









# FIBICO - IA2EPD Project (Artificial intelligence to empower the patient with diabetes)

#### **Abstract**

A research group from the Andalusian Public Health System (SSPA) has developed a dashboard that facilitates the management of the system for technical personnel and provides a tool for health personnel that enables customization of the system for each patient, based on their needs. At the same time, it provides reports on the degree of adherence to the behaviors previously agreed with the health personnel (therapeutic contract).

### Description

The IA2EPD project search to provide health professionals with a tool that allows them to monitor the healthy behaviors that they prescribe to patients with diabetes through a protocol that involves a therapeutic contract with each patient to fulfill a series of activities. The protocol and design of the therapeutic contract where the activities that each patient must do, the time and frequency are defined, have been designed by the healthcare team.

This project consists of two well-differentiated blocks, the intelligent activity recognition core developed by the UJA and the display panel (dashboard).

The smart core is in charge of recognizing user activities through the use of sensors and smart devices. To do this, the core integrates a system based on artificial intelligence that, based on the data provided by the devices, determines, firstly, the locations of people with diabetes and, secondly, the type of activity they are doing

The main purpose of the IA2EPD Dashboard is to provide information to the patient and healthcare personnel to facilitate healthy behaviors. To do this, personalized reports are generated on the degree of adherence to the therapeutic contract, which make it possible to see the evolution of its compliance over time, highlighting the key indicators to improve. In addition, it facilitates system management for the technologist staff.

#### **Advantages**

Currently, no other application has been found that generates reports of this type on the degree of compliance with the activities agreed upon through therapeutic contracts between patients with diabetes and the health professionals who care for them

#### **Industrial/Intellectual protection**

This technology is protected by the Intellectual Property Registry

#### **Objective of the Collaboration**

Seek a collaboration that leads to the commercial exploitation of the invention presented. The terms and conditions of the license agreement can be openly discussed if the technology presented is of interest.

#### Clasification

Activity/Type: Software. Pathology: Diabetes

## Representative Institution and Inventor

The principal investigator behind the innovation is Jesús González Lama, a researcher in the GE10 Clinical-Epidemiological Research group in Primary Care.

The development of the project has been possible thanks to the Andalusian Health Service and the University of Jaén.

#### **Contact**

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