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MEETING ABSTRACT Open Access

Improving On Fast-track Protocol for Post Cardiac Surgery Patients

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Background/Introduction

Many risk factors have been shown to be independently predictive of the success of fast-track for post cardiac surgery patients. While a safe fast-track protocol is important, patient selection is crucial too in determining the success of fast-tracking patients.

Aims/Objectives

We aim to improve on our fast-track protocol by identifying risk factors affecting extubation time in our institution.

Method

For a total of six months duration, we non-selectively included all cardiac surgery patients admitted through our new post-anaesthesia care unit (PACU). We studied how patients' profile, comorbidities and operative data affect the success rate of extubation.

Results

107 of the total 145 patients admitted to PACU were able to be extubated. However, only 79(54.5%) patients were able to be extubated within four hours. Within the success group, we found that age (OR = 0.912; 95% CI = 0.044-1.779) and duration of ventilator weaning (OR = 0.813; 95% CI = 0.698-0.928) significantly influenced the extubation time with p-value of 0.040 and <0.001 respectively. Within the failure group, age (HR = 1.061; 95% CI = 1.018-1.105), EUROscore II (HR = 2.303; 95% CI = 1.416-3.748), cardiopulmonary bypass time (HR = 1.015; CI 95% 1.005-1.025), aortic cross-clamp time (HR = 1.023; 95% CI = 1.010-1.037) and post-operative inotropic usage (HR = 2.892; 95% CI = 1.637-5.109) significantly affect failure of extubation with p-values of 0.005, 0.001, 0.004, 0.001 and <0.001 respectively.

Discussion/Conclusion

Through this observational study, we will be able to improve on our pre-operative patient selection based on their age and EUROscore II; and intra-operative decision based on the total cardiopulmonary bypass time and aortic cross-clamp time in order to fast-track cardiac patients by admitting them to PACU. Through this, fast-track protocol can be practiced safely to its many advantages.

Consent

Written informed consent was obtained from the patient for publication of this abstract and any accompanying images. A copy of the written consent is available for review by the Editor of this journal.

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