

students of anaesthesiology after teaching them ultrasound guided regional anaesthesia on blue phantom model or cadaver-based phantom model.

Methods: This study was conducted in the Department of Anaesthesiology and Critical Care and Department of Anatomy at a tertiary medical college hospital.

Video lecture on ultrasound knobology and transducer movement was given to all study participants. In group BP, participants trained on blue phantom model. In group CP, participants trained on fresh human cadaver model. After training, participants were shown video of supraclavicular brachial plexus block, and finally performance was assessed on patients.

Results: The median block performance time was 525.0 seconds in group BP with an interquartile(IQR) of (494-552.5) and 440.0 seconds in group CP with an IQR of (419.5-487.5) (table 1).

Table 1: Block performance time between the groups

	Group BP (n=25) Median (interquartile range)	Group CP (n=25) Median (interquartile range)	P
Block performance time (in sec)	525.0 (494-552.5)	440.0 (419.5-487.5)	<0.001

This difference was statistically significant ($p < 0.001$). The median image quality score was 3.0 in group BP with an IQR of 2-3, and it was also 3.0 in group CP with an IQR of 3-4, and it was statistically significant ($p = 0.00398$) (table 2).

Table 2: Ultrasonographic image quality in the two groups

Image quality score	Group BP (n=25) n (%)	Group CP (n=25) n (%)
Unsatisfactory	0	0
Poor	7 (28)	0
Satisfactory	15 (60)	14 (56)
Outstanding	3 (12)	11 (44)

ABSTRACT NO. : ABS0260

Comparison of phantom cadaver based simulations with blue phantom model for teaching ultrasound guided regional anaesthesia: a randomised controlled trial

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Background and Aims: Various methods of simulation have different advantages and disadvantages. This study was aimed to compare the block performance of novice post-graduate

Conclusion: Time taken to perform brachial plexus block was less in the cadaver phantom group compared to the blue phantom group. The image quality scores and number of attempts required to perform brachial plexus block were statistically significant between groups. Novices trained on cadavers had better transducer target orientation and were able to identify ultrasonographic artifacts better than those trained on the blue phantom.

Keywords: Simulation, cadaver, ultrasonography, teaching method, brachial plexus block

References:

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