

**Title: The occurrence and cause factors of back pain in operating rooms**

**ABSTRACT**

The morbidity of occupational back pain in health care system was severe; it was common associated with lifting, bending and twisting in daily health activities. Operating room staffs were handling nearly 30-40 scheduled operations. Every day, some of the operative equipments and instruments were very heavy, especially orthopaedic heavy instruments; they were approximately over ten pounds each set. On the other hand, staff working in operating room should stand for long time during operation. But, there were few study explore prevalence of the back pain in Hong Kong, especially in health care worker in operating room. This study would explore the occurrence and perceived contributing factor of back pain among health care worker in operating room. This was a retrospective study; a self-administered questionnaire were used to elicited characteristics of the participants' history and contributing factors of back pain. The preventive and management strategies for back pain could set up base on the study results and results could be used as a baseline data for future study.

The response rate of this study was 72.8%. There are 45.1% in 51 respondents reported that they had suffered from back pain during their operating room career. Approximately one-third of the respondent (the subjects reported that they had back pain) claimed that they had experienced of back pain daily. The most usual site of back pain is in low back. The top two dynamic factors contributing to back pain were place patient to operation position and transfer patient. In addition, stooping was identified as the most common static factor contributing to back pain. Finally, the top non-patient-oriented factors contributing to back pain was moving the heavy equipment.

The results of the study indicated that adequate staff training and education were essential in preventing back pain. Providing suitable equipments assisting staff in handling heavy equipment should be available. At this stage, setting up of regulation and policy as well as monitor workers' daily activities was important. Occupational safety health was everyone's concern in hospital. Risk assessment enabled nurses, health care worker and managers to work together to reduce the health and safety risks of back pain at work and should fit into the general management system of the health and safety to prevent hazards of back pain. Finally education the health care worker identifying hazards of back pain, assessing the risk of hazards and reducing and controlling the risks of back pain. Ensure lifting and handing patients and equipment should be adopted the regulation and policy under the Occupational Safety and Health Ordinance in 1997.