



**NOAA National
Environmental Satellite, Data,
and Information Service**

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Data Policy for Use of Commercial Radio Occultation Data

International Radio Occultation Working Group 8

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Outline

- **Policy and legislation enabling NOAA's commercial data work**
- **Radio Occultation data pilots and purchase licenses**
- **Ongoing interagency and international work**



Commercial Data Policy Drivers

National Space Policy, 2020

- Prioritize partnerships with commercial industry to meet Government requirements
- Purchase commercial environmental data for use in meteorological and space weather models when appropriate

NOAA Commercial Space Policy, 2016

- Sets guiding principles:
 - Ensuring access to global observations
 - Upholding national and international standards for full and open data sharing,
 - Ensuring a vibrant research enterprise through that enterprise's access to NOAA data.
- Negotiate the least restrictive terms of use possible
- Evaluate data sharing agreements on a case-by-case basis



NOAA Commercial Data Legislation

Weather Research and Forecasting Innovation Act of 2017 authorizes NOAA's space-based commercial weather data use

- Authorizes pilot program
- If pilot successful, obtain commercial weather data for operational use where appropriate, cost-effective, and feasible
- Avoid unnecessary duplication between public and private data sources
- Continue to meet current international meteorological agreements, including data sharing practices set forth through World Meteorological Organization (WMO) Resolution 40

PROSWIFT Act authorizes piloting of space weather data (ground, air, and space based)



Radio Occultation Data Licenses

Commercial Weather Data Pilot Round 1

- NOAA only

Commercial Weather Data Pilot Round 2

- Who: U.S. government agencies, National Meteorological and Hydrological Services, WMO-designated Regional Specialized Meteorological Centers, and members of the Coordination Group for Meteorological Satellites
- When: upon delivery to NOAA
- For what purpose: not for further dissemination for commercial purposes

Operational Radio Occultation Data Purchase

- Contracts include pricing for a variety of data sharing levels specifying to who, when, and for what purpose for varying quantities of data purchased
- Specific data sharing requirements defined by NOAA for each individual Delivery Order (DO)



Data Sharing License Options

Option 1	Unlimited distribution rights
Option 2	Distribution to U.S. Government agencies, National Meteorological Centers (NMC), WMO Met Centers, CGMS members, non profit organizations, Academic entities for non-commercial use with no further distribution
Option 2a	Option 2 plus unlimited distribution after 24 hours
Option 3	Distribution to U.S. Government agencies, National Meteorological Centers (NMC), WMO Met Centers, and CGMS members for non-commercial use with no further distribution
Option 3a	Option 3 plus unlimited distribution after 24 hours
Option 4	Distribution to U.S. Government agencies for non-commercial use and no further distribution (except to contractors for use on agency behalf)
Option 4a	Option 4 plus unlimited distribution after 24 hours
Option 5	No distribution outside NOAA (except for contractors and grantees for use on NOAA's behalf)
Option 5a	Option 5 for first 24 hours plus unlimited distribution after 24 hours



Ongoing Interagency and International Work

Working Group for Interagency Coordination of Commercial Weather Data under Office of the Federal Coordinator for Meteorology established in 2020

- Identified points of coordination across USG agencies throughout commercial data acquisition process
 - Agencies have begun sharing commercial data RFI responses
- Made recommendations to examine more standardized license structures across USG
- Provided principles for valuing of data sharing to be included in cost-benefit analyses of commercial data

U.S. Group on Earth Observations Commercial Task Team responding to directives in National Plan for Civil Earth Observations

Working Group on Non-Governmental data established under the Interagency Council for Advancing Meteorological Services (ICAMS)

NOAA participating in World Meteorological Organization data policy update process



Summary

NOAA is committed to pursuing the least restrictive terms of use possible in our commercial data purchases, and is encouraging others to do the same

Per direction in the 2020 Appropriation, NOAA will be providing Congress a cost-benefit analysis of our initial commercial RO data purchases, in which we will consider the cost and benefit of sharing the data with U.S. and international partners

As more organizations begin to purchase commercial data, NOAA looks forward to additional coordination to optimize data purchasing and sharing arrangements

NOAA will continue active USG interagency coordination through ICAMS and ongoing international multilateral and bilateral engagements

