

carboncalcpcf.com - Product Carbon Footprint Report

Sustainability Dashboard

For Product: **osktshjkde**

Total PCF: 13.62 kgCO2e per unit

Total Footprint

13.62 kgCO₂e

per 1.0 unit (factory_gate)

Carbon Intensity

13.62 kgCO₂e/unit

GHG Protocol Standard

Top Material Hotspot

0.70 kgCO₂e

from Main Component (Plastic)

Primary Emission Scope

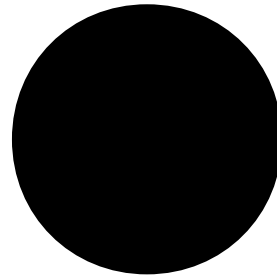
Scope 3 (Use Phase)

~89% of total PCF

Lifecycle Stage Breakdown

Use Phase	12.10 kgCO ₂ e
Materials	0.70 kgCO ₂ e
Production (Scc	0.696 kgCO ₂ e
Logistics	0.17 kgCO ₂ e
End-of-Life (Net	-0.05 kgCO ₂ e

Material Carbon Impact



 Main Component (Plastic)

 Other Materials (Not detailed)

The single main component contributes 0.70 kgCO₂e, representing 100% of the currently detailed material impact.

Highlights & Key Insights

 The **Use Phase** is the dominant emission hotspot, contributing nearly 89% (12.10 kgCO₂e) of the product's total carbon footprint, highlighting energy efficiency as the top priority.

□ **Material Acquisition** (Main Component - Plastic) and **Production** (Scope 2 Purchased Electricity) are the next significant contributors, each accounting for approximately 5% of the total PCF.

□ The **End-of-Life** phase currently provides a small net benefit due to recycling, indicating potential for greater positive impact through enhanced circular economy initiatives.

Recommendations for Carbon Reduction

□ **Energy Efficiency in Use:** Redesign 'osktshjkde' for significantly lower energy consumption during its operational lifespan to address the largest emission hotspot.

□ **Material Optimization:** Explore alternative, lower-carbon materials or increase the recycled content of the 'Main Component' and other parts to reduce upstream material impacts.

□ **Renewable Energy Procurement:** Further increase the share of renewable energy used in manufacturing beyond 75% or invest in on-site generation to reduce Scope 2 emissions.

□ **Logistics Optimization:** Investigate more efficient transportation modes (e.g., rail, sea freight where feasible) and optimize routing to reduce transport emissions.

□ **Circular Economy
Initiatives:**

Enhance take-back schemes and product design for easier disassembly and higher-quality recycling to maximize end-of-life benefits.