

PREDICT

September 2025



PREDICT (Pragmatic Recalibration and Evaluation of Drift in Clinical Tools) aims to tackle the problem of “temporal drift” - when clinical prediction models may become more error-prone over time.

The project aims to:

1. Raise the profile of this issue.
2. Test different strategies for dealing with temporal drift.
3. Open a dialogue with policymakers to discuss the options moving forward.

Key Links

[Project website
\(under development\)](#)

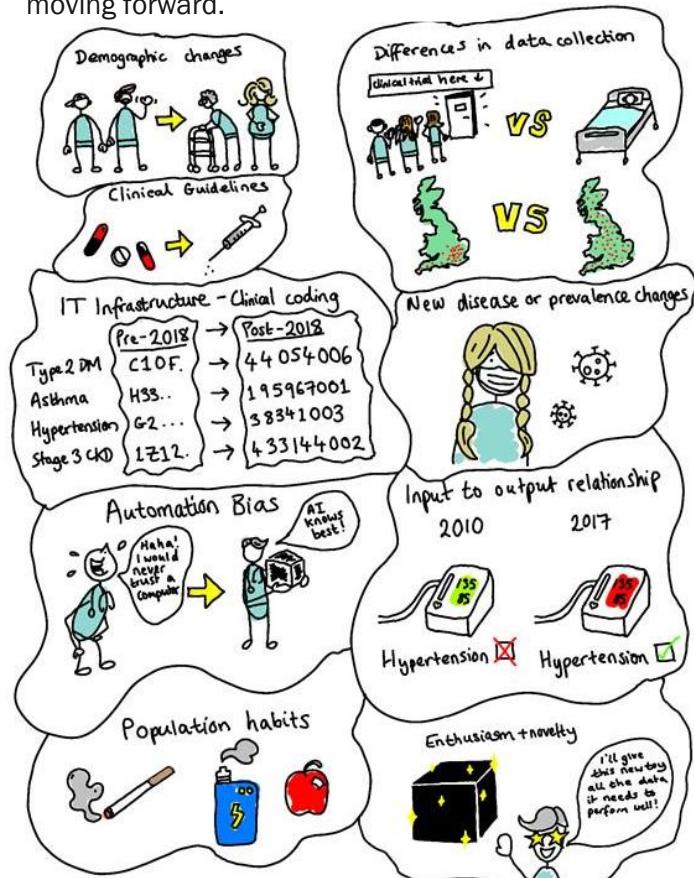
[PREDICT software](#)

[NIHR Press Release on
other research with similar
funding](#)

[AI considered for prescribing
drugs in the USA – key
example of why this
research is so important](#)

[MHRA launches AI Airlock to
address challenges for
regulating medical devices
that use Artificial Intelligence](#)

[Previous newsletters](#)



Potential causes of temporal drift in healthcare.

Progress since March:



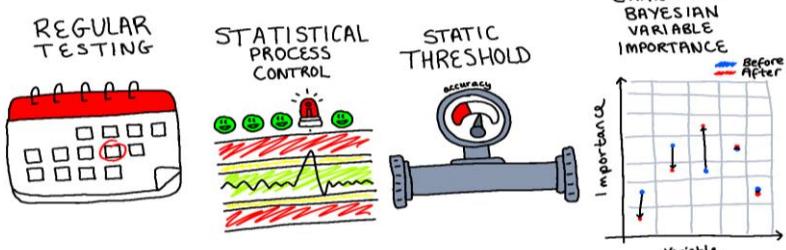
sdrelton / PREDICT

Developed software to detect and fix temporal drift, available at <https://github.com/sdrelton/PREDICT>.

Created simulated data for various scenarios (COVID, diabetes prevalence slowly increasing, smoking decreasing).



Developed a basic Python framework to detect drift using four methods:



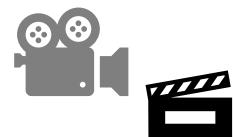
Finalising a paper describing the how we simulate the four dataset scenarios to test four detection methods on. To be submitted to European Journal of Operations Research.



The PREDICT (Pragmatic Recalibration and Evaluation of Drift in Clinical Tools) Framework



Pre-processing the Connected Bradford dataset to test the detect methodologies on real data and replicate QRISK2 and eFalls models.

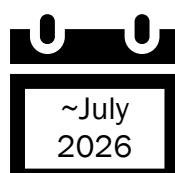


Preparing a patient experience recording to bolster discussions around prediction tools in healthcare.



First PPIE Workshop Planned

- Discussing progress on the PREDICT project
- Finding out about patient first-hand experiences of prediction tools and current understanding of these tools



The PREDICT workshop (~July 2026) aims to bring together national stakeholders to discuss how to handle temporal drift. As AI and predictive models become further embedded in the healthcare system, it is critical that we have robust monitoring to ensure they remain fit for purpose. We have secured delegates from the MHRA, NHSE, TPP, EMIS, academics, patient advocates, and other relevant groups. The main goals of the workshop are to:

1. Highlight the importance of this issue to successful integration of digital tools
2. Discuss the pros and cons of the approaches to monitoring and repairing drift
3. Examine potential regulatory approaches to ensure the longevity of digital health tools
4. Distil the discussion into a joint paper outlining our thinking on the issue

Patient and public involvement (PPI) and engagement is critical to this work, so please reach out to us if you have any questions or comments.

We'd love to hear from you!

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