Provisional Patent Specification: NeuraPlumb

TITLE OF INVENTION:

NeuraPlumb: AI-Powered Diagnostic System for Evaluating Plumbing Installations

FIELD OF THE INVENTION:

The invention relates to systems and methods for analyzing plumbing installation quality using

Al-powered photo evaluation, tiered scoring, and real-world adaptive logic.

BACKGROUND:

Homeowners and professionals often lack a clear and objective way to assess plumbing work

quality. Existing tools do not offer transparent, real-time photo-based evaluations or adaptive logic

that accounts for jobsite complexity, plumber intent, or trust-building.

SUMMARY:

NeuraPlumb introduces an AI scoring system ("NeuraScore") that uses uploaded photos to evaluate

plumbing craftsmanship. Scores range from 1 (red) to 5 (blue), with an optional hidden Legendary

Tier (gold badge) awarded only when field-defining mastery is demonstrated.

FEATURES CLAIMED:

Tiered scoring with color-coded NeuraScore (1-5) and optional Legendary Tier.

2. Scope-Based Grading System: Limits AI analysis when a plumber declares partial work.

3. "See Details" Toggle: Displays full diagnostic breakdown only when the user requests it.

4. Homeowner Clarity Suite: Includes timestamp/geotag, certification badges, and trust-building

summaries.

5. Real-World Filters: Al avoids unfair penalties for missing polish, environmental terrain, or visible

Page 1

Provisional Patent Specification: NeuraPlumb

asymmetry due to underground constraints.

6. Above-and-Beyond Recognition: Al highlights extra cleanup, thoughtful layout, or elite

adaptations.

7. Difficulty Rating Scale: Plumbing jobs rated 1 (Simple) through 5 (Extreme), with optional 3.5

(Elevated).

8. Submission Source Tagging: QR scan system and user-type attribution (homeowner, plumber,

third party).

9. All logic rules structured for field transparency, fairness, and trust.

INVENTOR:

James Kim - San Jose, CA

DATE:

May 24, 2025