Evaluating the Implementation of Ambient AI across an outpatient setting at scale and its impact on clinical productivity.

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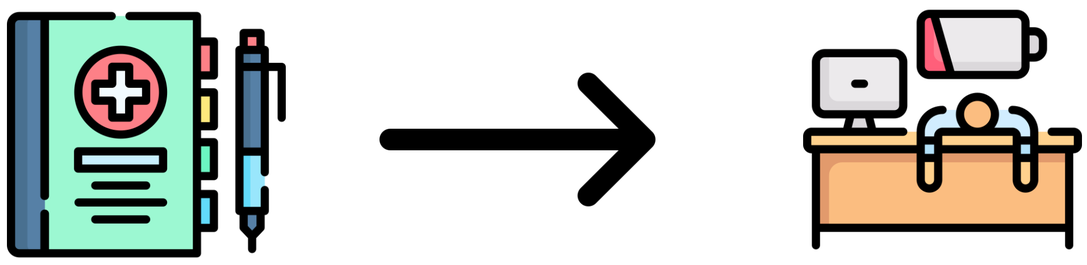
1 BACKGROUND AND RATIONALE

- The NHS has a huge backlog, about 7.36 million appointments waiting. Clinical documentation is a significant contribution factor.
- Clinicians spend 20–50% of their day on documentation, often continuing after hours (“pajama time”).
- Documentation reduces productivity, increases burnout, and disrupts patient-clinician communication

(Saag et al. 2019; Tierney Aaron et al. 2024).



2 SOLUTION

Deployment of Ambient AI transcription and documentation technology called Tortus.

This AI technology :

- Passively listens and captures consultations in real-time (with patient consent)
- Automatically generates structured clinical notes, and clinic letters.
- The outputs are uploaded directly into the Epic ,Electronic Patient Record (EPR).
- Clinicians review and sign off. The system reduces the need for manual typing and admin.

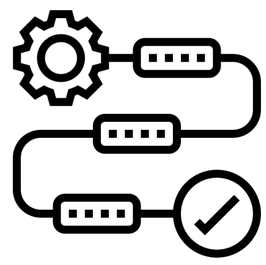
3 PROJECT AIM

To implement and evaluate an Ambient AI dictation tool fully integrated within Epic, the trust EPR system.

This service evaluation is structured around 4 Domains:

- **Productivity**
- **Quality of documents** ,
- **Patient experience** and
- **clinician experience**.

4 METHODOLOGY



Design: Mixed-methods service evaluation with phased rollout, starting with cardiology.

Intervention: Ambient AI listens (with consent), generates structured notes & clinic letters in real-time → uploaded to Epic → clinician signs off.

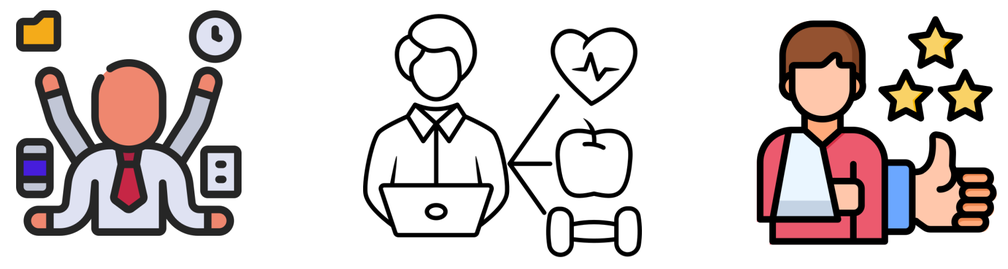
Data Collection:

- Quantitative: Documentation time, outpatient capacity, waiting times, “pajama time” before and after implementation.
- Qualitative: Patient experience surveys, clinician surveys/ interviews and SAIL assessment to evaluate quality of clinical notes.

5 EXPECTED OUTCOME AND CONCLUSION

This evaluation of Tortus in outpatient care is expected to:

- **Boost productivity** by reducing documentation time (at least 15%).
- **Expand capacity**, enabling about 14,500 additional outpatient appointments in year one.
- **Enhance patient–clinician communication**, reducing screen distraction.
- Support staff wellbeing by cutting down after-hours admin (“pajama time”).
- Provide a scalable blueprint for NHS-wide adoption, helping tackle waiting lists and improving equity of access.



6 REFERENCE

1. Saag, H. S., Shah, K., Jones, S. A., Testa, P. A. and Horwitz, L. I., 2019. Pajama Time: Working After Work in the Electronic Health Record. (1525-1497 (Electronic)).
2. Tierney Aaron, A., Gayre, G., Hoberman, B., Mattern, B., Ballesca, M., Kipnis, P., Liu, V. and Lee, K., 2024. Ambient Artificial Intelligence Scribes to Alleviate the Burden of Clinical Documentation. NEJM Catalyst, 5 (3), CAT.23.0404.