

carboncalcpcf.com

# Product Carbon Footprint Analysis

for exdmrnrnm

**24.46 kgCO<sub>2</sub>e** (per unit)

Report Generated: May 27, 2026

Total Product Footprint

**24.46 kgCO<sub>2</sub>e**

for 1.0 unit

Carbon Intensity

**24.46 kgCO<sub>2</sub>e/unit**

GHG Protocol Standard

Top Emission Hotspot

**Use Phase**

51.1% of total PCF

Primary Emission Scope

**Scope 3**

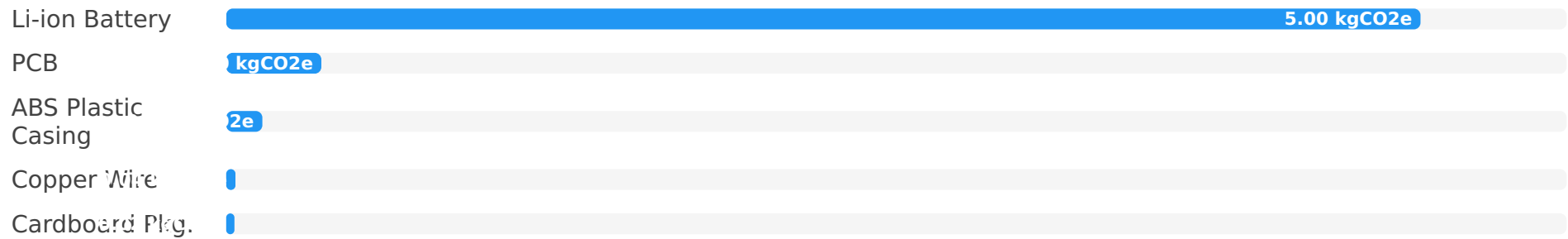
Value Chain Emissions

## Lifecycle Stage Breakdown

**51.1%**  
Use Phase

- Materials & Manufacturing (46.7%)
- Logistics (2.2%)
- Use Phase (51.1%)
- End-of-Life (<0.1%)

## Material Carbon Impact (Top 5)



## Key Insights & Hotspots

---

- The **Use Phase** is the largest contributor, accounting for 51.1% (12.50 kgCO<sub>2</sub>e) of the total footprint, emphasizing energy efficiency.
- **Purchased Goods and Services** (46.7% or 11.42 kgCO<sub>2</sub>e) is a significant upstream hotspot, primarily due to the Lithium-ion Battery and manufacturing energy.
- **Downstream Transportation**, particularly last-mile delivery, contributes 2.0% (0.50 kgCO<sub>2</sub>e), indicating logistics optimization potential.

## Recommendations for Reduction

---

- **Optimize Use Phase Efficiency:** Invest in R&D for lower energy consumption and educate users on efficient usage.
- **Supplier Engagement & Material Innovation:** Collaborate for lower-carbon batteries and explore materials with recycled content.
- **Renewable Energy Integration:** Advocate for increased renewable energy use across manufacturing and the supply chain.
- **Circular Economy Strategies:** Enhance take-back programs and explore innovative recycling technologies.

