Continuous ESG and EPR Tracking and Reporting Platform for SMEs

This document outlines the rationale, vision, and Minimum Viable Product (MVP) definition for a software platform focused on continuous Environmental, Social, and Governance (ESG) tracking for small and medium-sized enterprises (SMEs), with built-in Extended Producer Responsibility (EPR) compliance support and future-ready regulatory reporting.

1. Background and Rationale

While ESG reporting requirements are gradually expanding, many SMEs in India already face mandatory environmental compliance obligations through Extended Producer Responsibility (EPR) regulations for waste streams such as plastic, e-waste, batteries, tyres, and used oil. At the same time, expectations from banks, large buyers, and supply chains are pushing SMEs to disclose credible ESG data.

Most existing solutions are consultant-led, expensive, and designed for large enterprises. This platform is designed to offer a practical, evidence-based alternative for SMEs that focuses on daily operational data rather than one-time annual reporting.

2. Product Vision

The platform functions as a continuous ESG operating system for SMEs, enabling organisations to track real environmental performance on a daily basis. ESG serves as the primary user-facing framework, while EPR compliance is supported as a core regulatory output and future reporting requirements such as BRSR are handled as a background capability.

3. MVP Objectives

The MVP aims to demonstrate that SMEs can continuously capture, verify, and analyse environmental data with minimal friction, while generating credible ESG insights and EPR-ready regulatory submissions without heavy manual intervention or consultant dependence.

4. MVP Scope and Functional Modules

4.1 Company Onboarding

Companies provide basic organisational details, operational profile, locations, and reporting periods. Relevant ESG and EPR modules are activated automatically based on this information.

4.2 Continuous Data Capture

Users upload electricity bills, fuel receipts, water bills, waste invoices, and recycler certificates through drag-and-drop or mobile uploads. This mirrors existing SME workflows and enables ongoing data collection rather than annual data gathering.

4.3 Intelligent Document Processing

Uploaded documents are automatically classified and key fields extracted. Where ambiguity exists, user confirmation is requested to maintain accuracy and accountability.

4.4 ESG and EPR Calculation Engine

Standardised conversion and emission factors are applied transparently to calculate energy use, emissions, water consumption, and waste metrics. EPR-specific waste quantities and categories are tracked in parallel to support regulatory filings.

4.5 Verification and Anti-Fraud Controls

Built-in verification includes duplicate detection, anomaly flags, vendor consistency checks, and full audit trails. These controls support credible ESG disclosures and defensible EPR submissions.

4.6 Continuous Dashboards and Insights

Dashboards present clear trends across energy, fuel, water, and waste streams, enabling companies to monitor performance and identify inefficiencies in near real time.

4.7 Ongoing Suggestions and Operational Nudges

The system provides data-driven suggestions to improve efficiency, reduce environmental impact, and strengthen EPR compliance, framed around cost savings, risk reduction, and operational feasibility.

4.8 ESG, EPR, and Future BRSR Reporting

Users can generate ESG summaries and EPR-aligned regulatory outputs at any time. Data is also mapped quietly to BRSR-aligned structures to ensure future reporting readiness without additional effort.

5. Deliberate MVP Exclusions

To maintain focus, learning depth, and data credibility, the MVP does not include full Scope 3 modelling, supplier ESG scoring, carbon offset marketplaces, or automated sustainability narratives. These features may be considered in later iterations once data quality, verification strength, and user trust are firmly established.

6. Learning and Development Intent

A core goal of this project is deep technical and conceptual learning. Each system component is designed to be understood end-to-end, reinforcing responsible automation, regulatory awareness, and robust system design.

7. Conclusion

This platform proposes a practical, trustworthy approach to ESG and EPR management for SMEs. By prioritising continuous data capture, verification, and operational insights, it bridges the gap between daily business activity and evolving sustainability and regulatory expectations.