DIALOGUE AND PARTICIPATION

D1.5 PROJECT INFRASTRUCTURE REPORT 3

ASSET Project • Grant Agreement N°612236

ASSET

Action plan on SiS related issues in Epidemics And Total Pandemics

7th RTD framework programme

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ASSET Action plan on Science in Society related issues in Epidemics and Total pandemics

DOCUMENT MANAGEMENT

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Report D1.5 Project Infrastructure Report 3

Task: T1.3 Project Infrastructure

Leader: ZADIG – Other contributors: ABSISKEY,ISS

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EXECUTIVE SUMMARY

ASSET (Action plan in Science in Society in Epidemics and Total pandemics) is a 48 month Mobilisation and Mutual Learning Action Plan (MMLAP), which aims to:

 1) forge a partnership with complementary perspectives, knowledge and experiences to effectively address scientific and societal challenges raised by pandemics and their associated crisis management

2) explore and map SiS-related issues in global pandemics

3) define and test a participatory and inclusive strategy to succeed

4) identify necessary resources to make the action sustainable after the project's completion.

This report describes the two pillars that sustain the ASSET network: the virtual space of interaction (the Community of Practice) and the EU-funded MMLAPs virtual cluster.

Both activities started at the end of 2014, suffering from an overall project delay due to the project coordinator change: the entire ASSET project started de facto in the second half of the first year (2014).

However, once the work started, the activity soon became intense and the Community of Practice (ASSET CoP) confirmed for the entire duration of the project its crucial role as an internal communication tool for the ASSET partners. From August 2014 to December 2017, the total login to CoP was 65.542, with an average of 1,600 accesses per month.

As for the MMLAP virtual cluster, over the course of three and a half years of activity, ASSET has continued to look for and identify projects to share a common reflection on methods and content. All coordinators of the projects identified were contacted and many responded and visited our community of practice. The website reports today a graphic representation of the virtual cluster, which now counts 39 projects. All were invited to attend the brokerage event (see D9.2).

1. INTRODUCTION

This report describes the two lines of activities as requested by the DOW.

"The project infrastructure is a virtual place of interaction that encourages the transfer of knowledge, the development of new ideas, the re-framing of problems, and the finding of original solutions. The project infrastructure includes:

- An online system for discussing and voting on proposals about topics, issues, and opportunities to be addressed as they emerge during the Action. We will adopt anopen-source software, powering internet platforms for proposition development and decision making. The system should combine concepts of a non-moderated, self-organized discussion process (quantified, constructive feedback) and liquid democracy (delegated or proxy voting). The main goal is to facilitate a transparent and participatory discussion, allowing multi-actor cooperation and transfer of knowledge among partners. Initially the platform will be restricted to project partners, yet we will progressively extend access to stakeholder representatives as they are involved in the project, thus injecting them into the core of the Action Plan, creating a wider community and crossing sectors, disciplines, levels (local, national, supranational), and areas both geopolitical and cultural. A Beta Version of the platform will be available by m6.

- An ongoing, informal, MMLAP virtual cluster that may facilitate the exchange of experiences with other MMLAPs and promote best practices. The MMLAP virtual cluster will provide a rare opportunity to learn from others with whom ASSET partners may not interact on a regular basis and to learn from their experiences in MMLAPs. Learning from other MMLAPs should not focus only on infectious outbreaks and related crises, but on how others have tried to achieve their goals in other fields such as environment, education, agriculture, etc. (e.g., what works and what does not work in participatory practices, training, and communication with stakeholders). In order to identify the best practices, the task leader will contact MMLAP coordinators and relevant partners, exchange documents, and ask each MMLAP to appoint a liaison officer with ASSET. To the greatest extent possible we will then try to establish a database, which will be hosted on the ASSET website and will be made accessible to the ASSET partners and to all the MMLAPs that have accepted to participate in the cluster exercise.This will also be done in order to develop a 'RRI momentum' early in Horizon2020. The Beta Version of the virtual cluster will be online by m12. The virtual cluster will run for the whole project life".

2. THE COMMUNITY OF PRACTICE PLATFORM

In order to encourage intense long-distance exchange, which makes up the project's essence, we have created a place of virtual interaction called the project Community of Practice, CoP (http://community.asset-scienceinsociety.eu/) that (as indicated on the Dow) has encouraged the transfer of knowledge, the development of new ideas, the re-framing of problems and the finding of original solutions.

The CoP is based on an open-source software, MOODLE, which powers internet platforms for proposition development and decision making. The system combines concepts of a non-moderated, self-organized discussion process (quantified, constructive feedback) and liquid democracy. ASSET's Community of Practice platform has been therefore an online system with many personalized services tailored to meet ASSET requirements: for each WP and for the various stakeholders, a forum was set up to discuss proposals on topics, issues and opportunities as they emerged during the project.

If during ASSET's first year of activity the CoP was limited to project partners, over time we progressively extended access to stakeholder representatives as they were involved in the project, thus injecting them into the core of ASSET's action plan, creating a wider community and crossing sectors, disciplines, levels (local, national, supranational) and geopolitical and cultural areas.

The CoP is not the only ASSET internal communication tool: in fact, many contacts still go through ordinary e-mail. Moreover, every day the CoP system sends to all registered individuals a digest (in the chosen language) with the contributions received in the previous 24 hrs: in this way, all the ASSET participants do receive the info with the contents of the contributions. If full info are required or access to deposited files, then the user can click on the mail message and enter the CoP. Thus, the CoP accesses only cover a portion of internal ASSET contacts.

In conclusion, the Community of Practice combines the best automatic functions imagined by Moodle with a human touch. Everything is finalized to create a true group of work capable of sharing activities as well as exchanging various ideas, experiences, and points of view.

As a result of the many activities undertaken during the almost four years of project, the CoP has also been significantly enhanced, by opening protected areas for some important stakeholders such as: the members of the External Advisory Board (EAB), the High Level Policy Forum (HLPF), the stakeholder portal and the coordinators of MMLAP projects. A dedicated area was also created to the brokerage event.

See below the CoP homepage today:

All the activities that led to the expected results were enhanced through to the discussions that took place within each WP forum. So, not only the project's achievements but also the processes that have led to these results have been (and still are) available for both partners and stakeholders.

The objective of our Community of Practice was to help all partners to share a common vision of project's goals and a way to work and benefit together from theoretical reflections and field experiences.

It was not always easy to achieve this, just because of the diversity and the distance between the members of the ASSET consortium. But the comparison of ideas and experiences with the different stakeholders is an inspirational principle of the ASSET project. The statistics that we will comment upon show that in these four years a lot has been done in this direction and that the results are there.

2.2 Results

A dedicated tool was applied to monitor the access to the CoP. Statistics of access are considered a proxy for the participation to the project. The following graph shows the number of accesses by time. Numbers of accesses are available for each of the 10 Work packages, for the general project forum and for the different stakeholders areas.

Over the course of the entire project, the CoP was used as one of the most useful tools for working together, as is shown by the overall statistics for the entire period: from August 2014 to December 2017, the total login to CoP was 65.542, with an average of 1,600 accesses per month.

The characteristic peaks distribution indicates that work through the CoP was more intensive near the deadlines, although the frequency of discussions on the platform has always been maintained throughout the entire project.

Figure 1: N. of accesses to the ASSET CoP (August 2014-December 2017)
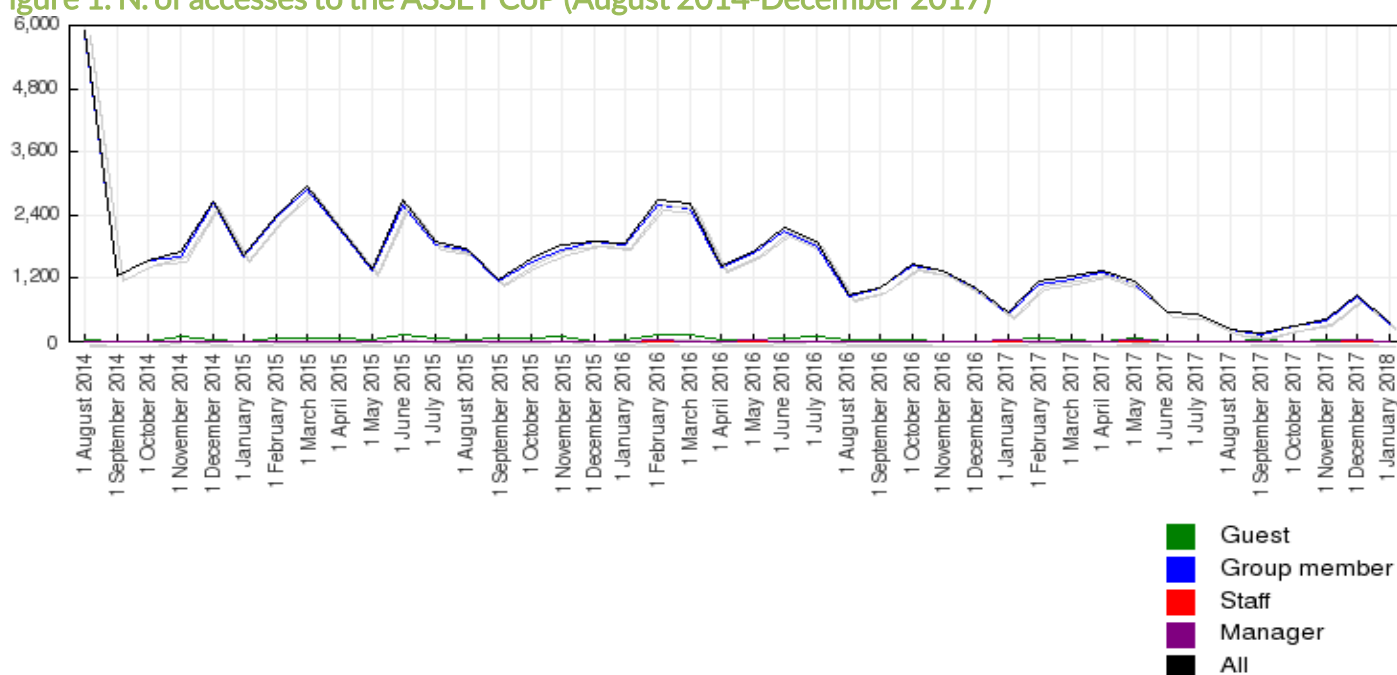
Let's take a look at the trends for some particularly significant WPs or dedicated areas, during the last year of the project.

For example, the General Forum, the area to discuss the overall theme of the project. In 2017 it has totaled 7,876 accesses, about 650 per month. The curve is wider in the early months of the year, falls in the summer and then rises, according to a predictable and attended trend. The graph shows the evolution of a mature instrument, used regularly, and where the peaks correspond to the periods when individual issues or deadlines require greater involvement of partners.

Figure 2: N. of accesses to the ASSET CoP general forum by time (January-december 2017)
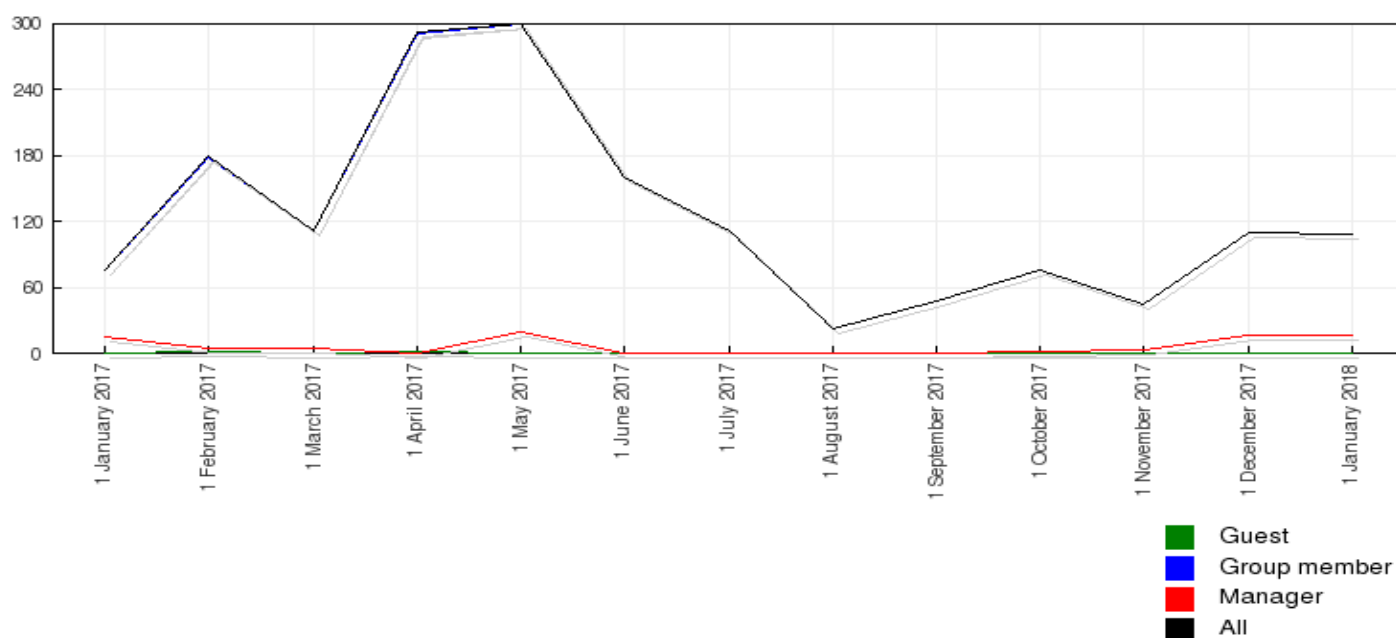
Another interesting example is the area dedicated to High Level Policy Forum (HLPF) participants. The statistics confirm the use of the CoP as a tool for participatory discussions and multi-actor cooperation. In this case, the total access numbers are smaller compared to other areas, as it was expected considering that the target is made up of few stakeholders. But the mode of use is the same, with the broader peak at the period of the last meeting, that took place in Brussels at the end of April. The curve shows, moreover, that the debate has continued for a couple of months.

Figure 3: N. of accesses to the ASSET CoP HLPF area (January-December 2017)
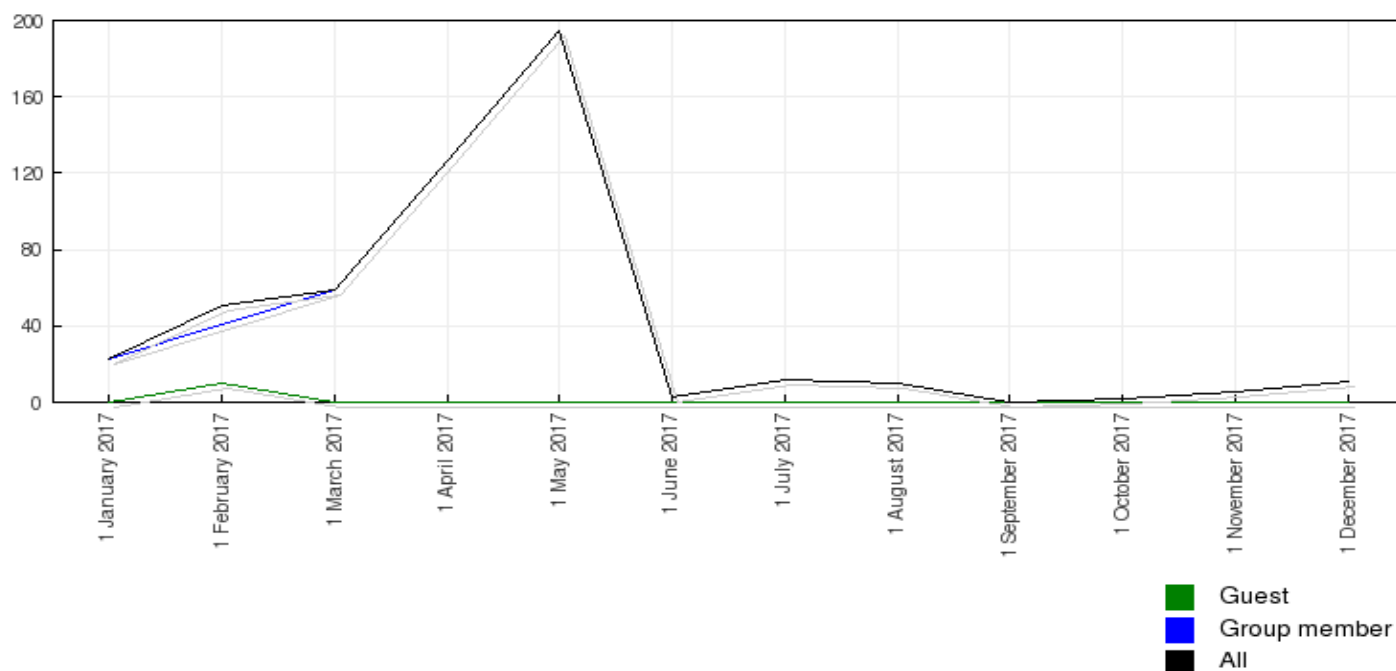
Another important example is the WP4 rea, which has involved practically all partners for the implementation of citizen consultation. The total number of accesses to the CoP (over 5,000) evidences the intensity of collaboration between partners.

It is also interesting to note that the trend of the curves shows the highest peaks at the day the consultation was conducted and at the period of the presentation of the results.

Figure 4: N. of accesses to the ASSET CoP WP4 area (August 14-December 2017)
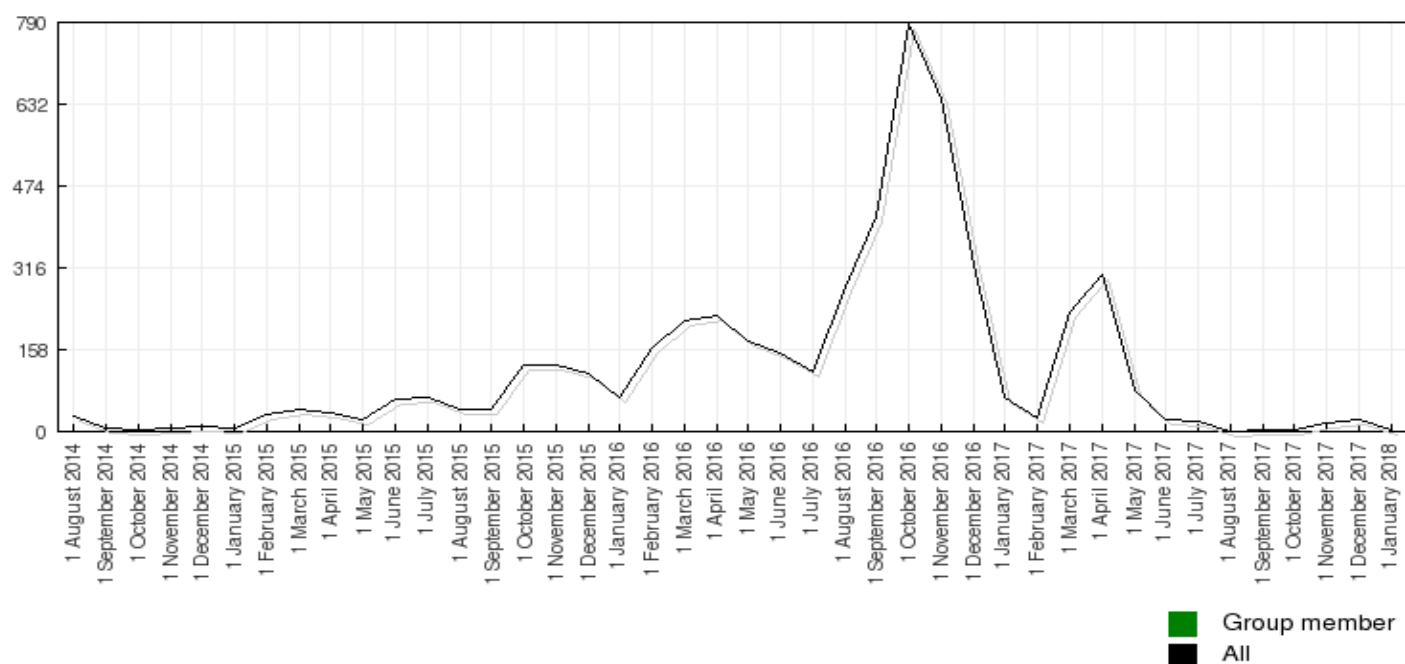
The last example concerns the preparation of the brokerage event. The statistics tell us that in this case too the dedicated CoP area has been used by both the partners and the project guests invited to participate in the event.

Figure 5: N. of accesses to the ASSET CoP brokerage event area (May-December 2017)

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3. THE MMLAP VIRTUAL CLUSTER

3.1 Objectives

To create an ongoing, informal, virtual cluster that not only facilitate the exchange of experiences with other MMLAPs and promote best practices, but also create the opportunity to learn from others on a regular basis by comparing methods.

3.2 Methods

During the entire project we have enriched the virtual cluster database. Since many MMLAP reached their conclusion and, apparently, fewer projects of this type were started, we expanded the inclusion criter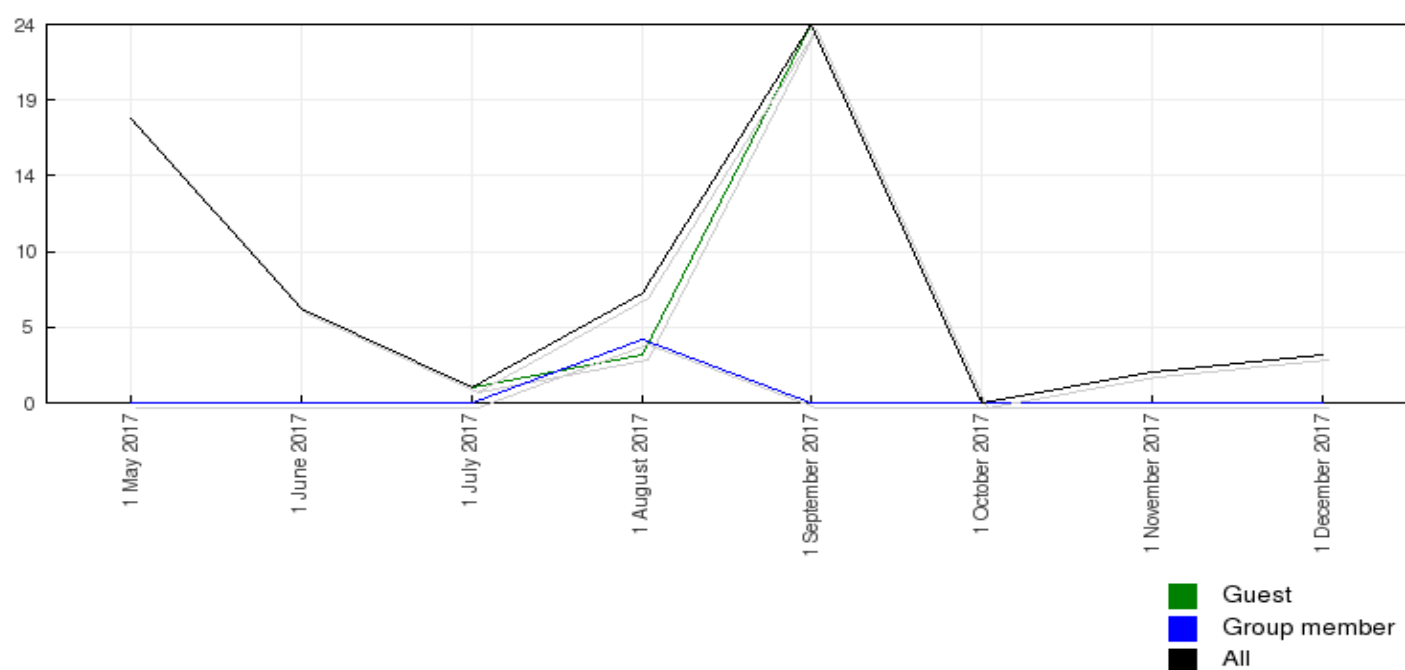ia in order to include similar projects by topic (preparedness, pandemics, epidemics etc.) or by methodological approach (two-way communication, RRI, science and society themes etc.).

By the time the project is over, ASSET's virtual cluster includes 39 projects, presented in this manner on the website's home page:

MMLAP AND OTHER EU PROJECTS

AsiaFluCap	BEWATER	CASI	CIMULACT	DARWIN
Health system analysis to support capacity development in response to the threat of pandemic influenza in Asia	Making society an active participant in water adaptation to global change	Public Participation in Developing a Common Framework for Assessment and Management of Sustainable Innovation	Engaging all of Europe in shaping a desirable and sustainable future	Expect the unexpected and know how to respond
DRIVER	**ECOM**	**EDEN**	**EPISOUTH**	**EPIWORK**
Driving innovation in crisis management for European resilience	Effective communication in outbreak management: development of an evidence-based tool for Europe	Solutions to improve CBRNe resilience	Network for Communicable Disease Control in Southern Europe and Mediterranean Countries	Developing the framework for an epidemic forecast infrastructure
EUPHARE	**EUROHEP**	**EuroMOMO**	**EURONHID**	**EUVAC.NET**
Strengthening of the national surveillance system for communicable diseases	Surveillance of vaccine preventable hepatitis	European monitoring of excess mortality for public health action	European network for highly infectious disease	Dedicated surveillance network for surveillance and control of vaccine preventable diseases in the EU
FLUMODCONT	**FLURESP**	**GAP2**	**HProImmune**	**INPROFOOD**
Modelling the spread of pandemic influenza and strategies for its containment and mitigation	Cost-effectiveness assessment of european influenza human pandemic alert and response strategies	Bridging the gap between science, stakeholders and policy makers	Promotion of immunization for health professionals in Europe	Towards inclusive research programming for sustainable food innovations
JA-CHRODIS	**M-Eco**	**MAPPING**	**MARINA**	**PACITA**
Addressing chronic diseases and healthy ageing across the life cycle	Medical ecosystem – personalized event-based surveillance	Studying the many and varied economic, social, legal and ethical aspects of the recent developments on the Internet, and their consequences for the individual and society at large	Get involved in the responsible marine research and innovation	Knowledge-based policy-making on issues involving science, technology and innovation, mainly based upon the practices in Parliamentary Technology Assessment
PANDEM	**PE2020**	**PERARES**	**PHEME**	**PREPARE**
Assessment of the current pandemic preparedness and response tools, systems and practice at national, EU and global level in priority areas	Analysis of innovative public engagement tools and instruments for dynamic governance in the field of Science in Society	Public Engagement with Research And Research Engagement with Society	Computing Veracity – the Fourth Challenge of Big Data	Providing infrastructure, co-ordination and integration of existing clinical research networks on epidemics and pandemics
PROMOVAX	**R&DIALOGUE**	**RESPIRE**	**SATORI**	**SECURING CITIES AGAINST GLOBAL PANDEMICS**
Promote vaccinations among migrant population in Europe	Creating mechanisms for effectively tackling the scientific and technology related challenges faced by society	Improve the quality of indoor air, keeping it free from radon	Improving respect of ethics principles and laws in research and innovation, in line with the evolution of technologies and societal concerns	Investigating how cities in the West securitise against global pandemics
SEiSMiC	**SIS CATALYST**	**SYN-ENERGENE**	**TELLME**	
Creating a structured dialogue and mutual learning with citizens and urban actors by setting up National Networks in 10 countries across Europe	Identifying how children can be change agents in the Science and Society relationship	Establishing an open dialogue between stakeholders concerning synthetic biology's potential benefits and risks	Transparent communication in Epidemics: Learning Lessons from experience, delivering effective Messages, providing Evidence	

3.3 Results

All project coordinators were contacted and invited to share documents, content and materials, through the dedicated area created on CoP. All of them have shown interest in the project and many have visited the CoP, as the graph below shows.

Figure 6: accesses to the MMLAP area on the ASSET CoP (October 2015-December 2017)
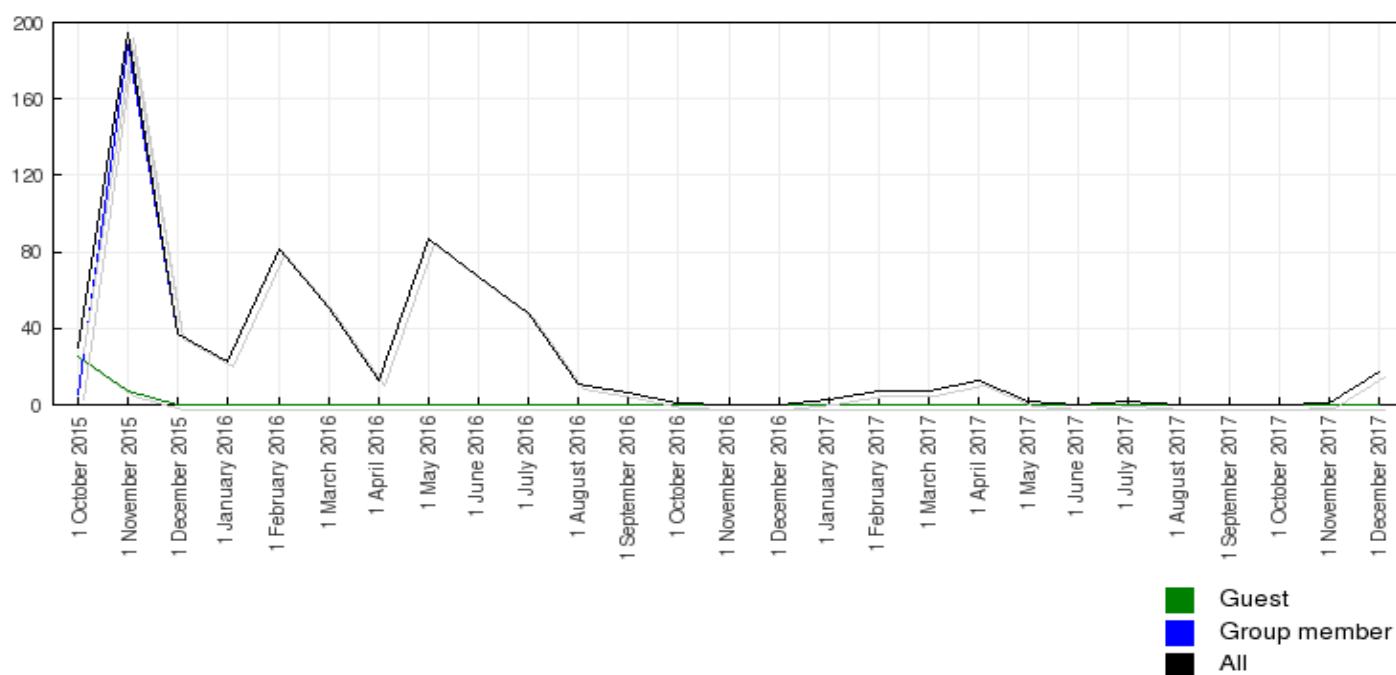
The projects contacted during the last months of 2017 were invited to attend directly the CoP area dedicated to the brokerage event (see Figure 5 and D9.12).

With DARWIN project (Expect the unexpected and know how to respond) we have been able to organize two days of sharing of experiences that took place in Rome on July 3 and 4, 2017.

In addition, 15 projects took part in the brokerage event organized in Rome on 30 and 31 October 2017.

Below we present the projects that are part of the virtual cluster of ASSET and that are all availables from the ASSET website.

AsiaFluCap

WEBSITE:
HTTP://WWW.CDPRG.ORG
/ASIAFLUCAP.PHP

This project, funded by the European Commission, analysed how resources can be deployed effectively and efficiently in Asian countries in the event of a pandemic. Its goal was to provide a framework to evaluate health system operational capacity and, in four settings (Vietnam, Indonesia, Thailand, Taiwan), to systematically determine operational capacity gaps, in order to sustain the containment and mitigation of pandemic influenza. With additional support from the Rockefeller Foundation, the study was expanded to cover two additional countries: Lao PDR and Cambodia.

Operational capacity gaps were determined under four hypothetical pandemic scenarios. Resources available were determined in order to address containment and mitigation outcomes. Resources were mapped at two levels, the enabling environment and the organisational environment tasked with implementation. Governance arrangements were evaluated according to the same pandemic influenza scenarios, which were drawn upon in evaluations of each setting to ensure lessons learned are coherent. With ministerial support across the sites, the results from this work provide a critical resource for strategic and operational pandemic influenza plans, and for decisions about future resource allocation in the event of a pandemic.

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BEWATER

WEBSITE:
HTTP://WWW.BEWATERPROJECT.EU/

The BeWater project promotes dialogue and collaboration between science and society for sustainable water management and adaptation to the impacts of global change in the Mediterranean. The project uses an iterative process of mutual learning, participatory techniques and a bottom-up approach to ensure that stakeholders play an active role in determining appropriate strategies for management of river basins. By actively engaging with local communities, BeWater involves society in discussions on current water uses and their related problems, raising public awareness of the importance of sustainable water management, with particular focus on the expected climate change impacts at River Basin scale.

In four Case Study River Basins across the Mediterranean, newly developed methodologies integrating physical, ecological, social and management processes are used to develop Water Management Options. These Management Options will be discussed with local communities who will participate in drawing up locally-relevant Adaptation Plans, which may be scaled up to develop guidelines of national and international relevance.

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CASI

The project "Public Participation in Developing a Common Framework for Assessment and Management of Sustainable Innovation" (CASI) is proposed as a response to one of the Grand Challenges set out in the Horizon 2020 programme of the European Union, namely "Climate action, environment resource efficiency and raw materials".

It represents an EU-wide cross-sectoral partnership on innovation-related challenges and considers not only the impacts of social and technological innovation, but also the types of actors involved and their inherent interests. It thus effectively integrates the perspectives of civil society, SMEs, industry, policy stakeholders, and leading academics. This collaboration investigates the scope of sustainable innovation as a societal phenomenon and enables the elaboration of an assessment framework of sustainable innovation practices, whose application can be successfully integrated into public policy developments. CASI includes a rich and intensive set of activities carried out across the EU. Based on a carefully designed methodology, CASI will identify and describe sustainable innovation cases through a collaborative analytical process (mapping). More than 160 innovative practices from around the EU will provide a rich qualitative perspective and will serve as the basis for focused analysis, comparison and contrasting.

Through the process of mapping, practices representing unique social and technological innovations will be considered separately in order to inquire into specific factors of, as well as consequences for, sustainability vis-à-vis social and business-oriented challenges. Key players and stakeholders will also be identified through this process, as well as how they are affected by (or are affecting) policy-making. CASI will provide rich opportunities and various venues for stakeholders to engage in focused debates on sustainable innovation – on the role of innovation for sustainability, on enhancing the understanding of sustainability within the innovation context, as well as on policy developments that will ensure opportunities for continuing innovation in the context of sustainability.

Actions are planned to keep track of national and EU-level policy debates on innovation and sustainability. These efforts will supplement the mapping processes of innovation cases. It will further provide grounds for comparison between opportunities of innovation adoption and trends in policy making, as well as of the balances between the two.

Based on the combination of the different analytic approaches, CASI will develop a Common Framework for Assessment and Management of Sustainable Innovation (CFAMSI), and will test its application on issues of sustainability through cases of social and technological innovation, and additional in-depth qualitative research of relevant actors, policy and business models, and societal responses.

CASI emphasises dialogue and participation, and relies on highly participatory methods of engagement when it comes to integrating citizens' inputs. Based on such input and results from CASI's internal analyses, EU-wide policy recommendations will be elaborated with the ambition to improve the integration of sustainability and innovation support actions into addressing the underlying issues embedded into the "Climate action, resource efficiency and raw materials" grand challenge.

CIMULACT

CIMULACT aims to establish and improve a genuine dialogue between citizens, stakeholders, scientists, and policy makers in the co-creation of European research agendas, where visions and scenarios can be developed, debated and transformed into recommendations and suggestions for research and innovation policies and topics. CIMULACT is developing and experimenting with methods for citizen participation on long-term foresight, as well as building capacities in already existing methods. The experiments are exploring a variety of methods in order to test and inspire the research community with a broad range of options for citizen and multi-actor engagement in research and innovation priority setting. Furthermore, the diversity of methods also allows targeting different societal groups, enriching the feedback and validation of the research programme scenarios from a wide range of societal perspectives.

DARWIN

The project name is inspired by the 19th century scientist, Charles Darwin, whose famous theory of evolution is based on the observation that species must 'adapt to survive'. So, the DARWIN project's main goal is to provide up-to-date and effective guidelines to facilitate faster, more effective and highly adaptive responses to crises, both natural (e.g. flooding, earthquakes) and man-made disasters (e.g. aircraft incidents), allowing resilience in different domains. These guidelines, which will evolve to accommodate the changing nature of crises, are developed for those with responsibility of protecting the population or critical infrastructure/services from policy to practice: critical infrastructure managers, crisis and emergency response managers, service providers, first responders and policy makers. To ensure the guidelines are dynamic, effective and user-friendly, the project will adopt innovative tools, including serious gaming and training packages. The guidelines will also be tested in strategic pilot studies in two key sectors Healthcare and Air Traffic Management. In order to foster communications among the European crisis and resilience community, DARWIN establishes a Community of Practitioners (DCoP), bringing the relevant stakeholders across Europe. This forum, that will exist beyond the lifetime of the project, lets them to exchange views and innovations around their responses to crisis.

DRIVER

DRIVER+ starts from the experience that neither successful R&D nor strong end-user demand always lead to innovation in the Crisis Management (CM) domain. DRIVER+ has three main objectives:

- Develop a pan-European Test-bed for crisis management capability development: it will provide the technological infrastructure, the necessary supporting methodology and adequate support tools.
- Develop a well-balanced comprehensive portfolio of crisis management solutions: the Portfolio of Solutions (PoS) is a database driven web site that documents all the available DRIVER+ solutions.
- Facilitate a shared understanding of crisis management across Europe: this will boost Europe's ability to continue adapting to new threats and emerging needs, laying the basis for a continuously resilient EU and providing a mechanism to drive innovation in European CM by bridging the gap from practitioners need and R&D to the market.

ECOM

Ecom project brought together various disciplines to go beyond the current knowledge, in order to develop an evidence-based behavioural and communication package for health professionals and agencies throughout Europe in case of major outbreaks of infectious diseases.

The goal was reached through the following specific objectives:

- To assess the time-dependent influences of epidemiology and risk communication including media content on human behaviour during the A/H1N1 pandemic;
- To analyse, using social marketing principles, vaccination behaviour, audience segmentation, and vaccination service delivery;
- To analyse knowledge, attitudes, risk perception, vaccination non-response and reasons for resistance during past epidemics;
- To apply Discrete Choice Experiments to determine acceptance of preventive measures in the case of epidemic outbreaks;
- To integrate the key findings of the studies under the first four objectives, to determine critical factors, groups, and media to be addressed in the development of effective strategies;
- To test behavioural interventions and communication strategies tailored to different target audiences;
- To finalize and disseminate a package of evidence-based tools that can be tailored to individual European countries.

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EDEN

WEBSITE:
HTTPS://EDEN-SECURITY-FP7.EU/

EDEN project aimed to improve the prevention, preparedness, response and recovery to a CBRNe event (Chemical, biological, radiological, nuclear and explosive), developing the resilience capacity of the EU society. Within the project there are three platforms: End-User Platform, Supplier and SME Platform, to match the needs expressed by the end-users with the products and services from Industries and Small and Medium Enterprises.

EDEN have also tended to EU-coordination and communication at the national and European level, improving security system integration, interconnectivity and interoperability in countering the CBRNe threat between EU member states and their response agencies. EDEN project uses the Toolbox of Toolboxes (ToT) approach and checked and improved throughout the EDEN demonstrations.

When the project started several workshops were conducted in order to collect needs and gaps related to CBRNe events, furthermore information from previous and on-going projects were gather, these led to a list of several hundreds of needs. Needs and gaps were prioritized and matched with tools developed within the project and from suppliers and SMEs, then demonstrations serve to understand if the tools cover the gaps.

EPISOUTH

WEBSITE:
HTTP://WWW.EPISOUTHNETWORK.ORG/

Health threats do not respect political borders: EPISOUTH and EPISOUTH PLUS were aimed at increasing the health security in the Mediterranean Area and Balkans by enhancing the preparedness to the threats which can affect the health security and bio-security risks at national/regional levels in the framework of the IHR implementation and by the detecting health threats which may affect the EpiSouth region.

The EpiSouth Plus used new strategic lines of activities relying on the Network of 27 EU and non-EU countries established by the EpiSouth project. This project strengthens the countries` capacity to cope with health threats through concerted and coordinated actions in accordance with generic preparedness plans based also on strategic approaches which can facilitate sharing of: information, alerts and national procedures between EU and non-EU countries of Mediterranean area. The projects led to the Regional Laboratory Network that established with selected laboratories to support the priority diagnostic needs and to facilitate interaction with public health institutions and officials based on national reference laboratories and the Institut Pasteur Network. As well as the attention in training on communicable disease epidemiology, the projects aimed to capacity building in generic preparedness and risk management, also through the organization of two workshop with capacity building sessions, aimed also at personnel working at local level.

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EPIWORK

The EPIWORK project proposed a multidisciplinary research effort aimed at developing the approriate framework of tools and knowledge needed for the design of epidemic forecast infrastructures. The research considered most of the much needed development of modeling, computational and ICT tools such as:

- the foundation and development of the mathematical and computational methods needed to achieve prediction and predictability of disease spreading in complex social systems;
- the development of large scale, data driven computational models endowed with a high level of realism and aimed at epidemic scenario forecast;
- the design and implementation of original data-collection schemes motivated by identified modelling needs, such as the collection of real-time disease incidence, through innovative web and ICT applications.
- the set up of a computational platform for epidemic research and data sharing that will generate important synergies between research communities and countries.

EUPHARE

The overall objective of the project was to strengthen the communicable disease (CD) surveillance system and to establish national early warning system assuring better control of CD in Bulgaria

The project purpose is to ensure the integration of the national CD surveillance system into the EU surveillance networks through adopting the EU legislation and strengthening the administrative capacity of the involved institutions

EUROHEP

The project addressed issues related to surveillance and prevention of hepatitis A and B in the EU countries, Associated States and Israel (28 countries) with a view to study the feasibility of a future network on surveillance and prevention and to speed up the progress of these countries towards control of hepatitis A and B.

The overall aim of this concerted action was to take stock, coordinate, strengthen and standardise the country-specific surveillance and prevention activity of viral hepatitis A and B. This has been achieved by establishing a feasibility study of a future network on surveillance of hepatitis A and B in the 28 participating countries, integrating the expert epidemiology and public health groups involved in the surveillance of infectious diseases in the respective countries.

EuroMOMO

The mission of this project was to reinforce the EU's preparedness to respond to potential risk of all hazards by a continued operation of the EuroMOMO network, which ensures quality check and standardised weekly mortality monitoring. The vision was further to extend the collaboration by adding new countries to the network and to continuously explore the potential of timely mortality data. By conducting regular network activities, partners learnt and exchanged best practice on how to apply data from real-time mortality monitoring for risk assessment, in particular as regards cross-border threats and the management of the public health response to emergencies.

EURONHID

The main aims of EuroNHID were to enhance and maintain co-operation, communication, and exchange of information on highly infectious diseases among infectious disease clinicians, and to enhance preparedness and response within Europe to health threats from highly infectious diseases, whether naturally occurring, newly emergent, or deliberately released. The focus of this network was on health care professionals. Clinicians have the huge responsibility of performing a diagnosis of suspect, providing information to identify an outbreak and providing care during one. They also must apply the required isolation procedure to reduce the risk of transmission to relatives and contacts and control the spread of the disease to other patients, to health care workers and ultimately to the general public. The EUNID network led to a forum to exchange good practices and share expertise and experiences: to compile an inventory of high isolation facilities and to develop consensus recommendations for highly infectious disease management.

A networking strategy was also adopted in order to develop a specifically designed, evidence-based checklists to assess hospital capabilities on resources, infection control policies and HCW safety in the management of patients with HIDs (https://www.ncbi.nlm.nih.gov/pubmed/19486074).

EUVAC.NET

The activities established by the EUVAC.NET project provided a solid platform to further develop the surveillance of vaccine preventable diseases in the EU. In particular it contributed to, advocated for and facilitated activities toward elimination of measles and rubella and the control of congenital rubella infection.

In September 2011, the responsibilities of EUVAC.NET were transferred to ECDC and now are coordinated by the Vaccine Preventable Disease group (VPD).

FLUMODCONT

WEBSITE:
HTTP://CORDIS.EUROPA.EU/RESULT
/RCN/54420_EN.HTML

The emergence of the highly pathogenic avian H5N1 virus raised the alarm about the threat posed by novel strains of influenza A gaining transmissibility to people and causing a human pandemic. To mitigate the impact of such a pandemic on human health, the EU funded the 'Modelling the spread of pandemic influenza and strategies for its containment and mitigation' (Flumodcont) project. Flumodcont was designed to support the development of policies, planning and response procedures in case of a flu pandemic. For this purpose, the consortium used mathematical models to simulate realistic pandemic spread scenarios and evaluate various control policies. The model took into account the role of virus transmission within schools, providing an assessment of the potential role of school holidays in shaping the infection impact. Data from 1889 to 1968 pandemics were used to standardise estimation procedures in computational models that could be used for performing detailed scenario analyses of interventions. One of the outputs of the project was a software package that simulated very efficiently, using an individual-based model, the spread of influenza pandemic at a European scale. During the A/H1N1 influenza pandemic of 2009, the consortium partners were actively involved in supporting national and international health agencies by providing an assessment of the situation. The Flumodcont-generated modelling approach was used to retrospectively analyse the epidemiological parameters and determinant factors that shaped the observed pattern of spread of the 2009 H1N1 pandemic in Europe. Also, by running two surveys, one before the infection had spread and a second after the main pandemic wave, researchers were to draw important conclusions on public intention and actual behaviour. This information could be essential for planning future communication strategies for infection management. The project's technical advancements with respect to modelling of the spread of an influenza epidemic offer promising solutions for designing future surveillance, planning and responses.

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FLURESP

WEBSITE:
HTTP://WWW.FLURESP.EU/

The outcome of the FLURESP project provided an extensive assessment of human flu pandemic response strategies, which lead to guidelines and recommendations for EU Member States presenting and discussing most cost-effective response strategies for each pandemic scenario.

- The first operational phase was dedicated to the description of human pandemic scenarios. After an extensive literature review, the FLURESP consortium created a specific expert panel, which defined possible human flu pandemic scenarios in Europe.
- The second operational phase of the project focused on response strategies at both national and European levels.
- The third phase defined standardized criteria for each response strategy, including epidemiological and socio-economical impact, and multi-criteria analyses.
- The fourth phase performed cost-effectiveness analyses on the response strategies in four pilot European countries.
- The fifth phase proposed guidelines and recommendations for policy decision makers, based on ranking tables of performance, costs and cost-effectiveness ratios.

GAP2

WEBSITE:
HTTP://WWW.GAP2.EU

GAP2's purpose was to demonstrate the role and value of stakeholder driven science within the context of fisheries' governance. The work was coordinated by an interdisciplinary team across Europe, with expertise ranging from social science to fisheries management. GAP2 was built upon the success of GAP1, an 18 month project run from 2007 to 2009, also funded by the European Commission's FP7 programme. Among the many and varied outputs of GAP1 were 15 fisher-science partnerships from across 11 different European countries, which formed the basis of GAP2's case studies.

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HProImmune

HProImmune was a 3-year project co-funded by the Health Programme of the European Union aimed to promote immunization among Health Care Workers (HCWs) in Europe. The project improved the knowledge on barriers concerning HCW immunizations and developed educational material for health professionals in both the private and the public sector, as well as propose recommendations for policy-makers.

The general objective of this project was to promote vaccination coverage of HCWs in different health care settings by developing a tailored communication toolkit. The specific objectives were:

- Increase awareness about the most important vaccine preventable diseases, which pose a particular risk to EU HCWs
- Increase awareness about immunizations among HCWs through a database comprising vaccination specific information from across the EU
- Provide new knowledge about vaccination behaviors and barriers among HCWs
- Identify best practices for the immunization of health professionals
- Provide new knowledge on how to communicate and promote immunizations among HCWs by piloting a purpose and tailor-made Immunization Toolkit
- Increase awareness and promote HCW immunizations through a widely disseminated and pilot tested HCW Immunization Promotion ToolKit comprising recommendations, communication guidelines, tools and fact sheets.

INPROFOOD

INPROFOOD aimed to find new ways to establish dialogue and mutual learning between industry, academia and civil society. This objective was pursued by achieving those goals:

- promoting bottom-up development of concepts (processes and structure) of societal engagement in food and health research;
- investigating current processes and structures in the area of food and health in both private and public research sectors and the role 'Public Engagement in Research' takes in these sectors;
- developing stakeholder engagement programs both at national and European levels, stimulate the adoption of concrete initiatives of societal engagement in food and health research already in the course of the project by forming an action plan that draws insights from various workshops;
- improving the current methodology used in Science in Society (SiS) projects through evaluation of the methodology implemented during the planned project in relation to its objectives and expected impacts;
- keeping the target audience and wider audience informed regarding the advances of the project by continuously disseminating relevant information using various communication tools and channels;
- additionally supporting and complementing existing FP7 programmes KBBE and HEALTH through establishing cooperations with approved projects and implementing joint activities.

JA-CHRODIS

WEBSITE:
HTTP://CHRODIS.EU/

The "Joint Action on Chronic Diseases and Promoting Healthy Aging Through the Life Cycle" (JA-CHRODIS) is a joint European action dedicated to chronic diseases and the promotion of "healthy" aging in the course of life. The aim of JA-CHRODIS was to promote and facilitate a process of exchange and transfer of good practices between countries for effective action against chronic diseases with a specific focus on health promotion and chronic disease prevention, on co-morbidity and diabetes. JA-CHRODIS was the first European Joint Action on the Prevention and Treatment of Chronic Illnesses. The project has opened up the possibility for regions and European countries to benefit from the experiences of others. In September 2017 it started JA-CHORDIS Plus, a three-year initiative (2017-2020). During the final conference of the project, it was presented the document "Building on JA-CHRODIS What can we do to plan and implement practices to reduce the burden of chronic diseases?" which contains 12 recommendations to counteract chronic diseases. Between the instrument developed through the project, there are the CHRODIS platform, online archive for good peer-reviewed practices, and the Policy Brief on Diabetes National Plan, focused on the importance of the empowerment of people with diabetes for the prevention of complications.

M-Eco

WEBSITE:
HTTP://WWW.MECO-PROJECT.EU/

Tthe M-Eco (Medical Ecosystem Personalized Event-Based Surveillance) project helped to complement traditional surveillance systems with additional approaches for the early detection of emerging threats.

Many factors in today's changing societies contribute towards the continuous emergence of infectious diseases. Demographic change, globalization, bioterrorism, compounded with the resilient nature of viruses and diseases such as SARS and avian influenza have raised awareness for European society's increasing vulnerability.Traditional Epidemic Intelligence systems are designed to identify potential health threats, and rely upon data transmissions from laboratories or hospitals. They can be used to recognise long-term trends, but are limited in several ways. Threats, such as SARS, can go unrecognised since the signals indicating its existence may originate from sources other than the traditional ones. Second, a critical strategy for circumventing devastating public health events is early detection and early response. Conflictingly, the time with which information propagates through the traditional channels, can undermine time-sensitive strategies. Finally, traditional systems are well suited for recognising indicators for known diseases, but are not well designed for detecting those that are emerging. Faced with these limitations, traditional systems need to be complemented with additional approaches which are better targeted for the early detection of emerging threats.

The Medical EcoSystem (M-Eco) project addressed these limitations by using Open Access Media and User Generated Content as unofficial information sources for Epidemic Intelligence. This type of content has transformed the manner in which information propagates across the globe. Based on this, M-Eco developed an Event-Based Epidemic Intelligence System that integrates unofficial and traditional sources for the early detection of emerging health threats. M-Eco emphasized adaptivity and personalized filtering so that relevant signals can be detected for targeting the needs of public health officials who have to synthesize facts, assess risks and react to public health threats.

MAPPING

Building on the results of several EU FP7 projects including CONSENT (covering on-line consent and privacy in social networks), SMART and RESPECT (which cover smart and on-line surveillance, etc.) MAPPING's goal is to create an all-round and "joined-up" understanding of the many and varied economic, social, legal and ethical aspects of the recent developments on the Internet, and their consequences for the individual and society at large. MAPPING would specifically investigate and debate the existing innovation policies, business models and legal framework related to the implementation of the Digital Agenda for Europe and the changes needed to set up an improved governance structure for the EU innovation ecosystem. The key to MAPPING's success would be its planned mobilisation of a wide spectrum of ICT-related stakeholders and social actors from both EU Member States and associated countries, including academics, law and policy makers, ISPs, international and EU Internet governance bodies, NGOs and civil society organisations. The project would provide these actors with a forum for informed discussion of issues related to the digital transition, such as problems of personal data and IPR protection online, business models and e-government applications based on the use of personal data, economic exploitation of IPRs and open innovation. MAPPING would then move to create an Action Plan and put forward workable policy guidelines based on a multidisciplinary perspective on the latest and foreseeable developments in ICTs taking into account conflicting interests, perceptions and practices of different societal actors that shape the EU's technological future. MAPPING would thus significantly contribute to creating an enabling framework for completing the digital transition and improving the innovation climate in the EU.

MARINA

The MARINA project engages citizens, researchers, policy makers, industrial and societal actors in order to improve Responsible Research and Innovation (RRI) around the European marine ecosystem, threatened by climate change in progress and the intensive human exploitation. The RRI approach is used with all stakeholders in 8 strategic marine Hot Topics issues: marine biotech, sea transportation, deep sea mining (including bio prospecting), marine change caused by climate, renewable energy (wave, wind, tidal), tourism and coastal cities, fishing and aquaculture, pollution caused by human land and sea pressures. Thanks to the on-field experience, MARINA project is strengthening this systematic approach, making it transferable and reproducible for any RRI thematic domain: the project aims to federate all other EU-funded RRI projects, including those not related to marine issues, in order to develop the RRI Roadmap, starting from its best practices and its limitations, and making it useful for many societal challenges. Thanks to MARINA, it will be possible to develop a better alignment between research and innovation and societal needs, transferable also to other important areas such as nanotechnology, biotechnology etc.

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PACITA

The PACITA Mobilisation and Mutual Learning Action Plan will distribute capacity and enhance the institutional foundation for knowledge-based policy-making on issues involving science, technology and innovation, mainly based upon the practices in Parliamentary Technology Assessment (PTA). PTA supports the processes of democratic policy-making on issues involving science, technology and innovation, by providing comprehensive insight into knowledge on opportunities and consequences, by facilitating democratic processes of debate and clarification, and by formulating policy options.

PACITA will a) document these practices, b) describe schemes for using them nationally and at European level, c) establish a set of training schemes for users and practitioners, d) establish a Web Portal to European TA expertise e) create a debate on such practices in countries, which do not have them formally established, f) involve experts, societal actors and politicians in European debates on these practices, g) provide three large example-projects on expert-based praxis, stakeholder involvement and citizen consultation, h) support this with a strong dissemination strategy towards the policy-makers, the scientific community, media and countries, which can favor from the mobilization and mutual learning created by the Action Plan, and i) have an independent evaluator monitor the progress and results.

The consortium has 15 partners from: National/regional parliamentary offices for science and technology; Science academies; Research institutions; Universities; Civil Society Organisations. The Coordinator is a PTA institution, highly experienced in project managing, which has taken part in more than 10 EU projects including an ERA-Net, and has coordinated two FP projects and a global citizen consultation project involving 55 partners in 38 countries.

PANDEM

The European Union (EU) faces a growing health security threat posed by pandemics due to the convergence of risk factors driving disease emergence, amplification and dissemination of pathogens with pandemic potential. Protecting the health and security of citizens in the EU in the face of these pandemic threats requires a coherent response by all stakeholders driven by effective pandemic risk management.

PANDEM will contribute to the reduction in the health, socio-economic and security consequences of future pandemics so that society will be better prepared at regional, national, EU and global level. PANDEM will assess current pandemic preparedness and response tools, systems and practice at national, EU and global level in priority areas including risk assessment and surveillance, communication and public information, governance and legal frameworks. PANDEM will then identify gaps and improvement needs leading to the development of viable innovative concepts and analysis of the feasibility of a future demonstration project to strengthen capacity-building for pandemic risk management in the EU.

PANDEM specifically addresses the needs and priorities detailed in the Horizon 2020 Work Programme crisis management topic DRS-4. PANDEM will focus on the needs and requirements of users and first responders across the spectrum of pandemic risk management. PANDEM will bring together highly skilled and multi-disciplinary senior experts from the health, security, defence, microbiology, communications, information technology and emergency management fields. Given the cross-border and multi-sectoral context of the health and security challenge for building pandemic risk management capacity, a systems-based methodology will be applied and the final outcome will be developed for use in a pan-European setting.

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PE2020

WEBSITE:
HTTP://PE2020.EU/ABOUT/

PE2020 will identify, analyse and refine innovative public engagement (PE) tools and instruments for dynamic governance in the field of Science in Society (SiS). PE2020 continues the work began in the MASIS project (2010-2012), both through its consortium and by going deeper in analysing the PE tools and instruments through a systemic and contextual perspective, and contributing to the potential and transferability of new governance innovations. PE2020 will create new knowledge of the status quo and trends in the field of public engagement in science, refine innovative PE tools and instruments and propose new ones. The project will do this by (1) further developing a conceptual model that provides a systemic perspective of the dynamics of public and stakeholder engagement; (2) creating an updated inventory of current and prospective European PE innovations; (3) context-tailoring and piloting best practice PE processes related to the grand challenges of the Horizon 2020 and (4) developing an accessible net-based PE design toolkit that helps identify, evaluate and successfully transfer innovative PE practices among European countries. New tools and instruments for public and societal engagement are necessary to boost the quality, capacity and legitimacy of European STI governance and to solve the looming problems related to the grand societal challenges of the Horizon 2020. In order to ensure practical relevance, the project will work through intensive co-operation between researchers and science policy actors. PE2020 will expand the capacity of European and national science policy actors to integrate better societal engagement by providing an easy access to new PE tools and instruments, to be included in the requirements and implementation of research in Horizon 2020 and beyond.

PERARES

WEBSITE:
HTTP://WWW.LIVINGKNOWLEDGE.ORG/

Public Engagement with Research And Research Engagement with Society (PERARES) is a four years project funded by the European Community's 7th Framework Programme started in 2010. The project aimed to strengthen public engagement in research (PER) by involving researchers and Civil Society Organisations (CSOs) in the formulation of research agendas and the research process.

It used various debates (or dialogues) on Science to actively articulate research request of civil society. To be able to answer to research requests, it was necessary to enlarge and strengthen the network of research bodies doing research for/with CSOs. Thus, ten new Science Shop like facilities throughout Europe were started, mentored by experienced partners.

PHEME

Social networks are rife with lies and deception, half-truths and facts. But irrespective of a meme's truthfulness, the rapid spread of such information through social networks and other online media can have immediate and far-reaching consequences. In such cases, large amounts of user-generated content need to be analysed quickly, yet it is not currently possible to carry out such complex analyses in real time. With partners from seven different countries, the PHEME project will combine big data analytics with advanced linguistic and visual methods. The results will be suitable for direct application in medical information systems and digital journalism.

PREPARE

Far from receding, the threats posed by infections with epidemic potential grow ever greater. Although Europe has amongst the best healthcare systems in the world, and also the world's supreme researchers in this field, we lack co-ordination and linkage between networks that is required to respond fast to new threats. This consortium of consortia will streamline our response, using primary and secondary healthcare to detect cases with pandemic potential and to activate dynamic rapid investigation teams that will deploy shared resources across Europe to mitigate the impact of future pandemics on European health, infrastructure and economic integrity.

If funded, PREPARE will transform Europe's response to future severe epidemics or pandemics by providing infrastructure, co-ordination and integration of existing clinical research networks, both in community and hospital settings. It represents a new model of collaboration and will provide a one-stop shop for policy makers, public health agencies, regulators and funders of research into pathogens with epidemic potential. It will do this by mounting interepidemic ('peace time') patient oriented clinical trials in children and in adults, investigations of the pathogenesis of relevant infectious diseases and facilitate the development of sophisticated state-of-the-art near-patient diagnostics. We will develop pre-emptive solutions to ethical, administrative, regulatory and logistical bottlenecks that prevent a rapid response in the face of new threats. We will provide education and training not only to the members of the network, but also to external opinion leaders, funders and policy makers thereby streamlining our future response. By strengthening and integrating interepidemic research networks, PREPARE will enable the rapid coordinated deployment of Europe's elite clinical investigators, resulting in a highly effective response to future outbreaks based on solid scientific advances.

R&DIALOGUE

WEBSITE:
HTTP://WWW.RNDIALOGUE.EU/

The objective of the R&Dialogue project is to create mechanisms for effectively tackling the scientific and technology related challenges faced by society by proactively bringing together different actors with complementary knowledge and experiences. The Mobilisation and Mutual Learning Action Plan (MMLAP) therefore forges partnerships between research organisations and different societal actors. It develops forms of dialogue and cooperation between science and society at different stages of the research process. The partners pool experiences and knowledge and better focus their respective efforts to develop a common approach to the issues at stake. In doing so the MMLAP contributes to sharing innovation more widely and efficiently and to optimizing the role of research and technology in tackling societal challenges.

The objective of this project is to organise a dialogue between R&D organisations (RDOs) and civil society organisations (CSOs) that results in a joint vision of CSOs and RDOs on the development of renewable energies and CCS for a low carbon society and identification of actions to improve the dialogue and associated mutual learning.

Our task will thus be to create a mechanism for dialogue between research and Civil Society Organisations (CSOs) to develop a common approach on issues regarding the low-carbon society. This common approach can be used by international, national and local policy makers, CSOs, industry and research. It will result in an Action Plan signed by all participating organisations.

RESPIRE

RESPIRE is a Life project. Its objective is to improve the quality of indoor air, keeping it free from radon of deep underground origin. RESPIRE will design, build and apply in four project areas a cost-effective and eco-friendly solution for Radon real-time measurement and remediation, to keep indoor Radon levels below 100 Bq/m3. RESPIRE will construct a geological database of Radon measurements and will provide local authorities with Radon hazard guidelines and online radon maps (Web-GIS) for land use planning and health risk assessment, helping to prepare radon national action plans. In RESPIRE, 10-15 public buildings for each of the 4 significant areas, three in the Latium region and one in Belgium, affected by a low level of air quality due to the occurrence of Radon, will be requalified by the installation of an intelligent, adaptable and versatile hybrid Radon remediation system composed by sensors, an Air Quality Balancer (SNAP) and an external additional fan-system (eolian and/or electric) working on positive pressure method.

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SATORI

SATORI is a 45-month project, comprising 17 partners from 13 countries, including an intergovernmental organisation, the aim of which is to improve respect of ethics principles and laws in research and innovation, and to make sure that they are adequately adapted to the evolution of technologies and societal concerns. The partners will develop an ethics assessment framework based on thorough analysis, commonly accepted ethical principles, participatory processes and engagement with stakeholders, including the public, in Europe and beyond.

The project comprises 12 work packages, starting with a systematized inventory of current practices and principles in ethics assessment. WP2 reviews existing projects and identifies stakeholders. WP3 investigates the impact of globalization and the extent to which research is conducted outside Europe to profit from more flexible frameworks. In WP4, the partners outline an ethical assessment framework and create a roadmap for a fully developed framework. WP5 concerns the cost-effectiveness and risk-benefit of ethics assessment. WP6 address other impacts and gathers stakeholder views on those impacts. The partners will study the prospects for standardizing the framework in WP7. In WP8, the partners will develop a strategy for sustainability of the SATORI network. In WP9, which runs throughout the project, the partners will monitor policy developments and other initiatives at the EU, MS and local levels which merit ethical assessment and alert our network accordingly. The partners have devised a multi-pronged communications strategy to interact with stakeholders in WP10. WP11 is project management. In WP12, the partners have created an independent evaluation of and reflection upon the project, which will enable any necessary remedial actions to enhance it. SATORI's experienced partners bring complementary perspectives and knowledge from academia, industry, research institutes, science academies, journalism and other sectors.

SECURING CITIES AGAINST GLOBAL PANDEMICS

The risk of new global pandemics has become a pressing concern in the West. The likelihood and impact of future pandemics are discussed amongst scientists working in various medical fields – from immunology to virology, epidemiology and veterinary research. Pandemic threat and the planning towards its mitigation feature increasingly in policy discourse and strategy at various levels, and most nations have drafted plans to mitigate pandemic risk. Social and ethical tensions are likely to arise in connection to pandemic response and, importantly, already arise in relation to current pre-pandemic planning.

Drawing on sociological knowledge, alongside medical and other knowledges already dominant in pandemic planning, can help us reveal the values inbuilt in current preparedness strategies. It can help us identify the impacts of the mitigation planning measure proposed, and generate a better understanding of the (often unintended) social consequences of measures adopted during previous pandemics. This project pursues a range of interconnected themes: Framing of pandemic risk in media and policy discourse, protocols and best practices circulated by international organisations, smarting up cities and the lessons from other cities (e.g. Singapore and Hong Kong), the role of technology in securitising Western cities against pandemics today and the role of vaccine in the securitisation of Western cities.

The research is based on mixed method: analysis of media archives, desk based research (review of international and national policy guidelines, measures and technologies deployed during previous and current pandemics) site visits, semi-structured and elite interviews with experts, policy advisors and practitioners, and ethnography.

SEiSMiC

The European Research Area is targeting efforts in research and innovation on the current challenges faced by society. These challenges are complex, multidimensional and require the engagement of different actors alongside researchers, particularly relating to integrated and sustainable urban development.

In an effort to bridge the gap between the scientific community and society, SEiSMiC (Societal Engagement in Science, Mutual learning in Cities) aims to create a structured dialogue and mutual learning with citizens and urban actors by setting up National Networks (and expanding on existing networks where possible) in 10 countries across Europe. These networks will specifically include urban stakeholders from civil society, business, NGOs, youth, media, musea but also from research and policy). On the European level, an Advisory Group (with EU-wide urban stakeholder organisations) and an Observer Group (with JPI Urban Europe and European Parliament representatives) will also be established.

The objectives of SEiSMiC as Mobilisation and Mutual Learning Action Plan are threefold. Firstly it aims to mobilise a wide range of urban stakeholders at the local level with a view to, secondly, feed the experiences and challenges of social innovation at local level into the European urban research agenda and to enhance the social dimension of the strategic research agenda of JPI Urban Europe. Thirdly, it will diffuse the initiatives, projects and results of JPI Urban Europe (and other European programmes) to all urban actors at local, regional, national and European level.

It is expected that by means of this multi-level, multi-actor, integrated and inclusive approach, research activities can be increased, new concepts and solutions will be more targeted and accepted, social innovation with the social context is strengthened, and commonalities and differences in European needs, awareness and solutions in the urban field can be identified.

SIS CATALYST

This ambitious SiS CATALYST project seeks to identify how children can be change agents in the Science and Society relationship, and from this starting point, to indicate how they can be catalysts in the longer term solutions to the grand challenges faced by society - their future. It will contextual this in Global, European, national, regional and local arenas. The Action Plan involves refining Case Studies of replicable and scalable SiS activities for children with an associated pan European benchmarking and mutual agreement process, which will provide vehicles for strategic and political alignment, as well as shared assessment tools.

These core WPs will be enriched by WPs which systematically engage three critical groups: young people, students and Key Players. The focus will be on children with ability, who are currently least likely to progress to study science in post secondary education. It will also combine the science and society agenda with the social inclusion agenda through entrepreneurship as well as considering the ethics of activities.

The capturing the mutual learning will be priortised and robustly disseminating and communicating this in regional, national, European arenas and beyond, specifically targeting newcomers. The totality of the activities of the consortium will be externally evaluated and all actors will be assisted to reflect on the 'Partnership Learning' that has occurred. This will be captured as an example of mobilising mutual learning for future European initiatives.

Key to the project will be the active participation of young people, exploring their perceptions and understanding of science. Learning from them as the scientists of the future. The Action Plan will be systematically promoted in Europe and beyond, with the goal of having at least 20 Ministers for Education presenting the same certificates to children in 20 countries in the final year and a Children's Gateway to the website of every University in the World.

SYN-ENERGENE

WEBSITE:
HTTPS://WWW.SYNENERGENE.EU/

Synthetic biology (SynBio) offers huge potential for applications in energy, health and the environment. It also brings with it various challenges such as regulatory issues of biosafety, biosecurity and intellectual property rights, as well as potential environmental and socio-economic risks in developing countries. As yet, however, there is scant public knowledge about the technology. It is thus essential to establish an open dialogue between stakeholders concerning SynBio's potential benefits and risks and to explore possibilities for its 'collaborative shaping' on the basis of public participation. SYN-ENERGY will organise a wide range of mobilisation and mutual learning processes relating to these challenges. Besides a number of well-established European and international networks, the consortium encompasses and can mobilise a wide variety of stakeholders from science, industry, civil society, policy, education, art and other areas. Learning processes will contribute to a better understanding of SynBio research and innovation and to enhanced public engagement, while at the same time stimulating reflection on novel approaches to an inclusive governance framework that is capable of fostering responsible research and innovation. The processes will involve citizens and specific publics through well-established and innovative means of engagement, and will support the convergence of stakeholders and perspectives. Activities will be structured by four platforms, highlighting SynBio's future, public, cultural and research & innovation perspectives. The iterative mutual learning process within SYN-ENERGY will be open to change in order to accommodate the dynamics of an emergent field. By dint of its approach, design and consortium, SYN-ENERGY will be a Science in Society activity with significant impact, raising public awareness of SynBio and yielding benefits for involved stakeholders, public discourse and European policy making in an international context.

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TELLME

TELL ME is a 36 month Collaborative Project, aimed to provide evidence and to develop models for improved risk communication during infectious disease crises. TELL ME combined public health, social sciences, behavioral sciences, political sciences, law, ethics, communication and media, in order to develop original communication strategies regarding complicated messages and advice based on uncertainties, also addressing vaccine-resistant groups.

During infection outbreaks, one of the major problems has always been to communicate with the population in order to influence behaviors, reduce the spread of disease and avoid panic. For centuries the communication strategy adopted by authorities dealing with infectious outbreaks was chiefly based on denial and verbal reassurances, followed, in a further phase, by restrictive measures (quarantine, isolation, compulsory hospitalization) and sanctions for non compliant individuals. The increasing recognition that human behaviour critically influences infectious disease transmission led to concentrate efforts on education and prescriptive messages.

Yet recommendations were soon recognized as insufficient, people needed to be also "persuaded" by emotional messages. The focus then shifted on public health propaganda. As the rapid and tumultuous progress in biological sciences, computer sciences, information technologies, and the naissance of a global public health governance, are offering new, surprising, opportunities for the containment of infectious disease outbreaks, there is the danger that we fail to take advantage of these opportunities, only getting their "adverse effects". We need instead to understand how maximizing opportunities and minimizing risks, notably we should learn to exploit the huge potential that the info society may offer in terms of evidence based and participatory communication. This is the first lesson, that one should get from communication failures occurred during the 2009 influenza H1N1 pandemic. A real paradigm shift has occurred, new challenges must be addressed, new models should be developed: this is the pivotal concept that has driven the consortium to propose the TELL ME project.

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4. CONCLUSIONS

4.1 The ASSET Community of Practice

The objective of the ASSET Community of Practice was to help all partners to share a common vision of project's goals and a way to work and benefit together from theoretical reflections and field experiences. We can say that the result has been fully achieved: the CoP has become a mature instrument, regularly used by partners and stakeholders in the different areas, as evidenced by the nearly 65.500 accesses during the lifetime of the project.

4.2 The ASSET MMLAP Virtual Cluster

The MMLAP virtual cluster successfully started with two webinars on 2015. During the project, the number of projects identified and invited to participate to the cluster has grown steadily and today there are 39 participants. Project managers visited the dedicated MMLAP's area at the CoP and 15 of them participated in the brokerage event at the end of October 2017.

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