



Service Priorities and Programmes Electronic Presentations

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Restraint Minimization Project

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Introduction

Restraint is widespread used in ICU despite it is increasingly being questioned by many studies. Inappropriate use of physical restraint is proven to cause various problems to patients including delirium, loss of dignity and physical injuries. Standardization of using restraint and regular reviewed by an established team might help to reduce the inappropriateness of restraint application.

Objectives

To decrease the inappropriate application of physical restraint in ICU

Methodology

The project included 1.To conduct a prevalence study on physical restraint in ICU before implementation of the project 2.To develop an objective scoring tool to aid nurses in making restraint decision. The scoring tool consists of 19 items based on patients' behavior, muscle power and types of medical devices being used. Each item had its own score. Patients would be categorized into three color zone (red, yellow, green) depended on the total score. In red zone, restraint would be considered to be necessary for the best interest of patients. In yellow zone, decision of using physical restraint was subjected to nurses' judgment. In green zone, restraint would not be used. A prospective clinical audit on using the scoring tool was started from Sept 2012 to Dec 2012 during the ICU morning ward round. Definition of inappropriateness of using restraint included 1.Patients were under muscle relaxant infusion 2. Patients were quadriplegia 3. Patients were diagnosed to be brain dead 4. Patients were totally alert and co-operative 5. Discordance between the use of restraint and the categorized color zone.

Result

555 ICU patients were involved in the evaluation. Compliance rate of using the scoring tool is 80%. 40% of patients were physically restrained at the time of audit; the prevalence rate is similar to the background rate which was 35% according to the prevalence study. Inappropriateness was much improved from 12% to 5% after

implementation of the project. Among those patients classified as yellow, 40% of them were not restrained. By using an objective tool to aid nurses in making restraint decision can help to reduce the inappropriate use of physical restraint in ICU.