**ADD-10 — Data Catalog & Lineage Explorer**

**Status:** New

**Intent**  
Make every artifact discoverable with relationships: partner ↔ sites ↔ decisions ↔ tokens ↔ snapshots ↔ rules.

**Actors**  
Catalog Service • Indexer • UI Explorer • Audit Vault

**Preconditions**

* Event firehose; metadata on artifacts (ids, types, timestamps, snapshot\_id, rule\_version).

**Flow**

1. **Ingest Metadata:** from events/DBs; normalize to a graph (nodes/edges).
2. **Index & Search:** type filters; free-text; time ranges; tenant scopes.
3. **Lineage Views:** from any entity, show upstream/downstream chain (e.g., decision → rule version → snapshot → provider).
4. **Evidence Links:** open Proof Bundles, CIRs, CBT/LRT details.
5. **Access Control:** per-tenant isolation + role-based view.

**Edge Cases**

* Deleted/archived entities → show tombstones with pointers.
* Cross-region catalog → federated search with region filter.

**Done when**

* Users can answer “why was this blocked?” with 2 clicks; export lineage as PDF/CSV for auditors.

**Deliverables**  
Catalog DB, ETL jobs, Explorer UI, export templates.