

Ventilator Training In The Rehabilitation Setting: Our Experience

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INTRODUCTION

Tan Tock Seng Hospital Rehabilitation Centre (TTSH RC) admits patients to optimise their function and enhance reintegration into the community. It is however located away from the acute hospital and has no respiratory therapist on-site. We have therefore not admitted ventilator-dependent patients to our centre. We came up with a training programme to equip a team of doctors, nurses and therapists with knowledge and skills to manage the first ventilator-dependent patient admitted for rehabilitation.

INTERVENTION

We first identified the core competencies for managing ventilator-dependent patients in the rehabilitation setting. The doctors, nurses and allied health professionals (AHPs) caring for ventilated patients need to be familiar with the basics of mechanical ventilation and the setting up of the ventilator, ventilator troubleshooting, tracheostomy management and emergencies and airway clearance techniques.

We then came up with a training programme which included lectures, hands-on practical sessions and resuscitation drills. Lectures on basics of mechanical ventilation, ventilator troubleshooting and airway clearance techniques were held. We also carried out hands-on sessions and competency

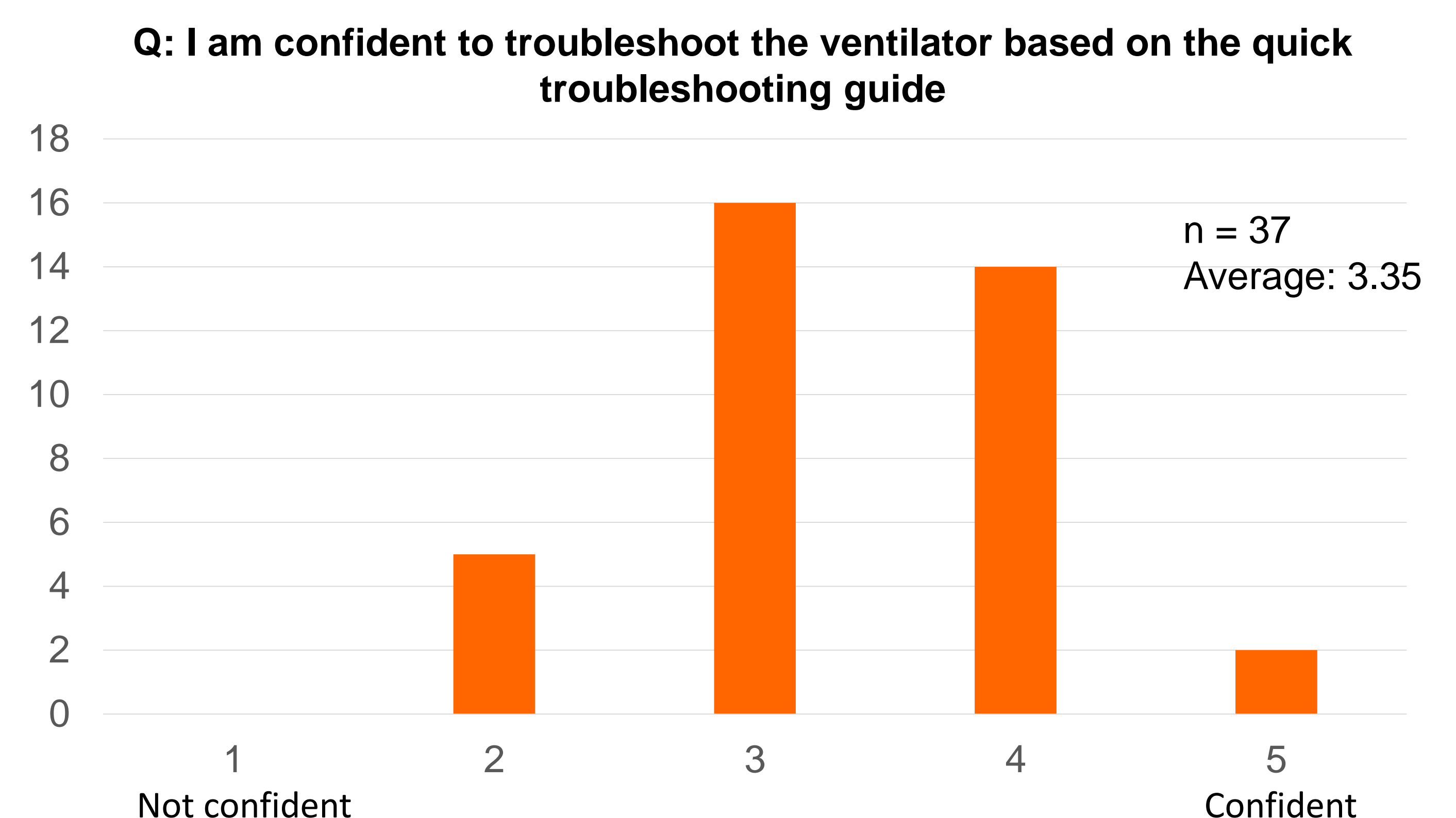
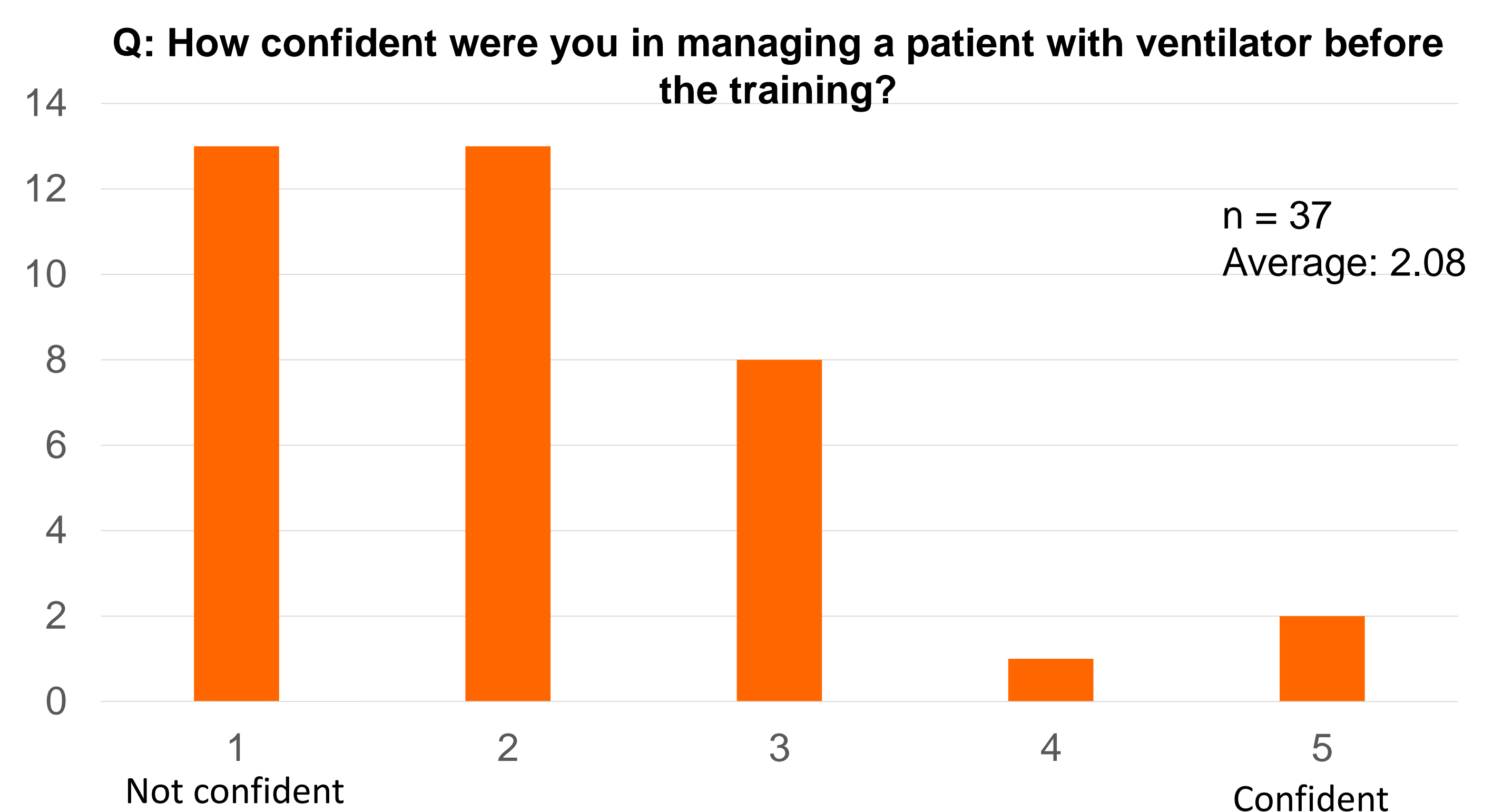
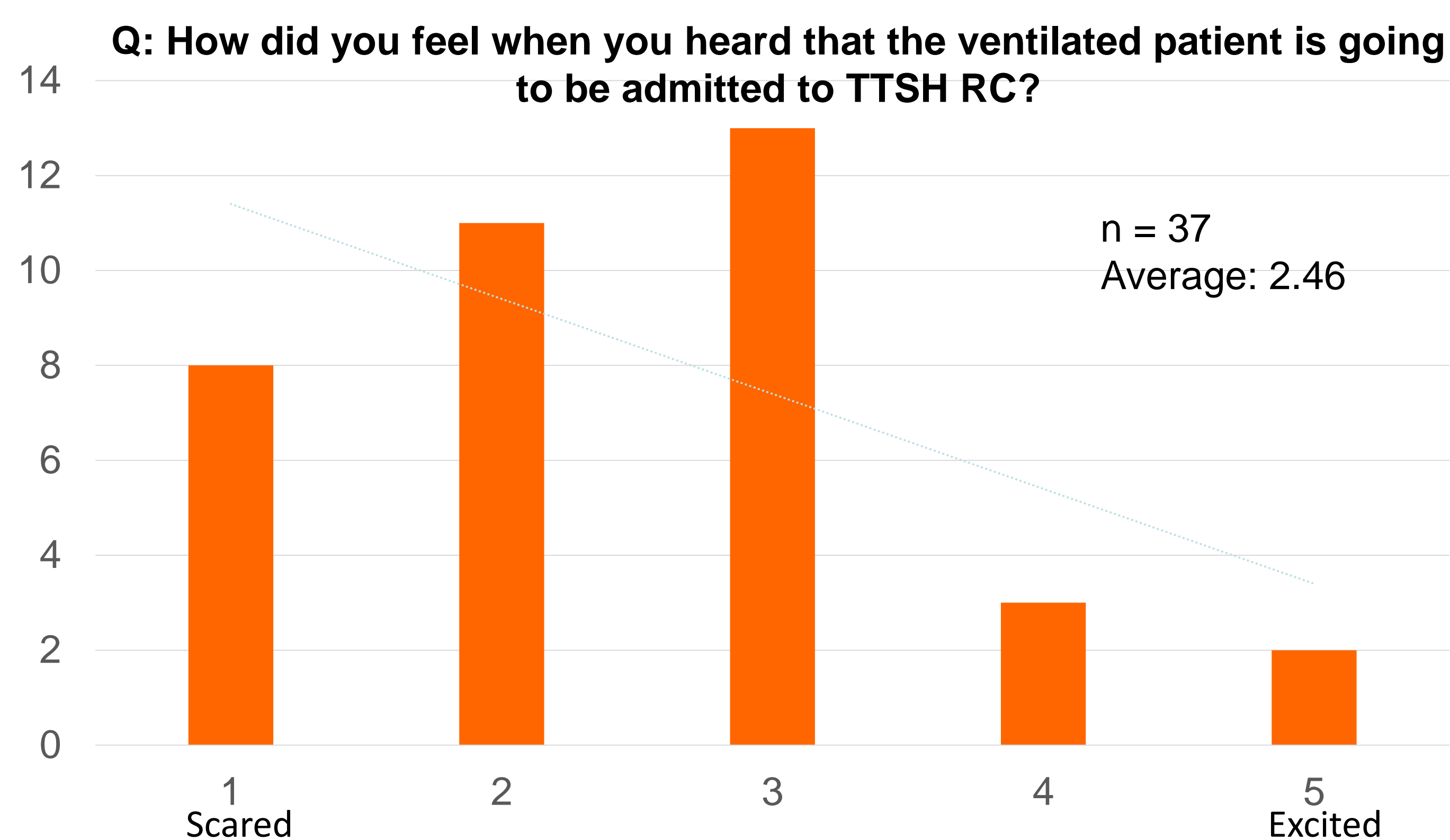
assessments with the use of a mannequin with a tracheostomy tube to simulate real-life situations. Topics for the hands-on sessions included setting up of ventilators, ventilator troubleshooting, the approach to desaturation in ventilated patients, tracheostomy emergency management and also on the use of Mechanical Insufflation-Exsufflation (MIE). Resuscitation drills involving multidisciplinary teams were also carried out.

On-job training was also carried after the patient has been admitted.

OBSERVATION

It was observed on the ground that tasks which initially required 2 staffs to perform, like the use MIE on this patient, were subsequently comfortably managed by just one as everyone gained experience in the management of this ventilated patient.

A survey completed by 37 doctors, nurses and AHPs involved in the care this patient showed that most were apprehensive upon hearing that a ventilated patient would be admitted. The confidence level in managing ventilated patients was low prior to the training programme and the confidence level in the troubleshooting of the ventilators improved with the training programme.



DISCUSSION

We have described TTSH RC's experience in the ventilator training for our staff in the rehabilitation setting. The training programme put together has allowed the multidisciplinary team to be equipped with skills and knowledge to comfortably and safely manage the first ventilator-dependent patient admitted to our centre for rehabilitation.