

EOSCExecutiveBoard

EOSC Governance and Sustainability

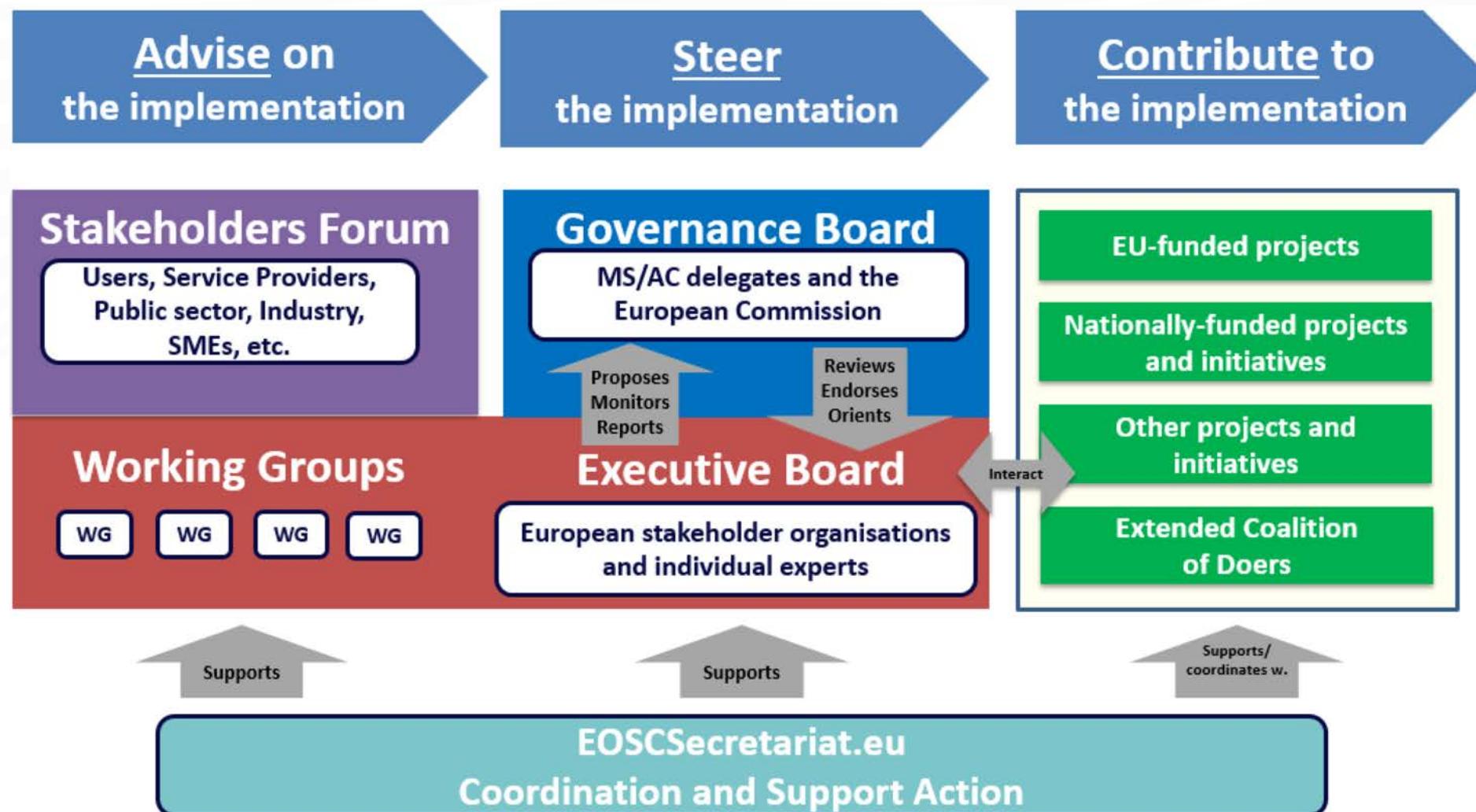
Rupert Lueck | EMBL
Executive Board
Co-chair EOSC Sustainability
Working Group

EOSC Launch Event

Nov 23 2019, Vienna



EOSC governance structure



Governance Board

- Representatives from all 28 member states and 10 associated countries
- Chaired by Hans Josef Linkens, BMBF, Germany
- Forming sub-groups to feed strategic inputs into EOSC Exec Board and Working Groups
- https://ec.europa.eu/research/openscience/pdf/ec_rtd_eosc-governance-board_062019.pdf

Executive Board

- Karel Luyben & Cathrin Stöver as Co-Chairs
- 8 representatives of stakeholder groups
- 3 independent experts



KAREL LUYBEN



CATHRIN STÖVER

JEAN-FRANÇOIS
ABRAMATIC

JUAN BICARREGUI



JAN HRUSAK



SARAH JONES



STEPHAN KUSTER



RUPERT LÜCK



NATALIA MANOLA



JOHN WOMERSLEY



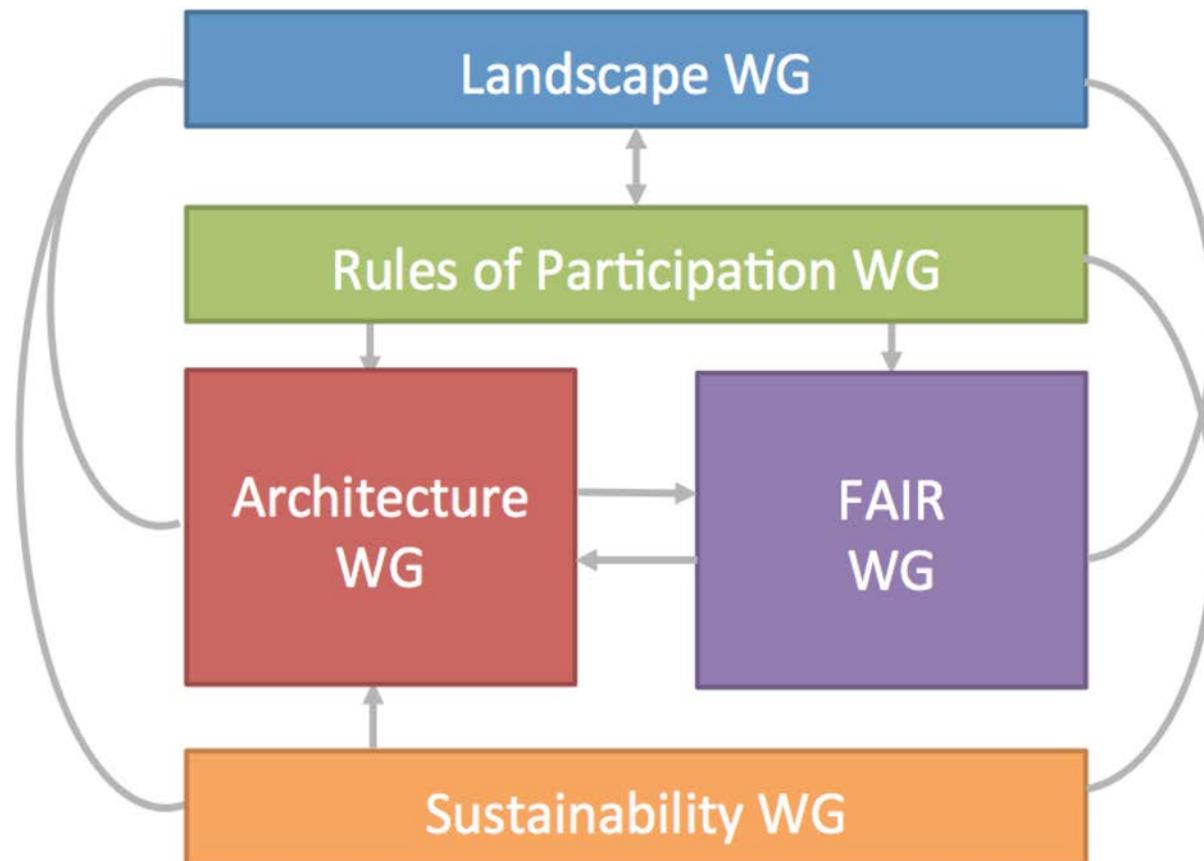
RON DEKKER

[https://www.eoscsecretariat.eu/
eosc-governance/eosc-executive-board](https://www.eoscsecretariat.eu/eosc-governance/eosc-executive-board)

A photograph of a group of children playing tug-of-war on a grassy hill. In the foreground, two boys are pulling on a rope. The boy on the right wears glasses and a grey puffy jacket with a red patch on the sleeve that reads "ART BUTCHER STREET". The boy on the left wears a blue jacket. In the background, several other children are watching the game.

Working Groups

EOSC Exec Board Working Groups



<https://www.eoscsecretariat.eu/eosc-working-groups>

Parallel / proposed groups

- Communications Task Force
 - Run by EB/EC/Secretariat
 - Tasked with branding, trademark and comms
- Skills WG
 - Proposed to run in 2020
- International WG
 - Proposed to run in 2020

How initial 5 WGs were formed

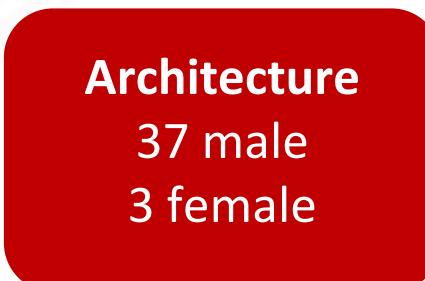
Members

- Nominations by Governance Board (all WGs)
- Nominations by Executive Board (FAIR WG)
- Nominations by H2020 projects (Architecture WG)

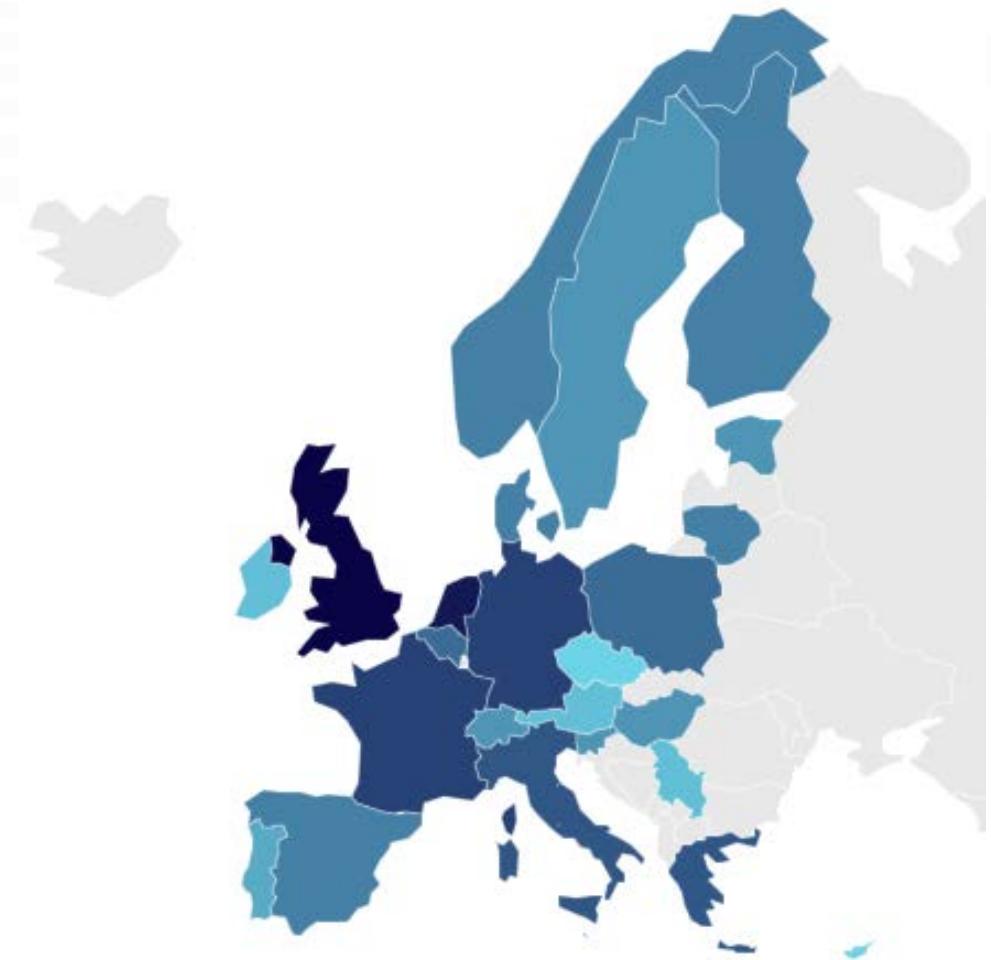
Contributors

- All WGs seeking inputs from existing projects and initiatives
- Architecture WG members have nominated experts to Task Forces
- WGs may invite presentations from H2020 projects, have experts join meetings/telecons, and commission consultancy reports

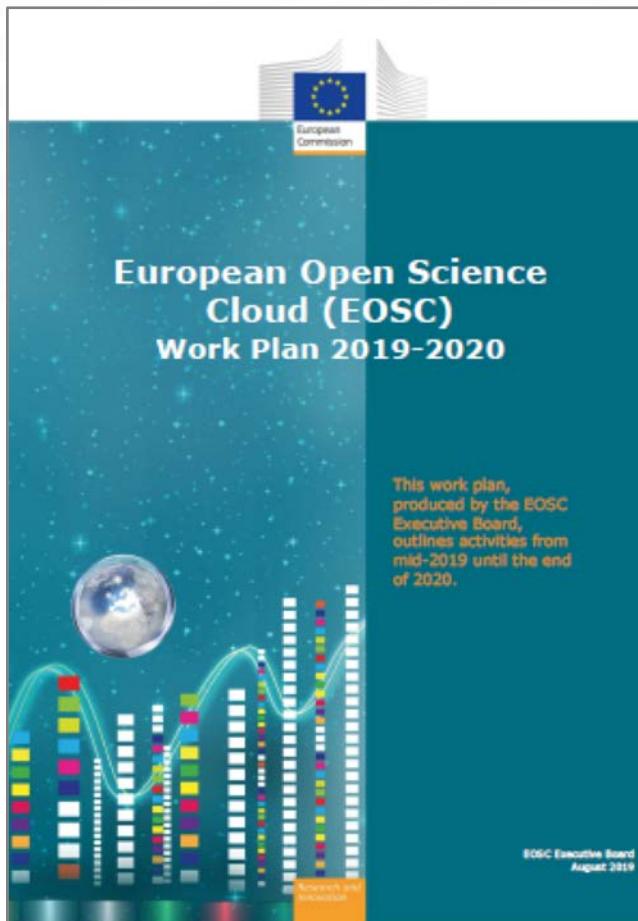
WGs by numbers



Experts represent 22 of the EU Member States and Associated Countries



Work Plan published



Contents

- A first EOSC iteration by end 2020
- Timeline
- Procedures and required inputs

<http://doi.org/10.2777/972843>

A first EOSC iteration by end 2020

- Agreed and tested Rules of Participation ([RoP](#))
- Analysis of the existing national infra and policies ([Landscape](#))
- Financing model, legal entity & post 2020 governance ([Sustain](#))
- Functioning federated core ([Architecture](#))
- Initial set of EOSC data and services ([Architecture](#))
- EOSC Interoperability Framework ([FAIR](#), [Architecture](#) & [RoP](#))
- Persistent Identifier policy ([FAIR](#) & [Architecture](#))
- Metrics for FAIR data and certified services ([FAIR](#))

Timeline

Iteration and testing built into plan

Initial / outline outputs → TEST → Updated / final

Agree versions for implementation post 2020

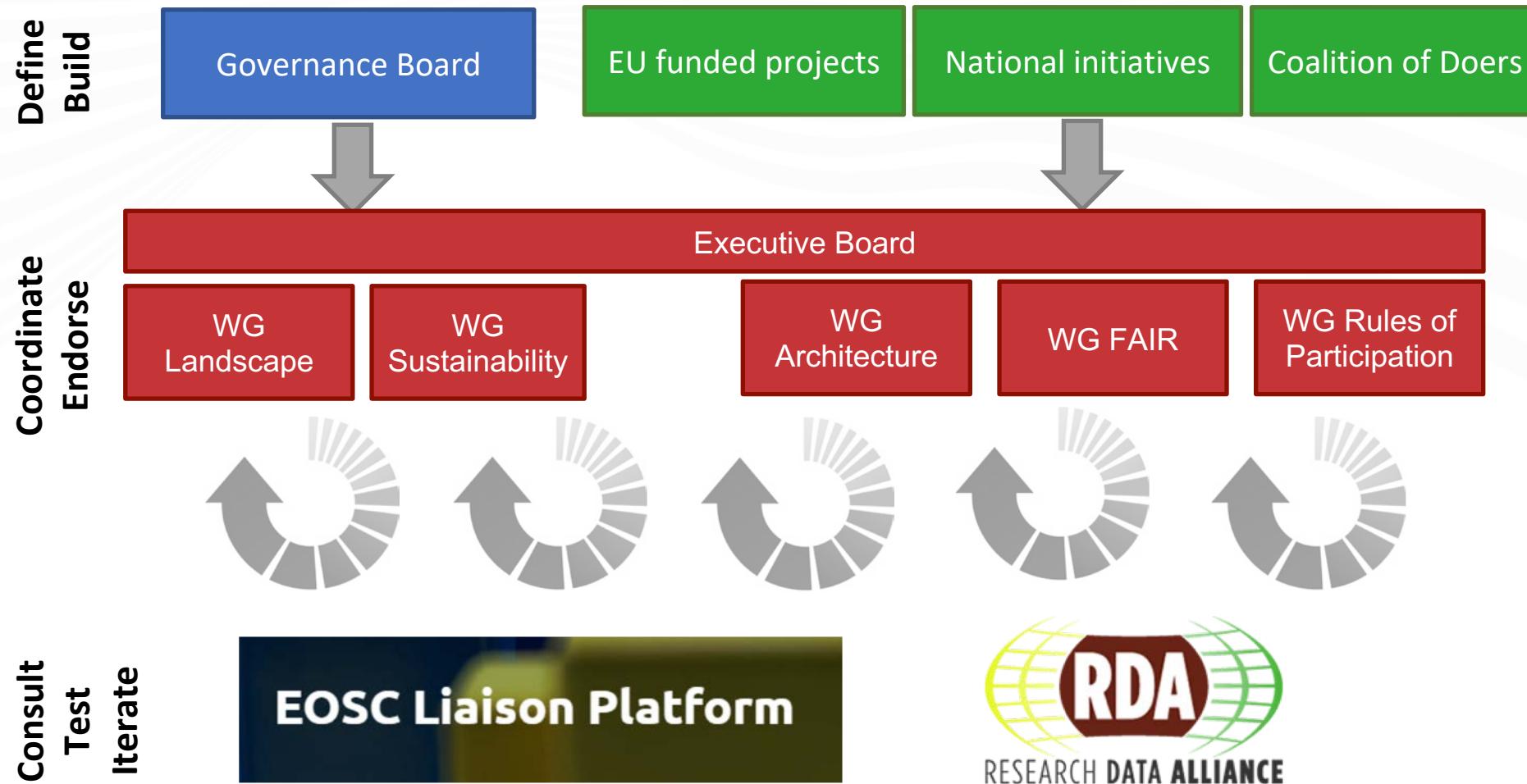
	Landscape (Jan Hrusak)	Sustainability (Rupert Lueck)	Architecture (JF Abramatic)	FAIR (Sarah Jones)	Rules of Participation (Juan Bicarregui)	EB/GB Comms Task Force (Ron Dekker)
Q2 2019 Apr-Jun				Annual FAIR workplan		
Q3 2019 Jul-Sep	Initial landscape mapping				Initial EOSC Rules of Participation	
Q4 2019 Oct-Dec	Final landscape mapping		Outline PID policy Initial federating core Registry of infrastructure Updated catalogue & Portal	Outline FAIR metrics & repository certification		Continual comms and engagement via Liaison Platform & Stakeholder Community events
Q1 2020 Jan-Mar				Annual FAIR workplan		EOSC brand
Q2 2020 Apr-Jun			Preliminary connection of infrastructures and services EOSC Catalogue of datasets			Trademark
Q3 2020 Jul-Sep	Report on EOSC readiness		EOSC Interoperability framework (joint output)			
	Strategic & financing options post 2020				Final EOSC Rules of Participation	
Q4 2020 Oct-Dec			Updated PID policy			
				Updated FAIR metrics & repository certification		

WGs are not reinventing wheels

- Need to reach out to H2020 projects, national initiatives and coalition of the doers
- Working Groups dependent on YOU!
- You produce and we coordinate & endorse
- Collectively we will build EOSC



Procedures and inputs



A close-up photograph of a person's hands and arms. The person is wearing a yellow ribbed sweater and a large, shiny, metallic cuff bracelet on their left wrist. They are using a silver laptop, with their fingers on the keyboard and their right hand resting on the touchpad. The background is blurred, showing what appears to be a keyboard and some papers.

Early results



EOSC Landscape

Executive Board Working Group

Chair: Jan Hrusak
Independent Expert



Introduction Background



Inventory - stocktaking and synthesis from existing documents



Mechanisms, modus operandi, trends and developments



Analysis and generalization, good practice examples, preparedness of MS



A) EOSC related
infrastructures with
reference framework
B) policies + legislation

A) operations of
infrastructures
B) policies evolvement

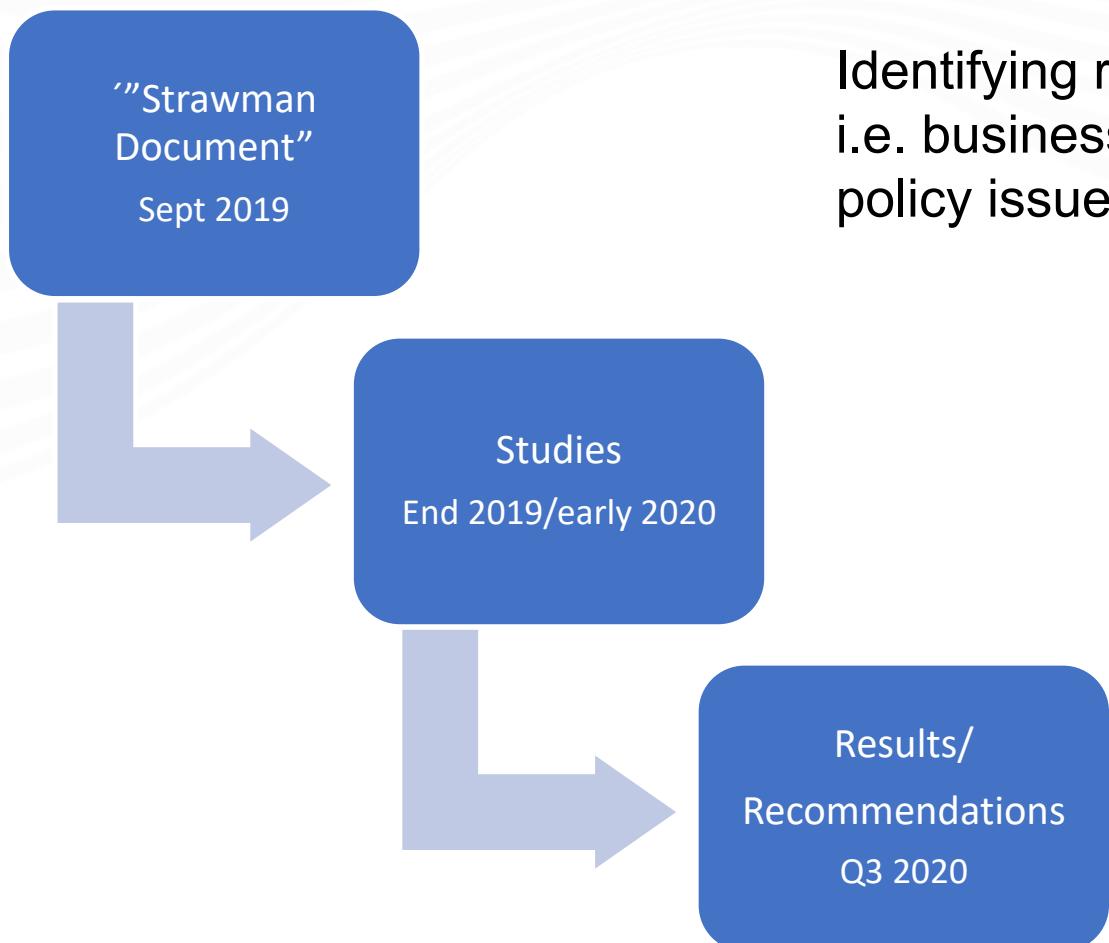
in collaboration with the other
WGs and the projects (external
subcontractor)

- Initial document drafted. Presented to EB on 25 October & GB thereafter
- Second phase inputs to come in Q4 2019 from the INFRAEOSC-5B projects
- Plan to subcontract analytical work on MS preparedness
- Validation workshop foreseen for January 2020



Co-Chairs
Rupert Lueck
EMBL

Lidia Borrell-Damian
Science Europe



Identifying recommendations for EOSC post-2020 sustainability,
i.e. business models, legal entity options, governance, national
policy issues

Strawman Document

- Iterative approach – gradual growth of EOSC
- Start with MVP for publicly-funded researchers
- Further iterations, establishing Digital Marketplaces to include additional services for researchers, public sector and industry
- Plan studies on legal entity and business models



Working on scoping and partitioning the scope

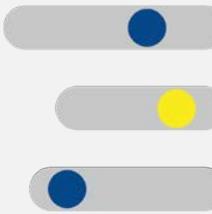
Different RoP will be required for different roles (users, providers)

Key questions for Rules of Participation

1. How should the RoP constrain what service providers can require of users?
2. How should users discover and access EOSC services?
3. How should EOSC minimise the barriers to service providers taking part?
4. To what extent should all of the above apply to Non-European users and service providers?



- WG members have identified 5 key areas of work
 - Authentication & Authorization Infrastructure (AAI)
 - Persistent Identifier policy (with FAIR WG)
 - Glossary (with Landscape WG)
 - Metadata
 - Data Access
- Two initial task forces launched – AAI & PID



- All Task Forces have defining scope and reviewing existing work/planned inputs
- Key outputs / progress to date
 - Defining matrix map FAIR practice / maturity
 - Drafting initial PID policy to consult at events
 - Liaising with FAIRsFAIR and RDA on metrics & certification
 - Considering what the EOSC Interoperability Framework should cover and how it should be formed



EOSC FAIR

Executive Board Working Group

Task Forces



Dynamic duo
- Rob Hooft
- Marta Teperek



Semantic specialists
- Oscar Corcho
- Krzys Kurowski



FAIR practice

Interoperability

PID policy

Metrics & certification

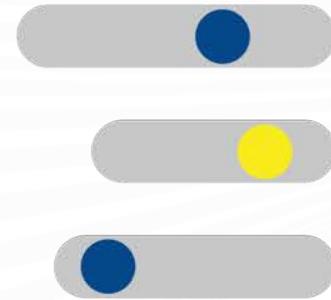


Identifier nerds
- Peter Wittenburg
- Rachael Kotarski



Research leads
- Francoise Genova
- Magnus Aronsen





EOSC Sustainability

Executive Board Working Group



EOSC Sustainability Working Group Update

Strawman report: Solutions for a Sustainable EOSC

Rupert Lueck / EMBL – Lidia Borrell-Damian / Science Europe



EOSC Sustainability

Executive Board Working Group



Co-Chairs
Rupert Lueck
EMBL

Lidia Borrell-Damian
Science Europe

WHAT

Provide strategic, legal and financing recommendations for an operational, scalable and sustainable EOSC federation after 2020

HOW

1. Analyse business models and implications on legal entity, costs, regulations, financial strategies, supporting NDI alignment
2. Map potential legal entities, taking into account national and European legislation

WHY

A clear understanding of key strategic, financial and legal aspects is essential for the second phase of the EOSC implementation

Towards a sustainable EOSC

3. Examine options for a governance framework to oversee EOSC operations and development
4. Analyse regulatory/policy environments and assess impact of proposed structures and funding streams at national & European level



Q1 2020

Initial analysis of alternative business model scenarios and potential future legal models

Q2 2020

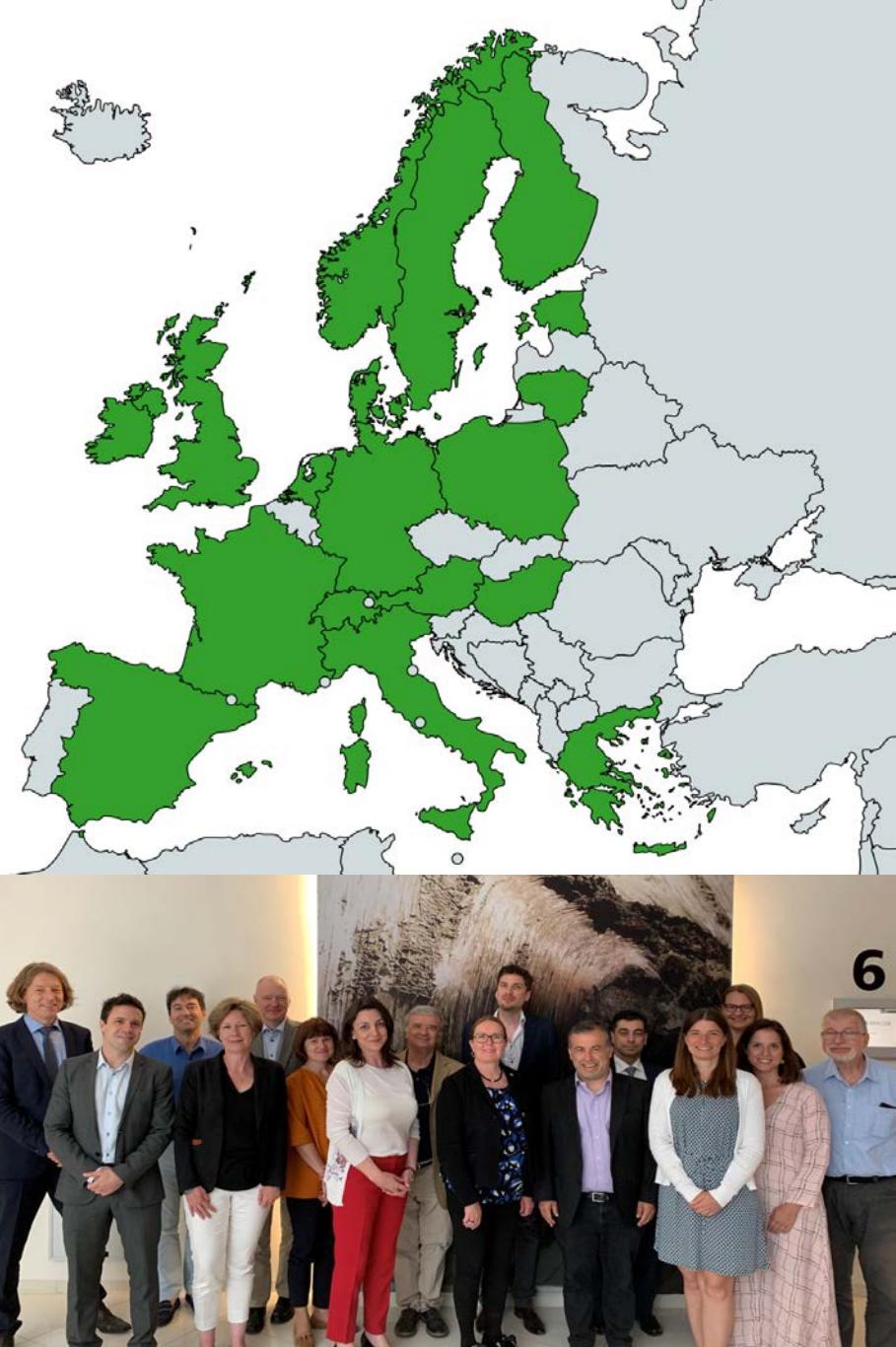
Refined business model options and future legal models

Q3 2020

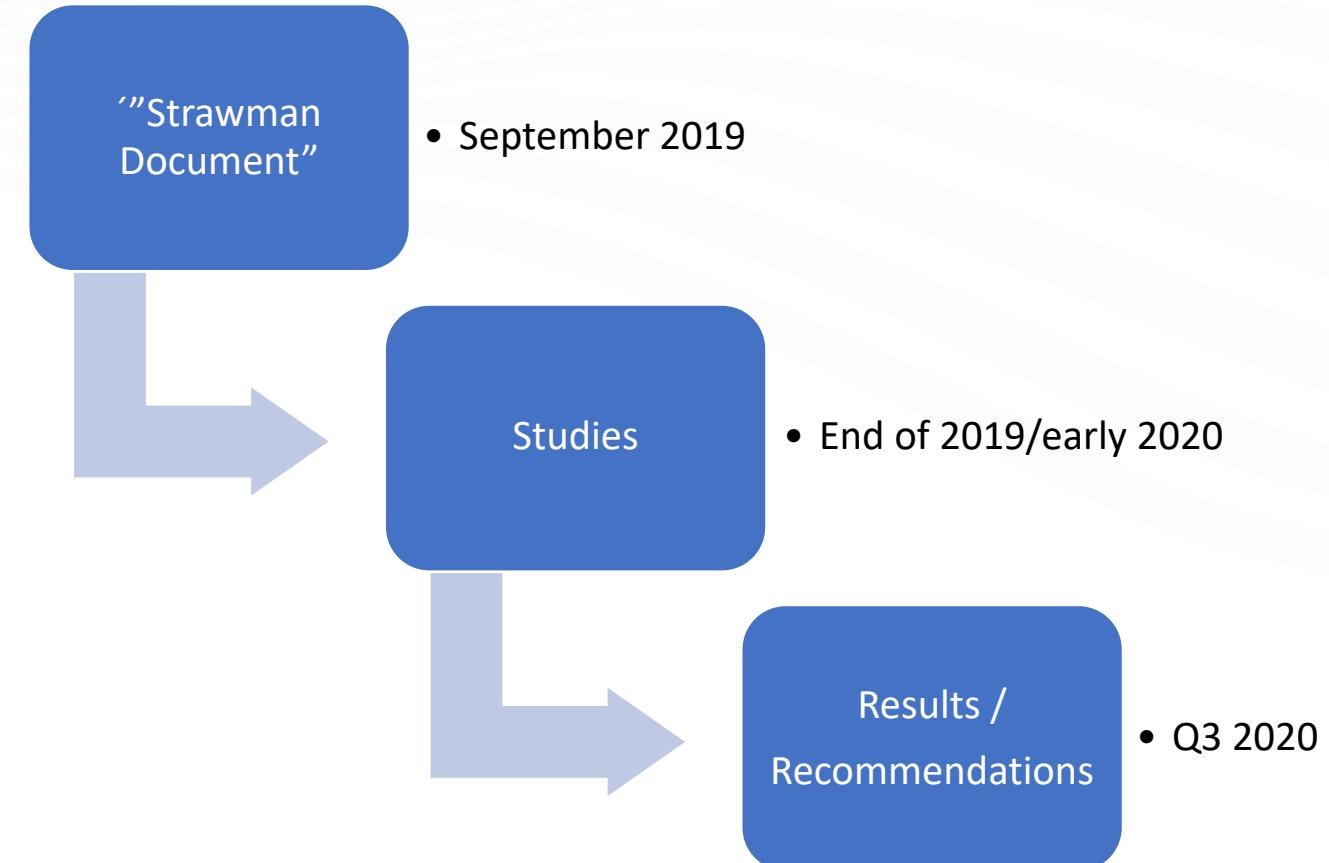
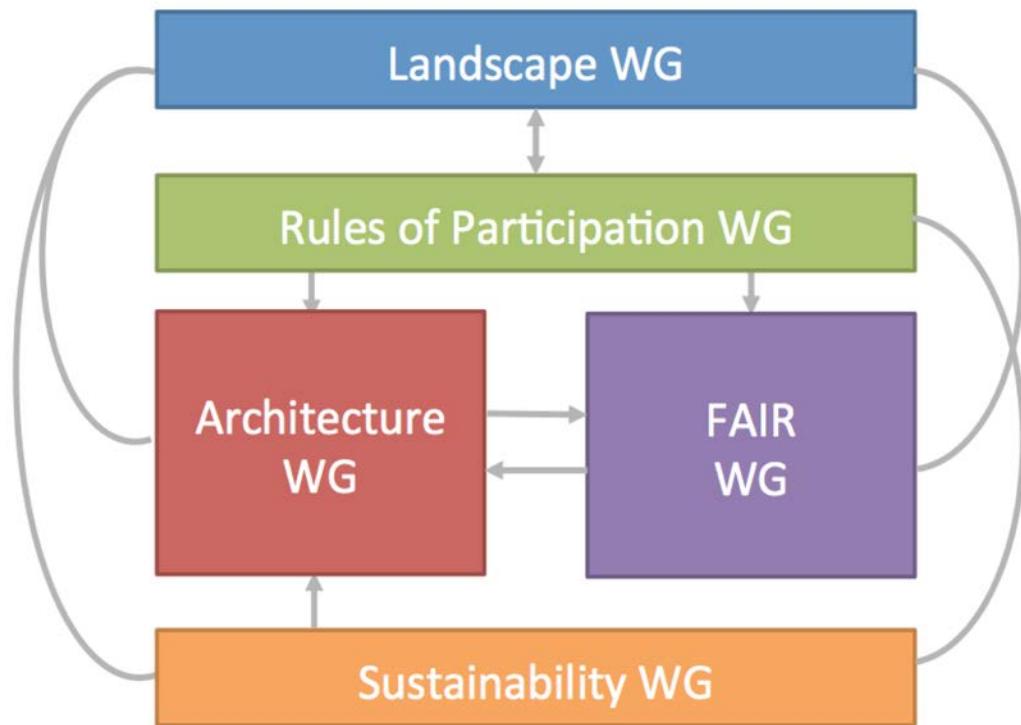
Recommendations on strategic and financing orientations and organisational settings for the future of the EOSC, post 2020

Working Group members

- 18 WG members from 18 countries (Member States and Associated countries) – quite well distributed in terms of Geography
 - most of the representatives are from: NREN, service providers, HPC experts, libraries and ministries.
 - Data infrastructures may be less well represented
 - Gender balance is almost achieved
- 2 Co-Chairs (Executive Board members)
- 3 EC representatives (RTD and CNECT)
- 1 Rapporteur
- Support staff
- Meetings: monthly teleconferences and up to 4 face-to-face meetings per year



Working Group Activities



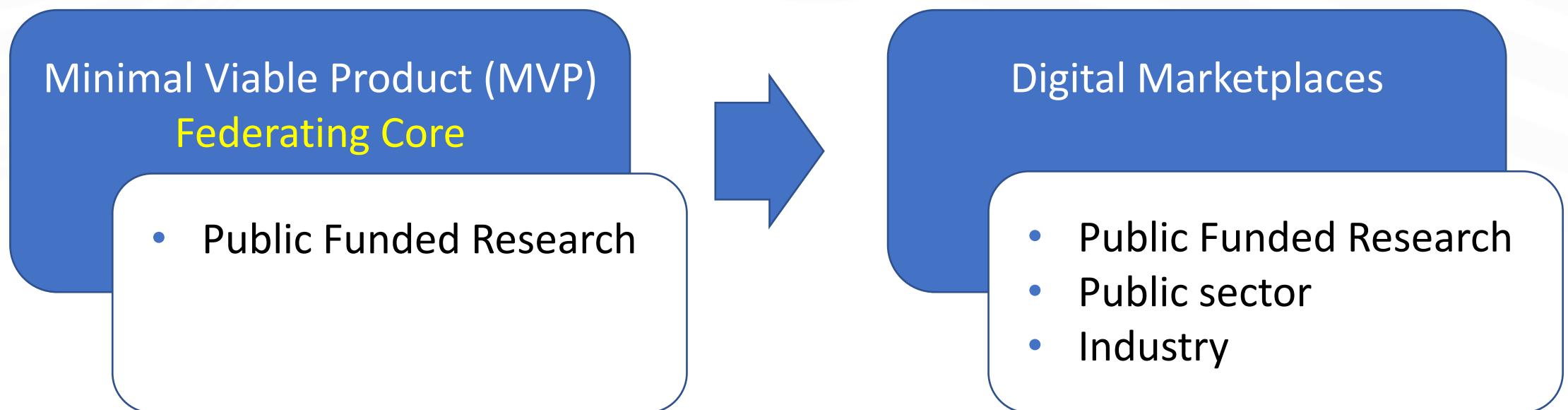
<https://www.eoscsecretariat.eu/eosc-working-groups>

Aims of this document

- Exploring possible means for sustaining the European Open Science Cloud beyond 2020
- Considering financing model, legal vehicle, governance structure as well as the regulatory and policy environment of the EOSC
- Intention to lead discussion about the possible options (not to be seen as a final proposal)
- Set foundation for preparation of studies

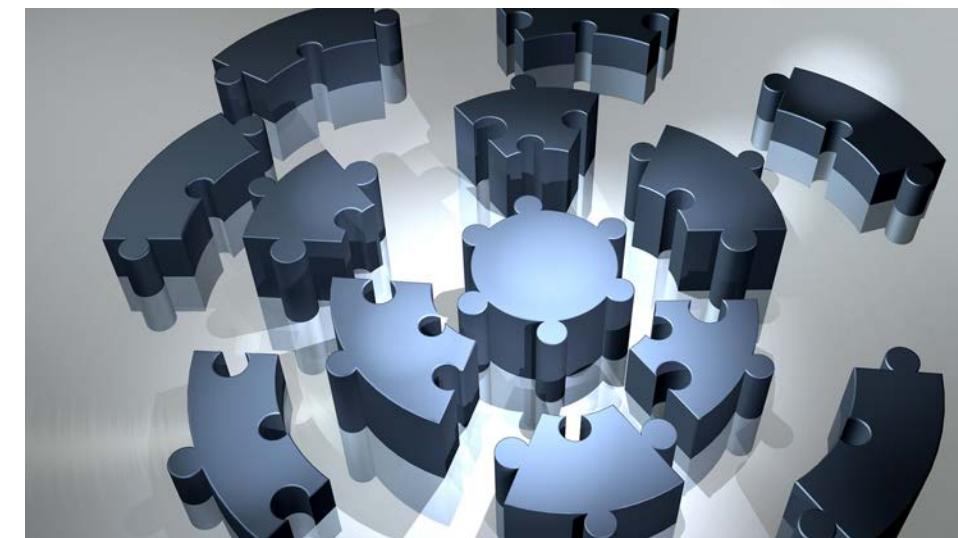
Results

- Iterative approach – gradual growth of EOSC starting with a MVP which includes the most essential building blocks initially targeted at publicly funded researchers



MVP as iteration 1 – Federating Core

- Federating Core
 - Intelligent access to sophisticated resources and tools delivering more collective value
 - Thin layer of horizontal services to support federation of existing and planned data infrastructures
 - In itself has no means to store, transport, process or preserve research data
→ limiting risk of data loss if EOSC MVP fails
 - Sustainability dependent on contributing infrastructures
- Legal entity options
 - should not be based on MVP alone but consider later iterations
 - Host agreement with existing public/private organization (no new, dedicated legal entity)
 - ERIC
 - Joint Undertaking
 - AISBL
 - ...



MVP as iteration 1 – Federating Core

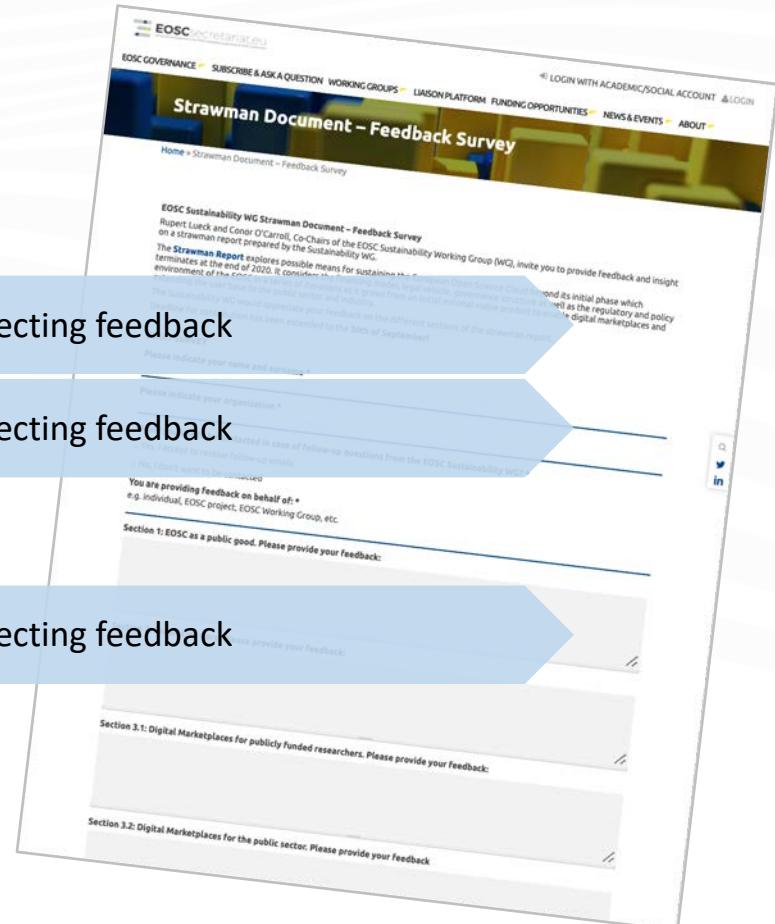
- Financing options
 - Long-term funding will be required
 - Participation and financial contribution must be positioned at national level
 - Research population size may be considered as basis for financial contributions
 - European Strategic Partnership as opportunity (either co-funded or co-programmed)
- Governance
 - Things to be considered
 - conflict between needed breadth of representation vs. effective size of the executive arm of governance
 - The rules for joining and leaving each board require careful consideration (e.g. eligibility, types etc).
 - Are the representation channels for key providers of the Federating Core appropriate for a mature EOSC?
 - Inclusion of a benchmarking activity so the level of usage, user satisfaction and cost effectiveness are regularly assessed by a third party
 - Available resourcing must be realistic and appropriate for the scale of the undertaking
 - EOSC's future global ambitions – what about countries beyond Europe?

Iteration 2 – Digital Marketplaces

- Aim: EOSC as a service-oriented environment where it is possible for innovators to exploit FAIR data using the latest IT technologies and trends
- Add services from both publicly funded and commercial providers accessible against some form of payment
- Funding:
 - freely defined but visible fees and transparent state funding
 - Potential model: registration charge paid by service provider per service + transaction charge paid by service provider based on total volume of consumption
 - Funds may come from research grants, centralized funding etc.
 - One example: commercial cloud service marketplace operated by GEANT



Sustainability schedule & activities



Engage with us – see you in Budapest!

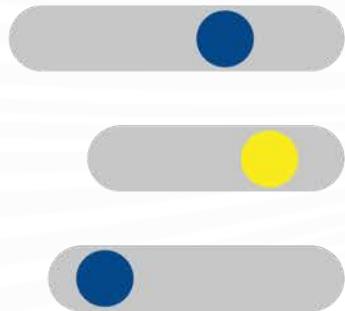
<https://www.eoscsecretariat.eu/events/eosc-symposium-2019>



EOSC Symposium 2019 "Where the EOSC makers & shakers meet"

An integral part of the EOSC Stakeholder Forum
26-28 November 2019, Budapest, Hungary

Co-located with the EOSC Coordination Day (28-29 November 2019)



EOSC Sustainability

Executive Board Working Group



Thank you!