



DEPARTMENT OF THE ARMY
CHIEF INFORMATION OFFICER
107 ARMY PENTAGON
WASHINGTON DC 20310-0107

ADD-GOV-DS-036

18 July 2024

SAIS-ADD (25-1rrrr)

MEMORANDUM FOR SEE DISTRIBUTION

SUBJECT: Army Enterprise Data Product Definition

1. References.

a. CDAO (DoD Data, Analytics, and Artificial Intelligence Adoption Strategy), 27 June 2023. (Available at <https://www.ai.mil>. Refer to the box in the upper right of the homepage.)

b. HQDA ASA (ALT) and CIO (Army Unified Data Reference Architecture, v.1.0), 22 March 2024. (Available via URL at <https://datacatalog.army.mil/asset/956aa9c2-d885-4859-a42d-ae0291a92d6f>)

c. Mission Command Center of Excellence Combined Arms Center concept of operations (Decision-Driven Data Concept of Operations), 6 July 2023. (Available at <https://datacatalog.army.mil/rest/2.0/attachments/0e52ae5e-1198-49d9-8359-94b222282617/file>)

d. HQDA CIO memorandum (Army Data Stewardship Roles and Responsibilities (Fiscal Year 2024)), 2 April 2024. (Available at <https://datacatalog.army.mil/rest/2.0/attachments/0595d2aa-7f5c-4ef7-8bd6-acf91ccf9584/file>)

2. Purpose.

a. This memorandum provides a definition of the term "data product" that is applicable across the Army enterprise.¹ Additionally, it establishes the individuals or departments responsible for managing the development of these products and supporting the product lifecycle.

b. This memorandum provides a definition and some important context. A definition of data product as well as some related terms can also be found in the Army Data

¹ This memorandum describes, for Army usage, the data product concept popularized by Zhamak Dehghani in 2019. It is not about the data product as defined in MIL-STD-963C and used in Data Item Descriptions.

SAIS-ADD (25-1rrrr)
SUBJECT: Army Enterprise Data Product Definition

Management and Analytics Lexicon, the official lexicon of the Army Chief Data and Analytics Officer (CDAO) and the Army Chief Information Officer (CIO) Data Integration Division. It can be accessed from the homepage of the Army Data Catalog.

3. Background. As discussed in the DoD Data, Analytics, and Artificial Intelligence Adoption Strategy (reference 1a), treating data as a product contributes to data advantage and facilitates data-driven decision making.

4. Scope. Although the Definition and Requirements section below applies Army-wide, the Responsibilities section need only be applied to data products for Army-wide release or for cross-command use (as opposed to use by the originating organization only). This memorandum applies to data products at all classification levels.

5. Definition and Requirements.

a. A data product is a pre-packaged set of data and metadata produced to satisfy consumers' mission or business demand. Data products are designed to be high quality, easy to use, self-describing and computationally governed.

b. High quality is in the judgement of the approving data steward, in coordination with the developers and existing policy. At present, existing policy includes the Unified Data Reference Architecture (UDRA) v.1.0 (reference 1b) and the registration requirements of the Army Data Catalog. Also, the concept of computational governance is described in reference 1b.

c. Data is persisted at the point of origin where the original data domain published the data product. Data products are not centrally located or shared. All consumption of data products goes back to the original producing data domain. With the right access permissions, end user devices consume and visualize data products for decision makers.

d. Data product development must follow the Enterprise Decision-Making Process outlined in the Decision-Driven Data Concept of Operations (reference 1c).

e. A data product is a high-quality data set that should be reused by multiple consumers when possible.

f. Data products may integrate data from multiple authoritative sources.

g. The conceptualization of a data product is not tied to any individual system.

h. The integration logic realized in a data product is authoritative as it illustrates the proper way to combine disparate sources of data for the intended purpose of the data product.

i. The goal of producing data products is to simplify and speed up analysis so that users and analysts are not burdened with understanding multiple data sources and integration logic. Data products facilitate data sharing and enable faster decision making.

j. Refer to the UDRA document (reference 1b) for more information on data products.

6. Responsibilities.

a. Data products are identified and overseen by a Functional Data Manager (FDM) and approved by a Data Steward.

b. The responsibility of Data Stewards and FDMs is to oversee the quality of the specific data elements that appear in a data product, and not for the entire data source system(s). However, if data quality issues are identified within the data product, the Data Stewards and FDMs will work with the owners of the source systems to resolve them.

c. Data Stewards and FDMs will ensure that data products, their metadata, and associated Application Programming Interface (API) endpoints are properly registered and discoverable in the Army Data Catalog at the proper classification level for use across the Army. Current minimum metadata requirements are as listed in UDRA 1.0 (reference 1b).

d. With respect to quality, Data Stewards and FDMs will ensure that data products meet the registration requirements of the ADC, including VAULTIS metrics, and are consistent with UDRA 1.0 (reference 1b).

e. The FDM associated with the initial identification of the data product oversees the full lifecycle of the data product, including integration of data from other domains. The Data Steward, and, if necessary, the associated Mission Area Data Officer (MADO), resolves inter-domain issues.

f. If the domain ownership of a data product is unclear, it is the role of the MADO and CDAO to resolve ambiguity. This might happen, for example, when a consumer requests a particular data product and its natural functional domain is ambiguous.

SAIS-ADD (25-1rrrr)
SUBJECT: Army Enterprise Data Product Definition

g. The FDM and the Data Steward manage the Service Level Agreements and entire lifecycle of the data product in an ongoing manner.

h. The FDM receives feedback from consumers to update and improve the product in accordance with consumers' needs.

i. Data Stewards and FDMs must execute their responsibilities as identified in the Army Data Stewardship Roles and Responsibilities memorandum (reference 1d).

j. Commanders and other decision makers will make use of data products, when they exist, to back analysis. If relevant data products do not exist they should request them from the applicable data steward.

7. Intended Effect. The term 'data product' has many definitions across the industry, as well as definitions applying specifically to particular contexts, such as data mesh. This memorandum provides a common base understanding across the broad Army for what a data product is and how it is governed, which will facilitate how they are developed and used.

8. Duration. The CIO is the proponent for this guidance. This guidance is effective upon signature and stays in effect until rescinded or superseded.

9. Points of Contact.

a. CIO Policy Inbox at usarmy.pentagon.hqda-cio.mbx.policy-inbox@army.mil

b. OCIO, Data Integration Division, at usarmy.data.management@army.mil

c. Mr. Alfred Hull, Data Integration Division, alfred.d.hull2.civ@army.mil

GARCIGA.LE
ONEL.T.1186
170411
LEONEL T. GARCIGA
Chief Information Officer

Digitally signed by
GARCIGA.LEONEL.T.11
86170411
Date: 2024.07.18
13:11:49 -04'00'

DISTRIBUTION:

Principal Officials of Headquarters, Department of the Army
Commander

U.S. Army Forces Command

U.S. Army Training and Doctrine Command

(CONT)

SAIS-ADD (25-1rrrr)
SUBJECT: Army Enterprise Data Product Definition

DISTRIBUTION: (CONT)

- U.S. Army Materiel Command
- U.S. Army Futures Command
- U.S. Army Pacific
- U.S. Army Europe and Africa
- U.S. Army Central
- U.S. Army North
- U.S. Army South
- U.S. Army Special Operations Command
- Military Surface Deployment and Distribution Command
- U.S. Army Space and Missile Defense Command/Army Strategic Command
- U.S. Army Cyber Command
- U.S. Army Medical Command
- U.S. Army Intelligence and Security Command
- U.S. Army Corps of Engineers
- U.S. Army Military District of Washington
- U.S. Army Test and Evaluation Command
- U.S. Army Human Resources Command
- U.S. Army Corrections Command
- U.S. Army Recruiting Command
- Superintendent, U.S. Military Academy
- Commandant, U.S. Army War College
- Director, U.S. Army Civilian Human Resources Agency
- Executive Director, Military Postal Service Agency
- Director, U.S. Army Criminal Investigation Division
- Director, Civilian Protection Center of Excellence
- Director, U.S. Army Joint Counter-Small Unmanned Aircraft Systems Office
- Superintendent, Arlington National Cemetery
- Director, U.S. Army Acquisition Support Center

CF:

- Principal Cyber Advisor
- Director of Enterprise Management
- Director, Office of Analytics Integration
- Commander, Eighth Army