

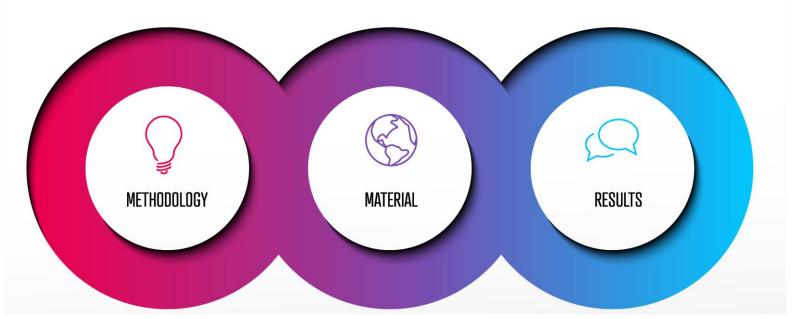
Liberté Égalité Fraternité

## SECOND FRENCH PLAN FOR OPEN SCIENCE

Generalizing open science in France 2021-2024



## Open science is to open



#### **Documented protocols**

All the research steps hypothesis, process, methodology, ...

#### Research data and software

Research data, codes and software used to transform the research data and produce new knowledge

#### **Publications and negative results**

Publications in journals and research books, negative results

2



## Why open science

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Principle: Public money? Public data!



- 1 IMPACT : CITATIONS AND READERS
- 2 BUDGET & ECONOMIC EFFICIENCY
- (3) REPRODUCIBILITY
- HEURISTICS!
  CUMULATIVE SCIENCE VS. DUPLICATE EFFORTS
- **5** ETHICS, INTEGRITY, TRANSPARENCY



# 1. Overview of the First French Plan for Open Science (2018-2021)



## NATIONAL PLAN FOR OPEN SCIENCE **4TH JULY 2018** #openscience esr.gouv.fr

## **Summary**

**Launched on 4 July 2018** by Frédérique Vidal, Minister for Higher Education, Research and Innovation based on three commitments

- Generalize open access to publications
- Structure research data and make it available through open access
- Be part of a sustainable European and international open science dynamic

Achieved the Open science steering committee, responsible for

- Creating and making decisions on the use of funding from the National Open Science Fund
- Proposing guidelines, recommendations on open science good practices
- Managing the work of "colleges" to investigate issues, initiate and realize projects



## **Key figures**



**30** workgroups





2 national open science days



### Main achievements

- Creation of the National Fund for Open Science (11.6 M€ of resources over 3 years), through which 2 calls for projects were launched in 2019 and 2021
- The French National Research Agency and other funding agencies request open access publication and data management plans for the projects they fund
- Progressive deployment of open science strategies within research organizations and universities and guidance for PhD students
- Creation of the open science barometer: measurement of the rate of French scientific publications in open access

More information at: https://www.ouvrirlascience.fr/bilan-du-plan-national-pour-la-science-ouverte-2018-2021/



# 2. Second French Plan for Open Science (2021-2024)





## Summary

**Launched on 6 July 2021** by Frédérique Vidal, Minister for Higher Education, Research and Innovation

- Multiplying the levers for change in order to generalize open science practices
- Structuring the policy for opening up and sharing research data
- New commitments to the opening of source codes produced by research
- European and international inclusion in the context of the French Presidency of the European Union
- Disciplinary and thematic variations: open science policies must be adapted to disciplinary specificities



## Objectives of the Second national plan

### 1-- Generalizing open access to publications

- reach 100% of open access publications in 2030
- support bibliodiversity

### 2-- Structuring, sharing and opening up research data

- encourage practices that favor research data reuse
- create Recherche Data Gouv in order to involve all research fields in active practices of open data

### 3-- Opening up and promoting source code produced by research

- major challenge for the reproductibility of scientific results
- foster distribution of software products under open source licence

### 4-- Transforming practices to make open science the default principle

 require the transformation of the assessment system in order to foster long-term open science practices



## National tool to support OS policy: the national barometer on open science

- Monitoring, observation and measurement tool of open science policy impact
- First edition launched in 2018, last update in December 2023
- In 2023, 65 % of the publications produced by French research are open access publications (38 % in 2018)
- The open access rate for publications published in 2019 has increased from 52 % in 2020 to 62 % in 2023, which characterized a reduced period of "embargo"
- Expand the barometer scope by producing new indicators to monitor:
  - Health study declaration, including clinical trials
  - Data and source codes opening and sharing, including data statements
  - Open science use by society
  - Universities open science policies
  - Open science platforms' accessibility for handicapped / disabled people
  - Publishing costs



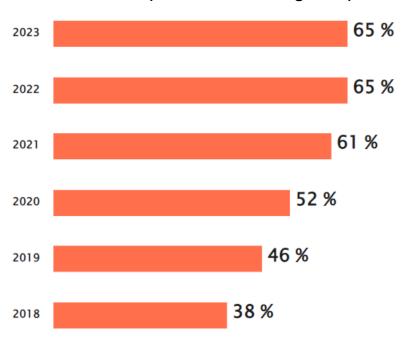
### Key indicators of the national barometer in 2023

Growth

(all fields) 2018-2023

**+27** points

Open access rate of scientific publications in France, with a Crossref DOI, published during the previous year by observation year



Amongst French publications in 2022 mentioning the production of data:

- 22 % are referring to sharing a dataset
- 26 % include a "Data Availability Statement" section

This indicator was created via artificial intelligence by the Ministry of Higher Education and Research.



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### Thank you

More on the 2<sup>nd</sup> national plan for open science at: <a href="https://www.ouvrirlascience.fr/second-national-plan-for-open-science/">https://www.ouvrirlascience.fr/second-national-plan-for-open-science/</a>

More on the national barometer on open science at: <a href="https://frenchopensciencemonitor.esr.gouv.fr/">https://frenchopensciencemonitor.esr.gouv.fr/</a>