

Product Carbon Footprint Dashboard

Product: xgximrxgkj
Total Footprint: 89.74 kg CO2e/unit

powered by carboncalcpcf.com

89.74 kg

Net CO2e per Unit

1.0 unit

Functional Unit

Aluminium Alloy 6061

Top Material Hotspot

Scope 3 (Materials)

Primary Emission Scope

Lifecycle Stage Breakdown



Material Carbon Impact



Highlights & Key Insights

- Materials Dominance: "Purchased Goods and Services" (Materials) is the most significant contributor to gross emissions, at approximately 86%.
- Use Phase Impact: The product's operational lifetime contributes substantially, at roughly 16% of gross emissions, highlighting energy efficiency importance.
- Circular Economy Benefits: High recyclability and robust circular programs provide a significant carbon credit, demonstrating potential for net footprint reduction.

Recommendations & Action Plan

- Material Decarbonization: Prioritize lower-carbon alternative materials or increase recycled content.
- Manufacturing Energy Optimization: Invest in energy efficiency and further increase renewable energy procurement at the China facility.
- Design for Durability and Efficiency: Extend product lifespan and minimize energy consumption during the use phase.
- Strengthen Circularity Initiatives: Expand take-back programs and increase the recyclability percentage of components.
- Enhance Data Granularity: Implement robust systems for collecting precise primary data across all lifecycle stages.
- Supply Chain Collaboration: Work with Europe-focused supply chain partners to collect data and support decarbonization efforts.