

Hedera Africa Hackathon — OFFICIAL GRANT EXECUTION ROADMAP

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OFFICIAL GRANT EXECUTION ROADMAP — HEDRON

1) Project overview (non-technical)

Hedron is a Hedera-native **agentic commerce SDK**: it enables AI agents to **negotiate, request payment, settle, and produce verifiable receipts**.

A launchpad-like flow — **discover agent → see price → approve/pay → get result → verify receipt**.

2) Vision: Router/Broker

Hedron's core product is a **Router/Broker** that coordinates **requests, pricing, policy, settlement, and proof** across users and agents.

Where it sits

- **Users / apps** request outcomes
- **Agents** offer priced capabilities
- **Hedera** provides the trust engine (**consensus + payments**)

Execution model

- **Inputs:** user request + policy (**budgets / allowlists / approvals**)
- **Process:** quote → approve/pay → execute → attest/log → receipt
- **Outputs:** result + **HCS event trail** + receipt

Responsibilities

1. **Discovery** — list agents, capabilities, and pricing
2. **Negotiation** — request → quote/proposal
3. **Policy & safety** — approvals, allowlists, spending limits, rate limits
4. **Settlement** — collect payment and trigger execution
5. **Proof** — emit an **HCS audit trail** for every step + a final receipt

3) Why Hedera (agentic mindset)

Hedera is positioned as the trust layer for agentic AI through: - **HCS**: immutable, timestamped, fair-ordered audit trails - **HTS / transfers**: micropayments and token economies for agents - **AI**

Studio / AI Agent Kit / MCP Server: developer tooling and integration surfaces

References

- <https://hedera.com/blog/hedera-leading-the-charge-in-agentic-ai/>
- <https://hedera.com/product/ai-studio/>
- <https://docs.hedera.com/hedera/open-source-solutions/ai-studio-on-hedera/hedera-ai-agent-kit>
- <https://hedera.com/case-study/eqty-lab-accenture/>

THE FUNDING MODEL — GRANT FUNDING: THE 50/50 DISTRIBUTION MODEL

The total grant prize is disbursed in two equal installments: 1) **50%** is allocated to the project upon the grant announcement. 2) The remaining **50%** is distributed upon successful completion of a major milestone within a timeframe of **3 to 9 months**.

For **Hedron**, the major milestone corresponds to the deliverables described in the **OFFICIAL GRANT EXECUTION ROADMAP** (Step 2 — Milestone, Months 6–9).

TRANCHE 1 — ACTIVATION

50% of the awarded tier is released immediately, to be invested 100% within the project scope according to detailed needs.

TRANCHE 2 — MILESTONE

Remaining 50% released upon milestone completion, aligned with the **OFFICIAL GRANT EXECUTION ROADMAP** phases and requirements.

4) THE 18-MONTH MISSION —

STEP 1 — ACTIVATION (Months 1–6)

Goal: ship a production-grade **agentic commerce loop** on Hedera mainnet with clear proof and developer adoption.

STEP 2 — MILESTONE (Months 6–9)

Goal: deliver a production-grade **Agentic Commerce Platform** on Hedera with hardened reliability, integrations, and verifiable execution trails.

Milestone deliverables (3–9 months): - **Router/Broker v2:** higher throughput, queueing, idempotency, rate limits, multi-tenant support - **Audit Trail v1 (HCS):** typed event schema + correlation IDs + explorer-verifiable trails for every workflow - **Payments v2:** stablecoin rails (HTS where applicable) + receipts + refund/dispute hooks - **Integrations v1:** AI Agent Kit plugin + MCP tools + Skills for commerce actions - **UI v1:** seamless agent discovery + purchase/approval + execution tracking + receipt verification - **2 production pilots:** two end-to-end workflows running on mainnet with published runbooks

Definition of Done: - p95 latency + error rates tracked; SLOs defined and met for pilots - Each pilot workflow produces verifiable HCS trails + payment receipts - Integrations ship as versioned packages with docs and examples

STEP 3 — SCALE (Months 9–18)

Goal: ecosystem growth (agents, partners, tooling), stronger trust infrastructure, and mature hosted infrastructure (SLOs, cost controls, partner enablement).

5) STRATEGY CANVAS (PHASES 1–3)

Focus Area: TECHNICAL (Hedron SDK)

| Goal / Objective | Key Deliverables (Outputs) | Key Metric (Number) | Success Criteria / Definition of Done | Risk Mitigation Strategy |
|--|---|---------------------|---|--|
| (M1–M6) Ship “Agentic Commerce Loop” on Hedera mainnet | Reference flow: discover → quote → approve/pay → deliver → receipt; production configs | 1 end-to-end flow | Any reviewer can follow steps and verify receipts + HCS trail on explorer | Scope lock: 1 core flow + 3 example agents |
| (M1–M6) Build a seamless UI for agent discovery and execution | Web UI: browse agents, view pricing, request/approve/pay, track status, verify receipts | 1 production UI | UI supports the full flow end-to-end and links to on-chain proofs | Start minimal; progressive enhancement; secure-by-default UX |
| (M1–M6) Verifiable execution trail (Hedera-first) | HCS audit trail for every commerce step; correlation IDs; schema registry | ≥ 1 HCS topic | Explorer shows ordered events for proposal/payment/receipt for each run | Strict schemas; deterministic correlation IDs |
| (M1–M6) Settlement module on Hedera | Mainnet settlement using HBAR and/or HTS ; idempotent receipts (paymentId) | ≥ 1 supported asset | Receipts are verifiable; retries are safe; no double-execution | Idempotency + replay protection + safe retries |
| (M6–M9) Integrations with Hedera AI Studio ecosystem | AI Agent Kit plugin + MCP tools exposing Hedron commerce actions | 2 integrations | Developers can call Hedron commerce actions from AI Studio-compatible tooling | Keep tool surface minimal: quote/pay/verify |
| (M9–M18) Trusted registry + governance foundations | Agent registry (capabilities/pricing/policies); governance hooks | 1 registry spec | Registry is documented, versioned, and supports verified listings | Versioning + compatibility rules |
| (M6–M18) Marketplace-grade trust primitives | Verified listings, reputation signals, dispute/chargeback workflow (process + logs) | 1 trust suite | Buyers can distinguish verified agents; disputes are traceable via HCS | Start minimal; policy-first; avoid over-automation |

Focus Area: OPERATIONS / DEVOPS

| Goal / Objective | Key Deliverables (Outputs) | Key Metric (Number) | Success Criteria / Definition of Done | Risk Mitigation Strategy |
|---|---|---------------------|---|--|
| (M1–M6) Production hosting and reliability | Router deployment (prod); monitoring; backups; incident playbook | ≥ 99% uptime target | Router runs reliably with observability and on-call readiness | Rate limits; backpressure; staged rollouts |
| (M6–M18) SLOs + multi-environment operations | Staging/prod parity, SLO dashboards, incident drills, cost controls | 1 ops program | Clear SLOs and monthly reliability reports | Progressive rollout; chaos testing light |
| (M1–M6) CI/CD and release discipline | Lint/unit/integration tests; release tags; changelog | CI < 10 min | CI green on main; semver releases; reproducible builds | Mock-first tests; isolate chain calls |
| (M6–M18) Scalability & cost control | Cost dashboard; caching; queueing; concurrency controls | p95 latency target | Stable costs per run; predictable performance | Capacity planning + load tests |

Focus Area: AUDIT / SECURITY

| Goal / Objective | Key Deliverables (Outputs) | Key Metric (Number) | Success Criteria / Definition of Done | Risk Mitigation Strategy |
|---|--|---------------------|--|--|
| (M1–M6) Secure protocol messaging | Enforced sign/verify + replay protection ; key management guidance | 0 unsigned accepted | Unsigned/replayed messages rejected (tests + runtime) | Threat model + property tests |
| (M1–M6) Policy & approvals (human-in-the-loop) | Spending limits; approvals; allowlists; scheduled transactions support | 1 policy module | High-value actions require explicit approval; policies are auditable | Safe defaults; least privilege |
| (M6–M18) Verifiable compute compatibility | Attestation hook interface; optional integrations later | 1 interface | Clear integration point for verifiable compute providers | Don't block core roadmap on hardware attestation |

Focus Area: BUSINESS / MARKET

| Goal / Objective | Key Deliverables (Outputs) | Key Metric (Number) | Success Criteria / Definition of Done | Risk Mitigation Strategy |
|--|---|---------------------|---|--|
| (M1–M6) Make the product legible to non-tech + tech | 1-page narrative + diagrams + examples | 1 narrative page | Non-tech understands "what/why/how" in <2 minutes | Use concrete examples + explorer proof |
| (M1–M6) Monetization and unit economics | Router/Broker pricing (per call/per workflow); hosted plans | 1 pricing sheet | Clear pricing + cost model for hosting and operations | Start simple; iterate after pilots |
| (M6–M18) Partnerships and adoption | Target integrations; partner outreach pipeline | ≥ 3 partners | 3 partner workflows running on mainnet | Focus on 1–2 verticals first |

Focus Area: MARKETING / CONTENT

| Goal / Objective | Key Deliverables (Outputs) | Key Metric (Number) | Success Criteria / Definition of Done | Risk Mitigation Strategy |
|---|---|---------------------|---|---|
| (M1–M6) Launch content that matches Hedera agentic narrative | Website + docs + mainnet demo video + 2 technical posts | ≥ 4 assets | Clear public narrative + proof links + developer quickstart | Avoid generic fluff; show receipts + HCS trails |
| (M6–M18) Continuous developer marketing | Monthly updates; case studies; tutorials; integration posts | ≥ 12 posts/year | Consistent shipping cadence visible publicly | Content calendar + reuse demos |

Focus Area: LEGAL

| Goal / Objective | Key Deliverables (Outputs) | Key Metric (Number) | Success Criteria / Definition of Done | Risk Mitigation Strategy |
|--|--|---------------------|--|---|
| (M1–M6) Governance & operating policies for hosted services | Terms of service, acceptable use, privacy, incident response, and key-handling policy for the hosted Router/Broker | 1 policy pack | Policies are published and aligned with operating a real mainnet service | Keep scope minimal; use standard templates; review periodically |

6) DUE DILIGENCE (baseline vs build plan)

Baseline (Hedron SDK today)

- Existing Hedron codebase and demo scaffolding
- Payment/settlement modules present (HBAR and/or HTS depending on configuration)
- Agent patterns (verifier/analyzer/settlement) and protocol scaffolding
- **Post-hackathon work (ascension branch):** a more complete *agent launchpad* track: agent discovery + workflow execution scaffolding, plus early **trust primitives** (reputation/verification-oriented modules and a harder “productionization” posture) compared to the main branch.

Additional hosted agent offerings (SaaS-ready)

These are candidate **hosted agents** (operated by Hedron) where revenue comes from **routing/usage fees** through the Router/Broker, while Hedera provides the audit and settlement rails: - Compliance & audit agents - KYC/AML screening agents - Supply chain provenance agents - ESG / carbon tracking agents

Next build steps (what we implement to be “best on agentic commerce platform”)

1. **Router/Broker mainnet deployment** (production infra + monitoring)
2. **HCS audit trail** as a first-class feature (every step logged)
3. **Payments** with idempotent receipts and safe retries
4. **Policy module:** approvals, allowlists, spending limits
5. **Hedera ecosystem integration:** AI Agent Kit plugin + MCP tools + Skills

7) Monetization + infra/hosting charges

Positioning: Hedron is the commerce layer for agents.

Revenue sources

- **Hedron Router/Broker fees (primary):** users/agents pay a stable-denominated fee per executed workflow (pay-per-call / pay-per-task).
- **Hosted Facilitator SaaS (primary):** monthly tiers for teams needing SLAs, analytics, policy/approvals, compliance logs.
- **Optional:** verified listing/promotions for the Agent Launchpad agents (curation badge + distribution).

Token value capture (if/when token exists)

- **Protocol buyback:** allocate X% of Router revenue to market-buy the token (buyback pressure; no dividend language).
- **Utility:** staking for listing priority / rate limits / access to premium routes (optional; only if it strengthens security and incentives).

Infra & hosting cost centers (what we budget for)

- Compute for Router/Broker (CPU/RAM)
- Persistent storage for logs/receipts/analytics
- Monitoring + alerting

- CDN/docs hosting
- Operational security (key management, backups)
- Marketing & digital content

8) SCALE & SUSTAINABILITY (PHASE 3: Months 13–18)

REVENUE MODEL

- Router/Broker usage fees + hosted tiers for teams.
- Optional verified listings and token-based incentives (if/when token exists).

GROWTH TARGETS (18 months)

- Mature hosted Router/Broker with predictable costs and reliability.
- Growth in number of listed agents and monthly routed workflows.
- Multiple production integrations via AI Studio surfaces (AI Agent Kit / MCP / Skills).

PARTNERSHIPS

- Target partnerships with Hedera ecosystem builders (AI tooling, wallets, stablecoin rails, infra providers).

COMPLIANCE / ENTITY

- Operating policies for a mainnet hosted service (privacy, acceptable use, incident response, key-handling).
- Entity/compliance readiness aligned to operating commercial SaaS on Hedera.

1) SELECT YOUR TARGET TIER

Which level of funding is required to execute the roadmap?

- ☐ **TIER 1 — \$20,000** (Focus: MVP & Launch)
- ☒ **TIER 2 — \$100,000** (Focus: Scale & Growth)

2) TRANCHE 1 ALLOCATION

| Category | Allocation (USD) | Notes |
|--------------------------|------------------|---|
| Development (Dev) | 40,000 | Router/Broker v1→v2, UI, protocol hardening, integrations (AI Agent Kit/MCP/Skills) |
| Operations (Op) | 20,000 | Production hosting, observability, backups, SRE playbooks, scalability work |
| Audit/Security (Audit) | 15,000 | External security review + internal hardening + threat model + verifiable governance test harness |
| Marketing (Mktg) | 10,000 | Website/docs, launch campaign, content production, case studies |
| Legal/Compliance (Legal) | 5,000 | Entity/compliance readiness, policies for hosted mainnet service |
| Partnerships | 5,000 | Partner integration support, BD materials, ecosystem activations |
| Contingency | 5,000 | Unplanned infra/security costs |
| Total | 100,000 | |