



NOVETTA

WOPR

WEB-SCALE OPERATIONAL
PLATFORM FOR RESEARCH



A single platform for data discovery, curation, and exploitation.

WOPR is a comprehensive, extensible big data environment with integrated machine learning (ML). WOPR helps analysts and data consumers prototype emerging capabilities in production environments. It features a scalable, object storage-based data layer, a flexible high-throughput data pipeline, and a rich UI for multi-dataset discovery, curation, and exploitation.

DATA LAYER MAINTAINS FULL RECORD PROVENANCE

WOPR’s lightweight data layer is built on S3-compatible object storage for high scalability and full provenance — from enriched, translated records back to original source records or documents. This data layer feeds the WOPR ecosystem, shortening the data delivery timeline and making it more accessible.



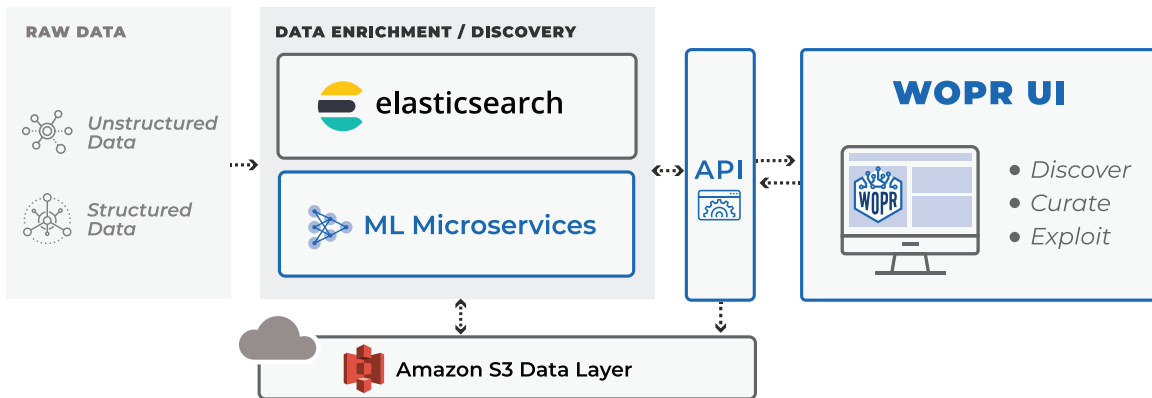
A microservice framework to move ML from the lab into the real world.

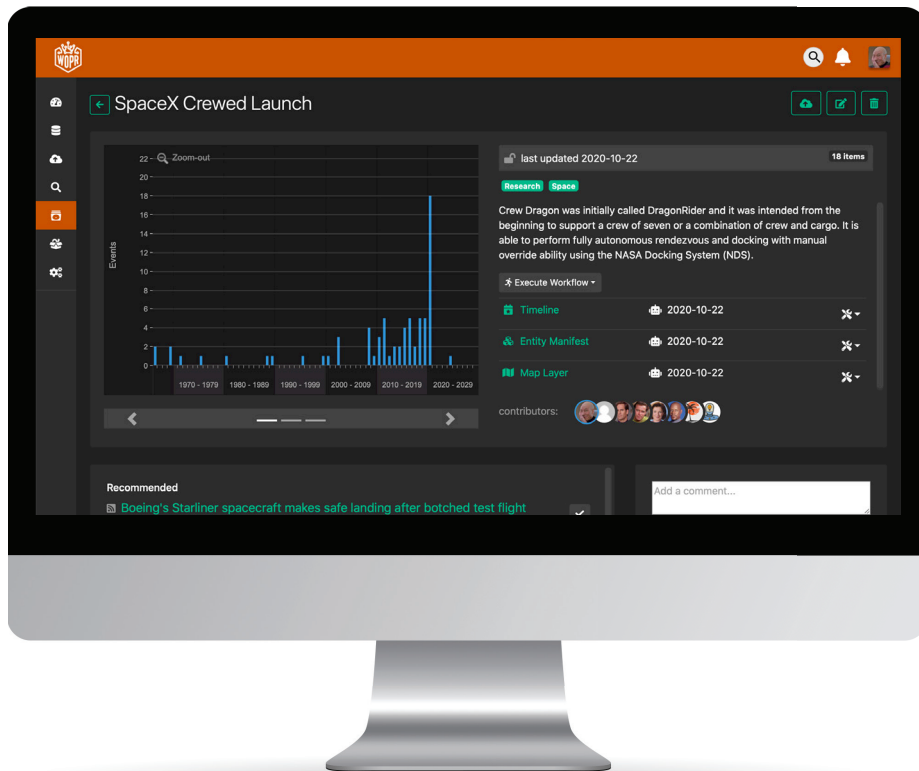
DATA PIPELINE ENRICHES RECORDS FOR ML-BASED ANALYTICS

The WOPR data pipeline scales to ingest and enrich up to 250,000 records per minute. A configurable data translation component, which includes a visual workbench, accelerates data engineering tasks. This data pipeline provides a turnkey ETL solution to hydrate the WOPR data lake with disparate datasets. It can also be used with Elasticsearch and relational database management systems.

MICROSERVICES ARCHITECTURE ENABLES FLEXIBLE DEPLOYMENT

WOPR consists of containerized microservices which can be leveraged within the end-user environment, data pipeline, or independently outside of the WOPR environment, to suit a variety of customer missions.





ANALYST UI DELIVERS ML-BASED INSIGHTS

The WOPR UI provides analysts with access to all WOPR services from a single pane of glass:

Discovery

Multiple search providers facilitate data discovery while a recommendation capability suggests relevant content.

Provenance

Raw data, enriched data, and associated metadata are always accessible.

Language Comprehension

Text summarization, entity extraction, and a question-and-answer feature aid comprehension.

Curation

Create and manage collections of content.

Collaboration

Share collections, leave comments, mention users, and react to content.

Artifact Generation

Generate map layers, timelines, entity reports, and export packages from collections.