Astrid Hoebertz, FFG – Austrian Research Promotion Agency

HEALTH IN HORIZON 2020 – CALL 2019: NEW TOPICS IN CLINICAL AND DIGITAL HEALTH RESEARCH

17th of May 2018, Vienna

CONTENT

Objectives

- Main Focus: New calls 2019 in „Health, demographic change and wellbeing“
  - Political background
  - Which call topics are open? Brief description of contents
  - How do I prepare?
- Analysis and „Lessons Learned“ of previous calls
- Questions & Answers
- Networking with US – presentations of US (Jefferson University) and Austrian researchers

Non-Objectives

- very detailed descriptions of each of the 23 call topics
- Training on proposal writing => participate in our FFG Academy trainings!
- Feedback to your individual project ideas => get in touch with us after the webinar!

YOUR HOST

- FFG - Austrian Research Promotion Agency is the national funding agency for industrial research and development in Austria.
- In the division “European and International Programmes”, it also hosts **all National Contact Points (NCPs) for Horizon 2020**

- **Speaker:** Astrid Hoebertz, PhD, National Contact Point for Life Sciences/Health since 2004

MAIN FFG SERVICES FOR HORIZON 2020

Information

- Events
  - ✓ e.g. 14th of June, Vienna: Auf dem Weg zu "Horizon Europe": 9. EU-Rahmenprogramm für Forschung und Innovation
- Webinars
- Newsletter
- Homepage
- …..

….plus other services!

Consulting

- Check of your project idea („One page proposal“)
- Phone calls, emails, personal meetings…
- „Proposalcheck“ - detailed feedback
- FFG Academy: Trainings and Webinars
  - ✓ Next one: Online training/4 modules à 90min on proposal writing for cooperative projects, 5th to 13th of June: https://www.ffg.at/europa/veranstaltungen/ffg-akademie_webinar_2018-06-05to13
- All our webinars are recorded! you can listen any time…

HORIZON 2020 – BASIC STRUCTURE

Scientific Excellence

1. ERC
2. Future and Emerging Technologies (FET)
3. Marie Curie
4. Research Infrastructures

Industrial Leadership

1. Key enabling technologies
2. Risk financing
3. Innovation in SMEs

Societal Challenges

1. **Health, demographic change**
2. Bioeconomy
3. Energy
4. Mobility
5. Climate & Environment
6. Inclusive Societies
7. Security

„HEALTH RESEARCH“ HAPPENS ALMOST EVERYWHERE…

Scientific Excellence

- European Research Council
- Marie Skłodowska Curie Actions
- Research Infrastructures
- Future & Emerging Technologies

Industrial Leadership

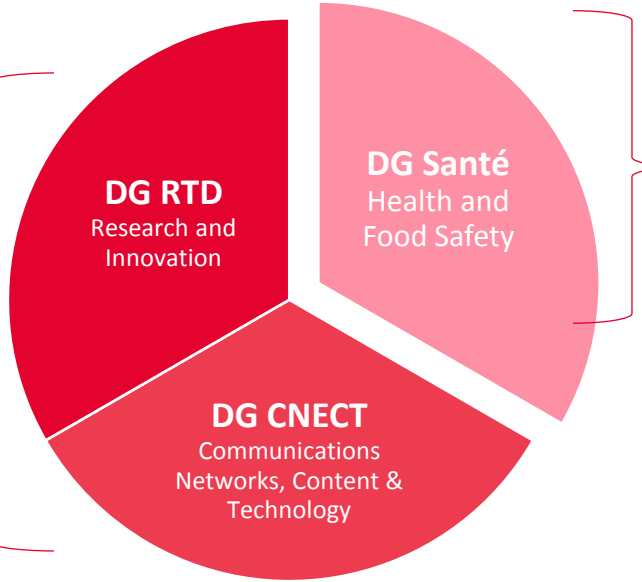
- Thematic Programmes (NMPB, ICT, Biotech…)
- SME instrument
- Fast Track to Innovation
- Eurostars-2

Societal Challenges

- 1. “Health, demographic change and wellbeing” (=SC1)
  - SC1 “core” calls
  - Innovative Medicines Initiative
  - Active Assisted Living Programme
  - European & Developing Countries Clinical Trials Partnership

HEALTH ACTIVITIES IN THE EUROPEAN COMMISSION – DIRECTORATES GENERAL = DGs

Research & Development => most implemented through Horizon 2020
Focus: SC1 „Health, demographic change and wellbeing“
7,2 Billion €



European Health Policy

„Third Health Programme“ => seperate funding programme, more on implementation, policy
449 Mio €

BACKGROUND – EUROPEAN AND GLOBAL POLICIES

- **Sustainable Development Goals**, especially No 3: "Ensure healthy lives and promote well-being for all at all ages"

- the **Ostrava declaration on environment and health**
- **Digital Single Market**
- European One Health Action Plan against **Antimicrobial Resistance**
- **cross-border healthcare directive** (and its support to the European Reference Networks)
- **International Cooperation** – Bilateral Agreements for one call: Canada, India, Russian Federation…or focus on countries in call text (CELAC, China…)
- ……..

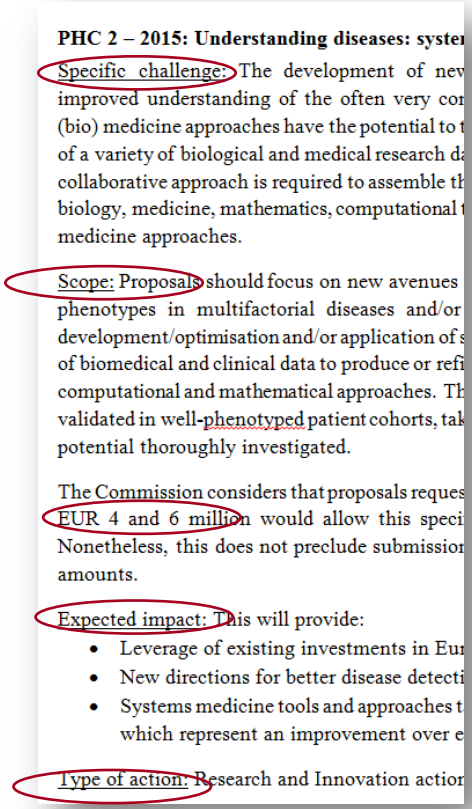
- **strategic collaborations/international consortia**
  - International Consortium for Personalised Medicine – ICPerMed
  - International Rare Diseasess Research Consortium (IRDiRC)
  - Global Research Collobartion for Infectious Disease Preparedness (GloPID-R)
  - Global Alliance for Chronic Diseases (GACD)
  - NEW: Human Cell Atlas
  - ….

WHICH COUNTRIES GET FUNDING BY THE EC THROUGH HORIZON 2020?

Everyone can participate, but the eligibility for funding is according to country groups….

1. **EU members, associated countries, low income countries:** eligible for funding
2. **Industrial countries and Emerging economies (incl. BRIC, Mexiko)**
   - in principle, not eligible for funding, have to find the resources for their part of the action
   - several countries have created co-fund mechanisms
   - **But: can receive funding in exceptional circumstances:**
     - there is a bilateral agreement between that country and the EU
     - their participation is deemed by the EC to be essential for carrying out the action.
     - the country is explicitly identified in the relevant call for proposal as being eligible for funding **=> in Health, this is the case for US participants, they are eligible for funding!!**

UNDERSTANDING CALL TOPICS: EXAMPLE



PHC 2 – 2015: Understanding diseases: syste

Specific challenge: The development of nev
improved understanding of the often very co
(bio) medicine approaches have the potential to t
of a variety of biological and medical research da
collaborative approach is required to assemble th
biology, medicine, mathematics, computational t
medicine approaches.

Scope: Proposals should focus on new avenues
phenotypes in multifactorial diseases and/or
development/optimisation and/or application of s
of biomedical and clinical data to produce or refi
computational and mathematical approaches. Th
validated in well-phenotyped patient cohorts, tak
potential thoroughly investigated.

The Commission considers that proposals reques
EUR 4 and 6 million would allow this speci
Nonetheless, this does not preclude submissior
amounts.

Expected impact: This will provide:

- Leverage of existing investments in Eur
- New directions for better disease detecti
- Systems medicine tools and approaches t
  which represent an improvement over e

Type of action: Research and Innovation actior

'Specific challenge' => sets the context, the problem to be addressed, why intervention is necessary

'Scope' => delineates the problem, specifies the focus and the boundaries of the potential action BUT mostly without describing specific approaches

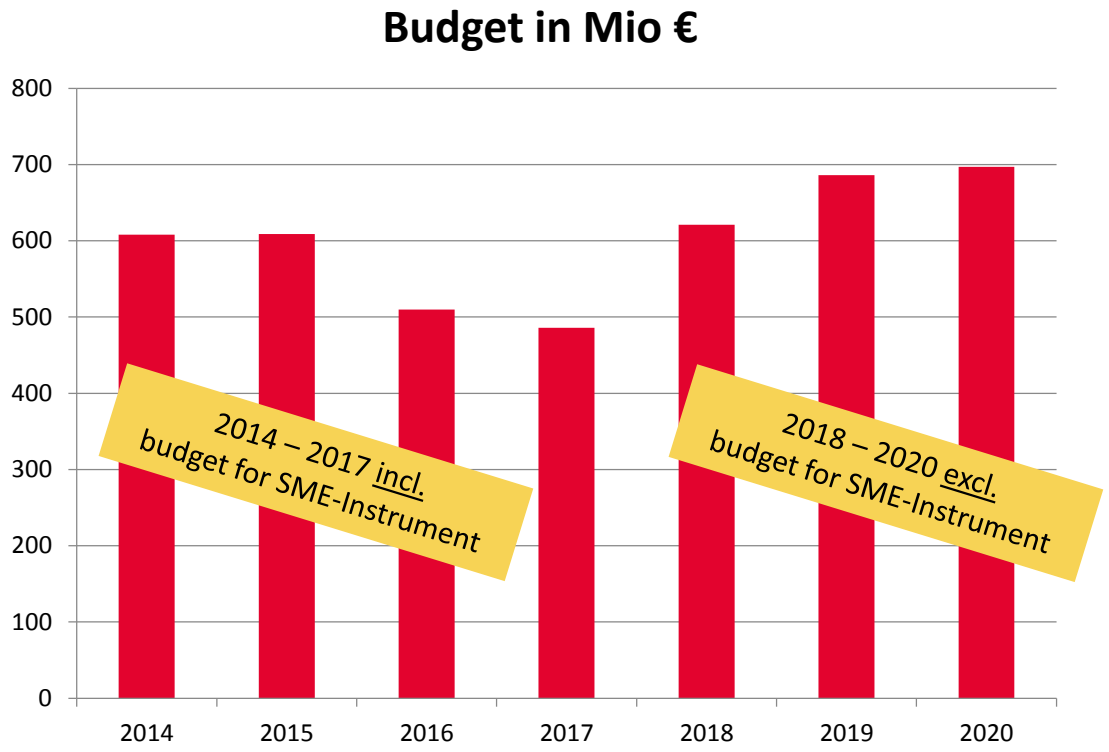
'Budget' => gives budget indications

'Expected impact' => describes the key elements of what is expected to be achieved in relation to the specific challenge

'Type of action' => Research and Innovation Action, Innovation Action, Coordination and Support Actions….

CALL 2019

HEALTH CALL BUDGETS



CALLS 2018 - 2020

Health Headlines 2018-2020

Better health and care, economic growth and sustainable health systems

Personalised medicine – innovative healthcare industry – global health – sustainable and evidence – based health and care systems

Decoding the role of the overall environment for health and well-being

Human exposome – global changes and health

Digital transformation in Health and Care

eHealth and mHealth – ICT for Active and Healthy Ageing

Trusted Big Data solutions and Cybersecurity for Health and Care

Call **„Better Health and Care, Economic growth and sustainable health systems“**

two-stage and single-stage topics

Budget 2019: 585 Mio €

Call **„Digital transformation in health and care“**

single-stage topics

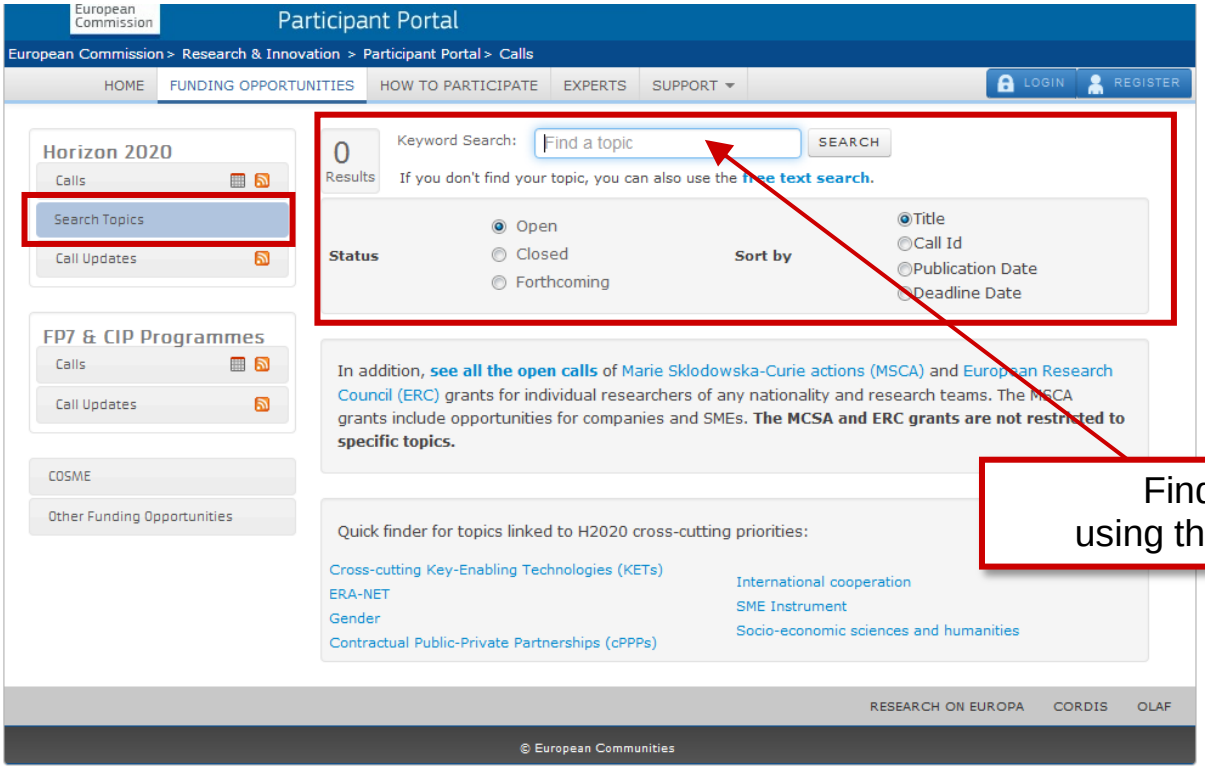
Budget 2019: 107 Mio €

Call **„Trusted digital solutions and cybersecurity in health and care“**

single-stage topics

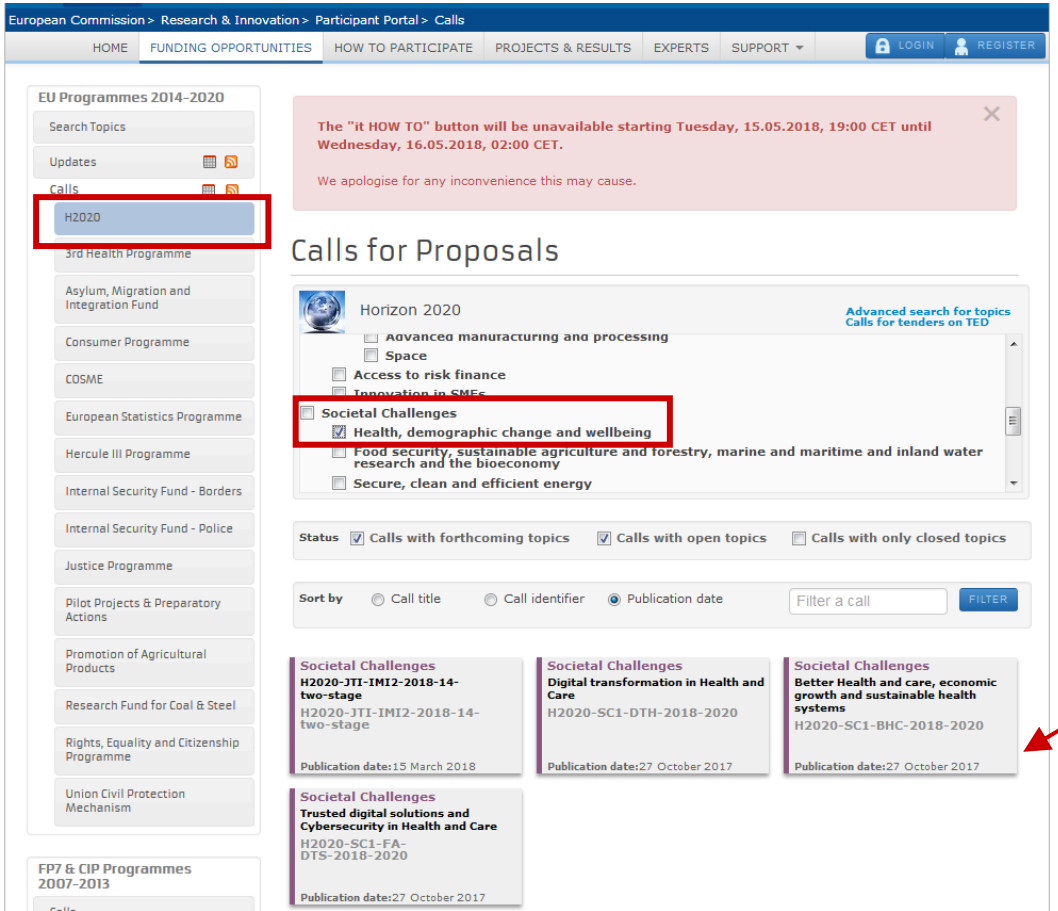
Budget 2019: 60 Mio €

WHERE DO I FIND THE CURRENT CALLS?



Find relevant topics
using the keyword search…

WHERE DO I FIND THE CURRENT CALLS?

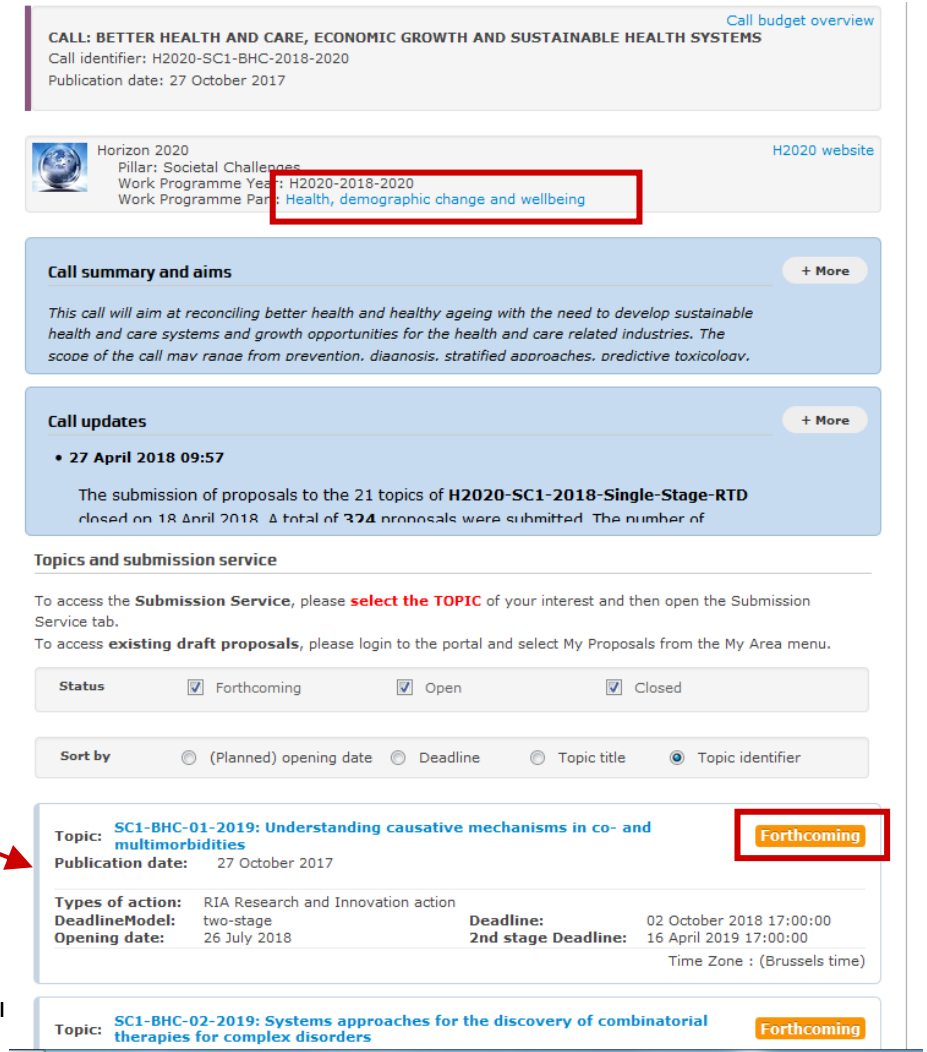


click on call

WHERE DO I FIND THE CURRENT CALLS?

many "Forthcoming" already online, but without latest changes!

plus some new topics which are not online yet!



CONTENT AND DEADLINES 2019

Deadline Single Stage Topics

- Full proposal: **16th of April 2019**

Deadlines Two Stage Topics

- 1st Stage – 10 pages: **2nd of October 2018**
- 2nd Stage – Full proposal: **16th of April 2019**

Call opens in June/July 2018 => many topics already online on the Participant Portal, but text might have changed slightly

Call „Better Health and Care, Economic growth and sustainable health systems“

two-stage and single-stage topics

Budget 2019: 585 Mio €

SC1-BHC-01-2019

Understanding causative mechanisms in co- and multimorbidities combining mental and non-mental disorders

Research And Innovation Action

4-6 Mio €/project

TWO STAGE => 2nd of October 2018

Tip!

Similar topic in 2015 – check funded projects! (PHC-03-2015)

Specific Challenge:

- lots of individuals with co- and multimorbidities
- understand causative mechanisms for better diagnosis, prevention, monitoring and treatments

Scope:

- identifiy and validate causative mechanisms (e.g. molecular, genetic, correlative, drug-drug interaction..) **combing mental and non-mental disorders**
- integration of basis, pre-clinical and/or clinical research (but not pharmaceutical „clinical trials“)
- purposeful exploitation of existing data, biobanks, registries and cohorts, but generation of new data not excluded
- SME participation encouraged

SC1-BHC-02-2019

Systems approaches for the discovery of combinatorial therapies for complex disorders

Research And Innovation Action

4-6 Mio €/project

TWO STAGE => 2nd of October 2018

Tip!

Similar topic in 2015 with systems medicine – check funded projects! (PHC-02-2015)

Specific Challenge:

- for many complex diseases it is challenging to find the most effective therapies, often only directed at single targets

Scope:

- understand at systems level the pathophysiology of a disorder in groups of patients responding well or poorly to particular therapies
- further develop combinatorial therapies tailored to needs of stratified patient groups
- focus on already available and/or authorised therapies, access to standardized biobank samples
- patients samples reanalysed with modern high-throughput technologies and integrated with systems approaches
- proposals on complex disorders of high prevalence and high economic burden (rare diseases excluded)
- SME participation encouraged

SC1-HCO-01-2019

Actions in support of the International Consortium for Personalised Medicine

Coordination and Support Action

1,5 to 2 Mio €/project

SINGLE STAGE => 16th April 2019

Tip!

- different subtopics each year…check funded projects at the end of 2018
- Check Action plan of ICPerMed: https://www.icpermed.eu/en/activities-action-plan.php

Specific Challenge:

- personalised medicine: advance in many fields, but a lot still needs to be done
- ICPerMed – International Consortium for Personalised Medicine (EU countries, and Canada) has identified many needs for coordination and support activities

Scope 2019:

- International aspect: building links and collaboration with China

OR

- Standardisation for clinical study design: innovative design methodology for personalised medicine

SC1-BHC-30-2019

Towards risk-based screening strategies in non-communicable diseases

Research And Innovation Action

4-6 Mio €/project

TWO STAGE => 2nd of October 2018

New topic! not online yet…can still undergo changes

Specific Challenge:

- effective screening may result in earlier disease detection => more effective treatments, better disease control and care
- personalised medicine and health digitalisation provide new opportunities for targeted screening

Scope:

- to develop new or refined, targeted population-based screening interventions aimed at identifying populations or groups at high risk of developing disease
- stratification by health risk factors and determinants…such as: (epi)genetic, exposomic, socio-economic…
- can also include digital applications
- must have potential to be taken up by health-care systems

SC1-BHC-31-2019

Pilot Actions to build the foundations of a human cell atlas

Research And Innovation Action

3-5 Mio €/project

SINGLE STAGE => 16th of April 2019

Tip!

New topic! not online yet.
Check out HCA White Paper.
https://www.humancellatlas.org/

Specific Challenge:

- International Human Cell Atlas initiative (HCA) to create molecular reference maps of all human cells
- European researchers well positioned to make important contributions

Scope:

- each pilot action to demonstrate utility of an interdisciplinary, technological/biological „platform“
- e.g. to generate data sets, characterising single cells or components and much more
- primary focus on healthy tissues, but comparison to diseased tissues also allowed
- ready to deliver results quickly **=> maximum duration of two years!!**

SC1-BHC-07-2019

Regenerative Medicine: from new insights to new applications

Research And Innovation Action

6-8 Mio €/project

SINGLE STAGE => 16th of April 2019

Tip!

Similar topic EVERY year – check funded projects!

Specific Challenge:

- so far, lots of approaches only for rare diseases or conditions of limited public health importance
- recent discoveries, new approaches => extend regenerative medicine to major diseases and conditions

Scope:

- innovative translational research to develop regenerative processes to adress unmet clinical needs of large patient groups
- „new approaches"…such as genome editing, gene therapy, transdifferentiation, 3D bioprinting…etc.
- may focus on any step in the innovation chain (pre-clinical to clinical)
- **very important: exploitation potential, regulatory and commercialisation strategy**

SC1-BHC-10-2019

Innovation procurement: Next generation sequencing (NGS) for routine diagnosis

Pre-commercial procurement/PCP

9-11 Mio €/project

SINGLE STAGE => 16th of April 2019

Tip!

not a research project! Aimed at public procurers (e.g. hospitals, ministries, insurers…)

Specific Challenge:

- introduction of NGS into clinical practice hampered by its cost, availabilty of proper tests, diagnostic errors, technological bias and complex interpretation of data

Scope:

- to implement NGS in routine diagnostics or personalised medicine
- scale up demand-driven innovation for health care systems
- **„ Pre-commercial public procurement“** => public sector as a “technologically demanding buyer” to encourage research and development of breakthrough solutions. In a 2nd step, within the project, it opens market opportunities for industry and researchers
- different rules, different funding rates!

SC1-BHC-13-2019

Mining big data for early detection of infectious disease threats driven by climate change and other factors

Research And Innovation Action

12- 15 Mio €/project

SINGLE STAGE => 16th of April 2019

Specific Challenge:

- (re-)emergence of infectious disease threats, altering the epidemiology and spread of disease in a changing global environment
- tools are evolving rapidly, many big data sets available (health registries, societal data…)

Scope:

- to develop technology to allow pooling, access, analysis, sharing or data, including NGS
- to develop innovative bioinformatics and modeling methodologies => risk modelling, mapping
- to develop analytical tools for early warning…
- LONG topic text! includes many links to political context, and existing infrastructures etc.

SC1-BHC-14-2019

Stratified host-directed approaches to improve prevention, treatment and/or cure of infectious diseases

Research And Innovation Action

6-10 Mio €/project

TWO STAGE => 2nd of October 2018

Specific Challenge:

- specific factors identified in host or the host-pathogen interaction are promising new approaches
- might be basis for stratification of individuals

Scope:

- to test emerging concepts in drug and/or vaccine development in order to address the problem of antimicrobial drug resistance
- to capitalize on knowledge of role of host factors, immune modulators or of host-pathogen interactions
- should lead to new enhanced therapies, cures and/or preventive measures
- take advantage of existing or newly established cohorts

SC1-BHC-19-2019

Implementation research for maternal and child health

Research And Innovation Action

2-4 Mio €/project

TWO STAGE => 2nd of October 2018

Tip!

definition of „implementation research“ in footnote of topic

Specific Challenge:

- huge differences within countries in Europe and globally for maternal mortality rates and newborn health
- many evidence-based guidelines insufficiently implemented and integrated into routine training and service provision

Scope:

- „implementation research“ for improving maternal and child health, focus on first „1000 days“ from pregnancy until two years of age
- in high income or low and middle income countries, or combination
- new or improved health service delivery interventions that strengthen maternal and child health

and/or

- scaling up and/or adapting of existing evidence-based interventions to new contexts
- end-user involvement (women/fathers and community) policy makers, politicians, media…)

SC1-BHC-32-2019

Towards a next generation influenza vaccine to protect citizens worldwide – an EU-India collaboration

Research And Innovation Action

6-10 Mio €/project

SINGLE STAGE => 16th of April 2019

new topic! not online yet

Specific Challenge:

- vaccines against flu only moderately effective, and with certain limitations
- high priority for Europe and India, in recent years significant progress

Scope:

- advance next-generation influenza vaccine candidates with improved efficacy and safety, duration of immunity, and reactivity against an increased breadth of influenza strains
- cover at least preclinical and early clinical research, including validation in a „human challenge model“ of influenza
- suitability for low- or middle income settings
- at least three participants from India => Indian entities have to contact their national funding agency for funding

SC1-BHC-22-2019
Mental Health in the workplace

Research And Innovation Action

2-4 Mio €/project

TWO STAGE => 2nd of October 2018

Specific Challenge:

- absence from work and early retirement due to mental illness has increased
- healthy workplace important, more knowledge needed

Scope:

- to develop and implement interventions(s) to promote good mental health and prevent mental illness in the workplace
- newly developed, or improvement of existing ones
- assess individual and collective health outcomes and cost-effectivness
- multidisciplinary, including social sciences

Workplace!? => location inside or outside, virtual or physical, can also be home if you work there

SC1-BHC-25-2019

Demonstration pilots for implementation of personalised medicine in healthcare

Innovation Action

18-20 Mio €/project (!!!)

TWO STAGE => 2nd of October 2018

Tip!

very high budget and Innovation Action => expects more than a „normal“ research project

Specific Challenge:

- demonstrate the benefit of large scale deployment of personalised medicine to citizens and health care systems

Scope:

- pilot projects should demonstrate implementability and economic viability of personalised medicine approaches in real life health care settings
- focus on diseases with high burden to society (but primary focus on cancer and rare diseases excluded)
- coordination with local, regional and national authorities to introduce Personalised medicine approaches

SC1-BHC-28-2019

The Human Exposome project: a toolbox for assessing and addressing the impact of environment on health

Research and Innovation Action

8-12 Mio €/project

SINGLE STAGE => 16th of April 2019

Tip!

check out existing exposome projects for partners: https://humanexposomeproject.com/international-exposome-research-centers/

Specific Challenge:

- *„Genetics load the gun but environment pulls the trigger“*
- deciphering the human exposome => individual level exposure data to estimate the unknown environmental component of NCDs (non-communicable diseases)

Scope:

- funded projects should work together in a coordinated way for an overarching „Human Exposome Project“
- innovative approaches to the systematic and agnostic identification of the most important environmental risk factors
- new cohorts, and/or retrospective epidemiological studies
- …..

CONTENT AND DEADLINES 2019

Deadline Single Stage Topics

- Full proposal: **16th of April 2019**
- (with one exception: DTH-10-2019 on the 14th November 2018)

Call opens in June/July 2018 => all topics already online on the Participant Portal, but text might still change slightly

SC1-DTH-01-2019

Big data and artificial intelligence for monitoring health status and quality of life after the cancer treatment

Research And Innovation Action

3-5 Mio €/project

SINGLE STAGE => 24th of April 2019

Specific Challenge:

- importance of addressing, and if possible, preventing long-term effects of cancer is growing
- big data can provide new opportunities to define statistical and clinical significance

Scope:

- how to better acquire, manage, share, model, process and exploit big data to effectively monitor health status of individual patients
- for example combined effects of cancer treatment, environment, lifestyle and genetics on the quality of life
- information can be collected from “traditional sources” (e.g. cohorts, registries, health records…) or “new sources” (e.g. health apps, wearables…)

SC1-DTH-05-2019

Large scale implementation of digital innovation for health and care in an ageing society

Public Procurement of Innovation

2-5 Mio €/project

SINGLE STAGE => 24th of April 2019

Tip!

check out „EIP on AHA“ – European Innovation Partnership on Active and Healthy Ageing

Specific Challenge:

- scale up outcome-based innovative digital health and care solutions across EU borders through joining up actions in procurement of innovation
- large-scale deployment of digital health and care solutions remains limited (although already tested and demonstrated in small-scale settings)

Scope:

- to specify, purchase and deploy ICT based solutions for active and healthy ageing through a common supply and demand side dialogue
- many specifications in topic text!
- target group: health procurers!

SC1-DTH-09-2019

Scaling up the univocal identification of Medicinal Products

Innovation Action

5-8 Mio €/project

SINGLE STAGE => 24th of April 2019

Specific Challenge:

- not every medicinal product is available in each Member State, and often different names or same name may identify a different product in another Member State
- EU wide implementation of ISO IDMP standards is currently under way by EMA

Scope:

- support the cross border mobility of European patients by offering safer eDispensations across borders
- support the implementation of the IDMP standards in Member states drug databases
- develop common approach and operating model

SC1-DTH-10-2019
Digital health and care services

Pre-commercial procurement (PCP)

5-6 Mio €/project

SINGLE STAGE =>
14th November 2018 (!)

Tip!

check out existing PCPs, e.g.
https://proempower-pcp.eu/
https://stars-pcp.eu/

Specific Challenge:

- to network, lead and facilitate health systems research, innovation and digitisation to adress key areas of intervention in health and care services

Scope:

- support health and care service provider to procure the development, testing and implementation of digital health services and communication concepts
- to facilitate transition to integrated care models across health and social services and country-specific cross-institutional set-ups
- possible areas: patient empowerment, self-management, home-care logistics…and many more
- address by ICT approaches (mHealth, telemedicine…)
- target groups: procurers!

SC1-DTH-11-2019

Large Scale pilots of personalised & outcome based integrated care

Innovation Action

5-8 Mio €/project

SINGLE STAGE => 24th of April 2019

Specific Challenge:

- senior people at greater risk of chronic health conditions
- ensure truly personalised delivery of health and social care, promote shift towards outcome-based delivery of integrated (health and social) care

Scope:

- foster large-scale pilots for deployment of trusted and personalised digital solutions dealing with Integrated Care
- support and extend health and independent living for older individuals
- specifications in topic of expected outcomes and indicators

SC1-HCC-02-2019

Support for the large scale uptake of open service platforms in the Active and Healthy Ageing domain

Coordination and Support Action

up to 1,5 Mio €/project

SINGLE STAGE => 24th of April 2019

Specific Challenge:

- several open service platforms have been developed

Scope:

- deliver an inventory of the state of the art and analyse the use of open service platforms in the Active and Healthy Ageing domain, also address interactions
- plus long list of additional activities….

CONTENT AND DEADLINES

Deadline Single Stage Topics – only 1 topic!

- Full proposal: **14th of November 2018**

Call opens in June/July 2018 => topic already online on the Participant Portal, but text might change slightly

DT-TDS-01-2019

Smart and Healthy living at home

Innovation Action

15 - 20 Mio €/project

SINGLE STAGE =>
14th November 2018 (!)

Tip!

contributes to a „Focus Area: Digitising and transforming European industry and services“ => introductory text very important on „Platforms and Pilots“

Specific Challenge:

- foster large-scale deployment of integrated digital solutions which will bring improved quality of life to citizens
- demonstrate significant efficiency gains in health and care delivery across Europe

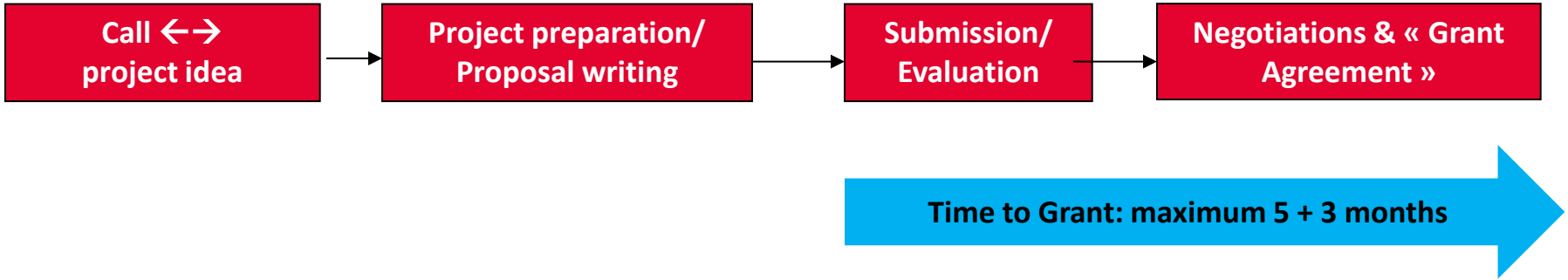
Scope:

- should address either
  - intelligent and personalised digital solutions for sustaining and extending healthy and independent living

  OR
  - personalised early risk detection and intervention
- pilots should build on open platforms and standardised ontologies and existing results
- and much more….

HOW TO PREPARE

PROJECT PREPARATION



PROPOSAL STRUCTURE – SINGLE STAGE VS TWO STAGE

1. Excellence
   - 1.1 Objectives
   - 1.2 Relation to the work programme
   - 1.3 Concept and methodology
   - 1.4 Ambition
2. Impact
   - 2.1 Expected impacts
   - 2.2 Measures to maximise impact
     a)Dissemination and exploitation of results
     b)Communication activities
3. Implementation
   - 3.1 Work plan - Work packages, deliverables
   - 3.2 Management structure, milestones and procedures
   - 3.3 Consortium as a whole
   - 3.4 Resources to be committed
4. Members of the consortium
   - 4.1. Participants (applicants)
   - 4.2. Third parties involved in the project (including use of third party resources)
5. Ethics and Security
   - 5.1 Ethics
   - 5.2 Security

1st stage => 10 pages!

3 Evaluation criteria

- Excellence => maximal 5 points
- Impact => maximal 5 points

1st stage => max 10 points

- Implementation => maximal 5 points

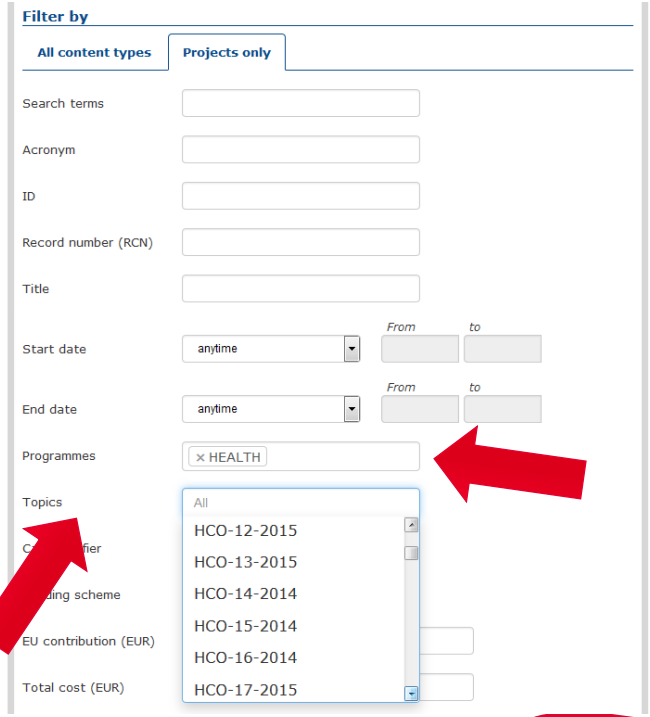
TWO STAGE DEADLINES - PROCEDURE

- page limit 10 pages
- “dynamic” threshold in Stage 1 => better control of success rate in Stage 2
- consensus meetings in Brussels also for Stage 1
- Information about Stage 1 result ~ January 2019
  - Successful proposals => receive only invitation to proceed to Stage 2
  - Rejected proposals: receive Evaluation Summary Reports (feedback)

EXAMPLES OF FUNDED PROJECTS

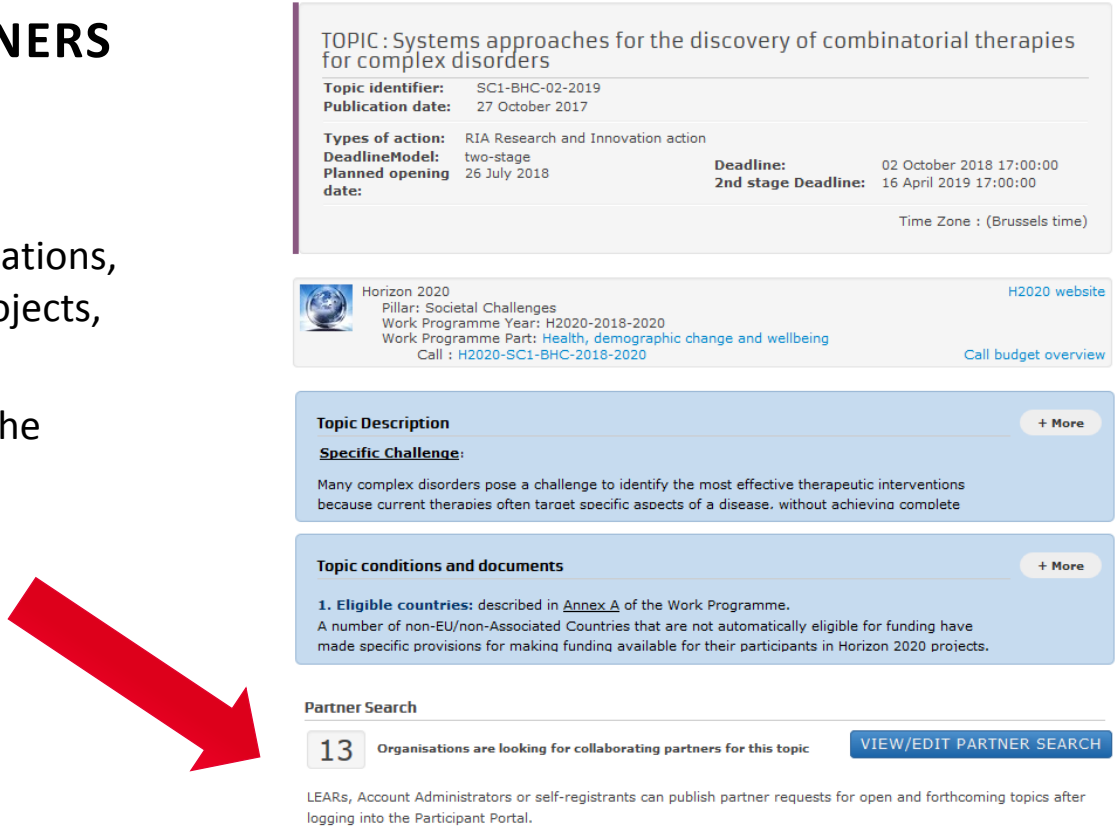
http://cordis.europa.eu/projects/home_en.html

=> Advanced Search, e.g. by topics:

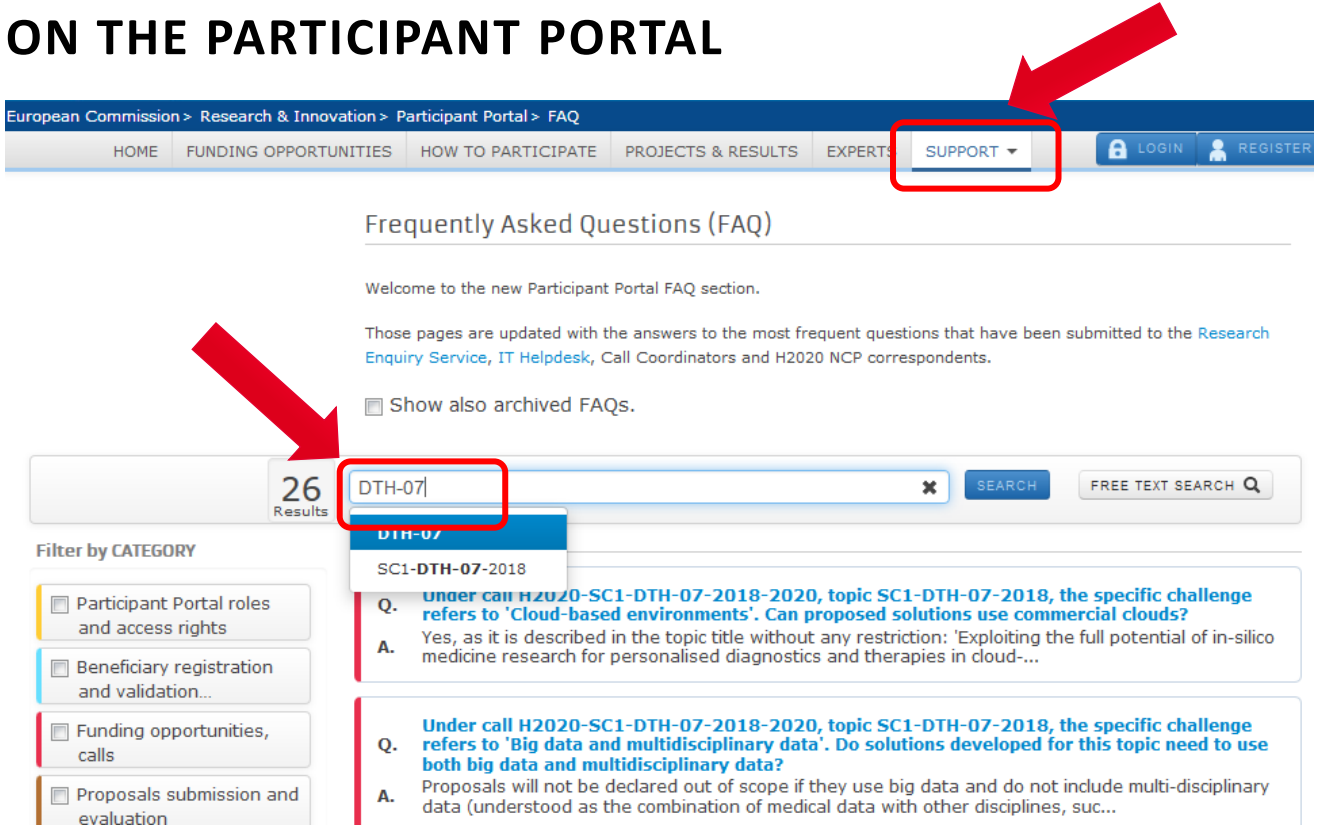


HOW TO FIND PARTNERS

- Use existing networks!!
- Search databases, publications, social media, existing projects, etc.
- New: Partnersearch on the Participant Portal



FAQs ON THE PARTICIPANT PORTAL



ANALYSIS, STATISTICS, LESSONS LEARNED

STATISTICS FOR AUSTRIA – HEALTH CHALLENGE

	Evaluated	Funded	Success Rate	Share of Austria in Total in %
Participants	837	**96**	11,5%	2,4%
Coordinators (in brackets: 1st stage rejections)	88 (+102)	**6**	6,8%	1,8%
Funding	435 Mio €	**44,6 Mio €**	10,2%	2,4%

OVERALL SUCCESS RATES

Single Stage Calls

- 2016 DG RTD Call: 10% success rate
- 2016 DG Connect Call: 16% success rate
- 2017 DG RTD Call: 16% success rate
- 2017 DG Connect Call: 5% success rate

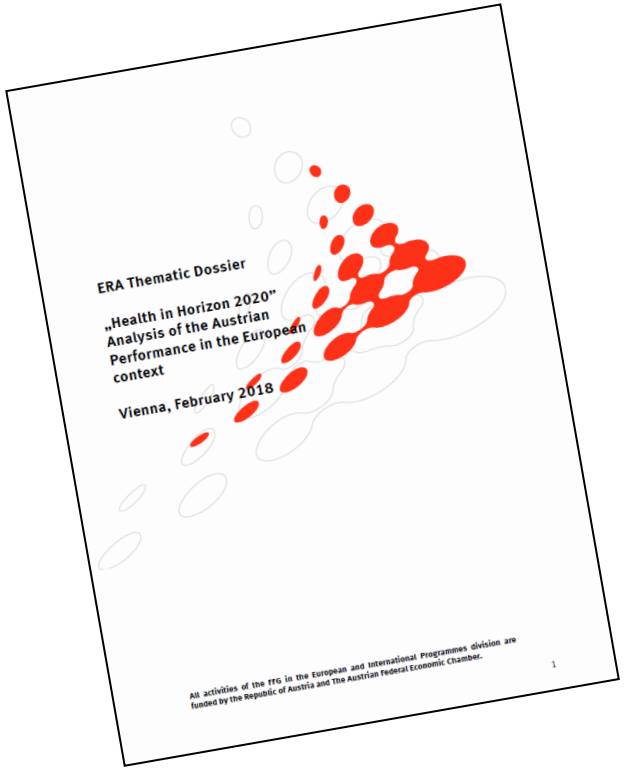
➢ these are average success rates!

➢ vary a lot depending on type of project, and topic!

Two stage Calls

- 2017 two stage call – 4 topics open:
  - 668 proposals submitted
  - 101 invited to 2nd stage => 15% success rate
  - 97 submitted to 2nd stage
  - 29 funded => 29% success rate

ANALYSIS AND STATISTICS



Inhalt

Link to download: https://www.ffg.at/sites/default/files/downloads/program_line/era_thematic_dossier_health_february2018_0.pdf

MAIN FINDINGS

General findings

- Health programme has changed in comparison to FP7 => e.g. broader topics, more clinical
- High enthusiasm at the beginning for this new approach
- SMEs (small and medium sized enterprises) more attracted to single company funding through „SME instrument“
- Most successful countries: UK, Germany, Netherlands, France and Italy
- Success rates were very low in first calls, but are rising again (e.g. better evaluation system for two stage calls)

Coordinators in Austria

- Numbers of successful Austrian coordinations have decreased
  - For more basic/preclinical research, researchers have „migrated“ to the ERC
  - For clinical topics, little capacity to coordinate at Medical Universities
  - Increasing frustration over the years
  - Proposal writing has „professionalised“
  - Tendency to join projects as partners instead

OTHER LESSONS LEARNED

Consortia

- „Geography“ not important any more
- many projects have several partners from one country
- if possible, involve end-users

US Partners

- many have been successful => ask for advice on legal and financial issues
- good as partners, but would not advice to coordinate

Reasons for failure

- most projects below threshold fail because of „Excellence“
- most projects above threshold (but not funded) lose crucial points in the „Implementation“ chapter!

Criterion „Excellence“

- most points lost on „Soundness and credibility“

Criterion „Impact“

- most points lost on „Measures to exploit and disseminate“
- when companies are involved: weak exploitation plans
- no end-user involvement

Criterion „Implementation“

- most points lost on „Coherence and effectiveness of work plan„ and on „Appropriateness of the Management“

OTHER FUNDING OPTIONS IN HORIZON 2020

Fast Track to Innovation

- thematically bottom-up
- 3-5 partners
- very close to the market
- Next deadlines: 31st of May and 23rd of October 2018
- Info and contact: ines.haberl@ffg.at
- https://www.ffg.at/ausschreibungen/h2020_fti

SME Instrument

- thematically bottom-up
- single company funding
- Phase 1 „Feasibility Study“, Phase 2 „Research and Innovation projects“
- 4 Deadlines/year for each Phase
- Info and contact: ines.haberl@ffg.at
- https://www.ffg.at/ausschreibungen/horizon2020_kmu

Innovative Medicines Initiative 2.0

- public-private initiative between EC and EFPIA
- Call 14 open, Deadline 14th of June 2018, **examples**:
  - Non-invasive clinical molecular imaging of immune cells
  - Development of a platform for federated and privacy-preserving machine learning in support of drug discovery
- Info and contact: astrid.flandorfer@ffg.at
- https://www.imi.europa.eu/apply-funding/open-calls/imi2-call-14

- many other **bottom up possibilities in ERC, MSCA, FET**
- or in **other cooperative programmes**…ICT, Nanotechnology, Advanced materials…
- **Active and Assisted Living Programme**

NETWORKING US AND AUSTRIA

ORDER OF PRESENTATIONS – 1 MIN EACH!

US

- Ignazio Marino – Overview for Jefferson University
- Adam Dicker – Jefferson University
- Mathew Thakur – Jefferson University

Austria

- Michael Jantsch – Medical University Vienna
- Lin Yang – Medical University Vienna
- Rokhsareh Rohban – Medical University Graz
- Piret Paal – Paracelsus Private Medical University
- Le Renard Pol-Edern – University Linz
- Jama Natequi – Symptoma
- Christopher Mayer – Austrian Institute of Technology
- Mario Heller – Center for Digital Health Innovation, FH St. Pölten
- Jorge Sepulveda - OncoQr
- Harald Schnidar - Scarletred
- Attila Kelemen - Proself International Inc
- Christoph Magnes - Joanneum Research Health
- Christian Gold - University of Bergen/Vienna
- Johannes Holfeld - Medical University Vienna

US

TJU-Jefferson Health

What we are, What we do

Ignazio R. Marino, MD, ScD

Professor of Surgery, Sidney Kimmel Medical College, Thomas Jefferson University

Senior Vice President for Strategic Affairs, Thomas Jefferson University and Jefferson Health

Philadelphia, PA, United States of America

ignazio.marino@jefferson.edu

Thomas Jefferson University – Jefferson.edu / JeffersonHealth.org

- Home of Thomas Jefferson University and the Sidney Kimmel Medical College
- 9 colleges and 4 schools spanning **medicine, science,** but lately also architecture, design, fashion, textiles, business, engineering and more
- 160 undergraduate/graduate programs, 7,800 students, 1,070 medical student rotations, 1,300 residents and fellows
- Ranked by U.S. News & World Report as **the nation's 16th Best Hospital; nationally ranked in 11 clinical specialties**
- **13 hospitals**, 2,824 licensed beds, 6,000 physicians and practicioners, 7,200 nurses
- 50+ outpatient and urgent care locations and 3 million outpatient visits
- NCI-designated Sidney Kimmel Cancer Center
- Over **110 million USD in public/private research funding**

Jefferson Health - Among the Top 10 in:

- Ear, Nose & Throat
- Ophthalmology (*Wills Eye Hospital*)
- Orthopedics (*Rothman Institute, Philadelphia Hand to Shoulder Center*)

Nationally (U.S.) Ranked Specialties

- Cancer (*Sidney Kimmel Cancer Center)*
- Cardiology & Heart Surgery
- Diabetes & Endocrinology
- Gastroenterology & GI Surgery
- Geriatrics
- Nephrology
- Neurology & Neurosurgery (*Vickie & Jack Farber Institute for Neuroscience)*
- Urology

Progress

Jefferson is currently focusing on the following upcoming topic calls:

- **SC1-BHC-15-2018** Implementation Research for Maternal and Child Health (*slides 4-5*)
- **SC1-BHC-02-2019** System Approaches for the Discovery of Combinatorial Therapies for Complex Disorders (*slide 6*)

Some deadlines have not been met, for lack of time and/or eligible partners:

- **SC1-BHC-18-2018** Translational collaborative cancer research between Europe and the Community of Latin American and Caribbean States (CELAC) (*see Dr. Thakur's slide*)
- **SC1-BHC-09-2018** Innovation platforms for advanced therapies of the future (*slide 7*)

Several other major research projects could not find a perfect fit within the topic calls, but remain worth attention and international consideration (e.g.: *slides 8-10*)

Cerclage for Short Cervix in Singleton Gestations without Prior Spontaneous Preterm Birth: a multicenter randomized clinical trial

Aim: In Europe millions of babies are born preterm every year, causing tens of thousands of deaths, as well as long-term disability in the survivors. Our project will prove whether or not cervical cerclage may prevent preterm birth in women with singleton gestations without prior preterm birth and with short cervical length. It is estimated that, given 130 million births per year, and given that 2% have a short cervix, over 2 million pregnant women worldwide have this condition annually. As cerclage has been shown to decrease preterm birth and perinatal death by about a third in similar populations, if cerclage is shown to be successful thousands of babies would be saved. National and international guidelines would be changed. Cervical length screening would become routine. Cerclage is easy to perform, and transfer to the bedside worldwide would be easily implemented.

Possible International Partners:

- Università di Napoli Federico II, Naples, ITALY
- Catholic University of the Sacred Heart, Rome, ITALY
- Thomas Jefferson University, USA

Lead Jefferson's investigator: Vincenzo Berghella vincenzo.berghella@jefferson.edu

Preventing Septic Shock in Post-Partum Women

Aim: Design, test and refine an innovative community-based approach, which integrates mHealth technology, to accurately identify postpartum women with signs and symptoms of infection or sepsis (3rd leading cause of maternal death worldwide). Refer study participants that meet criteria for a suspect case of maternal infection or sepsis to medical providers for diagnosis and treatment and obtain diagnosis and treatment information from providers;

Assess project cost and benefits and impact related to timeliness of referral, disease stage at diagnosis, and timeliness of treatment; and

Generate and analyze *SOS4Sepsis* data, present findings and determine adequacy for proof of concept and justification of a subsequent multi-site, multi-country clinical trial.

Possible International Partners:

- Thomas Jefferson University, Philadelphia, PA, USA
- Benten Technologies Inc., VA, USA
- Gondar University, ETHIOPIA
- King's College, London, ENGLAND
- Dublin Institute of Technology, IRELAND
- The Society for Infectious Diseases in Obstretrics & Gynaecology, BELGIUM

Lead Jefferson's investigator: Richard Derman richard.derman@jefferson.edu

SC1-BHC-15-2018 Implementation Research for Maternal and Child Health

Attacking Disease-Driven Pharmaco-resistance in Amyotrophic Lateral Sclerosis (ALS). A Therapeutic Strategy to Enhance Delivery and Efficacy of ALS Therapeutics

Preamble. In Europe, ALS kills more than 8,000 people annually with health care costs of 596 Million Euro. Jefferson has been the first to discover drug-efflux transporters-driven pharmaco-resistance in ALS and its impact on drug delivery.

Aim. Study the role of P-gp and BCRP drug efflux transporters in limiting the effective treatments for ALS. The ultimate goal is to develop and characterize P-gp/BCRP inhibitors to be used in combination with ALS therapeutics.

Project development

Phase 1 - P-gp/BCRP as ALS Biomarkers: Towards Personalized Medicine in ALS Patients
Phase 2 - Riluzole: a Proof-of-Principle Drug to Develop a Combinatorial Therapy for ALS
Phase 3 - Blocking and Tracking Pharmaco-resistance in ALS Patients: An International Multi-Center Clinical trial

Possible international Partners

- Vickie and Jack Farber Institute for Neuroscience, Weinberg ASL Center, Thomas Jefferson University, Philadelphia, PA, USA
- ASC Center, University of Turin, Turin, ITALY
- Vesalius research Center, University of Leuven, BELGIUM

Lead Jefferson Investigator: Piera Pasinelli piera.pasinelli@jefferson.edu

Engineering of efficient cytolytic effectors to target melanoma malignancies

Aims. 1- To develop TCR- or antibody-based CARs specific for defined pMHC ligands presented on melanoma cells. Such approach requires the identification of TCR or TCR-like antibodies specific for melanoma epitopes restricted by common human HLA alleles. Identification of new epitopes would be essential to develop potent effector T cells endowed with CARs capable to recognize melanoma-associated pMHC ligands with minimal on-target and off-target toxicity.

2- To determine which format of CAR would be more advantageous to trigger signaling leading to more potent and sustained response against tumor cells in vitro and in a mouse model.

Possible International Partners

Dept of Dermatology, Charité Universitaetsmedizin, Berlin, GERMANY

Dept. of Microbiology, Thomas Jefferson University, Philadelphia, PA, USA

Immunology Center, Marseille-Luminy, Marseille, FRANCE

Jefferson Principal Investigator: Yuri Sykulev yuri.sykulev@jefferson.edu

Proposal for Multinational Co-operative Research Program on Epidermolysis Bullosa as a Paradigm of Rare Heritable Skin Disorders

Aim: to study an orphan disease such as Epidermolysis bullosa (EB) for new diagnostic means, development of animal models and preclinical treatment development culminating in clinical trials for rare diseases.

Program Development

- Development of advanced next generation sequencing platforms towards identification of novel genes and new mutant alleles
- Generation of animal models for different types of EB by advanced CRISPR/Cas9 technology
- Use of mouse models for preclinical treatment development within the realm of precision medicine based on identification of specific mutations
- Clinical trials to test novel treatments
- Formalization of patient registries in Europe and in the U.S. with exchange of phenotypic and genotypic information

Possible International Partners

- Istituto Dermopatico dell'Immacolata, Rome, ITALY
- Bambino Gesù Pediatric Hospital, Rome, ITALY
- Department of Dermatology, Freiburg Medical Center, Freiburg, GERMANY
- Paracelsus Medical University, EB-Haus, Salzburg, AUSTRIA (!)
- Department of Dermatology and Cutaneous Biology, Jefferson, Philadelphia, PA, USA

Lead Jefferson's investigator: Jouni Uitto jouni.uitto@jefferson.edu

Development of Artificial Intelligence Systems for AOSpine Injury Classification (AIS-AOS)

Aim: We propose to develop a computer-aided diagnosis system named AIS-AOS employing deep learning techniques originating from the field of artificial intelligence (AI) such that an automated injury classification of spinal traumas can be provided based on regular CT-scan images.
Specifically, the AIS-AOS will provide:
1) automatic classification and localization of the thoracolumbar vertebral fractures caused by trauma according to AOSpine classification system and
2) automatic segmentation and labeling of the vertebrae in CT images.

Major benefits: the classification of trauma patterns could be faster and more reliable; trauma surgeons with less experience in the biomechanics and pathology of the complex spinal column will be able to provide adequate care. This project also shows the way for the development of a productive joint venture between surgeons and high-tech world.
500-1000 cases will be used as datasets to analyze.
At the end of the project an AIS-AOS software package will be available as a first release.

Possible International Partners

- *Project Coordinator* AOSpine Knowledge Forum Trauma, AO Foundation, Davos, SWITZERLAND
- Image Sciences Institute and the Department of Orthopedics, UMC Utrecht, NETHERLANDS
- Rothman Institute at Jefferson, Philadelphia, PA, USA https://www.rothmaninstitute.com/

Lead Jefferson's investigators: Irving Shapiro irving.shapiro@jefferson.

Alex Vaccaro alex.vaccaro@rothmaninstitute.com

Rabies Virus-Based Vector (RABV) Vaccine Platform

Preamble. Jefferson has established a world class consortium which can rapidly develop, test and manufacture new vaccines against emergent pathogens and move them into clinical trials. NIH currently supports the development of the RABV-based vaccine against Ebola virus, Sudan virus and Marburg virus vaccine with $ 30 million.

Aim. To further develop our deactivated RABV vector vaccine platform to produce and characterize RABV-based vaccines against Lassa fever virus, MERS-CoV, SARS-CoV, Nipah:

We would produce and store MVS of vaccines against viral pathogens with a high potential to emerge as serious health threats of large population groups.

We will establish, and have in place, a fast track system to clone and recover new constructs for novel identified pathogens within weeks of a new disease threat being identified and shortly thereafter provide well characterized MVS utilizing novel technology such as deep sequencing.

We will work closely with a BSL4 laboratory in parallel to analyze such novel vaccines against those new emerging pathogens in the appropriate animal models utilizing the required biosafety level and skills (e.g. BSL4).

We have partners to move the novel vaccine rapidly thought clinical phase 1, 2 and 3.

Possible International Partners

-IDT Biologika GmbH, GERMANY

-QuintilesIMS (now IQVIA), Clinical trial with multiple offices in EUROPE

-Jefferson Vaccine Center, Thomas Jefferson University, Philadelphia, PA, USA

Lead Jefferson's investigator: Matthias Schnell matthias.schnell@jefferson.edu

Contact information

- GENERAL INQUIRIES ignazio.marino@jefferson.edu
- RARE HERITABLE SKIN DISEASES, EPIDERMOLYSIS BULLOSA jouni.uitto@jefferson.edu
- PROSTATE CANCER LIQUID BIOPSY madhukar.thakur@jefferson.edu
- ARTIFICIAL INTELLIGENCE FOR SPINE INJURIES alex.vaccaro@rothmaninstitute.com
- MOTHER CHILD HEALTH – PREVENTION OF PRETERM BIRTH vincenzo.berghella@jefferson.edu
- MOTHER CHILD HEALTH – PREVENTING SEPTIC SHOCK richard.derman@jefferson.edu
- RABIES VIRUS-BASED VECTOR VACCINE PLATFORM matthias.schnell@jefferson.edu
- PHARMACO RESISTANCE IN ALS piera.pasinelli@jefferson.edu
- MELANOMA yuri.sykulev@jefferson.edu

http://www.jefferson.edu/ **http://www.jeffersonhealth.org/**

Harnessing Digital Phenotyping and Patient-Reported Outcomes to Improve Personalised Medicine

Healthcare Innovation & Precision Medicine

- Learning healthcare systems, Design thinking for Health, Interdisciplinary Innovation, Precision Medicine

AI in Health Systems

- Data Science, Machine Learning, Artificial Intelligence, Business Analytics, Population Intelligence, Data Analytics, APACHE, Spark, Scala,

Digital Health and Telemedicine

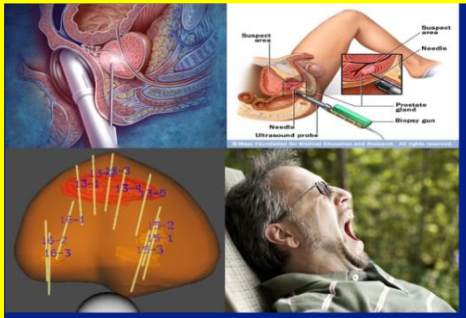
- Wearables, biometric sensors/ activity trackers, patient-reported outcomes, cloud computing, digital education, social media

- Facilitate collaboration & networking efforts for digital health projects between academic institutions and stakeholder partners
- Accelerate exchange between researchers and industry
- Maximize opportunities for collaboration, learning and data sharing

Contact: Adam P. Dicker, MD, PhD
adam.dicker@jefferson.edu

Potential Contributions

- **Knowledge** science of Digital Health and patient reported outcomes
- **Access** to academic research facilities, data scientists, health care professionals, patients, medical students, and health economists
- **Educational courses:** Intro to Design Thinking and Innovation in Healthcare, Digital Health Research Methods, Foundations of Data Science, Healthcare Leadership, Machine Learning and AI, Biometric Sensors and Wearable Technology in Healthcare, Principles of user experience (UX) and user interface (UI), Business of Startups, Intro to US Healthcare System Innovation, Patient-Centered Outcomes
- Executive **MS** in Digital Health
- Collaborations with FDA and Pharma



Prostate Cancer – Clinical Dilemma – II

Biopsy or not to Biopsy?

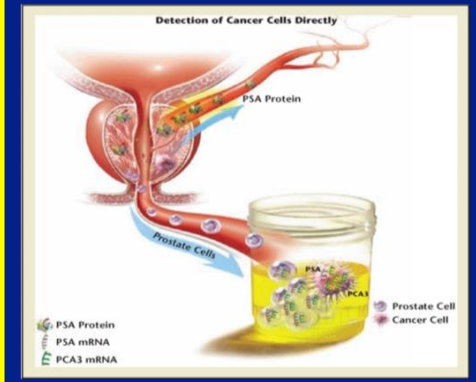
Thou shall Think Twice!

Great strides have been made (TRUS, CT, MRI, PET, SPECT) in imaging prostate cancer (PC), but suffer from serious limitations:

- Invasive biopsy with 10-12 tissue specimens still remains a gold standard of diagnosis
- Greater than 66% biopsies (> 1.5 million) find benign pathology at the expense of severe patient morbidity and billions of healthcare dollars

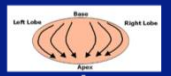
Biopsy procedures

TP4303 Urine Screen



ATTENTIVE DRE
(3 stroke/lobe)

XX



cell shedding

XX

First 20-30 mL urine sample

XX

Measure PCA3 and PSA mRNA from cells

Thakur ML et al work in progress.

IRB EXEMPTION

Optical Imaging of PCa (CTC /Liquid biopsy)

Hypothesis

- In 1869 (148 yrs. ago) ,Thomas Ashworth, a Australian pathologist reported cells similar to those in tumors, in blood of a patient. (a)
- A growing one gram tumor sheds 3-4x10^6 cells every 24 hrs. (b)

- We hypothesize that VPAC1 receptors on these cells collected from certain biofluids can be targeted to serve as an early screening test for Neoplasia

- In case of PCa, part of these cells are released into urethra through prostatic ducts and become available in Urine.

(a) Ashworth TR, (1869), *Australian Medical Journal*. **14:**146
(b) Thomas BP, et al, (1975), *Cancer Research*. **35**:512-26.

VPAC Targeted Urine Analysis

M. L. Thakur, PhD

Jefferson

AUSTRIA

Michael F. Jantsch
Medical University of Vienna
Center of Anatomy and Cell Biology, Division of Cell- and Developmental Biology, https://tinyurl.com/yb4dnhq5
Michael.Jantsch@muv.ac.at

Research Interests of Division: Epigenetics, Epitranscriptomics, Nuclear Dynamics, Tissue Engineering

Rationale:

Chemical modifications in RNA (Epitranscriptomic marks) alter the (coding). function of transcripts (RNA).

Modifications change in response to environmental, developmental or infectious triggers.

RNA-modifications have physiological consequences

Value: Epitranscriptomic marks can be used as diagnostic and prognostic markers (brain, cancer, infection, cardiovascular).

Study of Epitranscriptomic marks gives a handle to control physiology

Interest in: SC1-BHC-10-2019 Innovation Procurement: Next generation sequencing (NGS) for routine diagnosis – PCP/PPI

Function: Partner

Specific expertise:

Detection of chemical modifications in the transcriptome

NGS and bioinformatics

Use of model systems with impaired epitranscriptomic marks.

Funding and scientific output: https://orcid.org/0000-0003-1747-0853

Lin Yang, Assistant Professor of Epidemiology

Medical University of Vienna

- SC1-BHC-30-2019 Towards risk-based screening strategies in non-communicable disease – RIA
- SC1-BHC-18-2019 Translational collaborative cancer research between Europe and the Community of Latin American and Caribbean States (CELAC) – RIA
- SC1-BHC-22-2019 Mental health in the workplace – RIA
- Demonstration pilots for implementation of personalized medicine in health care –IA
- The Human Exposome Project: a toolbox for assessing and addressing the impact of environment on health – RIA
- SC1-DTH-01-2019 Big data and Artificial Intelligence for monitoring health status and quality of life after the cancer treatment – RIA
- SC1-DTH-05-2019 Large scale implementation of digital innovation for health and care in an ageing society – PPI
- SC1-DTH-11-2019 Large Scale pilots of personalized & outcome based integrated care – IA
- SC1-HCC-02-2019 Support for the large scale uptake of open service platforms in the Active and Healthy Ageing domain - CCA

I would like to contribute as partner with the following key expertise

Transdisciplinary research method

Epidemiology study design

Obesity and nutrition

Physical activity and sedentary behavior

Cancer prevention

Cancer survivorship

Contact details: lin.yang@muv.ac.at (email); +43 (0)1 40160 -34705 (phone)

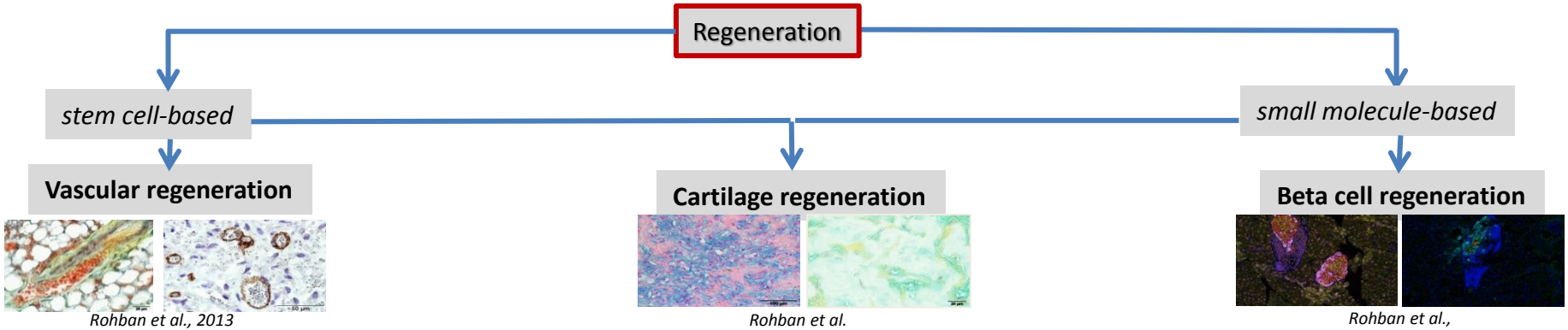
Horizon 2020 - Call 2019

Name and Surname: Rokhsareh Rohban
Degree: Ph.D. in Molecular Medicine - Stem Cell Research and Regenerative Medicine
Organization: Dept. Endocrinology, Medical University of Graz, Austria (https://www.medunigraz.at)
and CBmed Competence center, Graz, Austria (http://www.cbmed.org)

Interested in Topic: Regenerative medicine: from new insights to new applications
(SC1-BHC-07-2019)

I would like to contribute as a coordinator and/or partner with the following expertise:
**Digital Pathology, Multiplex IHC, Transplantation, Mouse models,
Differentiation/transdifferentiation studies ex vivo and in vivo**

Contact detail: **Email** rokhsaren.rohban@medunigraz.at rokhsareh.rohban@cbmed.at
Tel +43 316 385 72896 **Mobile** +43 664 422 7875



PARACELSUS
MEDIZINISCHE PRIVATUNIVERSITÄT

1.4. Innovative health and care systems - Integration of care

- SC1-BHC-22-2019 Mental health in the workplace – RIA
- We would like to contribute as partner with the following key expertise: Resilience, Ethical Leadership, Spirituality/Religion in nursing, multiprofessional setting, palliative care, nursing homes, etc.
- Please contact Mrs. Piret Paal, piret.paal@pmu.ac.at or Mrs. Sari Firuzan, firuzan.sari@pmu.ac.at

Name:
Dr. Le Renard, Pol-Edern

Organisation:

Department of Gynecology, Obstetrics and Gynecological Endocrinology
JOHANNES KEPLER UNIVERSITÄT LINZ - Kepler Universitätsklinikum GmbH

Description:

Research Institute - clinical university

Topics:

SC1-BHC-10-2019: Innovation Procurement: Next generation sequencing (NGS) for routine diagnosis
SC1-BHC-19-2019: Implementation research for maternal and child health
SC1-BHC-28-2019: The Human Exposome Project

I would like to contribute as **partner** with the following key expertise:

- Clinical studies (retrospective, pregnancy)
- sequencing/3rd generation
- Endocrinology (fertility, endometriosis, intracrinology, perturbators)
- Assited reproductive technology (ART)

Contact Details: Phone: +43 (0)5 7680 84; E-Mail: pol-edern.le_renard@jku.at

SC1-DTH-10-2019-2020:
Digital health and care services

Organisation: Symptoma GmbH

Name: Dr. med. univ. Jama Nateqi

Description: symptoma.com is a search engine for diseases.

Role: Coordinator

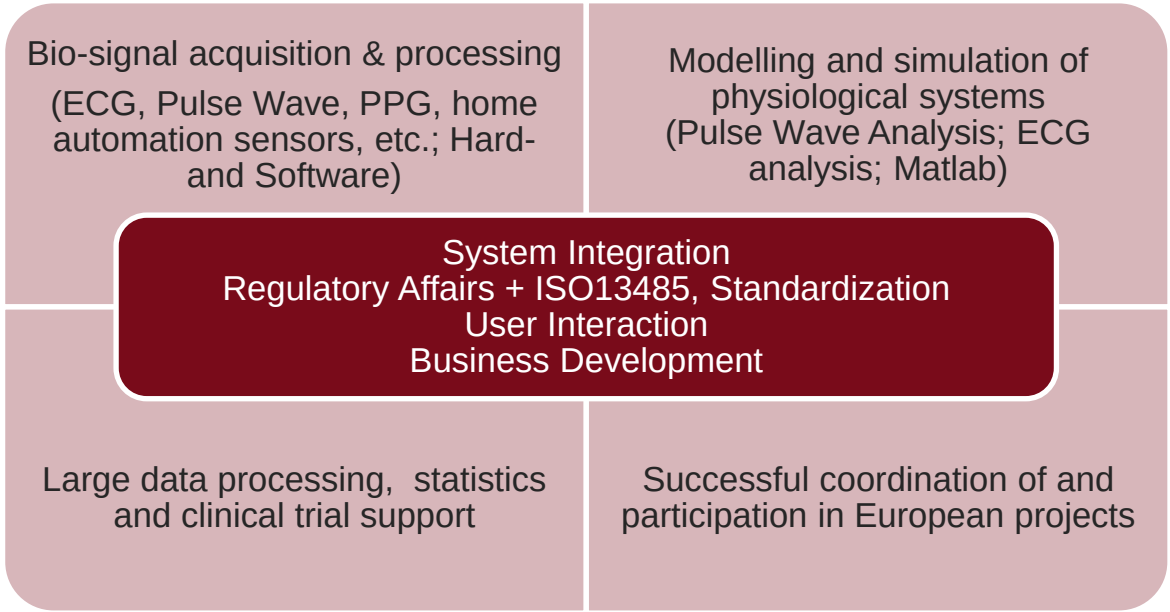
Expertise: Diagnostic decision support, Machine Learning, Patient empowerment, Chatbot, Cognitive intelligence

Contact: nateqi@symptoma.com , +436509133377

AIT AUSTRIAN INSTITUTE OF TECHNOLOGY

- AIT Austrian Institute of Technology, Center for Health & Bioresources, Biomedical Systems
- Austria's largest non-university research institute, is among the European research institutes a specialist in the key infrastructure issues of the future

- Topics:
  e.g., SC1-BHC-01-2019,
  SC1-BHC-25-2019,
  SC1-DTH-11-2019, etc.
  (open for all calls)
- Partner or coordinator
- Contact:
  DI Dr. Christopher Mayer
  Christopher.mayer@ait.ac.at
  +43 50550-4833



CDHI - Center for Digital Health Innovation - St. Poelten UAS

Center for Digital Health Innovation

fh st.pölten

- Mario Heller; CDHI - Center for Digital Health Innovation - St. Poelten UAS, Lower Austria, Austria
- The St. Poelten UAS is locally anchored, globally connected and stands for qualitative academic research & education in six departments (four within CDHI: *media & digital technologies*, *computer science & security, health sciences*, and *social sciences*)
- T1: SC1-BHC-25-2019: Demonstration pilots for implementation…
- T2: SC1-DTH-11-2019: Large cale pilots of personalised & outcomes…
- T3: DT-TDS-01-2019: Smart and healthy living at home…
- Contribution as **partner** with the following key expertise:
  - design & prototype ICT for social care and health;
  - collect & analyze health & social data;
  - assess & evaluate user experience & health impact
- E: mario.heller@fhstp.ac.at; I: https://cdhi.fhstp.ac.at/, P: +43 676 847 228 682

Name Jorge Sepulveda
E-Mail: Jorge.sepulveda@oncoqr.com
F: +43 66473455671

Who we are:	An Austrian start-up company
What we do:	Immunotherapeutic vaccines (initial targets: auto-antigens)
What is our selling point:	By using our platform, poor immunogens become good immune activators
How we do that:	Our 2 –module system targets B-cells and pDc inducing a strong antibody and cellular response
Topic of interest:	**Co-developing vaccines for the indication of Infectious disease (e.g. influenza, antibiotic resistance bacteria, etc.).**

SCARLETRED.com

We are a Vienna based digital health company transforming Dermatology

Our awarded CE medical device software enables objective remote skin monitoring and digital analysis in >3000 skin conditions

PROJECT COORDINATOR OR PARTNER

Dermatology
Preclincal R&D and Ph I-IV
Skin drug safety and efficacy
Patient reported outcome

Our focus under H2020

DIGITAL TRANSFORMATION IN HEALTH AND CARE

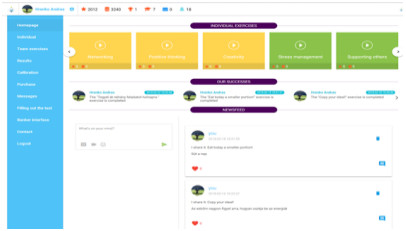
- **SC1-DTH-10-2019/20 Digital health and care services – PCP**
- **SC1-DTH-05-2019 Large scale implementation of digital innovation for health and care in an ageing society – PPI**
- **SC1-DTH-11-2019 Large Scale pilots of personalized &outcome based integrated care – IA**

SCARLETRED Holding GmbH
Campus-Vienna-Biocenter5, 1030 Vienna, Austria
CEO & Founder, Harald Schnidar PhD MBA
harald.schnidar@scarletred.com

ADVANTAGE AUSTRIA WKO

ProSelf International Inc. We are for you

- Attila Kelemen CEO, ProSelf International Inc. Vienna
- ProSelf International Inc. is an ICT company.
- Our software, SOLARIS is a WELL-BEING personal assistant program. ProSelf's SOLARIS intelligent system unites human studies, such as results of positive psychology, with technological innovations. With its guidance, people are being prepared for changes in their lifestyle, and are supported to find personalized solutions. It allows real-time analytics and interventions using self-learning algorithms to ensure precise prognosis on an individual level. The SOLARIS database contains 500+ WELL-BEING techniques. This base is continuously growing. The algorithm assembles a personal WELL-BEING packet for each user. Among the tasks, there are tasks to urge someone to do daily activities, project based tasks and tasks that can be done individually and in groups too.
- SOLARIS quantifies well-being in terms of social relationships, feelings of self-worth and self-determination.
- We are interest in topic SC1-BHC-22-2019 Mental health in the workplace – RIA
- I would like to contribute as partner with the following key expertise: quantifies self, WELL-BEING, smart working
- Contact details: attila.kelemen@proself.org. +43 664 1951 425



JOANNEUM RESEARCH Bioanalytics

- Mass spec-based metabolomics
  - Untargeted, targeted metabolomics
  - Data processing
  - Bioinformatics
  - Statistics, data-interpretation
- Bioanalytics
  - LC-MS/MS, LC-HRMS (Orbitrap), GC-MS/MS
  - Immunochemical assays
  - Drug analytics, biomarker analytics
- Method development, method validation
- Lab-automatisation – high-throughput

www.joanneum.at/health

References (open access)

- Nat. Med 2016 Dec;22(12):1428-1438. Cardioprotection and lifespan extension by the natural polyamine spermidine
- Diabetes. 2017 Feb;66(2):272-286. Adipocyte Glucocorticoid Receptor Deficiency Attenuates Aging- and HFD-Induced Obesity and Impairs the Feeding-Fasting Transition.

christoph.magnes@joanneum.at

Improving maternal and child mental health worldwide

- Name: Christian Gold, PhD, principal researcher, professor
- Organisation: Uni Research Health, now part of NORCE
  - a non-profit research institute with 900 employees
  - headquarters in Bergen, Norway; 1 research group in Vienna, Austria
  - research on energy, society, environment, climate – and health
- Background/expertise:
  - Multinational clinical trials of complex interventions (e.g. non-pharmacological therapies, nutrition supplements)
  - Ongoing and completed trials on maternal and child health, including in low- and middle income countries
- Interest:
  - Participate as partner and work package leader
  - Topic: «Implementation research on maternal and child health (SC1-BHC-19-2019)»
  - Idea: long-term follow-up and implementation study of trials above
- Email: christian.gold@uni.no; phone: +47-97501757 or +43-699-11240657

Interest in topic:

SC1-BHC-07-2019 Regenerative medicine: from new insights to new applications

Contribution: Coordinator

Expertise: Myocardial Regeneration, Cardiac Shockwave Therapy,

Entrepreneurship, Medical device production and development

Clinical Trials, Experimental Research, Biomarker Research

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THANK YOU FOR YOUR ATTENTION