

— SOLUTION OVERVIEW



DriftWatch: Intelligent Anomaly Detection

Context

Every mission generates data from disparate sources—ranging from physical assets like aircraft maintenance logs and satellite telemetry to cyber logs and network traffic. Outliers in these streams indicate critical events like component failures or cyber breaches.

The Problem

Current data analysis tools fall short in mission-critical environments:

- **Bloated Architecture:** Traditional enterprise data platforms are generic, complex, and heavy to deploy.
- **Supervised Data Dependency:** Most anomaly detection tools rely on labeled datasets, which are rarely available in real-time, unstructured mission environments.
- **Platform Lock-In:** Replacing existing agency investments in data hubs (e.g., Databricks, Splunk) is cost-prohibitive.

The Solution

DriftWatch is a lightweight, dedicated software suite designed exclusively for rapid anomaly discovery across any domain.

- **AutoML Engine:** Automatically evaluates, selects, trains, and validates the optimal anomaly detection algorithm for given data streams without human intervention.
- **Flexible Analyst Workflows:** Offers a web portal for interactive data exploration as well as real-time agentic workflows that continuously monitor sources and surface alerts.
- **Simple Workflow Engine:** Includes customizable pipelines for ingesting data, executing inference engines, and triggering automated alert notifications.

Differentiation

- **Unsupervised & Modular:** Eliminates the requirement for labeled datasets through automated algorithm selection.
- **Non-Invasive Integration:** Functions as a lightweight, modular service layer that hooks directly into existing Databricks, Splunk, or custom log pipelines rather than forcing a platform migration.
- **Domain Agnostic:** Seamlessly scales from physical system telemetry (latency vs. throughput) to cyber defense log streams.

Your mission is our commitment

Contact us at build@bridgephase.com to inquire about working together.