## National Science Foundation (nsf.gov): NSF-EAR: Earth Sciences

### Types of data

The Division of Earth Sciences requires that full data sets, derived data products (e.g. model results, output, and workflows), software, and physical collections must be made publicly accessible within two (2) years of final collection.

*Guidance*:

* [NSF-EAR Division Data Sharing Policy and Appendix](https://www.nsf.gov/geo/geo-data-policies/ear/index.jsp)
* [NSF Proposal & Award Policies & Procedures Guide (PAPPG)](https://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf18001)
* [NSF Frequently Asked Questions (FAQs) for Public Access](https://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf18041)

### Data and metadata standards

Standards to be used for data and metadata format and content (where existing standards are absent or deemed inadequate, this should be documented along with any proposed solutions or remedies).

*Guidance*:

* [NSF-EAR Division Data Sharing Policy and Appendix](https://www.nsf.gov/geo/geo-data-policies/ear/index.jsp)
* [NSF Proposal & Award Policies & Procedures Guide (PAPPG)](https://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf18001)
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### Policies for access and sharing

It is the responsibility of researchers and organizations to make results, data, derived data products, and collections available to the research community in a timely manner and at a reasonable cost. In the interest of full and open access, data should be provided at the lowest possible cost to researchers and educators. This cost should, as a first principle, be no more than the marginal cost of filling a specific user request. Data may be made available for secondary use through submission to a national data center, publication in a widely available scientific journal, book or website, through the institutional archives that are standard for a particular discipline (e.g. IRIS for seismological data, UNAVCO for GP data), or through other EAR-specified repositories. Data inventories should be published or entered into a public database periodically and when there is a significant change in type, location or frequency of such observations. Principal Investigators working in coordinated programs may establish (in consultation with other funding agencies and NSF) more stringent data submission procedures.

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### Policies and provisions for re-use, re-distribution

Policies and provisions for re-use, re-distribution, and the production of derivatives.

*Guidance*:

* [NSF-EAR Division Data Sharing Policy and Appendix](https://www.nsf.gov/geo/geo-data-policies/ear/index.jsp)
* [NSF Proposal & Award Policies & Procedures Guide (PAPPG)](https://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf18001)
* [NSF Frequently Asked Questions (FAQs) for Public Access](https://www.nsf.gov/publications/pub_summ.jsp?ods_key=nsf18041)

### Plans for archiving and preservation of access

Plans for archiving data, samples, and other research products, and for preservation of access to them.

*Guidance*:

* [NSF-EAR Division Data Sharing Policy and Appendix](https://www.nsf.gov/geo/geo-data-policies/ear/index.jsp)
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