

html

carboncalcpcf.com

Product Carbon Footprint Dashboard

Product: ptjdejkquo

Company: njmtzjnqgw

45.03 kg CO₂e
Total Carbon Footprint

Key Metrics

45.03 kg CO₂e

Total Footprint

56.29 kg CO₂e/kg

Carbon Intensity (per kg product)

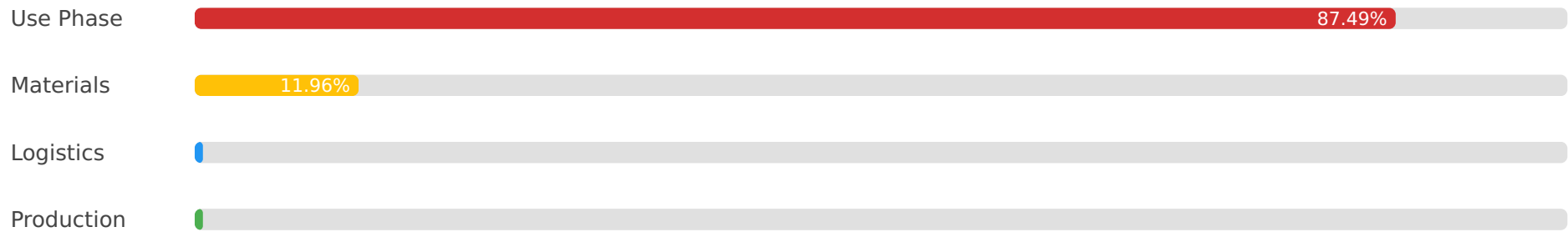
Use Phase

Primary Emission Hotspot

Scope 3

Dominant GHG Scope

Lifecycle Stage Breakdown



✔ End-of-Life provides a net credit of **-0.688 kg CO2e/unit**

Material Carbon Impact



Note: Percentages above are relative to the total material carbon footprint (5.47 kg CO2e).

Highlights & Emission Hotspots

- Use Phase is the dominant emission hotspot (**40.00 kg CO2e/unit**), demanding critical focus on energy efficiency in product design and user behavior.
- Purchased Goods and Services, particularly materials like the **aluminum casing (3.35 kg CO2e)** and **circuit board assembly (1.50 kg CO2e)**, represent the second largest impact category.
- The product benefits from a **60% recyclability percentage** and existing **Circular/Take-back Programs**, resulting in a net carbon credit at End-of-Life.

Recommendations for Reduction

- Optimize Use Phase Energy Efficiency: Prioritize product design innovations to drastically reduce energy consumption during the product's operational lifespan.
- Sustainable Material Sourcing: Explore opportunities to procure lower-carbon materials (e.g., recycled content, green aluminum) and investigate sustainable alternatives for electronic components.
- Enhance Circularity: Leverage existing take-back programs to maximize actual recycling rates and explore design-for-disassembly principles to improve material recovery.
- Supply Chain Engagement: Collaborate with upstream transportation providers to explore more fuel-efficient modes, routes, or alternative fuels for inbound logistics.