NovPod: From content novices to producing novice content

E. Dore, D. Kemp, R. Grimes, R. Bandopadhyay, J. Lipton Royal College of Anaesthetists, UK

Introduction

Training in Anaesthesia begins with a novice period during which a trainee demonstrates basic competencies and safe practice, to support the transition to on-call responsibilities. Peer support and guidance can ease this period, often carried out via informal learning conversations. Educational resources need to be focussed, accessible and flexible to fit in around the changing demands of training. Podcasts are an educational resource which fulfil these criteria, are free to access, convenient and highly valued by trainees. They are increasing in popularity and have been shown to benefit knowledge retention, skill acquisition and behaviour change.^{1, 2}

We aimed to deliver a **podcast** directly tailored to **novice anaesthetic trainees**, in an informal, educational and entertaining 'coffee room conversation' style, making pertinent information accessible, both **to improve confidence and ease the learning curve of novice anaesthesia.**

Methods

Learning objectives for the series were identified and linked to specific outcomes in the Royal College of Anaesthetists 2021 Curriculum. Peer review was sought from anaesthetists of all levels to identify key themes and plan episode content. Guests were selected to include a broad range of experience; from novices to operating department practitioners to the President of the RCoA. Fifteen episodes were recorded using RODECaster Pro and edited with Audacity software, covering topics including but not limited to pre-assessment, anaesthetic induction and emergencies. Finalised episodes were released in batches to coincide with timing of novice periods and hosted on the RCoA's 'Anaesthesia on Air' channel. Advertisement was by email to college tutors, on social media and the President's News (RCoA). Listener data was collated and analysed and written feedback obtained.

Figure 1. NovPod Season 1 Episode List



| RCM NovPod | NovPod, Episode 1: Introducing the NovPod | RC9A NovPod | NovPod, Episode 2: The first day | RC% NovPod | NovPod, Episode 3: Pre- assessment |
|------------|--|-------------|--|------------|--|
| RC% NovPod | NovPod, Episode 4: Preparing for theatre | RC9A NovPod | NovPod, Episode 5: Anaesthetic plan | RCM NovPod | NovPod, Episode 6: Drugs, part 1 |
| RC% NovPod | NovPod, Episode 7: Induction and airways | RC% NovPod | NovPod, Episode 8: Maintenance and emergence | RC% NovPod | NovPod, Episode 9: Recovery |
| RC% NovPod | NovPod, Episode 10: On calls | RC% NovPod | NovPod, Episode 11: Anaesthetic emergencies | RC% NovPod | NovPod, Episode 12: Drugs, Part 2 |
| RC% NovPod | NovPod, Episode 13: Breaking down the IAC | RC% NovPod | NovPod, Episode 14: Wellbeing for the Anaesthetic trainee | RC% NovPod | NovPod, Episode 15: Life after the IAC |

Results

Total Listens (July 2023 – May 2024)



Figure 2. Number of Listens per Episode, in descending order

| Episode Title | Total Number of Listens | | |
|---------------------------------------|-------------------------|--|--|
| Drugs, part 1 | 2925 | | |
| Introducing The Novpod | 2587 | | |
| Drugs, part 2 | 2538 | | |
| Pre-assessment | 2419 | | |
| The first day | 2386 | | |
| Anaesthetic plan | 2118 | | |
| Anaesthetic emergencies | 2114 | | |
| Induction and airways | 2032 | | |
| Preparing for theatre | 2028 | | |
| Maintenance and emergence | 1827 | | |
| On calls | 1663 | | |
| Recovery | 1643 | | |
| Life after the IAC | 1617 | | |
| Breaking down the IAC | 1418 | | |
| Wellbeing for the anaesthetic trainee | 1327 | | |

Figure 3. Global Reach – Percentage of listens by country (total podcast listens)

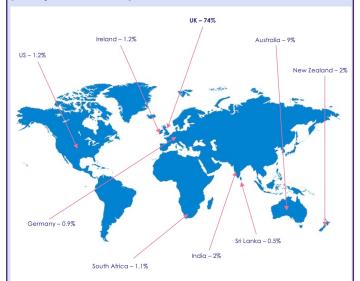






Figure 4. Audioboom data for the most popular episode, Drugs, part 1 Audioboom 2,925 listens 2023-07-14 to 2024-05-27 319 days 1st week 480 averaging 9 a day 1st month 1,202 1st sixty days 1 654 Showing average number of listens - 9 per day. Figure 5. Listen trend over time for 'Drugs, part 2'



Maximum listens are on first release, followed by gradual decline with peaks around changeover times.

Figure 6. Demographic data - Listeners by age and sex (for all podcasts)



Survey Responses

 Most responders preferred educational content as podcasts, videos and e-learning content

- All gave the maximum score for how likely they were to recommend the podcast to a friend (10/10)

Really practical, easy listening, made me feel a lot less anxious about starting novice period and training'

'Informative, significantly relevant, concise, clear language, informal, good volume, great content delivery, ease of access.'

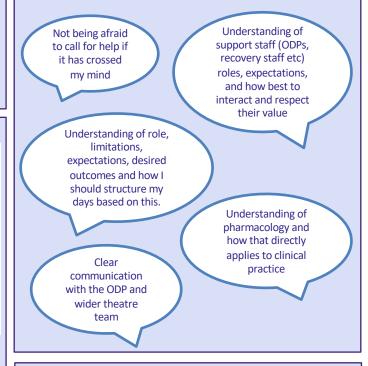
'I couldn't believe how tailored it is to what I wanted to know before starting!'

References

1. Kelly JM, Perseghin A, Dow AW, Trivedi SP, Rodman A, Berk J. Learning through listening: A scoping review of podcast use in medical education. Acad Med 2022; 97: 1079-85

2. Boreskie PE, Chan TM, Novak C, et al. Medical education blog and podcast utilization during the COVID-19 pandemic. Cureus 2022; 14: CD23361

Figure 7. Survey Responses to 'What three things, if any, have you changed in your practice having listened to this podcast episode, or the NovPod series as a whole?'



Discussion

Our listener data and feedback show that NovPod is a valued educational resource. Moving forwards our priorities are ensuring that the content remains valid, utilising an advantage of podcast education, as the RSS feeds be continually updated. In addition, obtaining further feedback; from trainees, IMGs and doctors following the CESR pathway, will ensure we are reaching all groups. Importantly, developing this podcast has also had a beneficial impact on our own development, fulfilling learning outcomes included in many of the clinical and non-clinical domains of the RCoA's 2021 Curriculum.

Conclusion

We found that podcasts are an effective, innovative and well-received method of delivering the curriculum content to today's anaesthetic trainees in a practical and accessible way, allowing trainees to manage their own learning in a variety of healthcare systems. They can be used to increase confidence around key areas of training and reduce anxiety during transitions, along with signposting to best practice resources. Future work includes investigating behaviour change as a result of listening and a second series focusing on obstetric anaesthesia and the initial assessment of competence in obstetric anaesthesia (IACOA).



Thank you to Duncan McMillan @RCoA for providing valuable data input.

