

**We're working for growth.**  
Berlin is our passion.



# **Project Proposal: A Cross-Border European Biometric Enabled Health Record Identification and Data Exchange Network** **PC Klinik & Netzwerksicherheit GmbH**

# Project background

Healthcare providers in Europe are facing incongruous challenges, which include an aging population and an increase in chronic diseases or long-term conditions of patients, whilst having to meet an overriding need to reduce costs and maintain high quality healthcare.

These necessities fuel the demand for e-health IT innovation in general and electronic health records (EHR) in particular. EHR solutions have been developed within Europe for some time however there are still issues of privacy and data protection when it comes to realising a pan-European EHR solution. Creating an interoperable European health information architecture enabling access by patients and authorised doctors to the patient data at the point of care is a key focus for the EU.

This would play a major role in enhancing patient safety by making it easier for authorised personnel to be able to get access to patient information in an emergency situation.

# Project background

The goal is for healthcare information on a particular patient to be accessible at any moment and no matter whether it was generated in a primary care centre, a hospital or a private physician's practice.

This would make ease of access better for the healthcare professionals with a Pan-European EHR of further benefit for the European citizens.

An example of this is when a French tourist falls ill or has an accident while on holiday in Spain; the Spanish doctor would need to easily be able to consult the electronic health record of the French patient.

# Project background

In Europe, however, the concept of a centralised server model of healthcare data has been poorly received due to the issues of privacy and security in such a model.

A number of users from doctors, nurses, technicians, billing clerks have access to at least part of a patient's records during their hospitalisation. Recent revelations of "secure" data breaches at centralised data repositories, in financial institutions, retail industry, and government databases, have caused concern about storing electronic medical records in a central location using password protection.

There is hardly any system worldwide that is completely secure (including EMRs or PHRs) especially when considering recent events with the losses of credit card records at large retails chains, or the 2006 Veterans' Administration loss of its patients' records. Despite tight security on these systems, data was lost or accessed by others who should not have had access.



# Project background

Aside from the problem of the privacy of electronic healthcare records, there is the separate, yet equally important issue of verifying the identity of a patient. Getting a patient's chart confused with another can be lethal.

Mistakes are being made in the healthcare system with records being mixed and wrong medication being given. There is a desperate solution being sought to find the best method of securing health data and preventing mistakes with consequences that range from embarrassing to deadly, whilst still enabling a flexible pan-European EHR system.

Biometrics is currently being introduced in various healthcare security industries across the world.

Biometric devices can take unique information about a person to ensure that a person is who they say they are and have permission to be working with the healthcare information they are trying to access.

# Project background

It would make it possible for patients and healthcare professionals to feel secure that their information is being kept confidential and only being released to those who have the right to see it.

Biometrics can potentially be a solution for the number of issues mentioned above; however, a lot of the development and growth in the area of Healthcare Biometrics are being done independently and in isolation.

Hence, there is a need for a pan-European EHR solution that would make use of biometric technology in an integrated fashion to cater for the issues of security and emergency patient identification.

# Project idea and method

## The Solution

An innovative, interoperable and integrated biometric enabled security access/exchange software platform for patient health records within the national health sectors across the European member states,

which will enable patient identification within a local hospital environment; patient identification and health record

# Partner / Consortium

**SMATOS UG & Co KG, Trier, Germany**

**Bio ID Security Ltd. , Edinburgh, Scotland UK**

**Tomas Bata University, Prag , Czech Republic**

**And looking for 2 – 3 further partners**



# Impact

1. Enables pan-European secure access to medical health data
2. Leading to better health care provision whilst at the same time keeping patients safe - but at a much reduced cost
3. Improves competitiveness and cost efficiencies in health care provision at point of need
4. Encourages and fosters EU-wide standards in a single digital market
5. Facilitates secure data collation to help in development and delivery of future healthcare improvements to contribute to the development of a smart, sustainable, inclusive society

# Contact

## Elmar Hilgers Geschäftsführer PC Klinik & Netzwerksicherheit GmbH

### **Berlin Partner for Business and Technology**

Ludwig Erhard Haus

Fasanenstr. 85 | 10623 Berlin

T +49 (0)30 46302-500 | [info@berlin-partner.de](mailto:info@berlin-partner.de)

[www.berlin-partner.de](http://www.berlin-partner.de) | [www.businesslocationcenter.de](http://www.businesslocationcenter.de)



Some projects of the Berlin Partner für Wirtschaft und Technologie Berlin GmbH are funded by the federal state of Berlin and the Investitionsbank Berlin, cofunded by the European Union – European Regional Development Fund. Investing in your Future.

