

IN PRACTICE

A49

**MODULAR EDUCATIONAL PROGRAMME
FOR ORGAN DONATION (MEPOD):
THE IMPLEMENTATION OF A NOVEL
NATIONAL SIMULATION COURSE FOR
MULTIDISCIPLINARY HEALTHCARE
PROFESSIONALS**

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Introduction: The Organ Donation Taskforce recommend “staff involved in the treatment of potential organ donors should receive mandatory training in the principles of donation” [1]. Additionally, donation facilitation is within intensive care and anaesthetic curricula [2]. Clinical training in donation is challenging and opportunities are infrequent, making simulation training desirable. However, the National Deceased Organ Donation Course by NHS Blood and Transplantation (NHSBT) is reserved for senior intensivists and is consistently oversubscribed. We aimed to develop a programme to provide accessible simulation experience for all team members involved in donation and enable doctors to meet their training requirements.

Methods: In collaboration with NHSBT we created three modules: Diagnosing Death using Neurological Criteria (DNC), Donor Management and Optimisation (DMO) and Donation after Circulatory Death (DCD). Pre-learning webinars provided information in advance, maximising time to explore human factors and psychological aspects during simulation training. We piloted in-situ modules at several London Intensive Care Units (ICUs) with support from Specialist Nurses in Organ Donation (SNODs). Delegates completed pre- and post-course surveys assessing technical knowledge and rating confidence levels using a Likert scale. Paired one-sided Wilcoxon signed-rank tests were used to test for significantly greater median post-course confidence scores, with p-value adjustment for multiple comparisons using the False Discovery Rate (FDR) method [3].

Results: A total of 30 delegates attended 5 MEPOD modules across 3 London hospitals between November 2023-January 2024. 100% of delegates would recommend to their colleagues. Confidence working with a SNOD improved by 23% and confidence diagnosing and recording circulatory death improved by 38%. Table 1-A49 demonstrates higher median post-course confidence scores for every question for all courses. There were significantly greater post-course confidence scores (FDR-adjusted $p < 0.05$) for all questions except one.

Discussion: We have demonstrated successful implementation of a modular educational simulation programme resulting in improved confidence managing

Table 1-A49. The 6 questions testing confidence levels in delegates for each module. Pre-course median and post-course medians were calculated. P-values were adjusted for multiple comparisons using the False Discovery Rate adjustment of Benjamini and Hochberg [3]. Green shows significant p-values (p<0.05). Red shows non-significant p-value.

| Course | Question assessing Confidence | Pre-course median | Post-course median | One-sided p-value after FDR adjustment for multiple comparisons |
|--------|-------------------------------|-------------------|--------------------|---|
| DMO | 1 | 4 | 5 | 0.02 |
| | 2 | 2 | 5 | 0.03 |
| | 3 | 4 | 5 | 0.02 |
| | 4 | 4 | 5 | 0.02 |
| | 5 | 4 | 6 | 0.01 |
| | 6 | 1 | 6 | 0.03 |
| DNC | 1 | 2.5 | 5 | 0.03 |
| | 2 | 2 | 5 | 0.03 |
| | 3 | 2 | 5 | 0.03 |
| | 4 | 2.5 | 5 | 0.03 |
| | 5 | 3 | 4.5 | 0.05 |
| | 6 | 2 | 5 | 0.03 |
| DCD | 1 | 2.5 | 5 | 0.01 |
| | 2 | 4 | 5.5 | 0.01 |
| | 3 | 4 | 5 | 0.01 |
| | 4 | 4 | 5 | 0.01 |
| | 5 | 3 | 5.5 | 0.01 |
| | 6 | 3 | 5 | 0.01 |

organ donation across a range of delegates within London. It was challenging to condense a 2-day national course aimed at seniors into modular format aimed at the multidisciplinary team. Barriers to attendance were overcome by providing pre-learning and delivering short in-situ simulation modules. Due to small delegate numbers, we were unable to account for the effects of delegate seniority and course location on differences in pre- and post-course confidence. This novel project has increased accessibility to organ donation education across our region, which we aim to expand nationally with the support of NHSBT educational leads.

Ethics statement: Authors confirm that all relevant ethical standards for research conduct and dissemination have been met. The submitting author confirms that relevant ethical approval was granted, if applicable.

REFERENCES

1. Department of Health. Working Together to Save Lives. The Organ Donation Taskforce Report, 2011. Available from: <https://bts.org.uk/wp-content/uploads/2016/09/The-Organ-Donation-Taskforce-Implementation-Programmes-Final-Report-2011.pdf>.

2. The Faculty of Intensive Care Medicine. ICM curriculum: supporting excellence for a CCT in Intensive Care Medicine, 2021. Available from: <https://www.ficm.ac.uk/sites/ficm/files/documents/2022-03/ICM%20Curriculum%202021%20v1.2.pdf>.

3. Benjamini Y, Hochberg Y. Controlling the false discovery rate: a practical and powerful approach to multiple testing. Journal of the Royal Statistical Society Series B (Methodological). 1995;57(1):289–300.

