

Open science policy development and implementation: Lessons learnt and perspectives in EOSC







Implementing Open Science in Europe and EOSC



What is EOSC?

European Open Science Cloud

- A virtual environment
- Set up by European Commission
- Combines existing scientific data infrastructures
- Find, access, and reuse research data
- Interlink and combine data sets with other data sets
- Across disciplines and borders

 \rightarrow Enables new and unexpected discoveries





Challenge EOSC wants to address

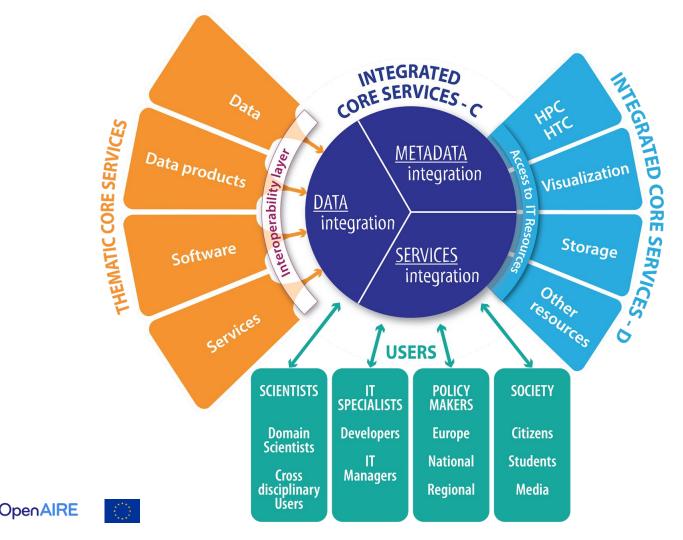
- Provide access to data and research results
- Handle the increase in data volume
- Battle limited data publications and sharing of data
- **Disciplines** that are working in silos
- Collaboration and synergy of data infrastructures, services and expertise



EOSC key characteristics

- Trusted and open virtual environment with seamless access to services (with highest TRLs) addressing the whole research cycle
- Multi-layered federation which brings together supply and demand in a trusted environment
- Open, transparent, rule of law based: no lock-in by individual service providers, data portability, IPR, cloud security...
- Adaptively user-oriented and inclusive (across borders and disciplines)
- Governed by a minimal set of Rules of Participation
- Steered by an inclusive governance structure





Source: https://epos-ip.org/epos-vision-eosc

European approach

Stakeholders working together to

- cataloguing datasets
- combining pre-existing research infrastructures
- provide services for researcher data
- exchange datasets across disciplines
- create the internet of FAIR data



• • • •

Involving <u>all</u> stakeholders

Three layer structure

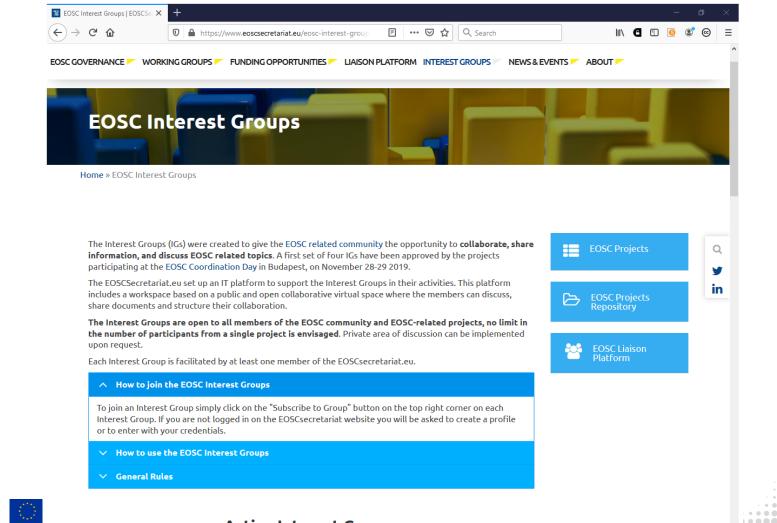


EOSC Board of member states <u>to ensure</u> effective supervision of EOSC implementation

Executive Board of stakeholder representatives <u>to help</u> <u>ensure</u> proper EOSC implementation and accountability **Stakeholder Forum** to provide input from a wide range of actors

Working Groups

- Architecture
- FAIR
- Rules of Participation
- Landscape
- Skills and Training
- Sustainability
- **Interest Groups**



....

Active Interest Groups



Active Interest Groups

EOSC Researcher Engagement and Use cases

Q

Ƴ in

EOSC Service and Research Product Catalogues

EOSC Federating Core



EOSC Glossary

EOSC GOALS

DpenAIRE

- Store, manage, analyse and share data
- Create data with a higher value
- Openness to research data and infrastructure
- Pan-European cooperation to create the internet of FAIR research data and services
- Interlink people, data, services to accelerate open science, facilitate open access, promote collaboration between data infra
- re-use of data, FAIR data implementation
- interoperable will enable interdisciplinary research
- \rightarrow EOSC provides a trusted and open distributed environment for the scientific community

Researchers will be able to

- Find data
- Exchange data
- Have access to data
- Reproduce data
- Interdisciplinary use of data
- Use federated services and infrastructure
 → knowledge production will also benefit
 industry and businesses



About OpenAIRE

Who is **OpenAIRE**

34 National Open Access Desks

Organizations experts in OA

Regional / Topical Experts

4 regional coordinators 3 topical coordinators 50 partners from all of Europe

e-Infrastructure / e-Science Service Providers

Infrastructure experts Metadata experts Big data technologists Text & data analytics experts

Legal Experts

IPR Data privacy

Data Communities

EU Research Infrastructures



Citizen Science

Schools Citizen science groups

Open Innovation

Industrial cluster facilitators Innovation management coordinators



Policies

Aligning

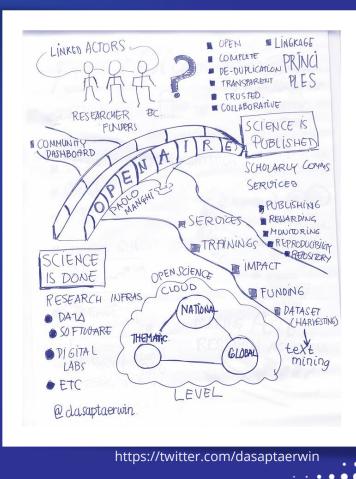
Training

Empowering

Services

Connecting

OpenAIRE



. . .

OpenAIRE Bridging the worlds where science is performed and science is published

OpenAIRE key characteristics

- Distributed and participatory infrastructure
 - Connecting different actors across Europe
- Based on existing initiatives
 - Institutional and national investments
 - Repositories and open infrastructures of key importance
- Linked open science
 - Support for all types of research outcomes
 - Contextual intelligent discovery



OpenAIRE

open and reproducible science scientific/scholarly communication data infrastructure social + technical links service + data interoperability

EOSC and OpenAIRE

Achieving Open Science in the EOSC

Read our position paper "Achieving Open Science in the European Open Science Cloud"

https://doi.org/10.5281/zenodo.3475076

Achieving Open Science in EOSC

Holistic perspective on data flow: Equally

addressing large scale science and scientific research carried out on a smaller scale, is critical for the success of open science in EOSC, both in terms of value and investments, and in terms of researcher uptake.



Achieving Open Science in EOSC -Researcher in the center Easiness: Offer services & tools seamlessly embedded in research workflows **Reward**: Help with restructuring incentives for datadriven science by keeping track of research production & use Skills: Targeted training & support, addressing all aspects & all levels of the research life cycle **Commitment**: Efficiency of processes & sustainability of resources & business models for openness



Achieving Open Science in EOSC (3)

Publishing all kinds of scientific products

- Publishing semantic links
- Publishing experiment products as digital packages of workflows
- Innovation in publishing & dissemination practices & methods
- Quality control for securing the quality, reproducibility, FAIRness of research results
- Assessment & rewarding by intelligently combining diverse/open/auditable metrics

Monitoring Open Science to ensure its implementation



DATA SHARING

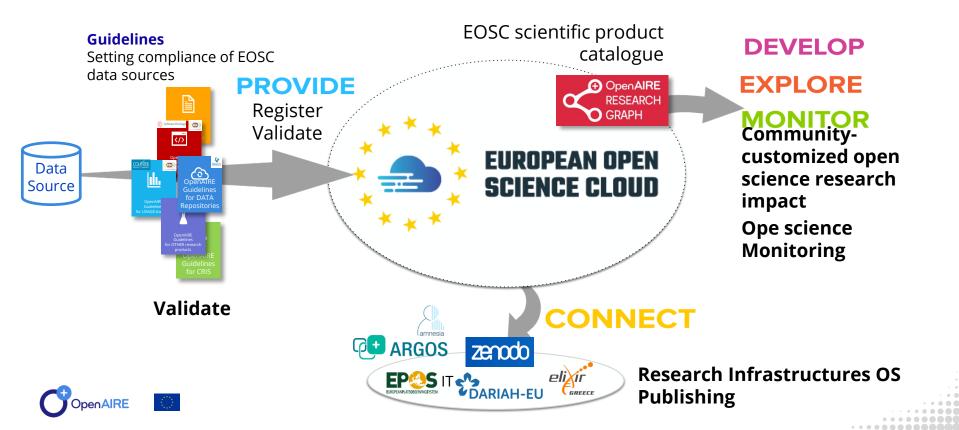
"1.7 million European researchers and 70 million professionals in science and technology a virtual environment with free at the point of use, open and seamless services for storage, management, analysis and re-use of research data, across borders and scientific disciplines"

2h

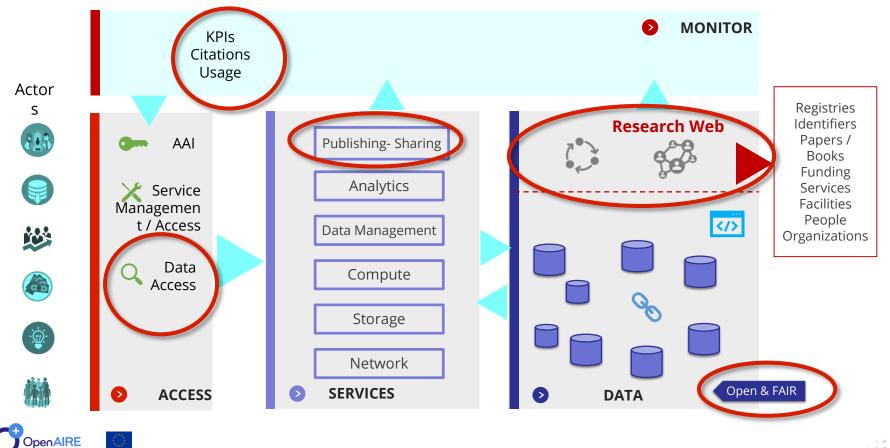
CONNEC

SUSTAINABLE

OpenAIRE services placed in EOSC



EOSC "deconstructed"





Openness as success factor for EOSC

The EOSC will only be successful if there is enough researcher engagement and uptake. Free (at the point of use), uncomplicated and intelligent access to data should be a core **EOSC Unique Selling Point**, adding value to existing EC and MS/AC investments. To reach a turning point for EOSC to fulfil its mission and vision, Open Science and specifically Open Access to research results (data, publications, software, protocols, as well as tools and services) should be a strategic priority, a key enabler into achieving a critical mass of accessible content for researchers to experiment with, stimulating the demand.

Goals

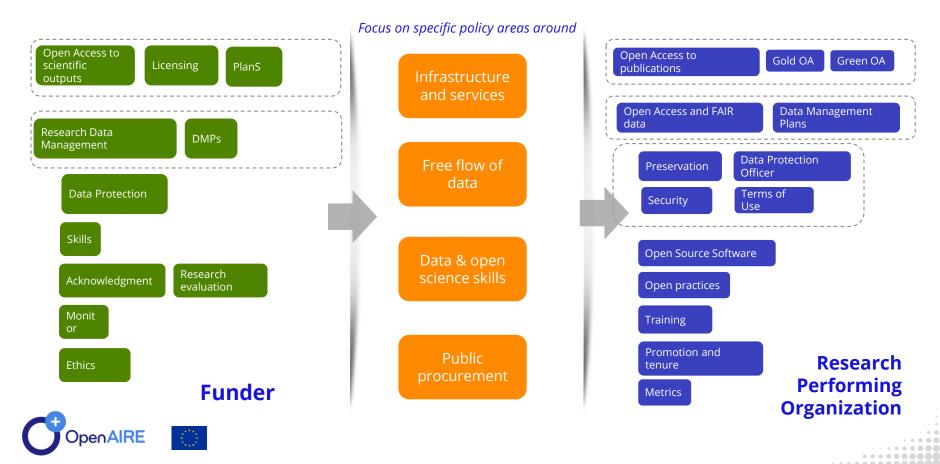
- 1. Produce consistent policies at the EU, the Member State and the institutional level
- 2. Standardise interactions at the organisational and institutional level

• •

- 3. Focus on the interactions with the industry, where the greater inefficiencies currently exist
- 4. Focus on interactions with platforms in order to maximize value, protect data ownership and portability and avoid vendor lock-in
- 5. Automate the application of policies supporting OS by design and default, as well as data sovereignty for the user
- 6. Support the development of the e-infrastructures services that could use the EU GDPR as a competitive advantage



Transforming *macro* **Policies** to *micro*



Access – Collaboration – Innovation – Participation

... practice science in such a way that others can collaborate and contribute, where research data, lab notes and other research processes are freely available, under terms that enable reuse, redistribution and reproduction of the research and its underlying data and methods.

> Open research beyond academia Innovation + Citizen science



Open Science – why?

What it entails

Open

publications research data / FAIR data software / lab books methodologies / protocols educational resources processes (open peer review) annotations

linked Open Science (provenance & context) access to <u>resources</u> for analytics



Why

- Science matters
 - Science doesn't just happen in a lab—it's a part of our everyday life
- Research is part of the wider ecosystem
 - Academic ecosystem
 - Innovation process
 - Social responsibility

A dialogue





It's all about trust

- Transparency
- Reproducibility
- Accountability

Increased consumer choice from public research





Innovation potential via access to

- data, information, knowledge
- computing resources
- people



Open Science – how? Challenges & Opportunities



Making the bridge from a global perspective of research, to the local implementation, actors and support



Data-driven research Data science skills Big vs. small science/data

Differences in Collection, Processing, Scalability, Modeling, Storage & Computation Coupling, Data Science, Data Security



Researcher in the center

- Reputation
- Incentives
- Services



Embed quality in openness FAIR research data / content Linked research Findable Accessible

Interoperable Reusable



New sharing culture ...via innovative services Social networks Shared economy models Innovate means of dissemination





Knowledge extraction ...made easier Technology advancement with text and data mining (TDM) and AI More easily accessible computing resources





Plethora of platforms Common approaches between sectors

Big and small data

...small data will increasingly be made more big datalike through the development of new data infrastructures that **pool, scale and link small data in order to create larger datasets**, encourage sharing and reuse, and open them up to combination with big data and analysis using big data analytics





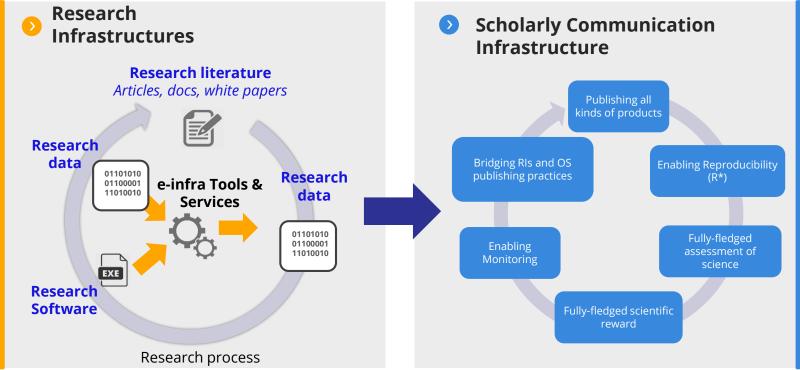
Use existing scholarly communication infrastructure

Scholarly communication a common language to bridge views, perspectives and gaps

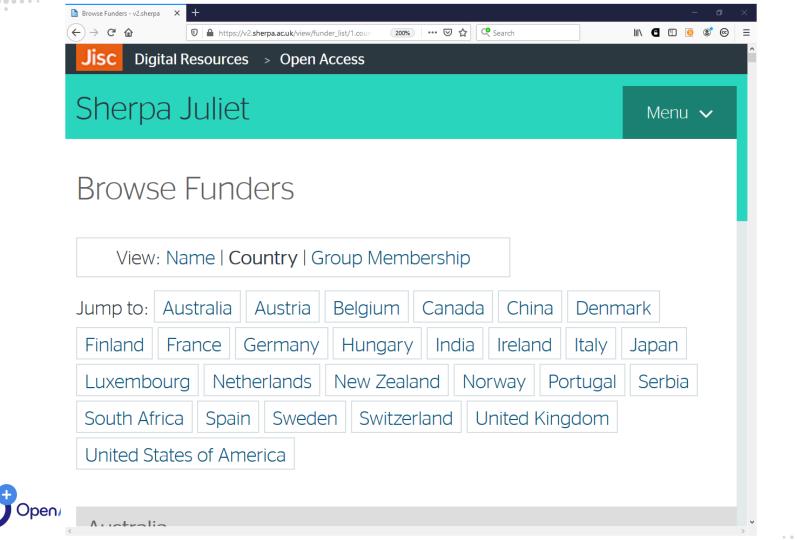
Publishing research results at any stage of the research life-cycle



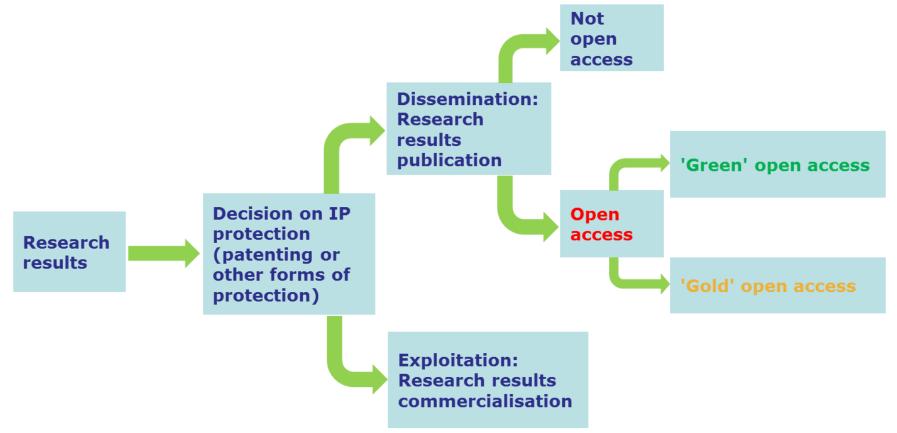
How - Scholarly Communication transition to Open Science







Dissemination and exploitation



| 🝼 Belgium | × | + | | - 0 × |
|-----------|---|--|------------------------|-----------------|
| ← → ♂ ☆ | | 🖲 🔒 https://www.openaire.eu/item/belgium | 170% ···· 🕑 🟠 🔍 Search | II\ 🕻 🗉 🧕 📽 😑 🗏 |

There are three main funders: BELSPO (federal), FWO (Flanders) and F.N.R.S. (Wallonia)

BELSPO

 At BELSPO, there is an Open Access Mandate which requires:
 1.Depositing publications in Green Open Access institutional or thematic repositories on ID/OA basis (Immediate Deposit - Optional Access).
 and recommends to:

2. Publishing in free of charge Diamond Open Access Journals/platforms run by public organizations.

3. Publishing in commercial Gold Open Access Journals with transparent pricing policies and fair prices for genuine added value.

The BELSPO Open Research Data policy complies with FAIR principles and its conception is to be considered fully within the EOSC framework. BELSPO expects a provisional DMP upon submission of the grant application, and a completed DMP no later than 6 months after the start date of the project. After the end of the proejct data should be deposited in a certified and trusted data repository. The BELSPO follows the FAIR researchd ata management principles in the template of their DMP. Furthermore it encourage re-use of research data where possible.

🗊 🔒 https://www.openaire.eu/item/belgium

170% ···· 🗵 🏠 🧟 Search

FWO

→ C' ŵ

×

🔿 Belgium

 (\leftarrow)

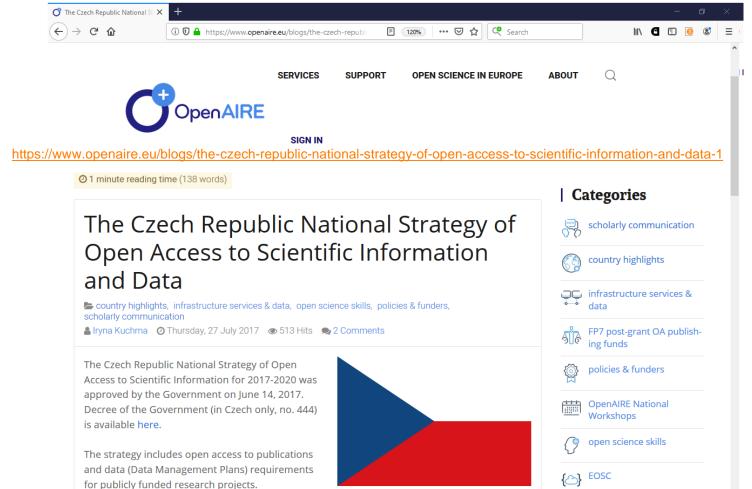
 According to the general regulation of the Research Foundation-Flanders (FWO), it is mandatory to make publications resulting from FWO funded research publicly available in a repository after maximum 1 year. Open Access 'Gold' is optional, for which the FWO funded researchers can make use of the consumables or bench fees that are part of their funding. The main host institutions, i.e. the Flemish universities, have repositories in place to facilitate this measure.

FWO demands that researchers ensure that all data relating to their research are stored securely and sustainably, taking into account the specific characteristics of the discipline and the nature of the research. To stimulate exchange of good practices and expertise a working group on research data management has been established within the Flemish Interuniversity Council (VLIR).

F.R.S. - F.N.R.S.

The F.R.S.-FNRS has issued a regulation on the implementation of the policy of Open Access to scientific publications resulting from research programmes supported by the F.R.S.-FNRS and Associated Funds, which is in force since 30/06/2013

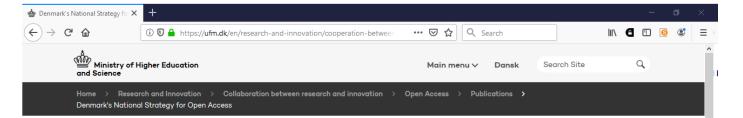
https://www.openaire.eu/item/belgium



presentations & publica-

ᡵ

Interoperable and OpenAIRE compatible open access e-Infrastructure will be built. And awareness raising and educational activities will be conducted.



Denmark's National Strategy for Open Access

Open Access

- Publications

- Vision and targets
- Denmark's National Strategy for Open Access
- Open Access policy in Councils and foundations
- Open Access Indicator

Denmark's National Strategy for Open Access forms the basis of work by the Ministry of Higher Education and Science with relation to research publications

The strategy states that the implementation of Open Access is to take place through the green model – i.e. parallel filling of quality-assured research articles in institutional or subject-specific archives (repositories) with Open Access. However, the strategy does not exclude the use of the golden model as long as it does not increase the expenses for publication. ē

Print

Read aloud

f Facebook

in LinkedIn

☑ Twitter
✓ Send

........

Two central principles form the basis for the strategy:

- The implementation of the Open Access is to support the possibility for Danish researchers to continue to publish in the most recognised national and international journals, and also the possibility to publish
- For the sake of research and society, it is stressed that it is crucial that the aggregate public expenditure to research publications is not increased significantly because of the implementation of Open Access

> Read Denmark's National Strategy for Open Access (pdf)

last modified Sep 18, 2018



esearch-and-innovation/cooperation-between-research-and-innovation/open-access/Publications/denmarks-national-strategy-for-open-access/Publica

П

+

1 of 4

- + 140%

53 🖨

Ministry of Higher Education and Science Denmark

Denmark's National Strategy for Open Access

Open Access is a question of achieving the maximum effect from research.

There are many benefits for Danish companies, Danish research and Danish society in having free accessibility – Open Access – to research. With everyone having increased accessibility to online scientific articles, we will see more effective knowledge-sharing between researchers, research institutions, and companies. Open Access will result in new and improved research opportunities, particularly within interdisciplinary research, and improved access to research-based knowledge for companies and others. And thereby will contribute to the latest knowledge being disseminated quicker and creating innovation and growth in society.

20 June 2018

Danish Agency for Science and Higher Education

Bredgade 40 1260 Copenhagen K Denmark Phone +45 3544 6200 Fax +45 3544 6201 sfu@ufm.dk www.ufm.dk/en

CVR no. 1991 8440

Responsible Hanne-Louise Kirkegaard Phone +45 + 45 72 31 82 46 hki@ufm.dk

Ref. no. 17/062761-35

Vision

To create free access for all citizens, researchers and companies to all research articles from Danish research institutions financed by public authorities and/or private foundations.

Researchers, universities and other research institutions, research councils and foundations, libraries, publishing houses and companies all play a crucial role in optimising knowledge sharing and the application of the latest research findings. Now it is a question of ensuring that all will also contribute to the optimal implementation of Open Access for research and innovation in Denmark.

Targets

From 2025 onwards, there should be unimpeded digital access for all to all peerreviewed scientific articles from Danish research institutions – with a maximum 12month embargo.





Prerequisites for successful implementation

The strategy is primarily focused on Green Open Access, while noting that Golden Open Access is widespread in a number of scientific fields and is promoted by a range of international publishers and individual countries, e.g. the Netherlands.

Golden Open Access covers a model where the journal as such is published as Open Access, and all its articles are immediately accessible online free of charge. The costs – Article Processing Charges – are typically covered by the researcher who pays the journal/publisher for the publication of each individual article. For the time being, this model often implies considerable extra costs for public authorities in relation to the existing subscription-based publication model.

By contrast, Green Open Access refers to publication in a quality-assured journal coupled with parallel archiving of the final quality-assured version of the research-

Page 2/4

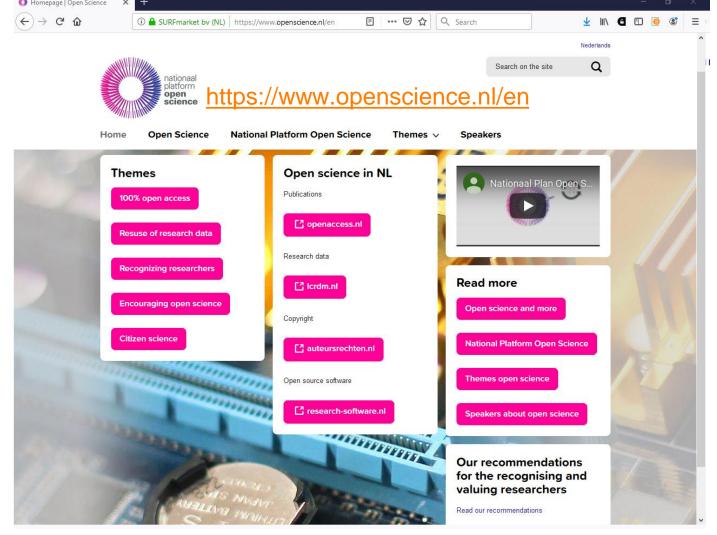
Ministry of Higher Education and Science Denmark

•••

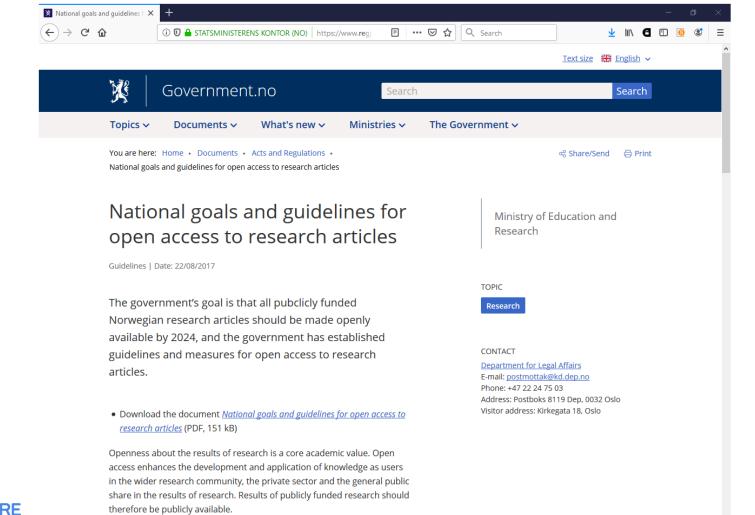
er's article in a digital repository. This repository will have online Open Access for all, potentially following any embargo period as set by the journal.

Green Open Access is a swift and cost-effective method for disseminating highly valued and quality assured scientific articles. Green Open Access is not a change of existing quality assurance on the part of the publishers. It merely means that the









ps://www.regjeringen.no/en/dokumenter/national-goals-and-guidelines-for-open-access-to-research-articles/id2567591/



The government has established the following national guidelines to ensure all stakeholders work towards the same goal, including measures that shall support the ongoing work:²

- Publicly funded research articles are to be made openly available. Researchers shall examine the
 possibilities for publishing their articles in open access journals and choose open access journals
 where academically acceptable. Only in exceptional circumstances may articles that are publicly
 funded be published in journals that do not allow the article to be made available in an academic
 repository.
- All publicly funded research articles must be deposited in a suitable academic repository. This shall take place at the latest on the publication date, irrespective of the publishing channel and when the article can be made openly available.
- Institutions and consortia that negotiate agreements with publishers shall ensure that these
 agreements promote open access without increasing total costs, and that the terms and conditions
 are open and transparent.
- 4. Institutions that fund research projects shall contribute to cover the costs associated with open access publishing. In research performing institutions costs associated with open access publishing shall be seen as part of research budgets, just as costs associated with other key activities. Researchers and research performing institutions are encouraged via their networks to contribute to the promotion of publishing services that deliver the required quality at an appropriate price.

Measures:

To contribute to a successful implementation of the guidelines, the government will:³

- 1. Improve the functionality associated with depositing an article via the Cristin system.
- 2. Investigate how a national repository can be realised.
- 3. Introduce a requirement for articles to be deposited in a local or national repository in order to be counted in the performance based funding scheme. This requirement will not take effect until the necessary repositories and infrastructure are available to all research institutions.
- Contribute to the development of new and sustainable models for the funding of open access publishing nationally and internationally
- 5. Develop indicators and statistics covering open access.

| 🝼 New Open Government Partner 🗙 | + | - 0 |
|---------------------------------|--|-------------|
| ← → ⊂ ŵ | A https://www.openaire.eu/blogs/new-open-governm | E 🧕 🖲 🖻 |



SERVICES SUPPO

SUPPORT OPEN

OPEN SCIENCE IN EUROPE ABOUT

SIGN IN

In the mid of November, a new Open Government Partnership Action Plan 2020-2021 was adopted in Slovakia, already the forth OGP Action Plan in order. The first one has already been implemented in 2012. The OGP 2020-2021 Action Plan builds on previous action plans. Topics concerning open data, open education, open science, open justice and citizen participation remain represented, only with new objectives and priorities:

1. Open Data

- to regularly publicly inform about fulfillment of ministry tasks (set up system enabling publishing of the fulfillment of tasks issued from the resolutions from SK government in a unified and structured form),

- publish data sets and API (develop and put into practice publishing minimum for state administration, after annually publish data on open data portal),

- inform about using of finances (develop quantitative analysis of information disclosure in the subsidy scheme module)

2. Open Education

- to operate and support usage of educational sources (legislatively adjust conditions for introduction of an open licenses, identify person responsible for creation of open educational sources, promote open educational sources, monitor and publish database of open educational sources)

3. Open Science

- main task is adoption of National Open Science strategy (prepare and launch pilot projects at universities and in research libraries)

4. Citizen participation

- is important to create public policies and development of citizen society (promote awareness of the added value of cross-sector partnership)

5. Open Justice part goal is to spread public publishing of legislative materials at Slov-Lex portal (such as selected implementing regulations and internal organizational and managements acts of ministries and other central government bodies)

Open Journal Systems (OJS) sets new standards to achieve OpenAIRE compliance with JATS

30 December 2018

International alignment across open access initiatives, funders and research organisations for a complete and immediate open access

28 November 2016

Danish OpenAIRE national workshop on challenges and possibilities for Open Science

15 February 2019

The Swiss National Strategy on Open Access and its Action Plan

16 January 2019

OpenAIRE Guidelines for CRIS Managers release 1.1.1





| 🎐 Slovenia | × | + | | | | | | - 0 | \times |
|------------|---------|--------------------------------|-------------|----------|------------------------|-------|---|---------|----------|
| ← → ♂ ଢ | | 🛛 🔒 https://www.openaire.eu/it | em/slovenia | 110% ••• | 🕑 😭 🔍 Search | | | E 🧕 🖲 🗉 | ≡ |
| (| C | OpenAIRE | SERVICES | SUPPORT | OPEN SCIENCE IN EUROPE | ABOUT | Q | SIGN IN | ^ |
| FUND | ERS NEV | VS | | | | | | | |

National policy

The Government of the Republic of Slovenia adopted the National Strategy of Open Access to Scientific Publications and Research Data in Slovenia 2015-2020 in September 2015 (ROARMAP record) and the action plan in May 2017.

Institutional policy

Slovenian research performing organizations have not yet adopted the open access policies.

The University of Ljubljana included a provision on designing and implementing the education and research according to the principles of open science in the Statutes of the University (Article 6 in Chapter II. on the autonomy of the university; came into force on 11 February 2017).

Funder policy

Funder policies are determined by the National Strategy of Open Access to Scientific Publications and Research Data in Slovenia 2015-2020. Each beneficiary has to ensure open access to all peerreviewed scientific publications that refer to the results from the nationally funded research. Before the adoption of the open research data mandate, a national pilot programme Open Access to Research Data will be carried out.

Slovenian Research Agency signed Plan S in September 2018.



https://www.openaire.eu/item/slovenia



About Plan S

Plan S is an initiative for Open Access publishing that was launched in September 2018. The plan is supported by cOAlition S, an international consortium of research funders. Plan S requires that, from 2021, scientific publications that result from research funded by public grants must be published in compliant Open Access journals or platforms.

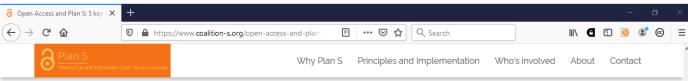






https://www.coalition-s.org

.



Open Access and Plan S: 5 key activities

18/02/2020

The emerging Coronavirus (COVID19) has once again highlighted the need for researchers for have unfettered access to the research literature. Indeed, a recent article in the <u>Guardian</u> argued that "hiding research papers behind a subscription paywall, could be killing people", whilst a group of . US patient and disease advocacy organizations <u>stated</u> that "information critical to health should no longer be held hostage by arcane publishing".

However, despite such concerns and calls for change, and after more than 15 years of Open Access (OA) mandates, declarations and discussions, some 75% of the world's research literature is, on publication, only available to paying subscribers.

Although in the case of COVID19, publishers have been quick to provide access to previously paywalled research on this topic – for example, see responses from <u>Wiley</u> and <u>Elsevier</u> – a much better solution, and one which works across all disciplines at all times, is to support a world when all research is open access. This is what <u>Plan S</u> is seeking to do, and why 24 research funding organisations are supporting this initiative.

In this short piece Robert Kiley, Head of Open Research at Wellcome and interim cOAlition S Coordinator provides an update on five key activities cOAlition S is currently supporting.

1. Growing the cOAlition S membership-base

<u>cOAlition S</u> is a group of funding agencies which have agree to align their OA policies with Plan S. Currently there are 24 members, including UKRI, the Gates Foundation and the European Commission, including the European Research Council. We recognise however, that if we are to be successful in bringing about a global change in the way research is disseminated, we need more funders to support Plan S.

Over the last few months we have secured the support of the <u>WHO/TDR</u>, the <u>South African Medical Research Council</u> and the <u>Aligning</u> <u>Science Against Parkinson</u>. We continue to work with many other agencies, encouraging them to consider the potential benefits OA can deliver.

Working with US funding agencies remains a high priority and the <u>rumoured</u> Whitehouse Executive Order appears to be well-aligned with Plan S. We are watching this with interest.



| Open Access and Plan S: 5 key a 🗙 | + | - 0 | \times |
|-----------------------------------|---|---------------|----------|
| ← → ♂ ଢ | 🗊 🖴 https://www.coalition-s.org/open-access-and-plan- | III 🖬 🗊 😒 😅 | Ξ |
| A Plan S | Why Plan S Principles and Implementation Who's involved | About Contact | |

2. Supporting researchers

Some researchers have expressed concerns with Plan S, fearing that if their publication choices are reduced, then this may negatively impact on their likelihood to secure future grants and tenure.

This concern has arisen as Plan S is explicit in saying that OA publications costs (typically Article Processing Changes, APCs) for articles published in subscription journals will no longer be funded, outside of Transformative Agreements. Researchers however, *can* still seek to publish in subscription journals, as long as they make a copy of their research article (either the accepted manuscript, or the published version) freely available without an embargo and with an open licence.

It is also worth stressing that funders which align their OA policies with Plan S make clear that when assessing research outputs as part of a funding decision, they will value the intrinsic merit of the work and not consider the publication channel, its impact factor or other journal-based metrics.

Within cOAlition S we have also established a task force to <u>monitor</u> the effects of Plan S. As early career researchers feel especially affected by Plan S, representatives from the Global Young Academy, Eurodoc, Young Academy of Europe and the Marie Curie Alumni have joined this group to ensure their voice is heard.

In advance of the Plan S policy coming into effect, we also provide a simple web-based tool in which researchers can determine how to comply with this policy at any specific publishing venue. An Invitation to Tender to build this tool has been <u>published</u>. We anticipate that we will appoint a contractor within the next three months and have a live service running by Autumn 2020.

3. Supporting learned societies

Plan S, with its explicit commitment not to fund hybrid open access fees, requires subscription publishers to reassess their business models. This affects all publishers, but is felt more acutely by learned society publishers, many of whom rely on publishing revenue to support their other activities, such as awarding grants and organising meetings.

To help learned societies explore alternative models, Wellcome in partnership with UKRI, commissioned Information Power to look at this issue. The subsequent <u>report</u> (and supporting <u>toolkit</u>) identified outlined 27 potential business models society publishers could adopt.

The Transformation Agreement model – in which funding from library subscriptions and funder APCs is used to provide institutions with access to all subscription content, whilst allowing research articles authored by researchers at subscribing institutions to be made fully OA – is gaining traction. By way of example, within the past 3 months both the <u>Microbiology Society</u> and the <u>Biochemical Society</u> have



| 👌 Open | Access an | nd Plan S: 5 key a 🗙 | + | | | | | | | | — | ٥ | \times |
|--------|-----------|---------------------------------------|---------|-----------------|---|---|-------------------------------|----------------|---------------|-----|------|-----|----------|
| €→ | C' 1 | ۵ | 0 | 🔒 http | s://www.coalition-s.org/open-access-and-plan- | Ē | ••• 🗵 🏠 🔍 Search | | III\ G | 1 | | ° © | ≡ |
| | a. | Plan S Making full and immediate (| Open Ar | ccess a reality | Why Plar | S | Principles and Implementation | Who's involved | About | Cor | tact | | í |

4. Engaging with publishers

cOAlition S continues to engage with publishers, encouraging them to develop publishing options in line with the Plan S principles.

As discussed above this includes supporting the development of Transformative Agreements, such as "Read and Publish" and "Subscribe to Open" arrangements.

We have also developed a set of <u>criteria</u> to encourage individual journal titles to transform to OA. Known as "Transformative Journals" (TJ's), any journal which commits to a set of KPI's can continue to levy APCs and where they are fair and reasonable, expect cOAlition S members to meet these. A consultation on the proposed criteria for TJ's closed in early January and we will report on the outcome of this before the end of March 2020.

Support for fully OA journals and platforms continues to be a key part of the Plan S strategy. Recognising however, that a *single*, global APC price for any given journal may not always be the most equitable way to cover publishing costs, we have started to discuss with a number of OA publishers the idea of linking the APC to the purchasing power parity (PPP) of different countries.

5. Developing price transparency

In 2017 it was estimated that the annual revenues generated from English-language STM journal publishing was <u>\$10bn</u>. As around 3m articles are published every year, this suggests that the average revenue from every published article is around \$3,333.

Leaving aside whether in an online world this sum is fair or appropriate, the current publishing model provides little or no transparency as to what the customers – libraries, funders and researchers – receive for this money.

To address this, Wellcome and UKRI, on behalf of cOAlition S, contracted Information Power to develop a <u>framework</u> through which publishers could price the services they provide. The draft framework seeks to breakdown the price charged into seven discrete "service buckets" such as "% of price from submission to desk reject or acceptance" and "% of price for peer review management".

To determine whether it is feasible for publishers to provide this level of data and whether this information is of use to libraries and funders, the framework will be piloted in then first quarter of 2020. 10 publishers have agreed to join this pilot including Springer Nature, Brill, PLOS the Company of Biologists and EMBO press.

More information?

Open Science Platform Serbia

- In July 2018, the Ministry of Education, Science and Technological Development (MESTD) of the Republic of Serbia adopted a national open science policy – the <u>Open Science Platform</u> – drafted by a Working Group
- Open Access (OA) is mandatory for all publications resulting from research funded by the MESTD, including journal articles, monographs, book chapters, conference objects, PhD theses (already mandated since 2014).
- "Publishing in a journal of choice and depositing an author's copy in an OA repository"
- The allowed embargo periods for providing OA are 12 months after the date of publication for STEM, and no later than 18 months for SSH
- The MESTD recognizes Article Processing Charges (APCs) and Book Processing Charges (BPCs) foreseen in the project budget as eligible costs

Open Science Platform Serbia (2)

- OA for data is not mandated but it is recommended; the Platform specifies situations where data should not be shared.
- It also states that research institutions should adopt institutional open science policies within six months of the launch of the policy, using the national policy as a framework - and thus ensuring implementation of the national policy at the institutional level. Progress and compliance is monitored by the Ministry.



≣

Institutional policy

(i) 🗊 🔒 https://www.openaire.eu/item/serbia

×

List of institutions

🔿 Serbia

(←) → ⊂

| Institution | Date | Link | Link |
|---|--------------------|---------------|---------------|
| Institute of Technical Sciences of the Serbian Academy of Sciences and Arts (ITS SASA) | September, 2018 | in Serbian | |
| University of Kragujevac | December, 2018 | in Serbian | |
| Institute for Plant Protection and Environment | December, 2018 | in Serbian | |
| University of Criminal Investigation and Police Studies | January, 2019 | in Serbian | |
| University of Pristina, Kosovska Mitrovica | March, 2019 | in Serbian | |
| University of Belgrade | March, 2019 | in Serbian | in English |

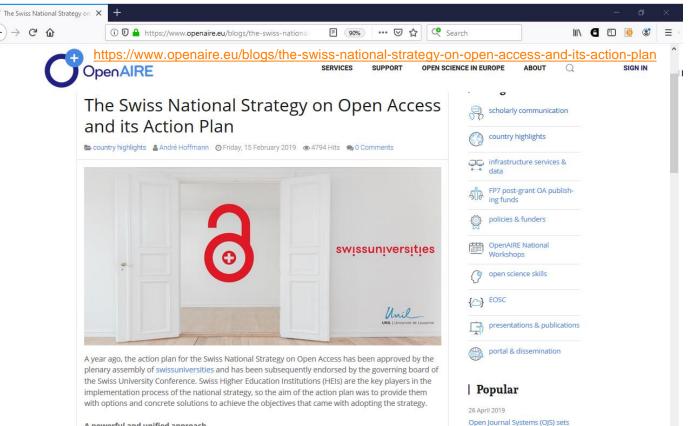


https://www.openaire.eu/item/serbia

Open Science in new Serbian law on science & research (July 2019)

- **Article 4** of the law states that conducting research work in accordance with the principles of open science is recognized as a fundamental principle of science and research.
- **Article 6** is entirely dedicated to open science, and stresses the importance or alignment with the requirements of the European Commission (EC), which mandates open science to all EC-funded research:
 - In order to increase the quality and visibility of scientific work, research is conducted in accordance with the principles of open science, with optimal use of scientific research infrastructure.
 - The principle of open science and open access to scientific publications and research data is based on the recommendations of the European Commission and international good practice
- **Article 72** refers to open data, focusing on the transparency of data from the Register of Research Organizations and the Register of Researchers in Serbia. This means that research data will be publicly available on the website of the MESTD in a machine readable format, ready for use and re-use. [See the new law <u>here, in Serbian</u>.]

https://eifl.net/news/open-science-included-new-serbian-law



A powerful and unified approach

According to the "Vision 2024" underlying the national strategy, all scholarly publications resulting from publicly funded research must be freely available on the internet and, moreover, that all scholarly publications in Switzerland should be 100% Open Access within a landscape of mixed Open Access models by 2024. The proposed approaches to implement this vision have been formulated with respect to predefined guiding principles such as pursuing a powerful and unified approach while having complete cost transparency and cost neutrality in the long term. All stakeholders have to join forces in order to realize the objectives. This is especially important considering the decentralized education and research system of Switzerland.



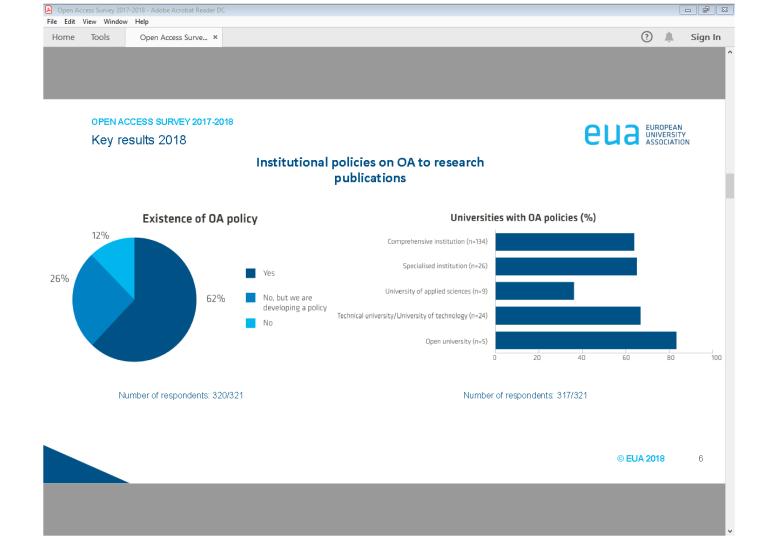
C

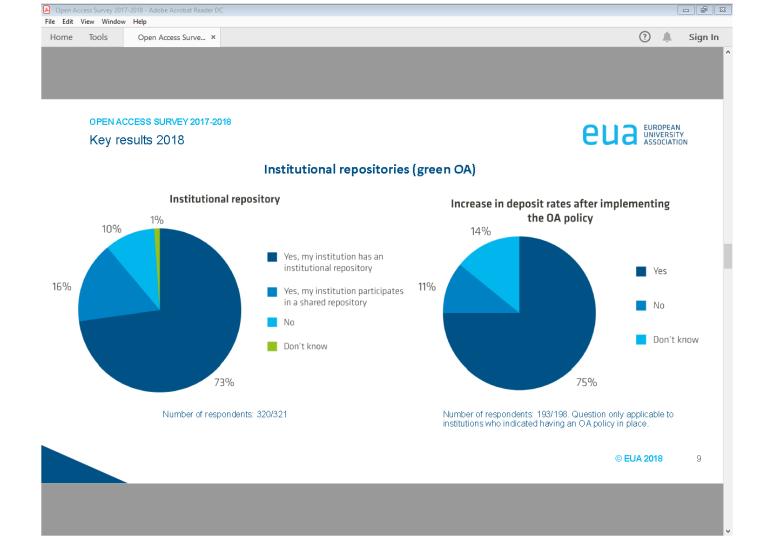
| International alignment across |
|----------------------------------|
| open access initiatives, funders |
| and research organisations for a |
| complete and immediate open ac- |
| cess |

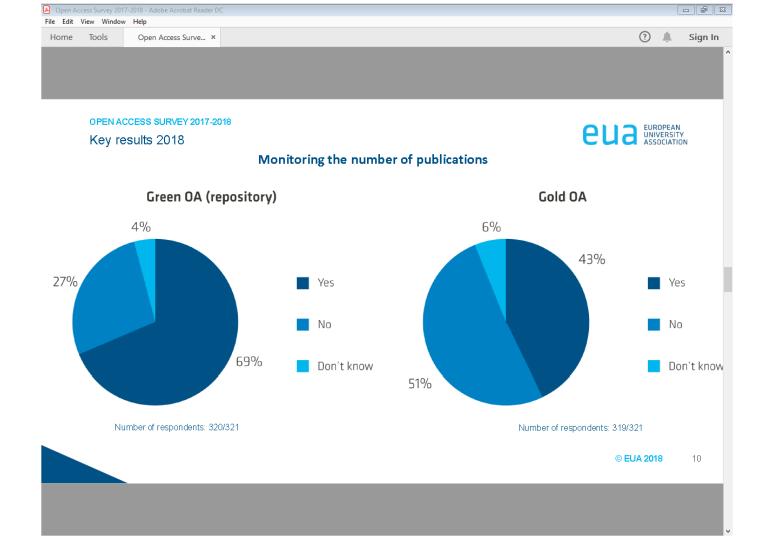
new standards to achieve OpenAIRE compliance with JATS

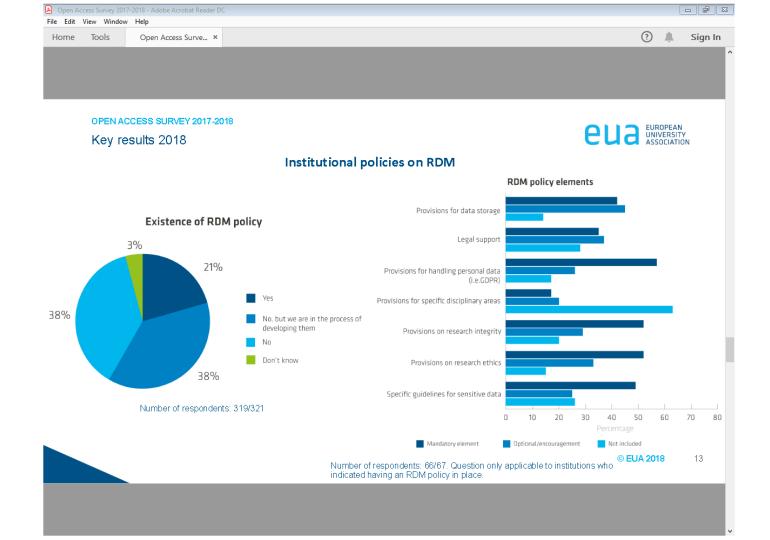
30 December 2018

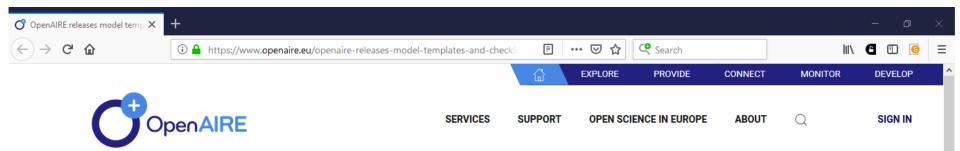
28 November 2016 Danish OpenAIRE national work-











OpenAIRE releases model templates and checklists for policy makers



As a part of the Toolkit for policy makers on Open Science and Open Access, OpenAIRE has released a set of model policy templates and checklists for Research Performing Organisations and for Research Funders.

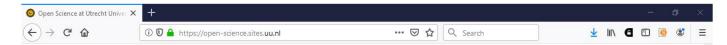
The OpenAIRE Toolkit for policymakers has been designed to assist the design and adoption of Open Science policies aligned with EU developments in the field. It therefore targets stakeholders at national, institutional or funder level with a key role in the adoption of Open Science/ Open Access policies(university rectors, directors of research centres, directors of funding agencies, rectors' summit, ministries etc.). The Toolkit can also be used by other stakeholders seeking to learn, adopt or align their Open Science policies and this is why all related material and resources are public.

The Toolkit for policy makers on Open Access and Open Science is publicly available on Zenodo

(10.5281/zenodo.2573797).

https://www.openaire.eu/openaire-releases-model-templates-andchecklists-for-policy-makers

An essential part of the Toolkit are the model policy templates and checklists, and these are now available as separete downloads, via Zenodo:



Open Science at Utrecht University

https://open-science.sites.uu.nl

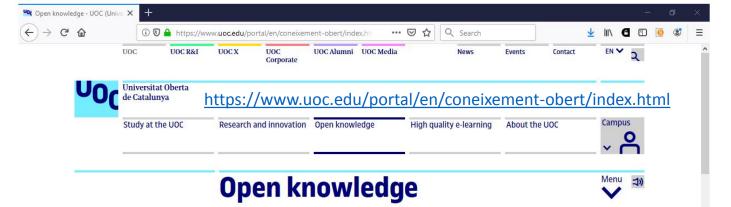
Open Science Programme 2018-2021 Lead-up to the programme About us Contact



An Open Science Programme for Utrecht University

Utrecht University aims to be at the forefront of open science. Therefore the Executive Board has launched the Utrecht University Open Science Programme. A programme that aims to stimulate and facilitate researchers to put open science into practice.

The Open Science Programme is directed by an Open Science Platform which includes members of the entire UU research community. Frank Miedema is chair of this platform. Anja Smit has been appointed as Secretary. Their initial focus



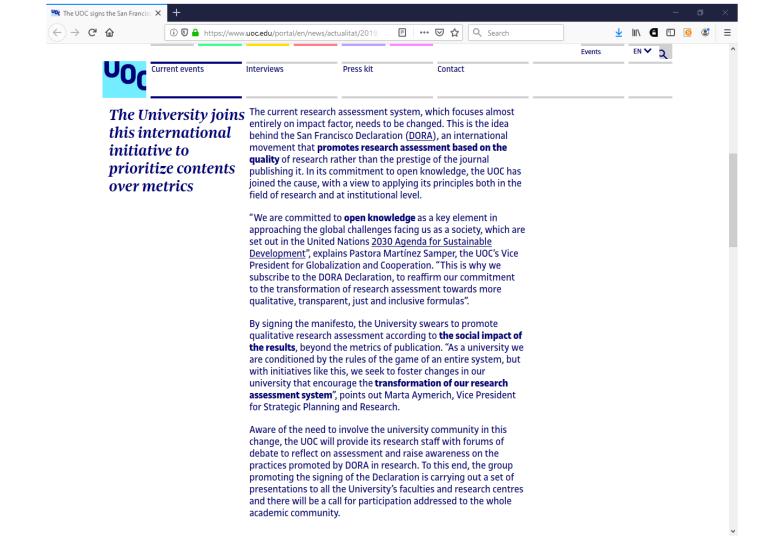
The UOC is a university that is open to society. It interacts with its students through a unique learning model, and offers its knowledge and opens lines of communication and co-creation to a range of other stakeholders.

The UOC Open Knowledge Action Plan aims to make the University a **central node for open and global knowledge** so that it can contribute to overcoming the global challenges identified in the 2030 Agenda.

Download the Action Plan



2



Thank you!

Iryna Kuchma

iryna.kuchma@eifl.net

