RESEARCH BRIEF

Exploring Analgesic Use Patterns Among Cancer Survivors With Chronic Chemotherapy-Induced Peripheral Neuropathy

Robert Knoerl, PhD, RN, Michael B. Sohn, PhD, Melyssa Foust, MSN, RN, OCN®, Lori Francar, MLIS, BSN, RN, Mark A. O'Rourke, MD, Gary R. Morrow, PhD, MS, Karen M. Mustian, PhD, MPH, Lynn Gauthier, PhD, and Jennifer S. Gewandter, PhD, MPH

OBJECTIVES: To explore cancer survivors' historical and current use of analgesics for chronic chemotherapy-induced peripheral neuropathy (CIPN).

SAMPLE & SETTING: 142 post-treatment cancer survivors who received neurotoxic chemotherapy and were experiencing moderate to severe CIPN.

METHODS & VARIABLES: Participants completed the Treatment-Induced Neuropathy Assessment Scale at baseline and reported all analgesics used to manage CIPN. Frequency of historical or current prescription analgesic use for chronic CIPN was described and stratified by CIPN pain severity.

RESULTS: At baseline, 31% of participants reported historical use of analgesics for CIPN and 46% of participants were currently using analgesics for CIPN. Gabapentin was the most frequently used analgesic, historically (20%) and currently (34%), and duloxetine was used less frequently (6% historical use, 10% current use). Many participants with severe pain (59%) reported using analgesics for CIPN.

IMPLICATIONS FOR NURSING: Duloxetine, the first-line treatment for chronic CIPN pain, was used less frequently than gabapentin, a common prescription analgesic for neuropathic pain. Further research is needed to determine strategies to promote the implementation of evidence-based CIPN treatments in clinical practice.

KEYWORDS analgesics; chemotherapy-induced peripheral neuropathy; cancer pain

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Chemotherapy-induced peripheral neuropathy (CIPN) is a side effect of neurotoxic chemotherapy administration (e.g., taxanes, vinca alkaloids) and persists chronically after treatment completion in about 60% of patients (Seretny et al., 2014). Chronic CIPN (bilateral numbness, tingling, neuropathic pain, and/or weakness) negatively affects individuals' ability to carry out activities of daily living (Gewandter et al., 2013; Knoerl, Mazzola, et al., 2022) and increases fall risk (Winters-Stone et al., 2017). Only one guideline-based treatment is recommended for painful CIPN (i.e., duloxetine), and there are no guideline-based treatments available for nonpainful CIPN or CIPN-related functional deficits (Loprinzi et al., 2020).

Various factors may influence clinicians' decisions regarding which treatments to prescribe for CIPN in clinical practice, including patients' concerns about additional side effects from medication, insurance barriers, drug–drug interactions (Knoerl et al., 2023), and lack of clinician knowledge surrounding available CIPN treatments (Tanay et al., 2022). As such, several analgesic medications are currently prescribed in clinical practice for CIPN management. For example, claims data suggest that within the first six months of initiating neurotoxic chemotherapy, gabapentin, pregabalin, and duloxetine were dispensed to approximately 7%, 1%, and 1% of patients, respectively (Gewandter et al., 2020). These data are limited because it is not known what percentage of these patients developed CIPN from the neurotoxic chemotherapy or for what these analgesics were prescribed, but they suggest that duloxetine may be underutilized to treat CIPN. The purpose of this secondary analysis is to explore cancer survivors' self-reported historical and current use of prescription analgesics for the