INTERREGIONAL COORDINATION FOR A FAST AND DEEP UPTAKE OF PERSONALISED HEALTH – REGIONS4PERMED

Best Practices Booklet

Key Area 2: Health Technology in Connected & Integrated Care

HORIZON 2020

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1. HEALTH MONITORING

Project | Initiative title		Health Monitoring
Organisation name		Health Insight Solutions GmbH
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Website:		https://www.health-insight.de/
Keywords:		Monitoring, Data collection, Digitization, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention, Lifestyle and chronic disease, Selfcare, Integrated care, Big Data analysis, Protection
Duration:		Not limited
Area of application		Clinical research
DESCRIPTION	Main challenges tackled	Definition of Health Monitoring in comparison to Telemedicine is based on Digital Health Data collection, Patient Health Data Exchange, Health Data Flow, Health Support, Teamwork etc. between health institution on the same or a similar hierarchical level. In Telemonitoring/Health Monitoring regular data collection (e.g. vital signs, questionnaires), data exchange, data analysis and notification across different health levels is focused not only on vital parameters but also on self-estimation and regularity of measurements. Place and time of data collection (e.g. by the patient at home) is separated from data analysis and processing.
	Objectives	The goal is to bring innovative health solutions to the market despite the lack of clarity of the terminology. Digitization had a strong emphasis on technical possibilities and less emphasis on changing the care process itself; data input and output mechanisms must be based on existing solutions. It is important to maintain interoperability and cross-sectorality. At the same time, many of such stand-alone solutions work with a tendency to centralize data.
	Main concept and methodologies involved	Healthcare information systems are no longer a luxury but a necessity for every pioneering facility in the field of healthcare. The advantages of applying Healthcare Information Systems in medical facilities are numerous starting from

		the management of patients' files and accounts to the management of all clinical and administrative functions that are undergone during the process of medical service, thus ensuring the highest standard of quality in patient care within cost effective processes.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	The main impact of health monitoring is on selfcare to consider the patient as an actor for his or her own health control. There are solutions in terms of patient pattern, equipment, features: • Swimming Solution for Individualization. • Providing individualized health content: patient content management • Automatic assessment and re-assessment of patient by the system • Increasing separation of technical solutions and applications regarding health monitoring & lifestyle monitoring
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Founded in the year 2000 to target the Healthcare IT market, proudly introduces its flagship Healthcare Information Management System applications, with end-to-end world-class functionality designed and developed using the latest technologies, best practices and international standards. It is a unique healthcare management system that is designed by physicians for physicians and healthcare professionals and all the supporting facilities that cater for healthcare services.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

2. GLUCOACTIVE - CONTROL DIABETES, EVERYWHERE, ALWAYS

Project | Initiative title	Control Diabetes, Everywhere, Always
Organisation name	GlucoActive Ltd
Country	Poland
Region	Lower Silesia
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Website:		www.gluco-active.com
Keywords:		Monitoring, Data collection, Glucose meter, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention, non-invasive
Duration:		Not limited
Area of application		Clinical research
DESCRIPTION	Main challenges tackled	GlucoActive devices use the most stringent medical standards for traditional blood glucose meters in their measurements to ensure quality of results and make life fully possible.
	Objectives	The innovative technology offers a non-invasive, automatic measurement of blood sugar levels. The proposed telemedicine solutions, including online memory, enable fast and accurate measurement and functions known from premium class smart watches. The device has a chance to become the first on the market, as so far none of the manufacturers has led to the sale. The devices do not have any interchangeable elements such as strips or sensors, they are a one-time purchase, which means cost savings in relation to invasive devices.
	Main concept and methodologies involved	GlucoActive is a portable, non-invasive blood glucose meter using innovative optical methods. The device is designed for diagnostic, prophylactic, diabetes treatment and sports applications. Currently, there are working devices and technology which are at the stage of clinical trials.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	There are impacts connected with problems related to market: • Diabetes is one of the most dangerous civilization diseases (the seventh most common cause of death in the world) • Pricking fingers for measurement is a psychological barrier for most patients, therefore patients neglect diabetes prevention • Diabetes is detected too late, making it difficult or impossible to treat successfully • No non-invasive solutions available on the market
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	GlucoActive - a startup operating on the basis of public and private investment - sincerely believes that innovation can change the world. It creates solutions in the field of modern medicine, focusing on the non-invasive measurement of not only blood glucose, but also other substances such as cholesterol, haemoglobin, hydration and many others.

3. BIOCAM - AI APPROACH TO DOCTOR'S WORKLOAD REDUCTION

	Key stakeholders involved	General practitioners, Clinicians, Researchers
Project | Initiative title		AI approach to Doctor's Workload Reduction
Organisation name		BIOCAM
Country		Poland
Region		Lower Silesia
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Website:		https://biocam.pl/
Keywords:		Monitoring, Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention, non-invasive
Duration:		Not limited
Area of application		Clinical research
DESCRIPTION	Main challenges tackled	BIOCAM is a start-up company which develops innovative capsule endoscopy that increases the comfort of patients' lives and provide new solutions for healthcare. They are a group of engineers, project managers and medical workers who envision capsule endoscopy as a golden standard examination of gastrointestinal track. The most common diseases that can be examined by capsule endoscopy are Crohn's disease, celiac disease, small bowel tumours and anaemia of unexplained origin. The endoscopy capsule is only 11 mm wide and 23 mm long.
	Objectives	The development of minimally-invasive endoscopic examination methods is another good practice and BIOCAM mission. They focus on greater patient comfort, reducing the cost of medical facilities and popularizing the capsule being endoscopic solution. Innovative capsules help patients and medical doctors by offering significant reduction of time and costs of digestive system tests. It saves time from 10 hours to even 30 minutes.

	Main concept and methodologies involved	The use of several types of light sources and innovative imaging methods (advanced imaging solutions) allows our solution to see more like traditional endoscopic capsules. Due to the use of intelligent solutions, it will be possible to stop the capsule at the place of detection of the lesion and immediate surgical intervention. Thanks to real-time imaging it is possible to use wireless communication, the doctor will be able to monitor the examination on an ongoing basis. In addition, the device will warn the doctor of any danger. A very interesting approach to the assessment of classifiers was presented, which consisted in minimizing false-negative results to miss any abnormal changes and any diseases. It is better to classify patient as sick than mistakenly classify them healthy.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative (max 200 words)	There are some innovation limitations because it will not replace the doctors, but it can reduce their workload. Also, the data labelling is time-consuming and costly. In case a network looks only for polyps, it won't find any bleedings. Reducing doctors' workload with the support of an AI system is possible, but it won't replace the human. Thanks to capsule endoscopy and a cloud system, patients can be at home and the data can be sent to the doctors.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	BioCam has raised a total of €250K in funding over 1 round. This was a Seed round raised on May 8, 2020. BioCam is funded by LT Capital.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

4. VIRTUAL COACH AND CHAT BOT INTERACTIONS FOR THE COGNITIVE IMPROVEMENT

Project | Initiative title		Virtual Coach and Chat Bot interactions for the cognitive improvement
Organisation name		ISRAA
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Region		Treviso
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Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention, non-invasive
Duration:		Not limited
Area of application		Clinical research
DESCRIPTION	Main challenges tackled	This is an initiative aiming to deliver outcome-based integrated care to older people to improve their quality of life and their families, while also making European health and social care systems more sustainable. It was elaborated on the concept of ValueCare project and its implications for the system.
	Objectives	ValueCare was developed in seven European cities with different pathologies. The aim is to build an integrated care system between health and social services by proposing an app-based platform that connects informal and formal caregivers and supports health empowerment through virtual coach.
	Main concept and methodologies involved	Regions can support this process through international collaborations and partnerships, identifying needs and common values. Clear goals need to be set within public and private networks to create models of best practice. This will trigger a shift in the current state of art, encouraging more local relations, cooperation, and collaborations that will facilitate the uptake and scaleup of innovative healthcare.

	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	There is a need to focus on the benefits of digitalization and implementation of innovation in health systems. Significant healthcare improvements will be achieved when intelligent ICT innovations are applied to the healthcare system.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Fundings and experiences coming from H2020 Value Care Project.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

5. ARTIFICIAL INTELLIGENCE IN ONCOLOGY

Project | Initiative title		AI in Oncology
Organisation name		Cancer Center
Country		Poland
Region		Lower Silesia
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Website:		https://cancercenter.ai/
Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention, non-invasive
Duration:		Not limited
Area of application		Clinical research
DESCRIPTIO	Main challenges tackled	The Cancer Center offers applications and APIs that enable automatic evaluation of medical images and took part in two contests in the field of "Imaging & Digital

		Pathology" used in cancer diagnostics. Their products allow for cheaper, faster and more accurate medical diagnostics and to support doctors and analysts.
	Objectives	The Cancer Center aims at solving the problems of patients whose diagnosis takes too long, and doctors who may lack manpower as well, related to the legacy technology used and processes that reduce performance. In addition, data scientists dealing with low availability of high-quality datasets can train algorithms. The proposed solutions are based on a safe and a compatible cloud platform
	Main concept and methodologies involved	The proposed solutions are based on a safe and a compatible cloud platform, the components of which are: internet browser of pathology and radiology, expert market: validating the second opinion and API-based supporting the application ecosystem.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	There were served five times more patients per day per doctor and two times more costs thanks to this simpler procedure. Such a system has been implemented for prostate cancer. In this case, 1 in 8 men get prostate cancer, which is 1.1 mil new cases / year and ~ 307,000 deaths cases.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	It is start-up company based on private investment.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

6. INFERMEDICA - OBJECTIVE IS TO TRANSFORM HEALTHCARE

Project | Initiative title	INFERMEDICA - objective is to transform healthcare
Organisation name	INFERMEDICA
Country	Poland

Region		Lower Silesia
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Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:		Not limited
Area of application		Personalised Medicine, Public Health Services.
DESCRIPTION	Main challenges tackled	The healthcare industry has never been so advanced. There are still so many patients who don't receive the right care at the right time. Infermedica thrives in the face of this global challenge by focusing on leading-edge technology to create patient-oriented solutions, including reliable pre-diagnosis, which significantly improves patient flow and enhances patient satisfaction.
	Objectives	Over the years, Infermedica has worked to make primary care more accessible for patients and to provide AI-driven support for health professionals. The company human-centric health applications are appreciated by users worldwide for helping them to make informed health decisions. Infermedica develops its diagnostic engine to collect intake, check symptoms, and guide patients to the right care.
	Main concept and methodologies involved	The technology can also detect emergencies and support healthcare professionals by giving them early access to health information and recommendations. Infermedica tackles the problem of inappropriate use of medical services and misdiagnosis, providing insurance companies, hospitals, and health systems with a set of advanced preliminary diagnosis and triage tools, that include products: Symptom Checker, Call Center Triage, Emergency Room Triage, and Medical Active Pharmaceutical Ingredient (API). The company uses artificial intelligence and machine learning to assess symptoms and find patterns in data.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	Thanks to algorithms, Infermedica gets smarter over time. Besides, the team of physicians verifies every piece of information that is added to the medical database to ensure that patients get safe and reliable recommendations. To date, physicians involved in the project have spent over 20,000 hours doing the review. Infermedica helps insurance, healthcare and pharmaceutical companies increase efficiency, improve patient flow, and reduce costs. The company technology combines the power of algorithms and the experience of doctors. They develop mobile, web and chatbot apps that are easy to use and integrate. Infermedica

		apps operate in 18 languages and the language catalogue is being constantly expanded.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Infermedica is a start-up company based on investments which include The European Bank for Reconstruction and Development and the Heal Capital fund.
	Key stakeholders involved	General practitioners, Clinicians, researchers

7. CARDIOMATICS

Project | Initiative title		CARDIOMATICS – the objective is to transform healthcare
Organisation name		CARDIOMATICS LTD
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Region		Lesser Poland
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Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:		Not limited
Area of application		Personalised Medicine, Public Health Services
DESCRIPT	Main challenges tackled	Cardiomatics is on a mission to make ECG analytics available to everyone using medical-grade system class II based on accurate, clinically validated algorithms which ensure high-quality and trusted outcomes of ECG analysis.

	Objectives	The cloud tool speeds up diagnosis and drives efficiency for cardiologists, clinicians, and other healthcare professionals to interpret ECGs — automating the detection and analysis of some 20 heart abnormalities. The software is able to integrate with more than 25 ECG monitoring devices, offering a modern cloud software interface as a differentiator versus legacy medical software.
	Main concept and methodologies involved	The customizable, multi-language cloud platform significantly reduces the time of analysis by seamlessly and quickly transferring data into an application and performing detailed analysis and interpretation of it. Shortly thereafter, the doctor receives a detailed test report on which he can base his diagnosis.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	The AI tool has analyzed more than 3 million hours of ECG signals commercially to date. The software is currently being used by more than 700 customers in 10+ countries, including Switzerland, Denmark, and Germany.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	The Cardiomatics team is still developing its product to fit into more patients' and physicians' journeys. In the future, this will include paediatric applications, direct-to-consumer analysis, and broadening diagnostic yield.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

8. TELEMONITORING AS A SOURCE OF BIG DATA

Project | Initiative title	Telemonitoring as a source of big data
Organisation name	Polish Chamber of Healthcare IT
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Region	Lower Silesia
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Keywords:	Monitoring, Personal Data collection, Telehealth,

		Telemedicine and telemonitoring, Prevention and Intervention, non-invasive
Duration:		Not limited
Area of application		Clinical research
DESCRIPTION	Main challenges tackled	The process of defining and implementing of fundamental changes in the Polish healthcare IT systems is ongoing: new central medical registries are being created, new information-sharing requirements have come into force, medical records migrate to electronic ones, e-prescriptions, e-assignments and other documents are being introduced. The burden of implementing all these changes will be on entrepreneurs working in IT healthcare area, while financing all the modifications will fall on medical entities.
	Objectives	The legal form of the Chamber of Commerce gives representative a special empowerment, because it benefits from privileges granted to self-governance bodies and is strongly founded in the law. The Polish Chamber of Healthcare IT unites both entrepreneurs who are suppliers and users (doctors, clinics, hospitals) of ICT systems in health care. As main tasks of the above-mentioned groups there are development, implementation and / or financing of the upcoming changes in medical informatics in Poland. There is proposition of constructive solutions to indicate computerization methods and consult legislative changes to emphasize benefits.
	Main concept and methodologies involved	In case of telemedicine, sources of data are based on remote patient monitoring (ECG, spirometer, thermometer, blood pressure meter, glucometer) and self-monitoring (questionaries, self-examination). Internet of Things (IoT) use cameras, beacons, smart home devices like air quality. Devices, as well as wearables (watches, GPSs, accelerometers, cameras) and e-visits / e-consultations (audio/video recording, photos, dicom).
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	E--healthcare future is certain. These changes may indeed have the potential for radically transform healthcare, but this potential has not yet been realized. There are the challenges for: data collection and storage methods, standards and protocols for sharing (open / public datasets) and their privacy, as well as legal aspects. The quality of the data and the possibility of their processing (computing power) are also important. Infrastructure and the possibility of financing it, are an important element.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Financing of the upcoming changes in medical informatics in Poland is a main tasks of Polish Chamber of Healthcare IT for development, implementation. There is support and proposition of constructive solutions to indicate computerization methods and consult legislative changes to emphasize benefits.

	Key stakeholders involved	General practitioners, Clinicians, Researchers

9. STETHOME

Project | Initiative title		StethoMe
Organisation name		StethoMe®
Country		Poland
Region		Greater Poland
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Website:		https://stethome.com/
Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:		Non limited
Area of application		Personalised Medicine, personalized technologies, Public Health Services.
DESCRIPTION	Main challenges tackled	StethoMe® is the first system that detects abnormalities in the respiratory system. StethoMe® relies on medical AI algorithms (CE 2274) working together with a wireless stethoscope and dedicated application.
	Objectives	StethoMe goal is to facilitate both the diagnostic and treatment process.
	Main concept and methodologies involved	Thanks to using unique technologies that ensure control over examination quality, StethoMe® can be used by patients at their homes. StethoME is AI powered healthcare. Automatic and remote lung and heart screening. Company has built a smart solution to improve the primary care diagnostic. They deliver to the telemedicine solution the missing puzzle piece in the remote interaction between the professional between the physician and the patient itself.

	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	The first element is the smart stethoscope, the physical device that enables precise auscultation of patient's heart and lungs. The second element, the most vital element of the solution is AI. The smart sound analyzer system based on the unique AI algorithms that was designed by the company. Those algorithms detect and classify abnormal lung sound. The device StethoMe stethoscope and StethoME AI algorithms for lung auscultation are certified in the EU as a class IIa medical device. World's first certification of that kind.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Private and public. StethoMe® also carried out a project co-financed by the European Structural and Investment Found. Priority axis: Support of R&D works by enterprises, measure: R&D enterprises projects, sub-measure: Industrial research and development works carried out by enterprises.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

10. SENSDX

Project | Initiative title	SensDX
Organisation name	SensDx S.A.
Country	Poland
Region	Masovia
Contact person	Tomasz Gondek
Contact email	tomasz@sensdx.eu
Website:	https://www.sensdx.eu
Keywords:	Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:	Non limited

Area of application		Personalised Medicine, personalized technologies, Public Health Services.
DESCRIPTION	Main challenges tackled	Our mission is to prevent the spread of bacteria and viruses by detecting pathogens at an early stage
	Objectives	SensDx is working on the technology of ultra-sensitive micorsensors, modified with biological molecules.
	Main concept and methodologies involved	The molecules on the electrode surface are selected by biotechnological methods. It allows you to identify unambiguously which bacteria or virus is the cause of infection or to determine the oncological marker, DNA or RNA. SensDx tests provide high sensitivity, comparable to the RT-PCR reference method. As the only one on the market, unlike the so-called "lateral flow" tests, it enables the detection of pathogen presence at an early stage of infection.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	The test analyses digital data, which allows for high reliability and continuous monitoring of the quality of the test. The result obtained in digital form can be printed out, sent to a selected recipient or archived in the system. Together with the result, the recipient receives a quality monitoring report of the test. The innovative solution combines a simple tool based on a fast, ultra-sensitive diagnostic test with a mobile application for easy result interpretation. The test tools are placed inside specially-designed devices called Mobi (for individual patients) or Pro (for medical professionals) SensDX comprises of an interdisciplinary team of experts specialising in biotechnological, chemical, electrochemical and electronic sciences, IT, production automation and business, including IP protection, technology commercialisation, sales and marketing. SensDX work in line with modern management methods, high quality standards and safety regulations.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Private (joint stock company) and public (funds obtained from the European Union)
	Key stakeholders involved	General practitioners, Clinicians, Researchers

Project | Initiative title		HEARTBIT 4.0
Organisation name		Wroclaw Medical Univeristy – Project Consortium Coordinator
Country		Poland
Region		Lower Silesia
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Website:		https://heartbit40.com
Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:		The project will end on 31 December 2022
Area of application		Personalised Medicine, heart diseases, medical data science technologies
DESCRIPTION	Main challenges tackled	HeartBIT 4.0 Project - Application of innovative Medical Data Science technologies for heart diseases project.
	Objectives	SensDx is working on the technology of ultra-sensitive micorsensors, modified with biological molecules.
	Main concept and methodologies involved	In the face of progressive digitization, which also involves medicine, acquiring skills, which are based on modern, advanced and state-of – the art computational and analytical techniques, is essential. During the HeartBIT_4.0 project, The Excellence Partners invited to the consortium, will train the staff from the Department of Heart Diseases of Wroclaw Medical University in the field of Data Science and application of Data Science techniques to medicine. The Department of Heart Diseases has no experience in using modern state-of-the-art methods of analysis and interpretation of large medical data sets. Due to the lack of these skills in the post-industrial era of Big Data and e-society, the Department is forced to accept a secondary role in the contemporary development of biomedical sciences.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	Establishing the consortium under Horizon 2020 twinning programme and thus formal cooperation with the leading scientific departments from the developed European Union countries that are experts in Biomedical Data Science will significantly increase the scientific potential of the Department. Moreover, the acquisition of the competencies described above will make the Department a

		valuable partner for future cooperation, research projects at the national and international arena. The acquisition of the above-described competences in cardiology will be the first step in implementing this approach in other fields of medicine so that the ultimate beneficiary of the HeartBIT_4.0 project will be the entire university.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	HeartBIT_4.0 project was submitted to the call: Horizon 2020, Spreading Excellence and Widening Participation: WIDESPREAD-05-2020: Twinning and has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 857446.
	Key stakeholders involved	General practitioners, Clinicians, Researchers

12. INTERNET PATIENTS ACCOUNT

Project | Initiative title		INTERNET PATIENT ACCOUNT
Organisation name		Ministry of Health and National Health Fund
Country		Poland
Region		Masovia
Contact person		n/d
Contact email		n/d
Website:		https://pacjent.gov.pl
Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:		Non limited
Area of application		Personalised technologies, Public Health Services
DESCR	Main challenges tackled	National web application where all the medical history is gathered.

	Objectives	Internet Patient Account (IKP) is a revolutionary tool in the health care system. It is supposed to facilitate patients' convenient use of digital services and organize medical information about their health in one place.
	Main concept and methodologies involved	An Internet Patient Account gives the information about patients past, current or planned treatment and allows to do a number of things without having to visit a GP surgery or clinic.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	Internet Patient Account allows to: - see the e-prescription without having to collect it in person at the surgery - receive alerts on e-prescriptions and e-referrals by e-mail or SMS - check and download the e-prescriptions and e-referrals you have received - order an e-prescription for permanent medicines - authorise to access your data, to deal with matters on your behalf (e.g. to collect an e-prescription) - find out where you can be treated - agree to certain healthcare services, such as invasive surgery - choose or change your primary care doctor, nurse and/or midwife - apply for an European Health Insurance Card
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Public (National Health Fund)
	Key stakeholders involved	General practitioners, Clinicians, Researchers

13. OPEN DATA - ACCESS, STANDARD, EDUCATION, NATIONAL HEALTH FUND

Project | Initiative title	OPEN DATA - ACCESS, STANDARD, EDUCATION, NATIONAL HEALTH FUND

Organisation name		National Health Fund
Country		Poland
Region		Masovia
Contact person		n/d
Contact email		n/d
Website:		https://www.nfz.gov.pl/O-NFZ/PROGRAMY-I-PROJEKTY/PROJEKT-OTWARTE-DANE-DOSTEP-STANDARD-EDUKACJA,3.HTML
Keywords:		Monitoring, Personal Data collection, Telehealth, Telemedicine and telemonitoring, Prevention and Intervention
Duration:		Not limited
Area of application		Public data, personalized technologies, Public Health Services.
DESCRIPTION	Main challenges tackled	Based on the "Partnership agreement for joint preparation and implementation of the project "Open data - access, standard, education", concluded between the Ministry of Digitalisation and the National Health Fund on 21 June 2017, the National Health Fund is implementing a non-competitive project entitled: "Open data - access, standard, education".
	Objectives	The aim of the project is to improve the availability and quality of public data and to increase the possibility of its re-use. The project will provide systemic solutions to improve availability and quality of public data and to increase opportunities for its re-use by developing the danepubliczne.gov.pl portal. The API will open 6 registers with high economic and social potential. The expanded danepubliczne.gov.pl portal will facilitate searching, analysis and use of data.
	Main concept and methodologies involved	The project will be implemented on the territory of the Republic of Poland, in its scale of influence it has a nationwide (supra-regional) character. As part of the project, the National Health Fund will provide API to the databases: NFZ Statistics, including LEKI Statistics and JGP Statistics; Directory of Waiting Times for Medical Services; NFZ contracts.
	Impacts (health, scientific, industrial, socio-economic or others enabled by the project/initiative	Expected results of the project: - improvement of the quality of open public data thanks to development and dissemination of standards for openness of public data in 3 dimensions: legal, security and technical regulations; - improvement of knowledge and skills of data administrators in the scope of opening and using public data; opening through API (Application Programming Interface) six public

		registers that store or make available public data with a high economic and social potential; - facilitation of public data searching and its re-use on the danepubliczne.gov.pl portal due to its adaptation to the needs of various groups of recipients and extension of functionalities: converting data to formats with a higher degree of openness, searching and using data and its preview and preliminary analysis, as well as improvement of the system usability and user-friendliness dissemination of information about the potential of data collected by the public administration and the benefits of opening data.
	Funding and Investments (please specify the source: public, private, Structural or other types of funds)	Project co-financed by the European Union under the Operational Programme Digital Poland
	Key stakeholders involved	General practitioners, Clinicians, Researchers

HORIZON 2020

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