Institute of Information Systems
eHealth

Hes·so VALAIS WALLIS
School of Management & Tourism

G-DEMANDE

Development of an electronic platform based on intelligent agents capable of diagnosing critical situations for patients with gestational diabetes.

Realization

Michael Schumacher
Stefano Bromuri
René Schumann
Johannes Krampf

Information

michael.schumacher@hevs.ch
aislab.hevs.ch

Keywords

- Gestational diabetes
- Chronic disease
- Intelligent agents
- Information system

Our skills

Formalisation of medical knowledge

Valorization

Development of a system for diabetes type 1 and 2

Partnership

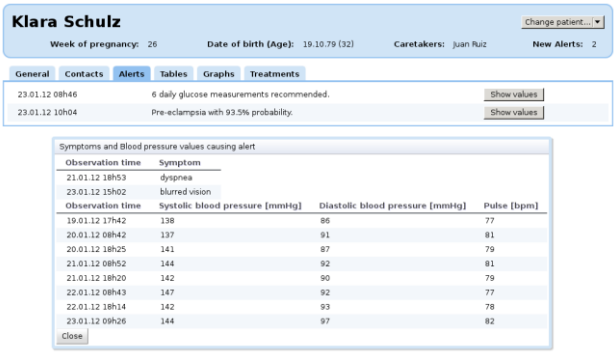
- Centre Hospitalier Universitaire Vaudois Lausanne (CHUV)

Funding

Nano-Tera

Schedule

09/2010 – 01/2013



G-DEMANDE develops an IT solution for the diagnosis of critical situations for patients with **gestational diabetes,** a condition occurring during pregnancy due to increased insulin resistance.

Even though the condition itself is easy to manage, treatment can be improved through **daily monitoring** of the glucose level and blood pressure by means of an electronic device. This provides the medical staff with all the relevant medical data. The continuous collection of information can facilitate the adjustment of the treatment during pregnancy and the generation of automatic alerts if the intelligent system diagnoses abnormal situations. The developed system thus becomes a decision-aid tool for medical staff (which cannot be replaced though).

For this project aimed at monitoring the evolution of chronic diseases such as gestational diabetes, the Institute uses **intelligent agents,** i.e. programmes capable of reasoning and of automatically carrying out tasks, based on the knowledge of the medical staff.

The application will be tested with a few patients of the University Hospital (CHUV) in Lausanne to evaluate the **medical relevance** of this approach. In future, the Institute is planning to develop similar information systems for diabetes type 1 and 2.