

Available online at www.sciencedirect.com

ScienceDirect

journal homepage: <http://www.elsevier.com/journals/international-journal-of-nursing-sciences/2352-0132>

Original Article

The investigation of care burden and coping style in caregivers of spinal cord injury patients

Hai-Ping Ma^a, Hui-Juan Lu^{b,*}, Xiao-Yun Xiong^a, Jian-Ying Yao^a, Zhen Yang^c

^aThe Second Affiliated Hospital of Nanchang University, Nanchang, China

^bSchool of Nursing, Fudan University, Shanghai, China

^cThe First Affiliated Hospital of Nanchang University, Nanchang, China

ARTICLE INFO

Article history:

Received 26 February 2014

Received in revised form

17 April 2014

Accepted 23 April 2014

Available online 9 May 2014

Keywords:

Caregivers

Care burden

Coping style

Spinal cord injury

ABSTRACT

Purpose: The level of care burden experienced by caregivers of patients with spinal cord injury and their coping style were evaluated in order to identify ways to improve their capacity to respond and reduce the care burden.

Methods: A convenience sampling method was used to select 150 spinal cord injury patients who were discharged from the Second and the Third Affiliated Hospital of Nanchang University and their primary caregivers. The Chinese version of the Zarit Caregiver Burden Interview and the Simplified Coping Style Questionnaire were distributed to assess caregiver burden and coping strategies.

Results: The care burden score of the caregivers of patients with spinal cord injury was 52.91 ± 11.56 points. Eighty-eight percent of caregivers reported moderate or severe care burden levels. The largest proportion of caregivers were female spouses, who were less likely to use an active coping strategy. A negative coping strategy was more frequently used by caregivers compared to healthy adults, and was positively correlated with burden of care. In contrast, a negative correlation was found between the care burden and an active coping style.

Conclusion: Primary caregivers of spinal cord injury patients report a heavy burden of care. As active coping strategies are more beneficial, medical care providers should encourage caregivers to make more use of these coping styles to promote physical and mental health for themselves, their patients and their family, as well as to improve the quality of care provided.

Copyright © 2014, Chinese Nursing Association. Production and hosting by Elsevier (Singapore) Pte Ltd. All rights reserved.

* Corresponding author.

E-mail address: H.-J.Lu@fudan.edu.cn (H.-J. Lu).

Peer review under responsibility of Chinese Nursing Association



1. Introduction

The development of transport and construction in China has led to an increase in the incidence of spinal cord injury (SCI). The estimated number of patients with spinal cord injuries worldwide is over three million, with more than one million in China, and 120,000 new cases every year [1]. Spinal cord injury is a relatively common serious disabling condition [2] that can cause permanent disability and leave individuals incapable of caring for themselves. Rehabilitation often occurs at home, with caregiving provided by the spouse. The psychological pressure and additional burdens are particularly substantial on the immediate family caregivers.

Previous studies have shown the coping strategies implemented by caregivers can affect their care burden [3,4]. Moreover, the burden felt by caregivers may seriously impact their own health as well as the quality of care they provide to their patients. The aim of this study was to evaluate the burden level on caregivers of patients with SCI and their coping strategies. The findings from this study will help provide a basis to identify effective coping methods that alleviate their burden to ultimately promote the common health of patients and their caregivers.

2. Subjects and methods

2.1. Subjects

A convenience sampling method was applied for the selection of caregivers of SCI patients discharged between January 2011 and November 2012 from the Second and Third Affiliated Hospitals of Nanchang University. Criteria used to identify SCI patients included: >18 years-old, diagnosed by computed tomography or magnetic resonance imaging as cervical, thoracic or lumbar SCI patients with paraplegia or quadriplegia, no history of mental illness, consent to participate in this study. Criteria for caregivers included: SCI patient family members who provided primary care (if more than one family member, the patient designated which was the primary caregiver), >18 years-old, provided care \geq seven days per week, able to understand the contents of the questionnaire and communicate with investigators in Mandarin without any barrier, consent to participate in this study. One hundred fifty-two of the 154 distributed questionnaires were recovered, yielding a 98.70% recovery rate. Of these, 150 were valid questionnaires, with an effective rate of 97.40%.

2.2. Questionnaire

2.2.1. General information

All data was collected from questionnaire responses. General information was collected from spinal cord injury patients, such as gender, age, medical expenses and sources of payment, etc., in addition to disease-related information, including which spinal segment was injured, admission time, clinical diagnosis, cause and severity of injury, treatment and complications. General information was also collected from

the caregivers, including basic conditions, personal health information and care information.

2.2.2. Zarit Caregiver Burden Interview (ZBI)

The Chinese version of the ZBI, developed by Lie Wang [5], assesses two dimensions of burden to caregivers (role and personal burden) in a survey comprised of 22 questions, and has been used for assessing the burden of caring for patients with stroke, hemodialysis, and chronic diseases such as Alzheimer's disease. Questions are scored on a 5-point scale ranging from 0 (never) to 4 points (always), and summed for a maximum total of 88 points with a higher score indicative of greater burden. The overall Cronbach's coefficient of internal consistency is 0.88, with a test-retest reliability of 0.87. The two dimensions within this assessment are internally consistent and show high content and construct validity.

2.2.3. Simplified coping style questionnaire

The first 12 questions of this questionnaire evaluate active coping response characteristics, and the remaining eight emphasize the negative coping characteristics. Questions are scored using a self-rated scale, ranging from a score of 0 (never) to 3 (often used). The overall Cronbach's coefficient for this questionnaire is 0.90, with a positive response subscale coefficient of 0.89 and a negative coping subscale of 0.78. The test-retest correlation coefficient for this questionnaire is 0.89. Factor analysis results show that, consistent with the theoretical conception, this questionnaire shows good validity for evaluation two factors, "active" and "negative" coping [6].

2.3. Statistical analysis

SPSS 17.0 statistical software (SPSS Inc., Chicago, IL, USA) was used for analyses of data frequency, mean, standard deviation, and percentage values. *T* and analysis of variance (ANOVA) tests were used to evaluate differences in gender, age, SCI, payment of medical expenses, education level, family role, and presence of religious beliefs of caregivers. Pearson's correlational analysis was used to assess the association between SCI caregiver burden and coping style. Data are expressed as mean \pm standard deviation, with a *p* value of 0.05 considered as statistically significant.

3. Results

3.1. Overall results

This study included a total of 150 cases of SCI. The majority of the patients were male (115/150, 76.7%) with an overall average patient age of 43.23 ± 11.92 years. The causes of SCI included: 65 cases from traffic accidents (43.3%), 52 cases of injury from falls (34.7%), 15 cases due to falls (10%), heavy injured in 10 cases (6.7%), and 8 cases of SCI injury due to other causes (5.3%). Most of the injuries were to the cervical spinal cord (102/150, 68%), 26 cases were injuries to the thoracic spinal cord (17.3), 18 cases involved the lumbar spinal cord (12.0%), and four cases involved injury to two or more segments (2.7%). Incomplete paralysis occurred in 93 of the 150 cases (62%), and total paralysis occurred in 57 cases (38%). One

Download English Version:

<https://daneshyari.com/en/article/2655874>

Download Persian Version:

<https://daneshyari.com/article/2655874>

[Daneshyari.com](https://daneshyari.com)