

Newsletter #7

June 2025

AI-PROGNOSIS -

Towards Parkinson's risk assessment and prognosis through Al



Newsletter highlights

Call for Workshop Papers

> **Public** deliverables

Events

Upcoming events

Learn more on www.ai-prognosis.eu













AI-PROGNOSIS receives funding from the European Union under Grant Agreement No. 101080581.



Project updates

Call for IEEE HealthCom 2025 Workshop Papers

The AI-PROGNOSIS and iPROLEPSIS projects are co-organising a workshop titled: "AI-enabled Digital Health Tools for Non-Communicable Diseases: From Concepts to Impact" as part of the IEEE HealthCom 2025 conference, taking place on 21-23 October 2025 in Abu Dhabi, United Arab Emirates.

Authors are invited to submit original research, position papers, or case studies with practical **highlights.** Topics of interest include (but are not limited to):

- Predictive models for early detection, risk assessment, and prognosis of NCDs
- Digital biomarkers and wearable sensors for
- Machine learning for personalized treatment, disease management, and precision medicine
- Al in remote care, mHealth, and telemedicine for **NCDs**
- Regulatory and ethical considerations in Alenabled software as medical device
- Data quality, fairness, and explainability in Al health applications
- User-centered design in Al-enabled health technology for chronic conditions
- Translational pathways from research prototypes to scalable digital health solutions

Important dates:

Workshop paper submission: July 1, 2025 Acceptance notifications: August 15, 2025 Camera Ready papers: August 30, 2025

For any questions, please contact:

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More information here



IEEE International Conference on E-health

More info healthcom2025,ieee-healthcom.org

Call for workshop papers

Al-enabled Digital Health Tools for Non-Communicable Diseases: From Concepts to Impact

21-23 October 2025 Abu Dhabi United Arab Emirates







Public deliverables

Initial Report on User Research and Co-Creation

The Initial Report on User Research and Co-Creation outlines the early work carried out to identify and integrate user needs into the AI-PROGNOSIS digital health ecosystem.



It summarises findings from interviews, focus groups, and workshops involving people with Parkinson's (PwP), people without Parkinson's (PwoP), informal caregivers, and healthcare professionals (HCPs). These insights form the foundation for co-developing tools that are meaningful, accessible, and relevant to end users.

Read the full report on Zenodo

Trustworthy AI development and evaluation framework

As Al becomes part of our daily lives, it is essential that the systems we build – especially in healthcare – are not only high-performing but also **reliable and trustworthy.**

In AI-PROGNOSIS, we have developed a Trustworthy AI development and evaluation framework to guide the creation of our AI tools for Parkinson's disease screening and prognosis. The framework is based on the Assessment List for Trustworthy AI developed by the EU's High-Level Expert Group on AI and takes into account relevant industry guidelines, the EU AI act, and the Medical Device Regulation. Focusing on digital health tools, it includes methods and practices for every step in the lifecycle of an AI system, from design to deployment, in order to ensure trustworthiness.

While it was created with Al-PROGNOSIS solutions in mind, it is broadly applicable to other healthcare and biomedical technology domains.



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Initial report on domain review and datasets

Building AI tools for Parkinson's disease (PD) screening and prognosis requires in-depth scientific insights and data. To this end, in the early days of the AI-PROGNOSIS project, we performed an extensive review of the current landscape of relevant research, databases, and technologies. The report is now publicly available and includes:

- A literature review (2013-2023) covering determinants and predictive modelling approaches of PD risk, progression and response to medication, as well as digital assessments of PD key symptoms
- A list of relevant datasets and biobanks
- A list of available, certified technologies for PD, with a focus on remote management and monitoring
- The project's strategy for data harmonisation based on the OMOP common data model



Read the full report on Zenodo

Events

EIT Health Morning Health Talk

Athens, Greece

2 June 2025

On June 2, 2025, the AI-PROGNOSIS project was presented at the 1st Morning Health Talk – Greece, part of the EIT Health Morning Health Talks series. The event, titled "Co-Creating Health Innovation Ecosystems: Empowering Providers and Citizens Beyond Financial Incentives", was organised by EIT Health Greece and hosted at the National Documentation Centre in Athens.

Stelios Hadjidimitriou from the Aristotle University of Thessaloniki (AUTH) delivered an overview of the Al-PROGNOSIS project, which aims to advance Parkinson's disease diagnosis and care through novel predictive models combined with digital biomarkers from everyday devices.





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The session brought together a diverse group of participants from across the health innovation landscape, including:

- EIT and EIT Health Greece representatives
- European Digital Innovation Hubs Health Hub
- European Network of Living Labs
- Digital health consultants from the Greek Ministry of Digital Governance
- Public and private hospitals
- Private health insurance companies, homecare providers, and telemedicine companies
- The event offered valuable opportunities for sharing perspectives, building connections, and exploring collaborative strategies for the future of healthcare innovation.



Medical Informatics Europe (MIE) 2025

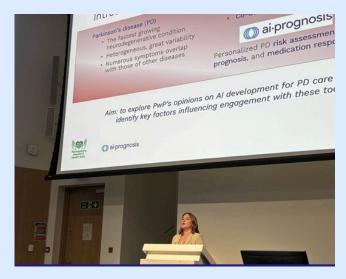
Glasgow, Scotland

19-21 May 2025

The paper "Co-Designing a 'Win-Win' in Predictive AI: First Results from Interviews and Focus Groups with Persons with Parkinson's Disease" was presented by Jamie Linnea Luckhaus from Uppsala University at the Medical Informatics Europe (MIE) 2025 conference, which took place in Glasgow, Scotland, from 19–21 May.

This study, part of the AI-PROGNOSIS project, explored the perspectives of people with Parkinson's disease (PwP) involved in the co-design of AI tools for PD care. The aim was to understand PwP perspectives on AI tools and identify factors influencing their engagement.

Read the full paper <u>here</u>





AI-PROGNOSIS Plenary Meeting

19-20 May 2025

Thessaloniki, Greece

The Al-PROGNOSIS consortium held its 5th Plenary Meeting on 19–20 May 2025 in Thessaloniki, Greece, hosted by the Centre for Research & Technology Hellas (CERTH).

Over the two days, partners came together to review project milestones, share updates from clinical and technical teams, and plan the next steps in the development of AI tools for Parkinson's disease.

Highlights included:



Presentations on clinical studies and system architecture



Showcasing of the first versions of the AI tools: mAI-Health, mAI-Care, and mAI-Insights



Updates on recruitment progress and planning for upcoming studies



Discussions on data analysis, communication strategies, and coordination

We also welcomed input from the External Expert Advisory Board, which helped shape our plans for the future.









Upcoming events

June 30-July 3, 2025. Maastricht, Netherlands

International Symposium of Gait and Posture Research (ISPGR)

Al-PROGNOSIS will be presented at International Symposium of Gait and Posture Research (ISPGR) Conference, in the session titled: "Measures, measures, measures... and what about the outcomes?"

More information about event

July 14-17, 2025. Copenhagen, Denmark

EMBC 2025

Al-PROGNOSIS research paper will be presented at the 47th Annual International Conference of the IEEE Engineering in Medicine and Biology Society (EMBC 2025).

Title:

Wrist Accelerometry-based Digital Assessment of Slowness of Movement in Parkinson's Disease: a Multi-Cohort Analysis

Authors:

Ioannis Gerasimou, Apostolos Moustaklis, Charalampos Sotirakis, Stelios Hadjidimitriou, and Leontios J. Hadjileontiadis

This work aimed to develop a digital biomarker (dBM) for assessing upper limb slowness of movement in Parkinson's disease using wrist accelerometer data passively captured during daily living. The dBM was trained on data from the Verily substudy of the Parkinson's Progression Markers Initiative (PPMI) and externally validated on an independent dataset (Michael J. Fox Foundation Levodopa Response Study) to assess generalizability.