

The Role of Family Resilience and Social Support among Cancer Patients Undergoing Chemotherapy: A Systematic Review

Dwi Retnaningsih^{1,2*}, Nursalam¹, Hanik Endang Nihayati¹, Ferry Efendi¹, Kristiawati¹

¹Faculty of Nursing, Universitas Airlangga, Surabaya, East Java 60115, Indonesia

²Universitas Widya Husada Semarang, Semarang City, Central Java 50146, Indonesia

*Corresponding Author's Email: dwi.retnaningsih@uwhs.ac.id

ABSTRACT

Background: Cancer and chemotherapy impose significant physical, emotional, and psychosocial burdens on patients and their families. Family resilience, supported by belief-based coping and positive perceptions of cancer treatment, plays an essential role in maintaining stability, reducing distress, and supporting patient well-being during chemotherapy. **Objective:** This systematic review aimed to synthesize evidence on how belief-based family support influences family resilience in caring for cancer patients undergoing chemotherapy and to identify implications for nursing practice. **Methods:** A systematic review guided by the PICOS framework was conducted using Scopus, ScienceDirect, ProQuest, and Web of Science databases. Studies published between 2019 and 2024 were screened through predefined inclusion and exclusion criteria. Fourteen studies met eligibility requirements and were critically appraised using JBI, Cochrane, and CASP tools. **Results:** Four key themes were identified: (1) family resilience is strengthened through social support, dyadic communication, and adaptive coping mechanisms; (2) resilience-focused interventions reduce anxiety, depression, and caregiver burden; (3) psychosocial challenges during chemotherapy affect both patients and families; and (4) determinants of resilience include family cohesion, financial capacity, accessibility of treatment, and health insurance coverage. These findings underscore the importance of integrating resilience assessments and belief-based educational and coping strategies into nursing care to strengthen family support and improve patient outcomes. **Conclusion:** Belief-based family support plays a significant role in enhancing family resilience during chemotherapy. Incorporating resilience-building strategies into oncology nursing practice can reduce psychological distress, improve treatment adherence, and promote holistic family-centered care.

Keywords: *Belief; Cancer; Chemotherapy; Family Support; Resilience*

INTRODUCTION

Cancer is a chronic illness that significantly impacts patients and their families in physical, mental, and social dimensions. Breast cancer, the most prevalent cancer among women (WHO, 2023), often requires intensive treatments such as chemotherapy, which can have both immediate and long-term adverse effects (Baltussen *et al.*, 2023; Lustberg *et al.*, 2023). In this context, family support plays a critical role in the patient's treatment, providing substantial emotional and practical assistance. The concept of family resilience, defined as the family's ability to recover from stress and adapt flexibly to challenges, is particularly vital in this scenario. (Melguizo-Garín *et al.*, 2023; Opsomer *et al.*, 2022)

Cancer is a chronic disease that has a significant physical, psychological, and social impact on patients and their families. The most common disease in women (WHO, 2023) is breast cancer, which frequently necessitates intense treatments like chemotherapy, which can have negative consequences both immediately and over time (Czech *et al.*, 2024; Tang *et al.*, 2024). In this situation, family support - which provides significant emotional and practical aid - is essential to the patient's healing process. In this situation, the idea of family resilience - the family's capacity to bounce back from stress and adapt flexibly to obstacles - is fundamental (Cui *et al.*, 2024; Perak *et al.*, 2024).

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Research indicates that social support from family members, encompassing emotional, practical, and informational aid, significantly enhances the quality of life for both cancer patients and their caregivers (Zamanian *et al.*, 2021). Strong social support systems are associated with reduced psychological distress and emotional burden, as well as improved treatment outcomes for patients (Cui & Wang, 2024). Family values, including the belief in their capacity to overcome challenges, are crucial in fostering resilience. These values are often influenced by spiritual beliefs, societal norms, and past experiences in dealing with adversity (Shao *et al.*, 2023).

Individual patient resilience is favorably correlated with the degree of family resilience among breast cancer patients and their partners (Chen *et al.*, 2021). The majority of cancer respondents reported getting instrumental help (80.9%), informational support (81.4%), evaluation support (75.7%), and emotional support (51.4%) (Kwon *et al.*, 2025). Depression and family resilience are strongly associated with financial difficulties (Chen *et al.*, 2024). Family resilience levels and effective spouse coping are related (Qin *et al.*, 2024). Breast cancer patients and their families are less resilient the more the caregiver is burdened (Li *et al.*, 2018). In the context of cancer care, family resilience is increasingly recognized as a key factor in supporting patients during treatment, managing psychological challenges, and maintaining effective communication (Plont *et al.*, 2023). Studies show that families with high resilience levels are better equipped to provide support, mitigate psychological strain, and sustain healthy communication (Zhang *et al.*, 2023).

Conversely, low family resilience can negatively affect the mental and physical well-being of both patients and family members, potentially reducing the quality of care and life. In the nursing context, resilience is an essential focus of holistic cancer care. Nurses play a crucial role in assessing the psychosocial and spiritual needs of both patients and their families during chemotherapy. By recognizing family strengths and coping patterns, nurses can develop family-centered interventions that promote adaptation, improve treatment adherence, and enhance quality of life. Integrating the concept of family resilience into oncology nursing care aligns with nursing's professional values – empathy, education, and advocacy for patient and family wellbeing. The study aimed to thoroughly examine how faith-based support can strengthen family resilience among cancer patients undergoing chemotherapy.

METHODOLOGY

Research Design

The approach used in this work is a systematic review. The researchers employed the PICOS framework (Population, Intervention, Comparison, Outcome, Study Design) to identify clinical questions (Table 1). To assess study quality, the PRISMA research table, developed by the Center for Review and Dissemination and the Joanna Briggs Institution, was used (Cumpston *et al.*, 2021; Page *et al.*, 2021). "What is the role of faith-based support in enhancing family resilience in caring for cancer patients during chemotherapy?" This is the research question of this study.

Table 1: Description of PICOS

Population	Cancer
Intervention	Increasing the resilience of families
Comparisons	Intragroup, intergroup, compared with the control group, or without the control group
Outcome	In caring for cancer patients, family resilience rises
Study Type	Full text, controlled trial, randomized, quasi-experimental, descriptive study

The population, intervention, comparisons, outcomes, and study (PICOS) for this investigation are outlined in Table 1. Families of cancer patients comprised the group under study. The goal of the intervention is to help families become more resilient when providing care for patients with cancer. Groups inside a group (intragroup), between groups (intergroup), and with or without a control group were compared. Increased family resilience in caring for patients with cancer is anticipated. Full articles, controlled trials, randomized trials, quasi-experimental studies, and descriptive studies were among the types of studies used.

Search Methods

The literature search strategy was conducted across four databases. Web of Science, ProQuest,

ScienceDirect, and Scopus are the databases used. The articles utilized are from a variety of foreign sources and span the years 2019–2024. Using terms related to the research issue, such as ("family resilience" OR "family support" OR "family coping" OR "family strength") AND ("stress management" OR "stress reduction" OR "coping strategies" OR "psychological resilience") AND ("quality of life" OR "wellbeing" OR "life satisfaction" OR "health status") AND ("cancer" OR "oncology" OR "malignancy" OR "tumor") AND ("chemotherapy" OR "cancer treatment" OR "chemotherapeutic agents" OR "drug therapy").

Inclusion and Exclusion Criteria

Table 2: Description of Criteria for Inclusion and Exclusion

Criteria	Inclusion	Exclusion
Population	Cancer	Apart from cancer
Intervention	Increasing the resilience of families	There are no exclusion criteria
Comparisons	Intra-group, intergroup, compared with the control group, or without the control group	There are no exclusion criteria
Outcome	In caring for cancer patients, family resilience rises	No relevant Resilience in cancer patients
Study type	Full text, controlled trial, randomized, quasi-experimental, descriptive study	Protocols, case reports, conference proceedings, surveys, systematic reviews, literature reviews, theses, dissertations, and papers that are not entirely available for download
Type Publication	Peer-reviewed original studies	Non-peer-reviewed studies
Years	2019 to 2024	Pre 2019
Language	English	Other languages other than English

The inclusion and exclusion criteria for the studies on family resilience in cancer patient care are shown in Table 2. The population of cancer patients, family resilience-enhancing interventions, group comparisons or comparisons with a control group, outcomes gauging the improvement of family resilience in caring for cancer patients, and research types such as full-text, controlled trials, randomized trials, quasi-experimental studies, and descriptive studies were among the inclusion criteria. Studies published in English-language journals between 2019 and 2024 and those that have completed peer review were also included. The exclusion criteria included studies that were not related to cancer, studies that were not about cancer patients' resilience, studies published before 2019 or in languages other than English, protocols, case reports, conference proceedings, surveys, systematic reviews, literature reviews, theses, dissertations, and articles that were not fully available for download.

RESULTS

The researchers used PRISMA search criteria to identify relevant publications for this literature review, following the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) flowchart (Figure 1). A total of 526 articles were found across all databases. After rescreening the 526 articles against the inclusion criteria, the researchers found that 14 met them.

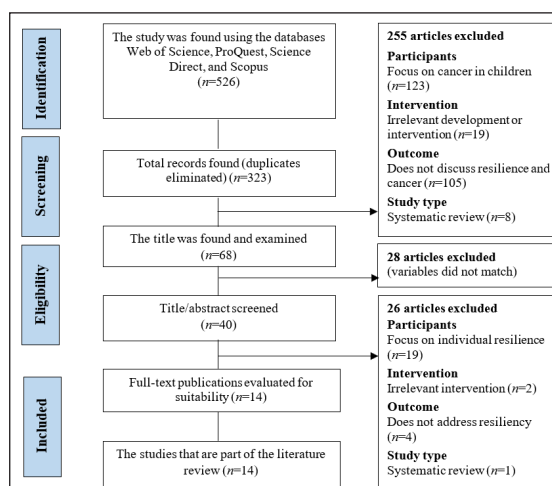


Figure 1: Preferred Reporting Items for Systematic Reviews and Meta-Analysis (PRISMA)

Figure 1 shows the process of locating and evaluating research. There are 526 papers accessible across all databases from 2019 to 2024. After removing duplicates and applying inclusion and exclusion criteria, 14 articles remained. All 14 papers left for quality evaluation following the full-text review had scores above 7. Table 3 displays 14 papers that address the resilience of families in providing care for cancer patients. Table 3 is used to evaluate the quality of studies according to risk of bias and study design. For quantitative research, researchers employed the Joanna Briggs Institute (JBI) Critical Appraisal Tool (Pearson *et al.*, 2014) and Cochrane (Higgins *et al.*, 2008). The CASP checklist is used in qualitative research (CASP, 2018).

Table 3: Data Extraction of the Selected Studies

No.	Author and Year	Design	Subject of Study	Results	Topic
1	Chen <i>et al.</i> , (2023)	Quantitative	348 gynecological cancer patients	Family resilience demonstrates a positive correlation with partner support and the quality of dyadic communication ($p < 0.01$).	Family Resilience and Social Support
2	Zhang <i>et al.</i> , (2023)	Cross-sectional	213 families of lung cancer patient caregivers	Family resilience serves as a mediator in the relationship between social support and caregiver burden.	
3	Cui <i>et al.</i> , (2023)	Cross-sectional	270 pairs of nurses and advanced-stage cancer patients.	Patients with health insurance outside the rural cooperative system and families exhibiting high cohesion demonstrate greater resilience.	
4	Tao <i>et al.</i> , (2022)	Descriptive cross-sectional	315 cancer survivors	Higher levels of social support and stronger family resilience reduce the caregiver load.	
5	Kim & Ahn, (2022)	Quantitative	123 pairs of gynecological cancer patients	Couples that communicate well and have appropriate coping mechanisms have improved family functioning.	
6	Gao <i>et al.</i> , (2022)	Experiment RCT	80 families of breast cancer patients	Anxiety, depression, and the burden of family illness decreased in the intervention group, whereas family resilience increased.	Intervention and Family Resilience
7	Ke <i>et al.</i> , (2023)	Cross-sectional	313 individuals with lung cancer and their spouses	The association between patients' quality of life and family resilience is mediated by dyadic coping.	
8	Mao <i>et al.</i> , (2021)	Quantitative	252 liver cancer patients	McCubbin's notion of stress resilience served as the foundation for the family adaptation model.	
9	Opsomer <i>et al.</i> , (2022)	Qualitative	Twelve couples who have just been diagnosed with advanced-stage cancer	Partners of patients are experiencing more psychological strain as a result of the COVID-19 epidemic, but they are adjusting creatively.	Psychosocial Impact on Patients and Families
10	Rasouli <i>et al.</i> , (2022)	Quantitative	There were 99 young people (18–26 years old) who lost a sibling to cancer	52.8% can cope with loss, while 47.2% experience unresolved grief.	
11	Zahid <i>et al.</i> , (2021)	Quantitative	250 head and neck cancer patients	The collectivist society lowers anxiety and boosts resilience.	
12	Too <i>et al.</i> , (2023)	Qualitative phenomenological	Twelve people who look after patients with advanced cancer	high financial and emotional costs while demonstrating psychological fortitude.	Factors Affecting Family Resilience
13	Cui <i>et al.</i> , (2023)	Cross-sectional	270 nurse-patients pair, with advanced-stage cancer	Limited treatment choices and social support have an impact on family resilience.	
14	Chen <i>et al.</i> , (2021)	Quantitative	272 cancer patients and their partners (N = 544)	Individual and family resilience is positively related to social support.	

A cross-sectional design is used in the majority of the research in Table 3 of the review. An experimental trial shows excellent quality with successful treatments in enhancing the resilience of relatives of cancer patients (Gao *et al.*, 2022). Meanwhile, qualitative research offers profound insights into the experiences of patients and their families (Opsomer *et al.*, 2022; Too *et al.*, 2023). The features differ depending on the type of research, the respondents, and the cancer type. The study addresses several kinds of cancer, including head and neck cancer, liver cancer, lung cancer, breast cancer, and gynecological cancer. Partners, family members, nurses, and unpaid caregivers are among this survey's broad group of respondents. Cross-sectional studies, randomized controlled trials (RCTs), and quantitative and qualitative methods are among the methods employed.

Numerous studies emphasize how coping strategies, family resiliency, and social support may enhance patients' and their families' quality of life. Furthermore, family resilience in the face of cancer is enhanced by factors such as health insurance coverage, family connectedness, and stress-coping skills.

Four topics are displayed in Table 3 of the article review results. These include:

(1) *Family resilience and social support:* There is a positive relationship between family resilience and

partner support and dyadic communication quality in gynecologic cancer patients (Chen *et al.*, 2023) family resilience mediates the relationship between social support and caregiver burden in lung cancer patients' families (Huang *et al.*, 2025; Zhang *et al.*, 2023), and patients with better health insurance and their families (Cui *et al.*, 2023).

(2) *Family intervention and resilience*: Dyadic coping mediates the relationship between family resilience and the quality of life of lung cancer patients and their partners (Ke *et al.*, 2023); A family adaptation model was developed based on McCubbin's theory of stress resilience in liver cancer patients (Mao *et al.*, 2021); coping-based intervention programs improve family resilience and lessen anxiety, sadness, and disease burden within the families of breast cancer patients (Gao *et al.*, 2022).

(3) *The psychological effects on patients and their families*: Partners of patients with advanced cancer faced increased psychological strain due to the COVID-19 pandemic, but they adjusted creatively (Opsomer *et al.*, 2022). Of siblings left behind by cancer patients, 52.8% were able to deal with the loss, while 47.2% still had unresolved grief (Rasouli *et al.*, 2022). Pakistan's collectivist culture lowers anxiety levels and increases the resilience of people with head and neck cancer (Zahid *et al.*, 2021). Kenyan caregivers of patients with advanced-stage cancer reported substantial emotional and financial hardships. However, they nevertheless showed psychological resilience (Too *et al.*, 2023).

(4) *Factors affecting family resilience*: Individual and family resilience is positively correlated with social support in cancer couples (Chen *et al.*, 2021), and family resilience is impacted by social support and limited treatment options for patients with advanced-stage cancer (Cui *et al.*, 2023).

DISCUSSION

Resilience within the family is a crucial component of cancer patient care, particularly for those receiving chemotherapy. Patients and their families face mental and physical stress during the cancer treatment process, particularly during chemotherapy. Enhancing family resilience helps cope with the strain and stress that come with this therapeutic process. According to several research studies, family resilience in caring for cancer patients is significantly influenced by social support, family interventions, psychological implications for patients and families, and factors influencing family resilience.

Social Support and Family Resilience

Increasing family resilience also requires social support from friends, extended family, and the community. The psychological strain that families bear when caring for cancer patients can be lessened with strong social support (Ahn & Kim, 2022; Zhang *et al.*, 2025). Families with access to broad social support systems typically have greater resources to manage the resulting stress and responsibilities. This might take the form of emotional support that reduces stress and anxiety or practical support that helps with home duties. Families are better equipped to handle chemotherapy-related difficulties and increase their resilience when they have significant social support (Hassana *et al.*, 2025; Shao *et al.*, 2023). Nurses play a central role in strengthening this support system by providing psychosocial guidance and resilience-based education to families throughout chemotherapy (Ashley *et al.*, 2025). To lessen the burden and enhance the quality of life for families, comprehensive support, which includes financial aid, counseling, health education, and spiritual support, is essential (Cui *et al.*, 2024).

Psychosocial Impact on Patients and Families

Both patients' and caregivers' physical and mental health may suffer as a result of the stress that comes with receiving cancer therapy. Resilience within the family acts as a buffer, lessening the damaging effects of that stress. Resilient families are better equipped to handle the stress of cancer treatment because they know how to resolve disputes, divide responsibilities, and support one another (Dionne-Odom *et al.*, 2021; Liu *et al.*, 2025). Families with resilience can lessen the adverse effects of stress on patients receiving chemotherapy on their mental health and quality of life (Ulibarri-Ochoa *et al.*, 2024). Patients' quality of life and motivation to receive treatment are enhanced by resilient families' improved ability to handle stress, foster a supportive atmosphere, and offer the emotional support that patients require (Balci & Şener, 2022). On the other hand, families with low resilience typically struggle to cope with stress, which can result in emotional strain, a lack of

communication, and an atmosphere that is not supportive of the patient (Cui *et al.*, 2023).

Factors Affecting Family Resilience

Family resilience when caring for cancer patients is primarily influenced by the social support that the patient and their family receive. Happiness, along with the types and sources of support, resilience, and optimism, is all positively connected with quality of life. According to the study's findings, informational assistance from friends is the factor that most enhances patients' general health. At the same time, emotional support from spouses is the factor that most helps patients cope with their illness. Thus, the primary factors influencing patients' symptom reduction are the emotional and informational support of partners and family members (Ruiz-Rodríguez *et al.*, 2022). One of the most important components of family resilience is partner support. Patients who have partners who support them emotionally, physically, and psychologically during the chemotherapy process feel more capable of handling the treatment's adverse effects (Chen *et al.*, 2021).

Research indicates that spouses who actively support patients during all phases of therapy might help patients feel secure and at ease. This helps lessen cancer patients' anxiety and sadness, which frequently become the most significant obstacles throughout therapy (Hermann *et al.*, 2024). Involving partners in treatment management and decision-making can help improve patients' confidence in therapy and strengthen emotional bonds. Regular assistance from a spouse has both psychological and physical advantages. The patient's physical rehabilitation is accelerated by partners who assist with daily care, such as cooking nutritious meals, supporting movement, and monitoring the patient's health (Afiyanti *et al.*, 2021). However, it has been demonstrated that partners who give emotional support – such as a space to vent and provide encouragement – improve patients' overall quality of life (Hermann *et al.*, 2024). Furthermore, developing resilience also heavily relies on self-acceptance. According to studies, cancer patients with higher self-acceptance also show greater resilience, enabling them to better adapt to the disease (Liu *et al.*, 2025). This review highlights that enhanced family resilience has a direct impact on clinical decision-making in oncology nursing. When nurses assess family coping capacity and levels of social support, they are better equipped to plan individualized care, anticipate psychosocial risks, and tailor interventions for patients undergoing chemotherapy. For example, identifying low-resilience families allows nurses to provide early counseling, strengthen dyadic communication, and reinforce belief-based coping strategies that improve treatment adherence. Strengthened family resilience also contributes to reduced anxiety, better symptom management, improved sleep quality, and higher motivation among patients – factors that directly influence chemotherapy outcomes. These findings indicate that resilience-focused assessment should become a routine component in chemotherapy nursing care, guiding more holistic and evidence-based clinical decisions.

From a nursing perspective, this review underscores the vital role of nurses in fostering family resilience during chemotherapy. Oncology nurses often serve as the primary point of contact for both patients and families, providing emotional, informational, and educational support. Through effective communication and patient education, nurses can help families understand treatment processes, manage side effects, and strengthen belief-based coping mechanisms. This aligns with the principles of family-centered nursing, which emphasize holistic support and collaborative care between nurses, patients, and family members to foster resilience (Retnaningsih *et al.*, 2025). Moreover, nurses can implement resilience-building interventions – such as family counseling, stress management training, and the use of digital health tools – to promote empowerment and improve quality of life among cancer patients and their families.

The findings of this systematic review provide several implications for nursing practice. Oncology nurses should incorporate family resilience assessments into their clinical routines to identify vulnerable families early. The results of this review also have important implications for nursing education. Training programs should incorporate structured modules on family resilience, psychosocial assessment, dyadic coping, and belief-based interventions. By integrating these concepts into the oncology nursing curriculum, nursing students and practicing nurses will be equipped with competencies to deliver family-centered care, conduct resilience screening, and facilitate effective communication with caregivers. Educators can utilize case-based learning, simulation, and digital health scenarios to strengthen students' ability to support families during chemotherapy. This ensures that future nurses are prepared not only to manage clinical symptoms but also to address the psychosocial and spiritual needs that influence patient outcomes. Nursing interventions based on

the Health Belief Model can be integrated into educational sessions to enhance belief-based family support. In addition, developing nurse-led digital platforms or mobile applications can help deliver ongoing psychoeducation and strengthen family coping during chemotherapy. This approach supports the holistic goals of nursing by ensuring that emotional, spiritual, and educational needs are addressed throughout the cancer care continuum.

Stronger family resilience contributes to measurable improvements in patient outcomes. Evidence from the included studies shows that patients supported by resilient families experience fewer depressive symptoms, lower anxiety, better adherence to chemotherapy schedules, and improved quality of life. Family cohesion and effective communication are also associated with better pain control, smoother recovery, reduced caregiver burden, and improved coping throughout treatment. These findings demonstrate that resilience-based family interventions are not merely supportive strategies but are directly linked to improved therapeutic outcomes. Therefore, integrating resilience-focused approaches into standard oncology nursing practice can substantially enhance the overall well-being of cancer patients undergoing chemotherapy.

Limitations

There are several limitations to consider, even though this study offers profound insights into how social support and family resilience might enhance the well-being of cancer patients receiving chemotherapy. First, as this study examines only English-language literature published between 2019 and 2024, pertinent studies conducted in other languages or earlier may have been excluded. Additionally, the systematic approach employed in this review relies on data from studies with diverse populations and designs, which may lead to differences in the quality and applicability of the conclusions.

As this study was a systematic review, it also lacked primary data. Thus, without further empirical investigation, the outcomes depend on the quality and availability of the prior research. This study also highlights the significance of faith-based support in building family resilience. However, cultural variations and contextual factors in the use of these support techniques have not been fully discussed. To fully understand the dynamics of family resilience in cancer patient care, further research using mixed methods and a longitudinal approach is required. Future nursing research should explore culturally adapted interventions that integrate spiritual and psychosocial components into family resilience models to strengthen holistic care in oncology settings.

CONCLUSION

Belief-based support greatly enhances family resilience in caring for cancer patients through chemotherapy. A family's preparedness and resilience in supporting the patient are influenced by their belief in the benefits of therapy, awareness of risks, and capacity to overcome challenges. Accordingly, family support may be strengthened through the development of Health Belief Model-based treatments in the form of educational modules or digital applications, which will enhance patients' quality of life and maximize the efficacy of treatment. The findings reinforce the critical role of oncology nurses in translating evidence of family resilience into clinical practice. Routine assessment of family resilience should be integrated into chemotherapy nursing care to identify families who are at greater psychosocial risk. By implementing structured resilience-building interventions such as communication enhancement, dyadic coping support, and belief-strengthening education, nurses can improve family coping capacity, strengthen treatment adherence, and create a supportive environment that promotes patient well-being. These actions ultimately lead to better chemotherapy tolerance, reduced anxiety, and improved quality of life in patients with cancer.

Opportunities to create Health Belief Model-based interventions, such as instructional materials or online apps, to help families become resilient while caring for cancer patients during chemotherapy are presented in this study. Additional investigations can examine the efficacy and use of this technology in a more comprehensive setting as well as its influence on the quality of life of patients and families.

Conflict of Interest

None of the contributing writers disclose any conflicts of interest.

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