

VeritasChain Releases VCP v1.1 Reflecting IETF Feedback and Early Adopter Deployments

Protocol update strengthens verifiable AI audit trails based on real-world trading use cases

VeritasChain Standards Organization (VSO) today announced the release of VeritasChain Protocol (VCP) v1.1, a major update to its cryptographic audit standard for algorithmic and AI-driven trading systems. The v1.1 release directly incorporates feedback from technical discussions at the Internet Engineering Task Force (IETF), as well as operational insights from early adopters and organizations that have deployed VCP v1.0 in real trading environments.

VCP is designed to function as an "AI flight recorder" for trading systems, enabling independent post-hoc verification of how algorithmic and AI-based decisions were generated and executed. While VCP v1.0 established tamper-evident logging, feedback from both standards experts and early production users highlighted a critical limitation common to many logging systems: the inability to reliably detect selective event omission.

Based on this feedback, VCP v1.1 introduces explicit completeness guarantees, allowing third parties to cryptographically verify not only that recorded events were not altered, but that all required events were included at the time of anchoring. This enhancement addresses omission and split-view attack scenarios that cannot be reliably detected using traditional sequential logs alone.

The v1.1 specification formalizes a clear three-layer architecture. Layer 1 provides per-event integrity through canonical hashing and digital signatures. Layer 2 ensures batch-level completeness using RFC 6962-compliant Merkle Trees. Layer 3 establishes external verifiability by anchoring Merkle roots to independent third-party systems.

A key change in v1.1 is that external anchoring is now mandatory for all compliance tiers, including retail-oriented Silver implementations. For Silver tier use cases, lightweight public timestamping services such as OpenTimestamps are explicitly supported, enabling external verification without requiring proprietary or heavyweight infrastructure.

In parallel with the specification release, VSO has published an open-source Evidence Pack and Reference Trading Agent demonstrating a production-grade implementation of VCP v1.1 in a live MetaTrader 5 (MT5) environment. The implementation uses a non-invasive sidecar architecture that operates independently of the trading system itself, requiring no modification to the MT5 terminal or broker infrastructure.

AI decision signals, order lifecycle events, and execution outcomes are captured externally, cryptographically hashed, organized into Merkle Trees, and anchored for independent verification. The design ensures that audit logging cannot interfere with trading execution and that failures in the logging process do not affect market operations.

To support transparency around its technical claims, VSO has also released a detailed Evidence Report documenting multiple independent prior-art analyses. These analyses reviewed academic literature, patent databases, commercial RegTech products, open-source projects, and the MetaTrader ecosystem. Based on publicly available information, no prior system was identified that combines MT4/MT5 integration, cryptographic verifiability, AI decision logging, production-grade deployment, and a non-invasive sidecar architecture in a publicly documented form.

The VCP v1.1 specification, Evidence Pack, and verification tools are published under open-source terms, allowing regulators, auditors, researchers, and market participants to independently reproduce verification results. This approach is intended to support regulatory expectations for transparency and accountability, including those emerging under frameworks such as MiFID II and the EU AI Act, while remaining vendor-neutral and implementation-agnostic.

VCP v1.1 is released as a production-ready specification with a defined transition period for existing VCP v1.0 implementations. While protocol-level compatibility is maintained, certification requirements have been strengthened to reflect higher assurance expectations informed by real-world deployment experience.

■ Reference Links

VCP v1.1 Specification

<https://github.com/veritaschain/vcp-spec/tree/main/spec/v1.1>

Open-Source Evidence Pack & Reference Implementation

<https://github.com/veritaschain/vcp-rta-reference>

Evidence Report (PDF)

https://github.com/veritaschain/vcp-rta-reference/blob/main/docs/VCP_Worlds_First_Evidence_Report.pdf

■ About VeritasChain Standards Organization

VeritasChain Standards Organization (VSO) is an independent, non-profit, and vendor-neutral standards body focused on developing cryptographically verifiable audit standards for algorithmic and AI-driven systems.

<https://veritaschain.org/>

VSO does not provide trading services and does not endorse specific vendors, platforms, or trading strategies.