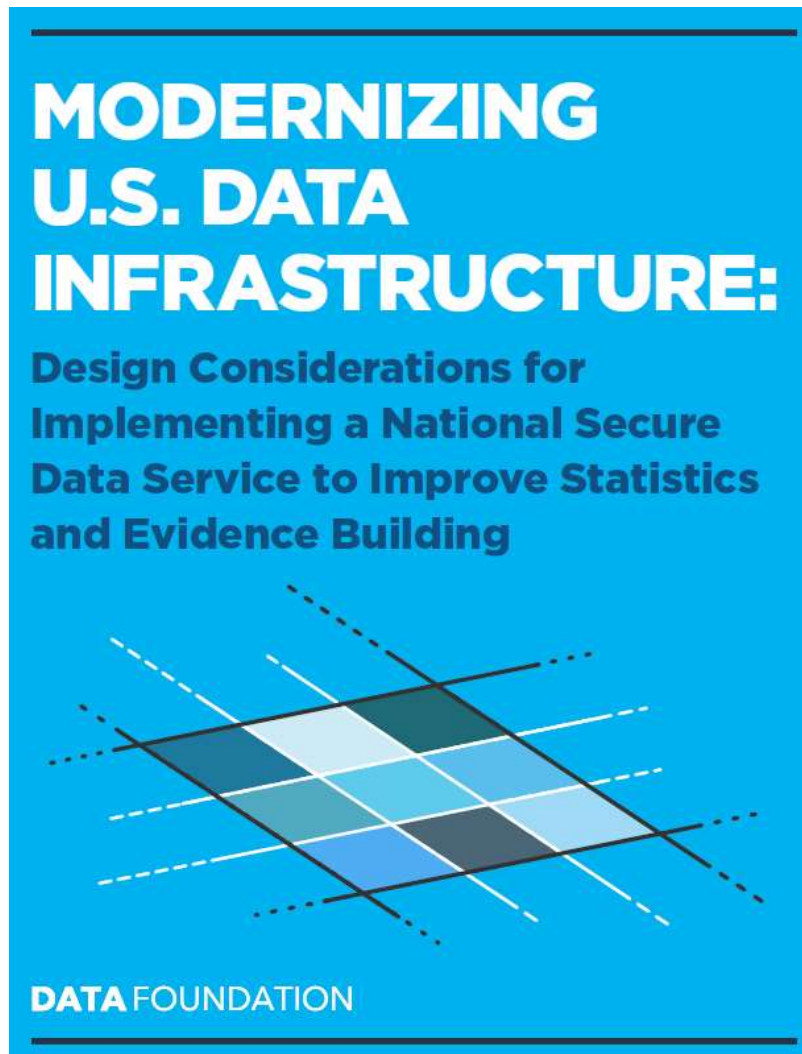


Design Considerations for Implementing a National Secure Data Service

*Federal Advisory Committee on Data for Evidence Building
April 23, 2021*

Nick Hart, Ph.D.
President, Data Foundation
Nick.Hart@DataFoundation.org

DATA FOUNDATION



Summary

- Review nuanced approaches for a service based on specified criteria
- Recommend a new FFDRRC via the National Science Foundation
- Identify administrative approaches for implementation, in addition to key questions for further review

Changes and Reforms Since 2017

- Evidence Act (PL 115-435) including CIPSEA expansions & OPEN Government Data Act
 - Presumption of accessibility
 - Common portal
 - Data inventory requirements
 - Consideration of level of sensitivity
- Federal Data Strategy & Annual Action Plan
- OMB Guidance:
 - IQA (M-19-15)
 - Evidence Act Phase 1 (M-19-23)
 - Evaluation Guidance (M-20-12)

Value Proposition for 2021+

Thematic

- Pandemic response
- Economic mobility and opportunity
- Social equity

Technical

- Replication
- Efficient research extensions

“In the 21st century, there is no reason why government should not be able to support the production of rapid and routine insights that inform how resources are spent addressing society’s greatest challenges.”

Necessary Attributes of a Data Service

1. Transparency and Trust
2. Legal authority to protect privacy and confidentiality
3. Independence
4. Legal authority to collect data from agencies
5. Scalable functionality
6. Sustainability
7. Oversight and accountability
8. Intergovernmental support

Four NSDS Organizational Options

1. New statistical agency within Commerce
2. Re-tasked agency within Commerce
- 3. New public-private partnership within NSF**
4. University-based

Weighing the Four Options

DATA SERVICE ORGANIZATIONAL OPTIONS AND SATISFACTION OF KEY ATTRIBUTES				
OPTIONS → ATTRIBUTES →	OPTION 1: NEW AGENCY AT COMMERCE	OPTION 2: RE-TASK AGENCY AT COMMERCE	OPTION 3: FFRDC AT NSF	OPTION 4: PUBLIC-PRIVATE PARTNERSHIP
TRANSPARENCY AND PUBLIC TRUST	Create new mechanisms, co-opt existing approaches from Census and BEA, and be covered by SPD1.	Create new mechanisms, reallocate from existing mechanisms, co-opt existing approaches from Census and BEA, and be covered by SPD1.	Create new mechanisms guided by the National Center for Science and Engineering Statistics (NCSES) and federal statistical principles and practices and be covered by SPD1 through NCSES.	Create new mechanisms, borrow from existing academic experience, and mimic principles in SPD1.
LEGAL AUTHORITY FOR PRIVACY PROTECTIONS	CIPSEA-eligible Privacy Act Ad hoc use limitations	CIPSEA-eligible Privacy Act Ad hoc use limitations	CIPSEA-eligible Privacy Act Ad hoc use limitations	Ad hoc arrangements in data sharing agreements
INDEPENDENCE	Subject to some Commerce Secretarial discretion and independent body oversight. May be at risk of political interference and prioritizing Commerce activities instead of interagency priorities.	Subject to some Commerce Secretarial discretion and independent body oversight. May be at risk of political interference and prioritizing Commerce activities instead of interagency priorities.	Quasi-independent, subject to some NSF Director discretion and independent oversight body. Less likelihood of being prioritized for NSF activities.	Quasi-independent with independent or third party oversight body.
ABILITY TO ACCESS AND ACQUIRE DATA	Yes, within CIPSEA framework	Yes, within CIPSEA framework	Yes, within CIPSEA framework	Limited
SCALABLE AND TIMELY	Yes, but would navigate existing business processes at Commerce. Likely slow development.	Yes, but would navigate existing business processes at Commerce and retool existing infrastructure. Likely slow development.	Yes, working with flexible NSF business processes. Allows for rapid development, particularly for acquiring capacity and skilled workforce.	Yes, with flexible and rapid development and hiring processes.

DATA SERVICE ORGANIZATIONAL OPTIONS AND SATISFACTION OF KEY ATTRIBUTES				
OPTIONS → ATTRIBUTES →	OPTION 1: NEW AGENCY AT COMMERCE	OPTION 2: RE-TASK AT COMMERCE	OPTION 3: FFRDC AT NSF	OPTION 4: PUBLIC-PRIVATE PARTNERSHIP
SUSTAINABILITY	Can be funded by direct appropriations in addition to user fees and transfer authority across Commerce budget accounts. May experience funding competition with other Commerce activities. Existing and relevant staff expertise accessible via Commerce. Hampered by federal hiring barriers, including salary limits. Would rely on Commerce shared services for administrative support.	Can be funded by direct appropriations in addition to user fees and transfer authority across Commerce budget accounts. May experience funding competition with other Commerce activities. Existing and relevant staff expertise accessible via Commerce, but also would require reskilling or reducing current staff of re-tasked entity. Hampered by federal hiring barriers, including salary limits. Would rely on Commerce shared services for administrative support.	Can be funded by direct appropriations in addition to user fees and transfer authority across NSF budget and program accounts. Existing and relevant staff expertise accessible via NSF. High capacity for quickly recruiting and retaining highly skilled workforce with up-to-date skills. FFRDCs are operated on a contract basis, subject to competition; shifting contracts could challenge a sustainable service model.	May be eligible for direct appropriation contingent on structure and authority. Likely majority funded by user contributions and fees.
OVERSIGHT AND ACCOUNTABILITY	Subject to GAO, IG, and congressional committee oversight. Additional interactions from governing board and an advisory committee.	Subject to GAO, IG, and congressional committee oversight. Additional interactions from governing board and an advisory committee.	Subject to GAO, IG, and congressional committee oversight. Additional interactions from governing board and an advisory committee.	Subject to independent oversight. Additional interactions from governing board and an advisory committee.
INTERGOVERNMENTAL COOPERATION	Would need to establish new relationships, building on some existing Census partnerships. May jeopardize some existing cooperation among state and local governments.	Would need to establish new relationships, building on some existing Census partnerships; may jeopardize some existing cooperation among state and local governments.	Flexible collaboration model in an FFRDC; would need to establish new relationships, building on NSF partnerships.	Flexible collaboration model in academia; would need to establish new relationships.

Roadmap for the FFRDC at NSF

- Administratively pursue an **FFRDC** at NSF under current law, with expectations beyond FAR minimum requirements
- **Responsibility** within NSF in conjunction with the National Center for Science and Engineering Statistics (NCSES), an existing federal statistical agency with CIPSEA designation
- Full **transparency** about proposed and ongoing projects, and their value
- **Accountability** should include review by GAO and NSF IG

Roadmap for the FFRDC at NSF (cont'd)

- **EOP support** for NSF role via Executive Action, in conjunction with ICSP, CDO Council, ICEP
- **Competitive** award process with clearly-delineated **criteria** for 5-year contract award
- Establishment of a governance **board** for guidance, strategic planning, and auditing
- **CIPSEA** designation as an agency or agent
- Produce government-wide **learning agenda**, based on individual agency plans published in 2022

Questions for the ACDEB

- **Value** – what types of analytic services, strategies for engagement and user feedback, approaches for quality, prioritization of projects?
- **Organization** – how to best ensure NSDS fits into the current and future ecosystem, including the role of FSRDCs?
- **Sustainability** – what level of resources are needed, how to approach fees/reimbursable arrangements?
- **Measurement and Accountability** – what additional oversight mechanisms, transparency requirements, archiving policies?

“If evidence-based policymaking is to truly succeed ... the American people must retain public trust in the system that serves their interests, protects their information, and advances policies that improve their quality of life, economy, and society.”

– Hart and Potok, 2020