Institute of Medicine, 2001).

The nursing literature has focused on burnout and its outcomes more than on the positive and satisfying aspects of care. To deliver appropriate patient-centred care, compassion is an essential element ( Frampton, Guastello, & Lepore, 2013). The positive feeling that results from being able to work well and help others during a time of suffering is called compassion satisfaction ( Stamm, 2009). When nurses experience compassion satisfaction, they may feel a sense of altruism, achievement or gratification as positive elements of nursing. Compassion satisfaction is one dimension of professional quality
of life, which is crucial for productivity (Boyle, 2011), communication strategies (Granek, Nakash, Cohen, Ben-David, & Ariad, 2017) and patient satisfaction (McHugh, Kutney-Lee, Cimiotti, Sloane, & Aiken, 2011). In a sample of physicians, compassion satisfaction significantly influenced the standards of care, harmful mistakes with patients and irritability with patients (Dasan, Gohil, Cornelius, & Taylor, 2015). However, the effect of compassion satisfaction on patient-centred care has not yet been explored.

Few studies have examined the factors that predict the provision of patient-centred care among nurses in acute care. It is still not clear whether structural empowerment, burnout and compassion satisfaction predict the provision of patient-centred care among nurses. Therefore, this study aims to (a) assess the relationship between provision of patient-centred care and compassion satisfaction, structural empowerment, and burnout among nurses in Saudi Arabia and (b) test a hypothesized model, according to which higher levels of structural empowerment and compassion satisfaction and lower levels of burnout increase the likelihood that nurses provide patient-centred care.

3 | METHOD

3.1 | Design and sample

A cross-sectional predictive design was used. Through random sampling, nurses were recruited from five public hospitals located in two cities in northern Saudi Arabia. These hospitals are nationally accredited and operate under the umbrella of the Ministry of Health. Three of them are considered main referral hospitals, providing secondary and tertiary health services. Two of the hospitals specialize in maternity and childcare. The five hospitals have a capacity ranging from 200 to 365 beds and have various acute care units, such as intensive care, paediatrics, oncology, burns and emergency care. These five hospitals were selected because they are the largest main hospitals in the area and are accessible to researchers.

Full-time nurses who had worked for more than 6 months in direct care in acute areas were eligible for participation. A list of nurses who met the inclusion criterion was obtained from each hospital and considered as the study sampling frame. Software for random sampling (https://www.randomizer.org) was used to select the participants. The sample size was estimated using G-power. With a significance level of alpha 0.05, a power level of 0.80 and a medium effect size of 0.15, the calculation revealed 85 to be the minimum required sample size. In total, 300 nurses were randomly selected to participate in the survey. However, 45 nurses were not interested in taking part in the study, so a sample of 255 nurses was included in the study. The study response rate was 85%.

3.2 | Data collection

The Institutional Review Board for the Ministry of Health provided an ethical approval (No: 2019-0113M) before data collection. The researchers then sought permission from the five selected hospitals' authorities. Lists of the nurses who worked in the eligible units were obtained from each hospital. The researchers then provided explanations of the study purpose to each unit head nurse and gave them an enclosed envelope with the relevant nurses' names. The selected nurses thus received an envelope with a letter of information about the study with written consent, questionnaires and the contact information of the researchers. After 2 weeks, the researchers collected the enclosed envelopes. Confidentiality of the information provided was assured, and each questionnaire was coded using identification numbers.

3.3 | Measurements

None of the scales selected for use had been utilized in the context of Saudi Arabia before; therefore, at the beginning of the study, the researchers assessed the questionnaires in terms of conceptual equivalence by consulting five expert nurses. Each of these nurses was asked to read the scales' items and rate their content in terms of comprehension and relevance to the Saudi health care context based on a 10-point rating scale (0 = ‘not at all’; 10 = ‘very much’). Minor modifications for some phrases were made on the basis of the expert recommendations; for example, ‘put myself in his/her shoes’ was modified because it is not a phrase understandable outside of a Western context. After that, forward translations were performed by two translators who had a background in the study concepts. The translation was conducted for two scales because one of the scales had an Arabic version. A pilot study was conducted with 30 nurses to assess the reliability of the scales. It showed that all alphas were within acceptable ranges. All questionnaires were presented with Arabic and English versions side by side.

Provision of patient-centred care was measured using the Patient-Provider Relationship Questionnaire (PPRQ) (Gremigni, Casu, & Sommaruga, 2016). It is a 16-item self-report scale that assesses health care providers' manner of dealing with patients based on four components of patient-centred care: empathy, efficacious communication, attentive to patient's agenda and inclusion of patients in the care plan (Gremigni et al., 2016). The scale asks the participants to consider their last contact with a patient and rate each item based on a 5-point Likert scale (1 = ‘not at all’; 5 = ‘very much’). The PPRQ can be used for general patient-centred care competencies considering either the total score or four subscales (Casu, Gremigni, & Sommaruga, 2019). The PPRQ was initially validated with 600 health care professionals. The internal consistency reliability of the scale was satisfied, with Cronbach's alpha coefficients ranging from 0.73 to 0.90 (Casu et al., 2019; Gremigni et al., 2016). In this study, Cronbach’s alpha was 0.84 for the total score.

Burnout and compassion satisfaction were measured using the Professional Quality of Life Scale version 5 (PROQOLS5) (Stamm, 2009). The PROQOLS5 is a self-report 30-item scale that assesses both the negative and positive aspects of helping others. The positive aspect of helping is compassion satisfaction, referring to the gratification derived from being helpers and impacting the work setting. The negative
aspect is called compassion fatigue, which has two dimensions: burnout and secondary traumatic stress. Burnout is about feeling emotionally exhausted, hopeless and frustrated with work (Stamm, 2009). For the aim of this study, only the compassion satisfaction and burnout subscales were included. There is evidence of validity and reliability for this approach, with Cronbach's alpha coefficients ranging from 0.72 to 0.90 (Duarte, Pinto-Gouveia, & Cruz, 2016). In this study, the internal consistency reliability was verified, Cronbach's alpha being 0.89 for compassion satisfaction and 0.94 for burnout.

Structural empowerment was measured using the Conditions of Work Effectiveness Questionnaire-II (CWEQ-II) (Laschinger, Finegan, Shamian, & Wilk, 2001). This uses a 12-item self-reported scale developed based on Kanter's model of work empowerment. CWEQ-II assesses empowerment on the basis of four elements: adequate access to resources, opportunity, information and support. It asks participants about the extent of their empowerment at work using a 5-point Likert scale (1 = 'none'; 5 = "a lot"). Total structural empowerment is scored by summing the four subscales, and each subscale is summed and averaged. The CWEQ-II has been widely used and has shown evidence of validity and reliability, with Cronbach's alpha coefficients for internal consistency ranging from 0.72 to 0.82 (Laschinger, Wong, & Grau 2013; Patrick, Laschinger, Wong, & Finegan, 2011). In this study, the internal consistency reliability was verified with a Cronbach's alpha of 0.904; its construct validity was also confirmed on account of its positive correlation with a two-item global empowerment scale (r = .599).

3.4 | Data analysis

The Statistical Package for the Social Sciences version 25 was used. Descriptive statistics were used to summarize and describe the data. An analysis of variance (ANOVA) was conducted to explore differences in the study variables across the five selected hospitals and different areas of practice. To assess whether patient-centred provision can be predicted by structural empowerment, burnout and compassion satisfaction, a multiple linear regression was conducted. Regression assumptions, such as multicollinearity and distribution, were assessed before the analysis.

4 | RESULTS

The mean age of the nurses was 29.6 years (SD = 4.22, range: 21–55 years). Most nurses held a bachelor's degree (69.4%), and one-third (30.2%) held a diploma degree in nursing. They had worked as nurses on average for 5.84 years (SD = 3.40, range: 1–26). The majority of nurses were Saudi (58%), while 24.7% and 17.3% were Indian and Filipino, respectively. They worked in different clinical areas: 37.6% (n = 96) in the emergency unit, 29% (n = 74) in intensive care, 27.5% (n = 70) in paediatric inpatients, 5.5% (n = 14) in burns and 0.4% (n = 1) in oncology. The descriptive statistics for the study variables are presented in Table 1. The nurses perceived their workplace to have a moderate level of empowerment (M = 14.99, SD = 3.04). Their burnout (M = 27.78, SD = 3.98) and compassion satisfaction (M = 41.02, SD = 6.46) were mostly moderate. Nurses provided a middle level of patient-centred care (M = 68.22, SD = 10.50). Table 2 presents Pearson's correlations among the study variables.

The relationships between the nurses' background characteristics and the study variables were assessed. There was a significant relationship only between nurses' age and provision of patient-centred care (r = .160) and nurses' years of experience with burnout (r = −.154). Table 3 represents the results of ANOVA. The analysis revealed significant differences in burnout, compassion satisfaction, structural empowerment and provision of patient-centred care among the five selected hospitals. The fourth hospital has highest compassion satisfaction (M = 45.39), structural empowerment (M = 16.98) and provision of patient-centred care (M = 72.39). In terms of clinical area, we excluded the oncology department because it had only one participant. The results revealed that across the clinical practice areas (emergency, intensive care, paediatrics and burns), there were significant differences in burnout and compassion satisfaction, but there were no significant differences in structural empowerment and provision of patient-centred care.

The regression analyses (Table 4) showed that the model was a significant predictor of the provision of patient-centred care, F (3, 251) = 31.73, p = .000. Compassion satisfaction, burnout and structural empowerment together explained 27.5% of the variance in providing patient-centred care. Upon observing each predictor, we found that compassion satisfaction positively predicted patient-centred care (β = 0.260) after controlling for other variables. As nurses' compassion satisfaction increased, they provided a higher level of patient-centred care. Burnout negatively predicted patient-centred care (β = −0.266), controlling for other variables. Higher burnout decreased nurses’ ability to provide patient-centred care. Structural empowerment positively predicted patient-centred care (β = 0.273), after controlling for other variables. As structural empowerment increased, nurses provided a higher level of patient-centred care.

| Variables             | Mean | SD  | Range   | Skewness |
|-----------------------|------|-----|---------|----------|
| Patient-centred care  | 68.22| 10.50| 16–121  | −0.69    |
| Compassion satisfaction| 41.02| 6.46 | 10–50   | −0.82    |
| Burnout               | 27.78| 3.98 | 12–34   | −1.44    |
| Structural empowerment| 14.99| 3.04 | 2–20    | −0.34    |
DISCUSSION

The result reveals an acceptance of the study hypothesized model, in which higher levels of structural empowerment and compassion satisfaction and lower levels of burnout predict the provision of patient-centred care by nurses. The finding contributes to the literature by highlighting the significant negative effect of burnout and the positive effects of compassion satisfaction and empowerment on the provision of patient-centred care. It also supports those of previous qualitative studies that call attention to the role of workload, organisational leadership and support, motivation, and work environment in providing patient-centred care (e.g., Moore et al., 2017; Nkrumah & Abekah-Nkrumah, 2019). The existing evidence for ensuring patient-centred care has focused on three levels: individual (e.g., individuals' skills or attitudes), organisational (e.g., resources or management participation) and health care system (e.g., regulations and rules) (Gluyas, 2015; Moore et al., 2017; Patel et al., 2018). Our findings contribute to this by demonstrating the significant effects of structural empowerment, which is applicable at the organisational level; compassion satisfaction, which is applicable at the individual level; and burnout, which is applicable at both individual and organisational levels (Leiter, Maslach, & Frame, 2014; Maslach, Schaufeli, & Leiter, 2001).

Based on Watson's (1988) theory of caring, holistic practice and patient-centred care are at the core of nursing care. Patient-centred care is believed to encompass the quality of interactions between health care providers and patients (Agregli et al., 2016). Compassion, which is the essence of nursing care (Hassmiller, 2017), considers the experience of the patient, empowers patients to become independent and applies measures that help mitigate patients' suffering (de Zulueta, 2016). Compassion is a key element in providing patient-centred care (Frampton et al., 2013). Therefore, compassion satisfaction is a significant factor in enabling nurses to provide patient-centred care. Although previous studies have considered various outcomes of compassion satisfaction (Dasan et al., 2015; Granek et al., 2017), this study demonstrated its significant effect on patient-centred care. Thus, the promotion of nurses' compassion satisfaction should receive particular attention. Mindfulness-based intervention programmes (Duarte & Pinto-Gouveia, 2016) and a resiliency programme focusing on self-awareness (Klein,
Riggenbach-Hays, Sollenberger, Harney, & McGarvey, 2018) have been proven to be effective in enhancing compassion satisfaction. Activities for strengthening or reinforcing nurses’ compassion for caring (Perry, 2008) and self-renewal (Romano, Trotta, & Rich, 2013) may be effective in enhancing compassion satisfaction.

The finding that structural empowerment predicts nurses’ ability to provide patient-centred care is not surprising. According to Kanter’s theory, power is earned by accessing or mobilizing empowerment structures in the workplace to get things done (Kanter, 1993). Staff powerlessness may occur due to inaccessible empowerment structures (Kanter, 1993). The perception of empowerment in the workplace reflects the staff’s feeling of autonomy and control over their job, which can enhance their capacity to empower and emancipate the patients by delivering patient-centred care. According to the expanded nurse–patient empowerment model, structural empowerment increases nurses’ personal or psychological empowerment, which enables them to partner with patients and empowers them (Laschinger, Gilbert, Smith, & Leslie, 2010). Research has found that the antecedents of providing patient-centred care among intensive care unit nurses are organisational support and promotion of a patient-centred culture (Jakimowicz & Perry, 2015).

Our study reveals the negative effect of burnout on the provision of patient-centred care. Burnout is characterized by emotional exhaustion, debilitation from work and a feeling of uselessness and detachment (Maslach, 1982). Nurses’ wellness is a contributory factor to the provision of patient-centred care. Experiencing burnout may prevent nurses from showing empathy, engaging patients in their treatment plan, considering patients’ beliefs and values and delivering holistic care. This finding is in conjunction with that of other studies that burnout decreases nursing quality of care (Salyers et al., 2017), patient safety (Garcia et al., 2019) and work effort and patient satisfaction (Dyrbye et al., 2017). Since burnout hinders nurses’ ability to deliver patient-centred care, programmes that minimize stressors and manage nurses’ burnout are needed. For example, focusing on nurses’ coping strategies significantly decreases burnout (Lee, Kuo, Chien, & Wang, 2016), and a psycho-educational programme for stress management could be effective in enhancing nurses’ self-care (Kravits, McAllister-Black, Grant, & Kirk, 2010). A randomized clinical trial found that comprehensive management intervention decreases nurses’ burnout (Wei, Ji, Li, & Zhang, 2017).

The findings from this study show that nurses’ background characteristics are not related to the provision of patient-centred care; only nurses’ age is associated with the provision of patient-centred care. Older nurses have a greater ability to show empathy, use effective communication, be responsive to patients’ perspectives and agendas and share decisions with patients. Evidence has also found that older nurses are more capable of involving the patient as an active member in the care plan (Malfait, Eeckloo, & Van Hecke, 2017). Furthermore, the current findings show that experienced have lower burnout, which is consistent with previous studies’ findings (Hunsaker, Chen, Maughan, & Heaston, 2015). This could be explained by such nurses’ ability to use coping strategies to decrease their feelings of exhaustion and frustration with work responsibilities.

The results also revealed that across clinical practice areas (emergency, intensive care, paediatrics and burns), there were significant differences in burnout and compassion satisfaction. Intensive care unit nurses have the lowest level of compassion satisfaction. This may be explained by the fact that intensive care nurses provide care for patients who are unable to communicate (Jakimowicz & Perry, 2015), which may affect their perception of the provision of emotional support. Nurses working in paediatric and burns units have the highest level of burnout, which may be explained by the nature of their patients’ conditions, which may induce emotional reactions and psychological effects in the nurses. The current findings showed differences across the five hospitals in burnout, compassion satisfaction, structural empowerment and provision of patient-centred care. The highest hospital with the provision of patient-centred care has also the highest level of compassion satisfaction and structural empowerment, and this shows the importance of these factors in providing patient-centred care. Yet, the pattern of differences among these five hospitals could not be explained because the settings were largely similar in terms of the capacity and administration styles and other data specific to the organisational structure for each hospital were not collected.

In the Saudi health care system, provision of patient-centred care is an essential element of quality care (Almutairi & Moussa, 2014). One-third of nurses believe that patient-centred care is important (Al-Tannir, AlGahtani, Abu-Shaheen, Al-Tannir, & AlFayyad, 2017). Patient-centred care relies on providers’ appreciation of and consideration for patients’ preferences, beliefs and values (Walton & Barnsteiner, 2012). Nurses in Saudi Arabia undergo

| Predictor                 | Unstandardized coefficients | Standardized coefficients | 95% CI          |
|---------------------------|----------------------------|---------------------------|-----------------|
|                           | B      | SE     | β      | p     |                   |
| Compassion satisfaction   | 0.423  | 0.113  | 0.260  | .000  | 0.201 to 0.645    |
| Burnout                  | −701   | 0.151  | −0.266 | .000  | −0.998 to −0.403  |
| Structural empowerment    | 0.945  | 0.245  | 0.273  | .000  | 0.462 to 1.427    |

Abbreviation: CI, confidence interval.

TABLE 4 Results of multiple linear regression analysis (n = 255)
training programmes related to the delivery of culturally sensitive care (Aboshaiqah, Tumala, Inocian, Almutairi, & Atallah, 2017); access to resources of this kind may increase nurses’ ability in providing patient-centred care. In Saudi Arabia, 39.8% of public hospitals' nursing workforce are foreign (Ministry of Health, 2017), mainly from the Philippines and India (Alsulaimani, 2014). There is a relationship between foreign nurses' cultural competence and providing patient-centred care (Albougami, 2016). These nurses perceive empowerment from management to be an important factor in the provision of culturally competent care (Almutairi, McCarthy, & Gardner, 2015). In the context of nurses in Saudi Arabia, empowerment is required from the higher management level to increase their ability to provide such care. Although compassion satisfaction and burnout among nurses have not been studied extensively in the Saudi context, one study found that 77.3% of nurses have an average level of compassion satisfaction (Alharbi, Jackson, & Usher, 2020), and according to another, 45% have high emotional exhaustion (i.e., burnout) (Al-Turki et al., 2010).

6 | LIMITATIONS AND FUTURE RESEARCH

The use of self-reported measures to assess the provision of patient-centred care from nurses' perspectives may have introduced bias in the study's findings. Therefore, future studies should consider measuring the patients' experience of patient-centred care. The use of a cross-sectional design precludes causal explanation, although it does increase the likelihood that consideration of nurses' burnout, compassion satisfaction and structural empowerment is important in promoting the provision of patient-centred care. Future research using a longitudinal design would be valuable in examining changes in study variables over time. Although the study used random sampling to enhance generalizability, further studies with a larger sample size using different health care settings are needed to replicate this study.

7 | IMPLICATIONS FOR NURSING MANAGEMENT

To enhance the provision of patient-centred care, nursing leaders and managers should provide particular attention to nurses' compassion satisfaction, burnout and structural empowerment. Nursing management should be attentive and supportive in creating work environment that promotes nurses' compassion satisfaction and decreases their burnout. Tailoring intervention programmes that focus on self-renewal, self-awareness, mindfulness, resilience, positive perception of caring and empathy is recommended (Craigie et al., 2016; Sacco & Copel, 2018). Moreover, developing in-service training that target work-life balance, recognizing early indication of staff exhaustion and integrating a reward system that acknowledges nurses' contributions might be effective in reducing burnout and ultimately increasing nurses’ ability to provide patient-centred care. Nursing managers worldwide and in Saudi Arabia should work on empowering nurses. Strategies that enhance shared decision-making and the accessibility of nurses to ‘power tools’ can be advantageous in achieving high-quality nursing care. Organisational programmes that target a structurally empowering working environment are needed in Saudi health care system. These programmes could focus on achieving decentralization structure as well as accessing information, support, resources and opportunities for the purpose of delivering patient-centred care.

8 | CONCLUSIONS

Patient-centred care is considered essential to achieving high-quality care. This study revealed the significant effect of compassion satisfaction, structural empowerment and burnout in predicting the provision of patient-centred care. The study reveals that promoting nursing compassion, empowering nurses and preventing burnout can increase nurses' ability to provide patient-centred care. The roots of nursing care are to be found in holistic care, but nurses' practice of providing patient-centred care requires access to empowering structure. The findings also highlight the need for organisational strategies that protect nurses from burnout and that enhance their compassion satisfaction.

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ETHICAL APPROVAL

The Institutional Review Board for the Ministry of Health provided an ethical approval (No: 2019-0113M) before data collection.

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REFERENCES

Aboshaiqah, A. E., Tumala, R. B., Inocian, E. P., Almutairi, A. F., & Atallah, M. (2017). Enhancing culturally competent nursing care in Saudi Arabia. Journal of Cultural Diversity, 24(1), 20–26.

Agreli, H. F., Peduzzi, M., & Silva, M. C. (2016). Patient-centred care in interprofessional collaborative practice. Interface-Comunicação, Saúde, Educação, 20, 905–916.

Albougami, A. (2016). The relationship between cultural competence levels and perceptions of patient-centered care among Filipino and Indian expatriate nurses working in the Saudi Arabian healthcare. Retrieved from https://search-proquest-com.sdl.idm.oclc.org/docview/1880540913?accountid=142908

Alharbi, J., Jackson, D., & Usher, K. (2020). Compassion fatigue in critical care nurses and its impact on nurse-sensitive indicators in Saudi Arabian hospitals. Australian Critical Care. https://doi.org/10.1016/j.acc.2020.02.002
Almutairi, A. F., McCarthy, A., & Gardner, G. E. (2015). Understanding cultural competence in a multicultural nursing workforce: Registered nurses’ experience in Saudi Arabia. *Journal of Transcultural Nursing*, 26(1), 16–23. https://doi.org/10.1177/10436359166523992

Almutairi, K., & Moussa, M. (2014). Systematic review of quality of care in Saudi Arabia. *Saudi Medical Journal*, 35(8), 802–809.

Alsalimian, A. (2014). Practical competency of Filipino nurses working in Taif City, Kingdom of Saudi Arabia. *Saudi Journal of Health Sciences*, 3(2), 85–91. https://doi.org/10.4103/2278-0521.134859

Al-Tannir, M., AlGahtani, F., Abu-Shaheen, A., Al-Tannir, S., & AlFayyad, I. (2017). Patient experiences of engagement with care plans and healthcare professionals’ perceptions of that engagement. *BMC Health Services Research*, 17(1), 853. https://doi.org/10.1186/s12913-017-2806-y

Al-Turki, H. A., Al-Turki, R. A., Al-Dardas, H. A., Al-Gazal, M. R., Al-Maghrabi, G. H., Al-Enizi, N. H., & Ghareeb, B. A. (2010). Burnout syndrome among multinational nurses working in Saudi Arabia. *Annals of African Medicine*, 9(4), 226. https://doi.org/10.4103/1596-3519.70960

Amor, A. M., Vázquez, J. P. A., & Faiña, J. A. (2020). Transformational leadership and work engagement: Exploring the mediating role of structural empowerment. *European Management Journal*, 38(1), 169–178. https://doi.org/10.1016/j.emj.2019.06.007

Asif, M., Jameel, A., Hussain, A., Hwang, J., and Sahito, N. (2019). Linking transformational leadership with nurse-assessed adverse patient outcomes and the quality of care: Assessing the role of job satisfaction and structural empowerment. *International Journal of Environmental Research and Public Health*, 16(13), 2381. https://doi.org/10.3390/ijerph16132381

Boyle, D. A. (2011). Countering compassion fatigue: A requisite nursing agenda. *The Online Journal of Issues in Nursing*, 16(1), 1–13.

Casu, G., Gremigni, G. P., & Sommaruga, M. (2019). The Patient Professional Interaction Questionnaire (PPIQ) to assess patient-centered care from the patient perspective. *Patient Education and Counseling*, 102(1), 126–133.

Chenoweth, L., Jeon, Y.-H., Stein-Parbury, J., Forbes, I., Fleming, R., Cook, J., ... Tinslay, L. (2015). PerCEN trial participant perspectives on the implementation and outcomes of person-centered dementia care and environments. *International Psychogeriatrics*, 27(12), 2045–2057. https://doi.org/10.1017/S1041610215001350

Chenoweth, L., Stein-Parbury, J., Lapkin, S., Wang, A., Liu, Z., ... Williams, A. (2019). Effects of person-centered care at the organisational-level for people with dementia. *A systematic review. PLoS One*, 14(2), e0212686.

Craigie, M., Osseiran-Moisson, R., Hemsworth, D., Aoun, S., Francis, K., Brown, J., ... Rees, C. (2016). The influence of trait-negative affect and compassion satisfaction on compassion fatigue in Australian nurses. *Psychological Trauma: Theory, Research, Practice, and Policy*, 8(1), 88. https://doi.org/10.1037/trt0000050

Dasan, S., Gohil, P., Cornelius, V., & Taylor, C. (2015). Prevalence, causes and consequences of compassion satisfaction and compassion fatigue in emergency care: A mixed-methods study of UK NHS Consultants. *Emergency Medicine Journal*, 32(8), 588–594. https://doi.org/10.1136/emermed-2014-203671

de Zulueta, P. C. (2016). Developing compassionate leadership in health care: An integrative review. *Journal of Healthcare Leadership*, 8(1), 1.

Delaney, L. J. (2018). Patient-centred care as an approach to improving health care in Australia. *Collegian*, 25(1), 119–123. https://doi.org/10.1016/j.collegn.2017.02.005

Dirik, H. F., & Intepeler, S. S. (2017). The work environment and empowerment as predictors of patient safety culture in Turkey. *Journal of Nursing Management*, 25(4), 256–265. https://doi.org/10.1111/jonm.12458

Duarte, J., & Pinto-Gouveia, J. (2016). Effectiveness of a mindfulness-based intervention on oncology nurses’ burnout and compassion fatigue symptoms: A non-randomized study. *International Journal of Nursing Studies*, 64, 98–107. https://doi.org/10.1016/j.ijnurstu.2016.10.002

Duarte, J., Pinto-Gouveia, J., & Cruz, B. (2016). Relationships between nurses’ empathy, self-compassion and dimensions of professional quality of life: A cross-sectional study. *International Journal of Nursing Studies*, 60, 1–11. https://doi.org/10.1016/j.ijnurstu.2016.02.015

Dyrbye, L. N., Shanafelt, T. D., Sinsky, C. A., Cipriano, P. F., Bhatt, J., Ommaya, A., & Meyers, D. (2017). Burnout among health care professionals: A call to explore and address this underrecognized threat to safe, high-quality care. Washington, DC: National Academy of Medicine, 7(7), https://doi.org/10.31478/201707b

El-Altii, L., Sandman, L., & Munthe, C. (2019). Person centered care and personalized medicine: Irreconcilable opposites or potential companions? *Health Care Analysis*, 27(1), 45–59. https://doi.org/10.1007/s10728-017-0347-5

Elfstrand Corlin, T., Kajonius, P. J., & Kazemi, A. (2017). The impact of personality on person-centred care: A study of care staff in Swedish nursing homes. *International Journal of Older People Nursing*, 12(2), e12132. https://doi.org/10.1111/pon.12132

Frampton, S. B., Guastello, S., & Lepore, M. (2013). Compassion as the foundation of patient-centered care: The importance of compassion in action. *Journal of Comparative Effectiveness Research*, 2(5), 443–455. https://doi.org/10.2217/cej.13.54

Garcia, C. D. L., Abreu, L. C. D., Ramos, J. L. S., Castro, C. F. D. D., Smiderle, F. R. N., Santos, J. A. D., ... Bezerra, I. M. P. (2019). Influence of burnout on patient safety: Systematic review and meta-analysis. *Medicina*, 55(9), 553. https://doi.org/10.3390/medicina55090553

Gluyas, H. (2015). Effective communication and teamwork promotes patient safety. *Nursing Standard*, 29(49), 50–57. https://doi.org/10.7748/hsus.2014.s49.50.e10042

Grane, L., Nakash, O., Cohen, M., Ben-David, M., & Ariad, S. (2017). Oncologists’ communication about end of life: The relationship among secondary traumatic stress, compassion satisfaction, and approach and avoidance communication. *Psycho-oncology*, 26(11), 1980–1986. https://doi.org/10.1002/pon.4289

Gremigni, P., Casu, G., & Sommaruga, M. (2016). Dealing with patients in healthcare: A self-assessment tool. *Patient Education and Counseling*, 99(6), 1046–1053. https://doi.org/10.1016/j.pec.2016.01.015

Håkansson, J. E., Holmström, I. K., Kumlin, T., Kaminsky, E., Skoglund, K., Högländer, J., ... Summer, M. M. (2019). “Same same or different?” A review of reviews of person-centered and patient-centered care. *Patient Education and Counseling*, 102(1), 3–11.

Hassmiller, S. B. (2017). The essence of nursing care. *The American Journal of Nursing*, 117(5), 7. https://doi.org/10.1097/01.NAJ.0000516250.61687.63

Hower, K. I., Vennedey, V., Hillen, H. A., Kuntz, L., Stock, S., Pfaff, H., & Ansmann, L. (2019). Implementation of patient-centred care: Which organizational determinants matter from decision maker’s perspective? Results from a qualitative interview study across various health and social care organizations. *British Medical Journal Open*, 9(4), e027591.

Hunsaker, S., Chen, H. C., Maughan, D., & Heaston, S. (2015). Factors that influence the development of compassion fatigue, burnout, and compassion satisfaction in emergency department nurses. *Journal of Nursing Scholarship*, 47(2), 186–194. https://doi.org/10.1111/jnu.12122

Institute of Medicine (IOM) (2001). *Crossing the quality chasm: A new health system for the 21st century*. Washington, DC: National Academies Press. https://www.ncbi.nlm.nih.gov/books/NBK222274/

Jakimowicz, S., & Perry, L. (2015). A concept analysis of patient-centred nursing in the intensive care unit. *Journal of Advanced Nursing*, 71(7), 1499–1517. https://doi.org/10.1111/jan.12644

Jarrar, M. T., Minai, M. S., Al-Bsheish, M., Meri, A., & Jaber, M. (2019). Hospital nurse shift length, patient-centered care, and the perceived
Sacco, T. L., & Copel, L. C. (2018). Compassion satisfaction: A concept analysis in nursing. *Nursing Forum, 53*(1), 76–83.

Salvarani, V., Rampoldi, G., Ardenghi, S., Bani, M., Blasi, P., Ausili, D., ... Strepparava, M. G. (2019). Protecting emergency room nurses from burnout: The role of dispositional mindfulness, emotion regulation and empathy. *Journal of Nursing Management, 27*(4), 765–774. https://doi.org/10.1111/jonm.12771

Salvarani, V., Rampoldi, G., Ardenghi, S., Bani, M., Blasi, P., Ausili, D., ... Strepparava, M. G. (2019). Protecting emergency room nurses from burnout: The role of dispositional mindfulness, emotion regulation and empathy. *Journal of Nursing Management, 27*(4), 765–774. https://doi.org/10.1111/jonm.12771

Salyers, M. P., Bonfils, K. A., Luther, L., Firmin, R. L., White, D. A., Adams, E. L., & Rollins, A. L. (2017). The relationship between professional burnout and quality and safety in healthcare: A meta-analysis. *Journal of General Internal Medicine, 32*(4), 475–482. https://doi.org/10.1007/s11606-016-3886-9

Sharp, S., Mcallister, M., & Broadbent, M. (2018). The tension between person centred and task focused care in an acute surgical setting: A critical ethnography. *Collegian, 25*(1), 11–17. https://doi.org/10.1016/j.colegn.2017.02.002

Stamm, B. H. (2009). *Professional quality of life measure: compassion, satisfaction, and fatigue version 5 (ProQOL).* Center for Victims of Torture. Retrieved from https://proqol.org/ProQol_Test.html

Sun, J. W., Lin, P. Z., Zhang, H. H., Li, J. H., & Cao, F. L. (2018). A non-linear relationship between the cumulative exposure to occupational stressors and nurses’ burnout and the potentially emotion regulation factors. *Journal of Mental Health, 27*(5), 409–415. https://doi.org/10.1080/09638237.2017.1385740

van Mol, M. M., Boeter, T. G., Verharen, L., Kompanjie, E. J., Bakker, J., & Nijkamp, M. D. (2017). Patient-and family-centred care in the intensive care unit: A challenge in the daily practice of healthcare professionals. *Journal of Clinical Nursing, 26*(19–20), 3212–3223.

Walton, M. K., & Barnsteiner, J. (2012). Patient-centered care. In G. Sherwood & J. Barnsteinern (Eds.), *Quality and safety in nursing: A competency approach to improving outcomes* (pp. 67–89). Hoboken, NJ: Wiley-Blackwell.

Watson, J. (1988). *Nursing: Human science and human care. A theory of nursing.* New York, NY: National League for Nursing.

Wei, R., Ji, H., Li, J., & Zhang, L. (2017). Active intervention can decrease burnout in ED nurses. *Journal of Emergency Nursing, 43*(2), 145–149. https://doi.org/10.1016/j.jen.2016.07.011

Wong, C. A., & Laschinger, H. K. (2013). Authentic leadership, performance, and job satisfaction: The mediating role of empowerment. *Journal of Advanced Nursing, 69*(4), 947–959. https://doi.org/10.1111/j.1365-2648.2012.06089.x

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