



Copper is Material of Choice for Appliances

Study Name: Competitive Analysis of the Appliances Market
Study Author: The Martec Group
First Presented: October 2018

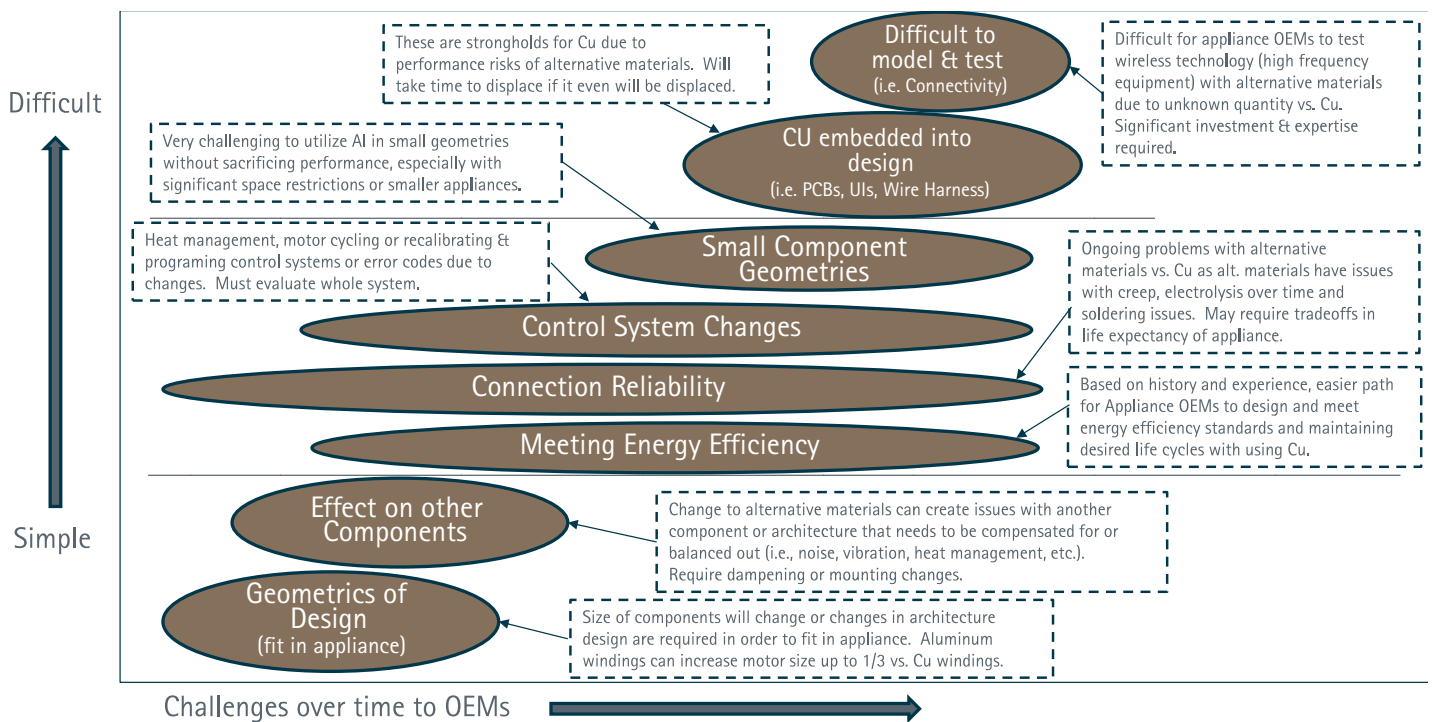
Historically, copper has been the preferred material in the domestic appliance industry and this trend looks set to continue according to new research commissioned by the International Copper Association (ICA). Strong performance in crucial indicators such as ease of welding, heat transferability and corrosion resistance mean copper is continuing to outperform alternative materials like aluminum, with investors unwilling to move away from tried and tested copper.

Overview

According to the study, copper continues to be viewed as the domestic appliance industry's preferred material and this is likely to be the case for years to come, with a predicted 1.9 million tonnes being used annually by 2022.

The research—carried out by The Martec Group, a strategic market research firm, on behalf of ICA—points to multiple factors governing why alternatives to copper have not grasped a larger proportion of the market.

Technical Matters that Defend Copper



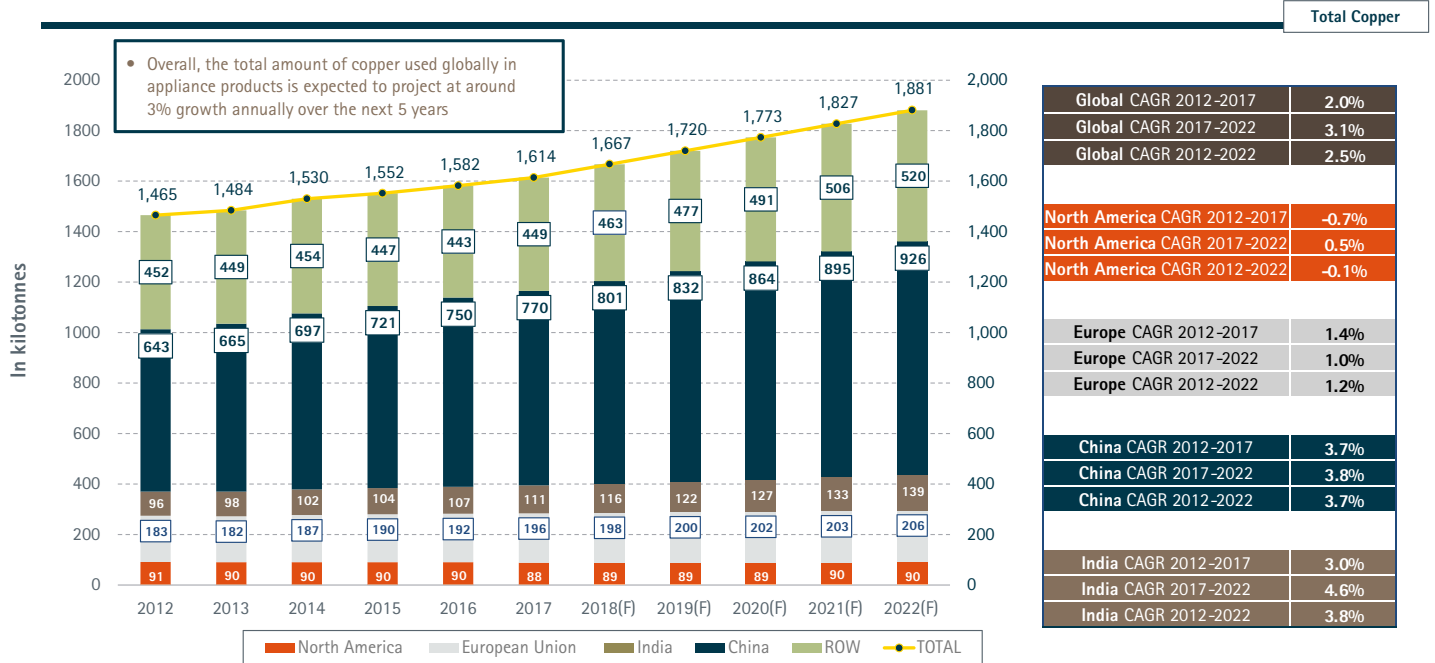
Challenges for Alternative Materials

- Conductivity loss.
- Changes to control algorithms due to electronic properties.
- Reduced component lifespan.
- Procurement complexities.
- Material expansion in heat.
- Larger diameters.

Key Findings

- Copper is a critical material in domestic appliances, e.g. the global average copper use for an oven is 0.8 kg.
- Copper will continue to be the material of choice in the domestic appliance industry.
- Copper use in the domestic appliance industry will rise to 1.9 million tonnes annually by 2022.

Total Copper Use (kt Cu)



Drivers of Growth

Growth in appliances is predominantly occurring in countries with a developing middle class, namely China and India. Over the last five years, these two countries have experienced a 6–10% annual growth rate in appliances, and this is not expected to slow down. In the next five years, India's annual growth rate could reach 9%. As long as copper continues to be the material of choice, demand will continue to escalate.