

THE MENTAL HEALTH STATUS OF CHINESE MEDICAL PEACEKEEPERS IN LEBANON

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We investigated the mental health status of Chinese medical peacekeepers in Lebanon. In total, 59 peacekeepers completed the Self-rating Depression Scale (SDS; Zung, 1965), Self-rating Anxiety Scale (SAS; Zung, 1971), and Symptom Checklist-90 (SCL-90; Wang, 1984) 1 week after their arrival in Lebanon. These data were compared with those of 62 military personnel (control group 1) and 58 medical workers (control group 2). Significant differences were found between the peacekeeping group and control group 1 concerning sum scores on the SDS and SAS, and a number of SCL-90 factors. Although peacekeepers had good mental health status 1 week after arrival, this needs to be assessed longitudinally in future research.

Keywords: anxiety, depression, mental health status, peacekeepers, military, medical.

Owing to growing threats to global security, the role of United Nations (UN) peacekeeping or humanitarian interventions has increased dramatically in recent years. Peacekeeping has become more dangerous as missions have become

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riskier, longer, unpredictable, and so on (Klaassens, van Veen, Weerts, & Zitman, 2008; Maguen, Litz, Wang, & Cook, 2004). Several researchers have suggested that the deployment of peacekeeping operations is associated with increased psychological distress and decreased health-related quality of life (Eaton et al., 2008; Forbes et al., 2005; Michel, Lundin, & Larsson, 2003; Sareen et al., 2008). Furthermore, there is concern about the negative psychological impact including increased self-reported distress and suicidal behaviors of peacekeeping operations (Thoresen & Mehlum, 2004, 2006; Ward, 1997).

Military personnel are exposed to high rates of traumatic events during combat and peacekeeping operations (Greenberg, Iversen, Hull, Bland, & Wessely, 2008). It is surprising, that although no peacekeeping mission can be successfully carried out without healthy participants, mental health issues of peacekeeping workers have received little attention, and psychiatric problems that can negatively impact on mission success have been largely ignored (Ismail et al., 2002; Sawamura et al., 2008). There are limited studies in which the prevalence of mental health issues in military members has been investigated. In addition, the validity of previous research into the mental health of peacekeepers has been questioned owing to the lack of appropriate controls (Klaassens, van Veen, Weerts, & Zitman, 2008).

In this study, the mental health status of peacekeepers was analyzed one week after they arrived in the mission area, through a well-controlled investigation. Intervention strategies for military personnel who conduct peacekeeping missions, and applications to further research are then discussed.

Method

Participants

Participants comprised 59 members of the June 2010 Chinese peacekeeping medical team in Lebanon (46 males, 13 females, average age 29.05 ± 6.26 years, average education period 14.64 ± 2.25 years), 62 members of a military control group (all male, average age 26.56 ± 4.96 years, average education period 14.39 ± 2.09 years), and 58 local medical staff members in the second control group (33 males, 25 females, average age 28.67 ± 6.17 years, average education period 16.84 ± 1.75 years). All participants gave their informed consent.

Measures

The Self-rating Depression Scale (SDS; Zung, 1965) and the Self-rating Anxiety Scale (SAS; Zung, 1971) are both well-recognized 20-item self-report scales for assessing the severity of depression and anxiety symptoms, respectively.

Individual items are rated on 4-point Likert scales (from 1 = *a little of the time* to 4 = *most of the time*). The total score is obtained by summing the ratings of all items, ranging from 20 to 80 (Zung, 1965, 1971). These two questionnaires were used to assess the mental health status of the peacekeepers. The Symptom Checklist-90 (SCL-90, Wang, 1984) includes nine subscales, and items are rated on a 5-point Likert scale from 0 = *not at all* to 4 = *extremely characteristic of me*.

Procedure

The study was approved by the ethics committee of the Beijing Institute of Basic Medical Sciences. Before the survey, consent was obtained from all participants, none of whom refused to take part. After peacekeeping personnel were selected and had completed two months of training, the survey was performed one week after the peacekeepers arrived in Lebanon. Participants were given the self-reported questionnaires to answer according to their concrete realities. The two control groups took the test in the same way.

After three incomplete questionnaires were eliminated, 176 participants were included in the final sample (response rate of 99.0%). SPSS version 13.0 was used to carry out analyses of variance (ANOVAs) to measure the differences in mental health status among the groups. Results were considered statistically significant at $p < .05$.

Results

The ANOVAs revealed statistically significant differences among the three groups in SDS ($F = 3.167, p = .045$) and SAS ($F = 8.548, p < .001$) sum scores. Through post hoc least significant difference comparisons, we found that the peacekeepers' SDS scores were significantly lower than those of the military group (37.72 ± 7.58 vs. $41.48 \pm 9.87, p < .001$). No differences were found between peacekeepers and medical workers. Post hoc comparisons of the SAS scores revealed a significant difference between peacekeepers and military personnel (33.38 ± 5.28 vs. $38.44 \pm 8.21, p < .001$) as well as between peacekeepers and medical workers (33.38 ± 5.28 vs. $35.02 \pm 6.46, p < .001$; see Figure 1).

ANOVAs and post hoc testing of the SCL-90 data revealed a significant statistical difference in the somatization, anxiety, hostility, and other factors as well as the positive item total between the peacekeeper and military groups (see Table 1). No significant differences in the mean SCL-90 scores were found among the three groups ($F = 1.585, p = .208$).

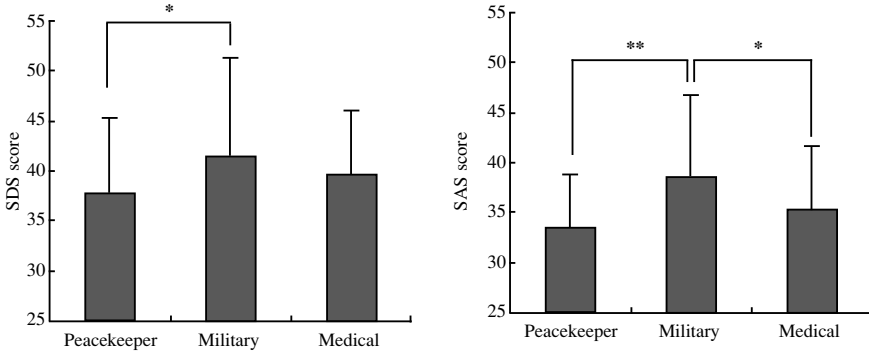


Figure 1. Comparison of SDS scores (left) and SAS scores (right) between peacekeeper and control groups.

Note: * $p < .05$. A statistically significant difference was found in SDS and SAS scores between peacekeeper and control groups.

Table 1. Comparison of SCL-90 Scores Between Peacekeeper and Control Groups

SCL-90 Subfactors	Military	Medical	Peacekeeper
Somatization	1.37 ± 0.40	1.13 ± 0.19	1.14 ± 0.20*
Obsessive-compulsive	1.58 ± 0.44	1.49 ± 0.38	1.57 ± 0.38
Interpersonal sensitivity	1.40 ± 0.43	1.37 ± 0.42	1.38 ± 0.35
Depression	1.31 ± 0.37	1.28 ± 0.40	1.20 ± 0.29
Anxiety	1.29 ± 0.35	1.28 ± 0.29	1.16 ± 0.17*
Hostility	1.37 ± 0.46	1.19 ± 0.25	1.23 ± 0.42*
Phobia	1.16 ± 0.30	1.12 ± 0.26	1.13 ± 0.22
Paranoid ideation	1.28 ± 0.40	1.32 ± 0.40	1.31 ± 0.36
Psychoticism	1.29 ± 0.37	1.24 ± 0.26	1.21 ± 0.20
Other	1.39 ± 0.38	1.25 ± 0.33	1.22 ± 0.26*
Positive items count	23.61 ± 20.35	17.12 ± 14.34	16.69 ± 11.88*
Mean score	1.35 ± 0.34	1.27 ± 0.25	1.25 ± 0.20

Note: * Compared with military group, $p < .05$.

Discussion

At the beginning of the peacekeeping mission, we recruited nonpeacekeeping military and local medical personnel as comparison groups in order to assess the current mental health status of Chinese medical peacekeeping personnel in Lebanon. The results indicated that the peacekeepers had good mental health status during the first week of the mission, as indicated by the absence of anxiety, depression, and other psychological symptoms, and by the differences in SAS and SDS scores when compared to the military personnel group.

Likewise, in the comparison with the military group the peacekeepers recorded low scores in somatization, anxiety, hostility, and other factors of the SCL-90 as well as the positive item count, indicating they had good physical and mental health. We, therefore, had evidence that at the beginning of the peacekeeping mission, the military personnel also had good health status. An individual's cognition plays an important role in the maintenance of mental health. Therefore, after two months of training, the peacekeepers had a more comprehensive and profound understanding of their new environment and what is involved in peacekeeping. This may have helped them maintain their mental health and carry out their work more effectively.

As part of their work, peacekeepers face a number of potential stress factors such as prevalence of severe infectious diseases, dangerous environment, change in lifestyle, and distance from family (Maguen et al., 2004; Michel et al., 2003). Different stressors can impact the peacekeepers in different ways and negatively impact their mental health status during missions. More profound sources of stress lead to stronger psychological responses and, over time, without psychological intervention their mental health will be adversely affected.

Several limitations in this study should be addressed. First, the sample size was relatively small and was limited to Chinese peacekeepers, impacting on the interpretation of the results. The sample size should thus be increased in future studies and people from other ethnicities and cultures should be studied in a peacekeeping role. Second, a pilot study should be performed to assess the effect of mission time on the mental health status of peacekeeping personnel. Third, it is necessary to develop appropriate diagnostic criteria to assess the mental health status of personnel. If we use the diagnosis standard of the survey scale, only severe mental health diseases are assessed, overlooking those with moderate mental health problems (Forbes et al., 2005; Thoresen & Mehlum, 2006; Ward, 1997). Although the mental health status of these newly arrived peacekeepers was good, mental health protection is an important aspect to be emphasized because an acute physical or mental disorder may develop during longer missions.

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