Trident Build | Construction Research

Project 001 — Part I Completed

Research update: November 3, 2026

Part I covers Stages 1–8 of a computer-based research and documentation program exploring autonomous construction inspection concepts. The work includes simulated operating scenarios, communications-outage behavior, return-to-start logic, safety-oriented mission outcomes, preliminary evaluation criteria, and structured records for future comparison.

Research status

The reported trials and outcomes are synthetic computer simulations. They are not physical rover tests, demonstrations of deployed equipment, verified plumbing leak detection, or validated electrical fault detection. Electrical quantum-circuit work is a separate simulation reference and should not be interpreted as rover hardware validation.

Part II — Engineering Verification and Preparation (Planned Stages 9–12)

The next research phase is intended to check source-to-trial traceability, refine measurement definitions and evaluation methods, review limitations, and prepare documentation for subsequent testing.

Part III — Applied Testing and Evaluation (Future Stages 13+)

A later phase is intended to gather independent physical test evidence, compare compatible measurements against simulation references, investigate differences, and document engineering conclusions.

Publication note

This public summary describes research scope and status only. No operational readiness, field performance, quantum advantage, or physical validation is claimed. Future updates will be published as evidence becomes available.