

# Family Caring Strategies in Neutropenia

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Aggressive chemotherapy protocols result in approximately half of all patients receiving chemotherapy developing neutropenia (Ozer et al., 2000). Recognition that chemotherapy and dose intensity can make a difference in survival rates for patients with cancer has challenged health-care providers to find methods to increase the percentage of patients treated with at least 85% of the planned chemotherapy dose (Bonadonna, Valagussa, Moliterni, Zambetti, & Brambilla, 1995; Crawford, Dale, & Lyman, 2004). Neutrophil growth-stimulating factors have become integral parts of cancer treatment to maintain this dose intensity. Although the use of colony-stimulating factors has helped to shorten hematopoietic system recovery in many instances, chemotherapy-induced neutropenia (CIN) continues to be a significant and potentially life-threatening side effect of treatment (Hayes, 2001). Because the advent of ambulatory care options for IV antibiotic and colony-stimulating factor delivery has reduced the incidence of inpatient care (Cappozzo, 2004; Donohue & Carbo, 2004; Rostad, 1991), families and patients now manage CIN, and the family is an integral part of the healing environment. However, the family's experience with and role in managing CIN have received sparse attention in the literature.

Families experience cancer and stressful events related to the illness along with patients with cancer (Matthews, Baker, &

Aggressive chemotherapy protocols result in neutropenia in approximately half of all patients receiving chemotherapy. Thus, neutropenia continues to be a significant and potentially life-threatening side effect of treatment, even with use of colony-stimulating factors. Families of patients with neutropenia often provide the primary healing environment because most chemotherapy protocols are managed on an outpatient basis. To learn about the family's experience of managing chemotherapy-induced neutropenia (CIN), a grounded-theory methodology was used to analyze data from seven families. The central theme revealed by these families was "turbulent waiting with intensified connections." This meant that when families had a sense of greater vulnerability in response to the waiting after diagnosis of CIN, they connected intensely with each other and healthcare providers. Families reported that connections with nurses became more significant when neutropenia interrupted chemotherapy. Families also developed family caring strategies to manage this period of waiting for the chemotherapy to resume. These strategies included family inquiry, family vigilance, and family balancing. Nurses need to be aware of approaches to support the family's ability to manage CIN. Interventions and approaches constructed from the perspective of a family-professional partnership will enhance the family cancer experience as well as ongoing family growth and function.

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distress (Mast, 1998; Mishel & Murdaugh, 1987). This article reports the family experience of CIN and suggests nursing approaches that can support family caring strategies during CIN.

Caring for families in distress so that they can be a source of support and strength for their loved ones with cancer is a foundation of nursing practice. Nurses in partnership with a family will enhance the treatment environment, contribute to treatment adherence (Champion, 2001), and minimize the distress of uncertainty. Recent cancer literature has suggested the need to invest in conversations with families about cancer (Duhamel & Dupuis, 2004), develop a program of care to assist family members in managing the stress of cancer (Northouse et al., 2002), and initiate patient and family education related to neutropenia (Cagen, Franco, & Vasquez, 2002; Hood, 2003). Because of their strategic role on a health team that cares for patients with cancer and their families, nurses have the opportunity to provide support to families dealing with the stresses of a cancer illness (Duhamel & Dupuis).

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