The longitudinal accumulated effects of mastery of stress of families

to reduce their stress and PTSD through critical care transition

**Background:** While families suffered critical illnesses, it will not only affect the health of family members, but more importantly, the family's ability to function properly will be impacted tremendously. The solution to such problems is to investigate the family's response to stress as well as factors affecting their ability to mastery.

**Purpose:** This research aims to investigate the accumulated families' ability to mastery the stress on their stress and PTSD during the critical care transition period.

**Methods:** In order to achieve prospective and long-term traceability of the research, participants were recruited from a group of families of critically ill patients from admission into ICU until discharged from ICU after 6 months. We measure the families' anxiety and acute stress, as well as their ability to manage of stress. Data was collected from a certain northern medical centre's neurosurgery and burn department through structured surveys and voluntary interviews with family members. A total of 42 sets of survey results were collected from the 4 different time slots (Time<sub>1</sub>-Time<sub>4</sub>).

Result: From the perspective of baseline tracking model analysis, there is

a significant correlation between the mastery of stress of Time<sub>1</sub> and the acute-stress of Time<sub>2</sub> and Time<sub>3</sub>. Similarly, there is also a significant correlation between the mastery of stress of Time1 and HADS of Time<sub>3</sub> and Time<sub>4</sub>. Both of these shows that when young adult patients are admitted into ICU, the immediate increase of family function and mastery of stress will significantly affect the emotions and stress response of family members 3 & 6 months later. The accumulated effect on mastery of stress at two different time slots has a negative correlation with ASD of Time<sub>3</sub> & HADS of Time<sub>4</sub>. This shows that by maintaining good family function and mastery of stress, it can improve the emotions and stress response of critically ill patients.

**Conclusion:** This research shows that as mastery of stress improves, it can lower the after-effects of trauma. Results show that a good families' mastery of stress can improve the adaptation of family members. Clinical medical personnel should try to provide the relevant family members with the care and support that they need so as to increase their ability to control stress, and give focus to possible issues of emotional traumas that could have been neglected and come up with relevant countermeasures.

*Key words:* post-traumatic stress disorder, young adult, family, critically ill patients, transition, acute stress disorder, mastery of stress, anxiety, depression