

# PROJECT / Smarter Cardiac Sensing via Integrated Signal Processing

## SmartHeart

### Main Objective:

- Develop a cloudbased machine learning toolkit for automated feature extraction and prescreening of cardiac diseases from multimodal sensing sources (PCG & ECG)
- Create an improved lowcost robust hardware and software for cloudbased “offtheperson” [SILVA2015b] cardiac signal acquisition and storage
- Develop a “Google Docs”like online platform for collaborative multimodal cardiac data sharing and annotation, with a Software-as-a-Service (SaaS) framework
- Establish a framework and working base for extending the collaboration between the team members in future work through joint applications to FCT, P2020, H2020, or other relevant funding programmes
- Create prototypes and demonstrations that can showcase the potential of the activities developed within the project
- Publish results in high-impact scientific journals and conferences
- Transfer resulting technologies to relevant companies for commercial exploitation

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Groups: [Computer graphics and interactive multimedia - Po](#), [Networked Systems – Po](#), [Pattern and Image Analysis – Lx](#)

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