ABSTRACT

Background: Community re-integration is an important goal for people living with a spinal cord injury, however, it presents with multiple barriers such as secondary health conditions. Pain is a common secondary health complication post spinal cord injury (SCI), often resulting in limitations in daily functioning, mood and sleep. Therefore, this study aimed to determine the association between pain and community re-integration.

Method: This study involved secondary data analysis from an existing database, consisting of 122 participants with SCI from T2 and below. Data on sociodemographic, injury profile, pain characteristics, as well as community re-integration were used. The Reintegration to Normal Living Index was used to determine community re-integration, while the DN4 and Wheelchair User's Shoulder Pain Index were used to determine the presence of neuropathic and shoulder pain respectively. Spearman correlations were used to determine associations between pain and pain severity on community re-integration, and Mann Whitney U tests were used to determine if there was a difference in community re-integration between participants who had pain and those who didn't. Data was analysed at the 0.05 significance level.

Results: The median total percentage for community re-integration was 77.73 (IQR 19.88) and 85.2% of the participants reported current pain. Neuropathic pain was more common and more severe than nociceptive pain. Despite a low prevalence of shoulder pain in this study (14.8%), there was a negative association between taking trips out of town and loading a wheelchair into the car ($p < 0.05$). There was no significant difference in levels of community re-integration between participants with or without pain, and no correlation was found between the overall presence of pain and community re-integration. It was the severity of pain, particularly shoulder pain, which was negatively associated with taking trips out of town ($p < 0.01$), and with overall community re-integration ($p < 0.05$).

Conclusion: It is not the mere presence of pain that influences community re-integration, but rather the severity of pain, especially if pain is located in the shoulders. This is an important consideration when rehabilitating people with SCI back into their communities, as shoulder care and pain management will need to be included in the rehabilitation programme.