

Global Value Chain of the iPhone

Topic: Advancing Multi-Regional EEIO Models: A Developer's Summit on Learnings, Evolution, and Future Directions (II)

Author: Yuya Katafuchi

Co-Authors: Keiichiro Kanemoto

In today's global economy, products labeled "Made in China" often conceal a far more intricate story of international collaboration and value distribution. The Apple iPhone, priced around \$1,000, exemplifies this complexity, involving numerous firms across various countries including China, Taiwan, Japan, Germany, and the United States. While China handles the final assembly, substantial portions of the device's value are captured elsewhere, particularly through Apple's design and brand management based in California. Here, we quantify the distribution of value-added across the iPhone's global supply chain at the firm-level, using an enterprise-level multi-regional input-output (EMRIO) table as a base, integrating detailed Bill of Materials (BOM) data, corporate financial reports, and retail price data. This approach enables us to identify specific firms, industries, and countries contributing significantly to value creation and examine how these contributions evolve over time, based on a further disaggregation of firm-level monetary flows within EMRIO into iPhone-model and role levels including parts, assembly, design, and services. Our framework provides a clearer understanding of how individual firms, industries, and countries participate in complex global supply chains, offering valuable insights into the structural dynamics of value capture that extend beyond the electronics industry.