

Product Usage Metrics Framework

Metrics Foundation Proposal & Product Vision

1. Purpose and Context

RavenStack leadership needs a single, governed view of product usage. They've communicated a wish to better understand *how customers are using the product, whether adoption is improving, and which features drive engagement*. This is why I will focus my efforts on **product adoption** and **product engagement** metrics for this exercise.

This framework will define a consistent approach to measuring these domains and will also establish the workflow that governs how new metrics are created, validated and evolved; both for these topics and new (e.g. product retention/churn).

2. Design Priorities and Principles

The main priorities were to ensure **no duplication, no ambiguity, and faster delivery of trusted insights**.

- **To avoid duplication**, all metrics are managed through a centralized catalog with clear ownership and naming conventions.
- **To remove ambiguity**, each metric includes an explicit definition, grain, and source table to guarantee consistent interpretation.
- **To accelerate delivery**, reusable data models are enforced by architectural rules, e.g. at the silver layer we enforce the existence of a single authoritative subscription table all subscription information from bronze must flow there. This standardization allows teams to build and validate new metrics efficiently and consistently.

The framework is built on two complementary dimensions: **governed, scalable data foundations**, and **clarity, storytelling, and business relevance** in analytics.

- **Governance and Architecture**: Data transformations follow a consistent layered structure (raw → silver → metric). Every metric originates from a single validated source and is defined at its lowest meaningful grain (account, subscription, or feature). Lineage, logic, and ownership are documented in a shared catalog, providing transparency and trust.
- **Analytical Design and Storytelling**: Metrics are intentionally structured to describe the customer journey forming a clear, connected narrative. Each metric is modular and reusable, allowing teams to assemble insights efficiently while maintaining consistency across use cases.

3. End-to-End Metrics Development Workflow

All metrics follow a standardized lifecycle to ensure consistency and trust:

1. **Define** - Workshops are held between the Governance Lead and the Metric Owner to complete the standard Metric Template.
2. **Validate** - Data professionals work with the Governance Lead to create an early draft of the metric logic using governed data sources. The draft is then reviewed and approved by the Metric Owner
3. **Publish** - The metric is implemented in the production analytics environment. The finalized definition is added to the central Metrics Catalog with full documentation.
4. **Monitor** - Regular check-in meetings between the Governance Lead and Metric Owners assess metric adoption and quality.

Roles: Metric Owner, Data Analyst, Data Engineer, Governance Lead.

Artifacts: Metric Template, Catalog Entry, Validation Notebook.

4. Governed Business Metrics

Each metric is defined through a standard template to ensure clarity, reusability, and auditability. Template fields include: **Metric Name, Category, Grain, Business Purpose, Calculation Logic, Source Tables, Owner, Frequency, and Status.**

This creates a shared language between business and data teams and guarantees that any new KPI can be developed or validated in the same way.

Below is a summary snapshot of Adoption and Engagement metrics; full catalog is available here: [Metrics Catalog V1 - Google Sheets](#)

Category	Metric	Grain	Core Question
Adoption	Activation Rate	Account	% of new accounts that start using a feature within 14 days
Engagement	Active Subscriptions	Subscription	Monthly count of subscriptions with any usage event
Engagement	Feature Reach	Feature	% of active subscriptions using each feature

5. Scalable and Reusable Structure

All metrics are built on a **layered data architecture** that separates ingestion, modeling, and consumption:

- **Raw Layer:** Original system data (**accounts, subscriptions, feature_usage**).
- **Silver Layer:** Standardized, validated, defining one authoritative subscription view.
- **Metric Layer:** Reusable, version-controlled views that feed dashboards and notebooks.

By enforcing this structure, every team builds from the same trusted components, minimizing duplication and speeding up delivery of new analytics.