GreenPWRcord: Power Cord Reuse Program A Circular Solution to Electronic Waste

The Problem:

- Over 3.3 billion electronic devices shipped annually come with power cords, contributing significantly to e-waste.
- Most power cords remain in good condition long after the devices are discarded, resulting in unnecessary **landfill waste** and loss of valuable materials.

Our Solution:

- AI-Driven Sorting & Testing System for Power Cords:
 - Automatically analyzes cord images to categorize by Type (e.g., AC Power Cords, DC Cables) and Condition (new, used, or renewed).
 - Reintroduces tested, usable cords into the economy, reducing the need for manufacturing new cords and **lowering lifecycle emissions**.

Benefits:

- **50% Reduction** in power cord waste in participating regions.
- Decreased demand for raw materials by reintroducing cords into the supply chain.
- Potential to save **millions of tons** of e-waste globally.
- **Cost savings** for consumers by providing affordable reused cords.

Progress & Plan:

- Prototyped AI system for sorting and condition assessment.
- Partnerships with **recycling centers** to secure discarded cords.
- Goal: Process 100,000 cords in the first 6 months of launch.

Community & Environmental Impact:

- Job creation in sorting and testing.
- **Increased access** to affordable reused cords, reducing costs for underserved communities.
- Supports **environmental justice** through reduced e-waste and resource extraction.