

Legal Statement

- The purpose of the information in this presentation is to guide ICA programs and provide members with information to make independent business decisions.

Antitrust Guidelines for Copper Industry Trade Association Meetings

The following guidelines with respect to compliance with antitrust laws of the United States, Japan and European Community are intended to govern the conduct of participants in copper industry trade association meetings, both at the meeting itself and in informal discussions before or after the formal meeting.

Price: Competitors should not discuss future prices (including terms of sale) of their products. There is no blanket prohibition against the mention of or reference to current or past prices but limits must be observed. Such references or mentions should occur only when necessary in connection with the development of association programs. For example, reference to a particular price level in comparing the cost of a copper product to a competing product is permitted. Whenever possible, such references should be discussed in advance with legal counsel.

Competitive Information: Competitors should not discuss the market share of a particular copper producer or copper fabricator's products. Furthermore, nothing should be said at a meeting which could be interpreted as suggesting prearranged market shares for such products or producer production levels. The overall market share of copper products may be discussed with regard to competition with non-copper products and general market acceptance.

New Products: Competitors should not encourage or discourage the introduction of a new product by another competitor or reveal a particular copper company's plans to change the production rate of an existing product or to introduce a new product. No company should disclose to another company whether it is in a position to make or market a new product. New products may be discussed in a technical manner or from the standpoints of competition with non-copper products and general market acceptance. In addition, proposed methods for and results of field and laboratory testing can be considered.

The Role of Legal Counsel: Legal counsel attends association meetings to advise association staff and other meeting attendees regarding the antitrust laws and to see that none of the matters discussed or materials distributed raise even the appearance of antitrust improprieties. During the course of a meeting, if counsel believes that the discussion is turning to a sensitive or inappropriate subject, counsel will express that belief and request that the attendees return the discussion to a less sensitive area.

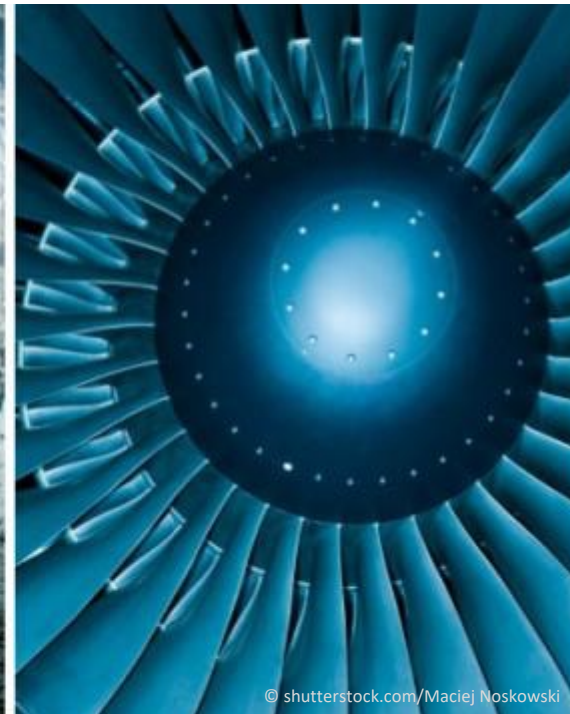
A paper entitled 'Copper Industry Trade Associations and Antitrust Laws' is available upon request.

10/92, 5/93, 10/10

1. Other foreign competition laws apply to International Copper Association, Ltd. (ICA)'s activities worldwide.

Copper Embedded In Overseas Trade FLOWS

Luis Tercero & Denis Stijepic
ICSG Spring Meeting | 29 April 2021



Trade Flow Developments

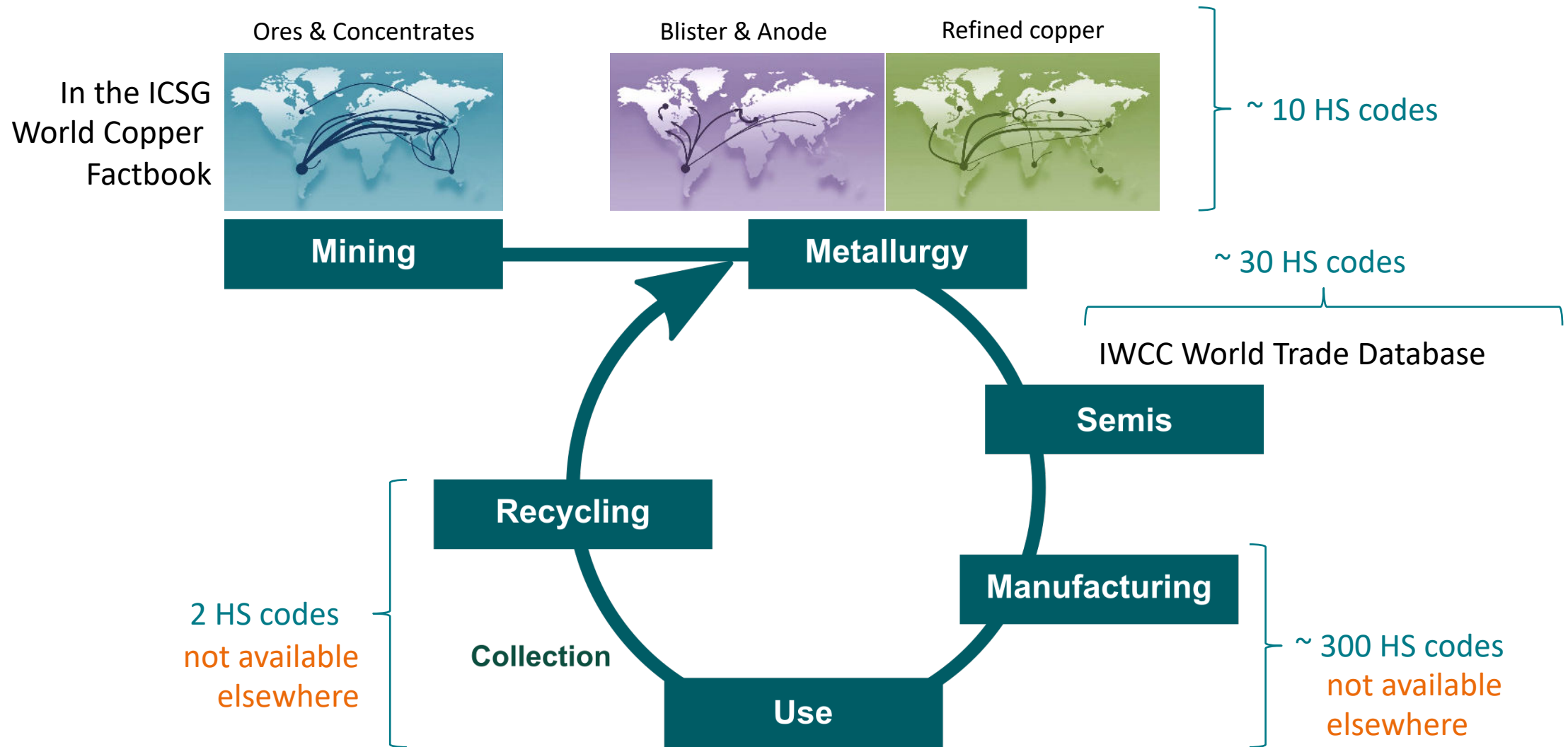
Previous work

- 2015-2016 first attempt at understanding trade flows, referencing data up to 2014
 - Presented and well-received at ICSG (2016)
 - Published in the peer-reviewed scientific literature (2016)
- Revealed different market behaviors across regions

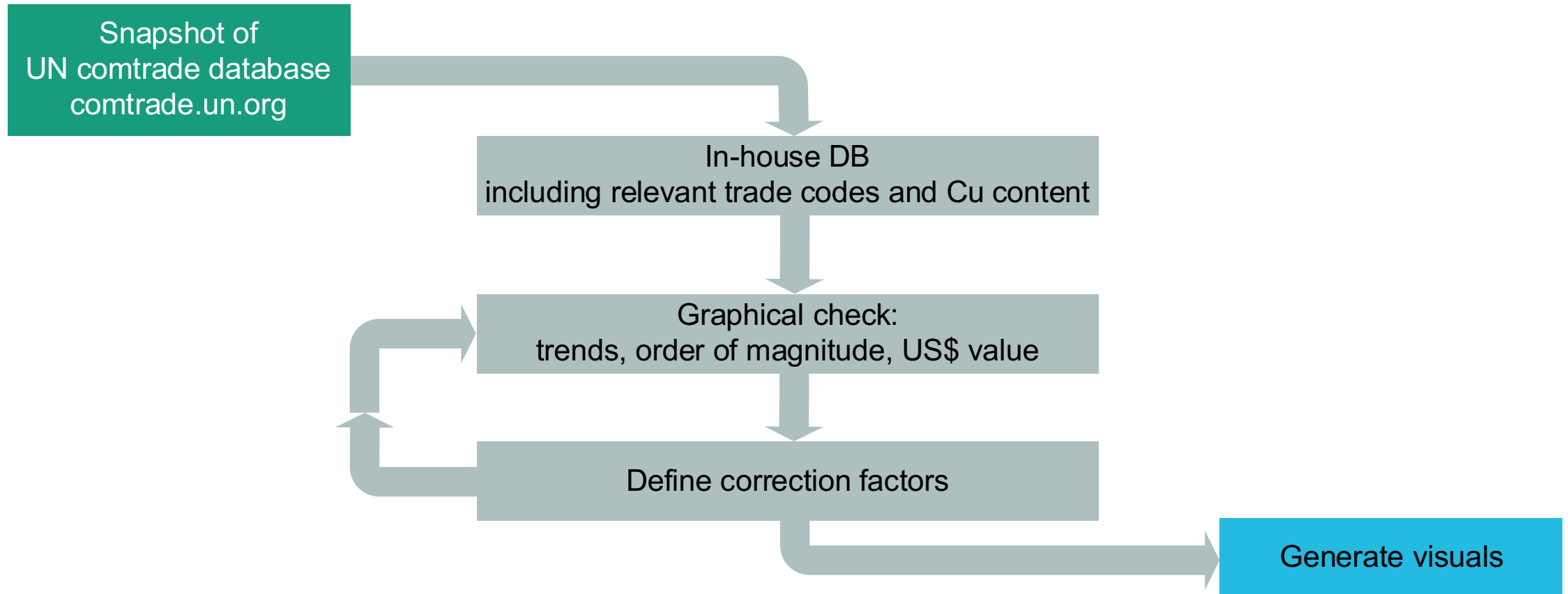
This work

- Update to latest available data (2018)
- Addition of financial aspect clarifies tonnage/weight versus monetary value of trade flows
- Increased detail in the view of copper markets and different behaviors across regions

What information is available and how this work fits in



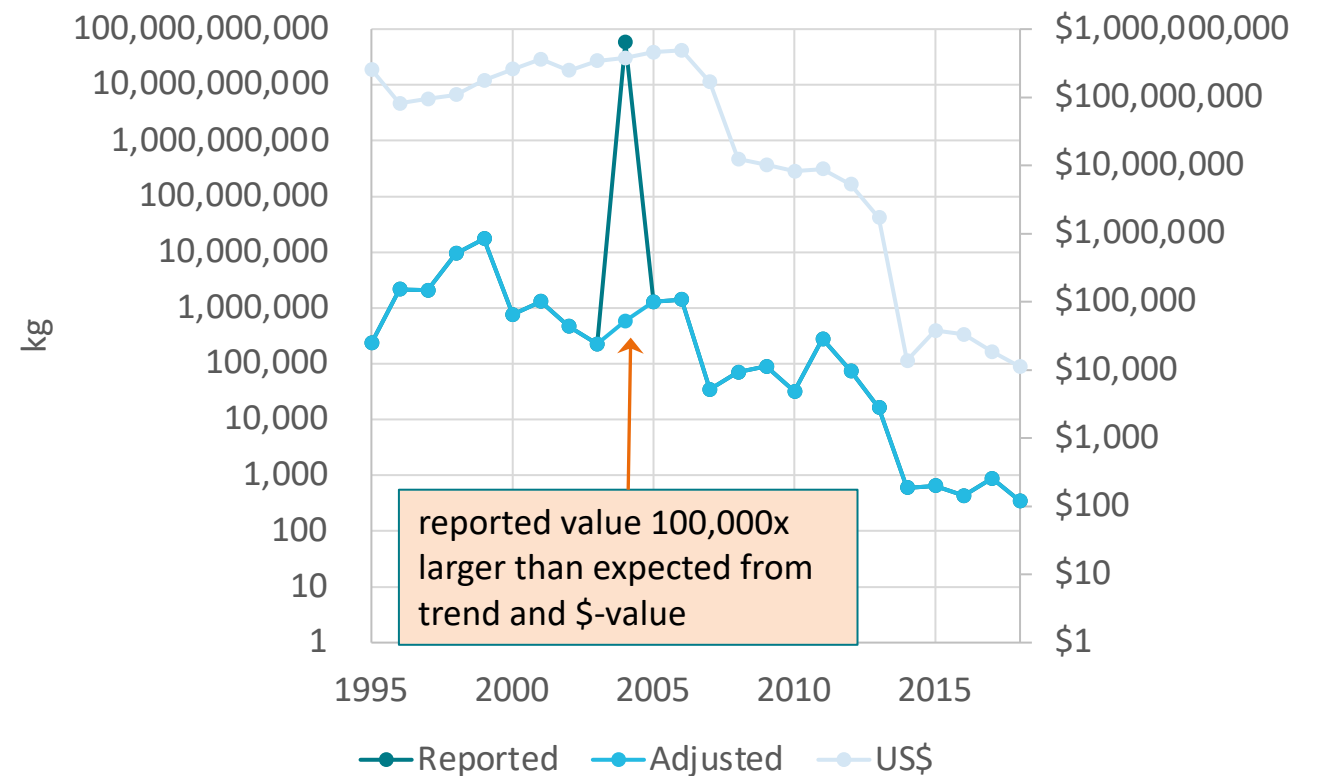
Workflow



Methodology

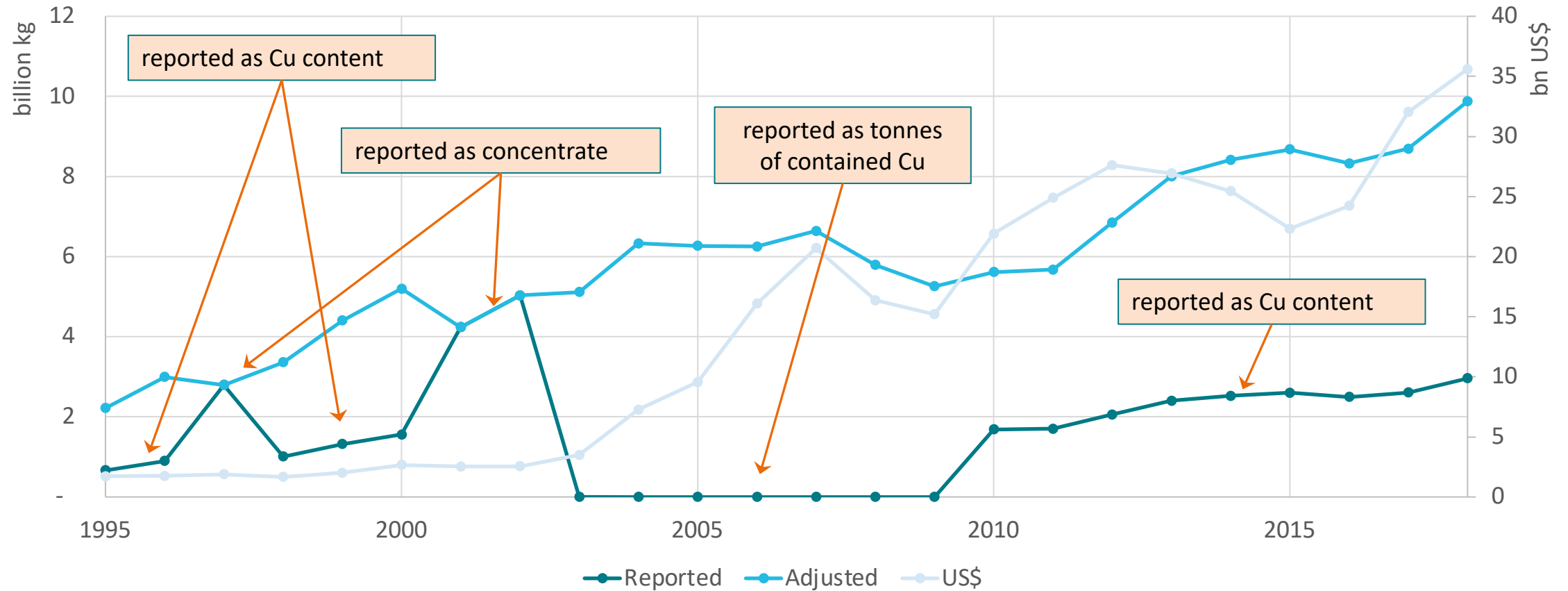
- UN comtrade as unified data source
 - National statistical offices report data to the UN Statistics Division
 - Common classification of goods (here Harmonised System in its original version, H0)
- Regions vs. Rest of the World
 - Corresponds to the logic of the regional models
 - Simpler to track, visualize and cleanse
- Data editing where necessary

Latin America imports (HS 854280)



Raw data from UN comtrade (2020)

A more complex data editing example: CHL exports of Cu concentrate (HS 260300)

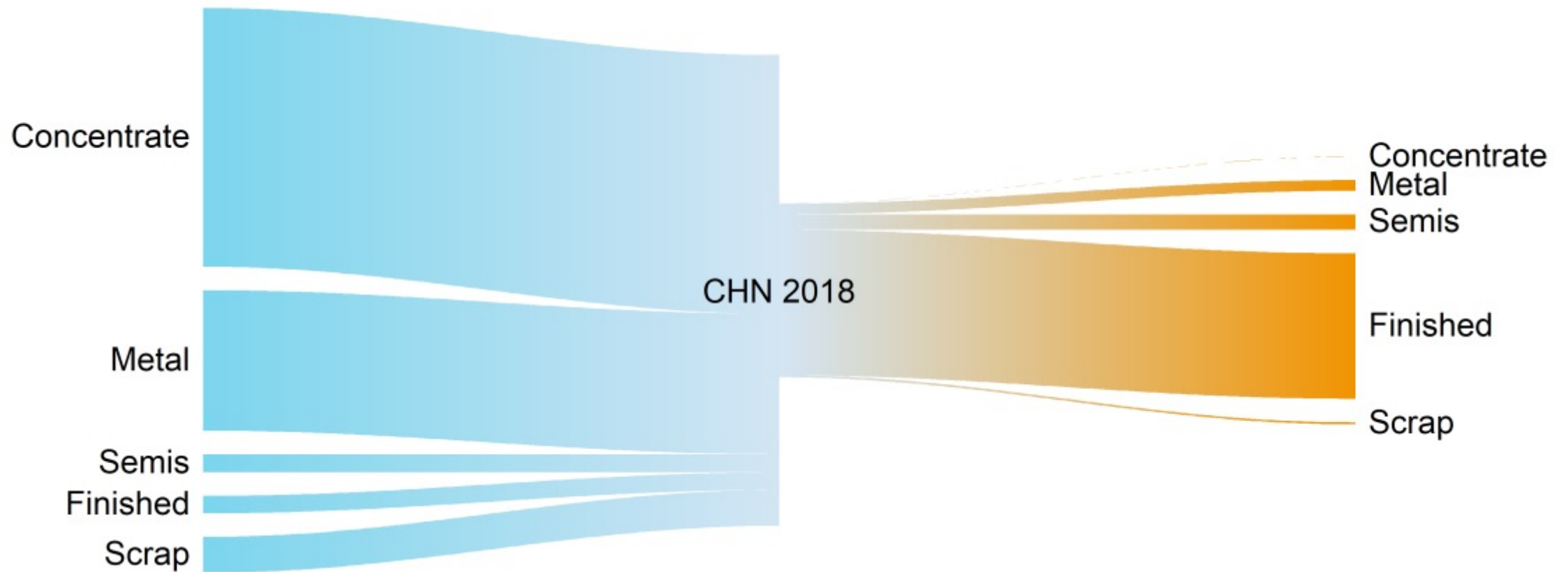


Raw data from UN comtrade (2020)

China

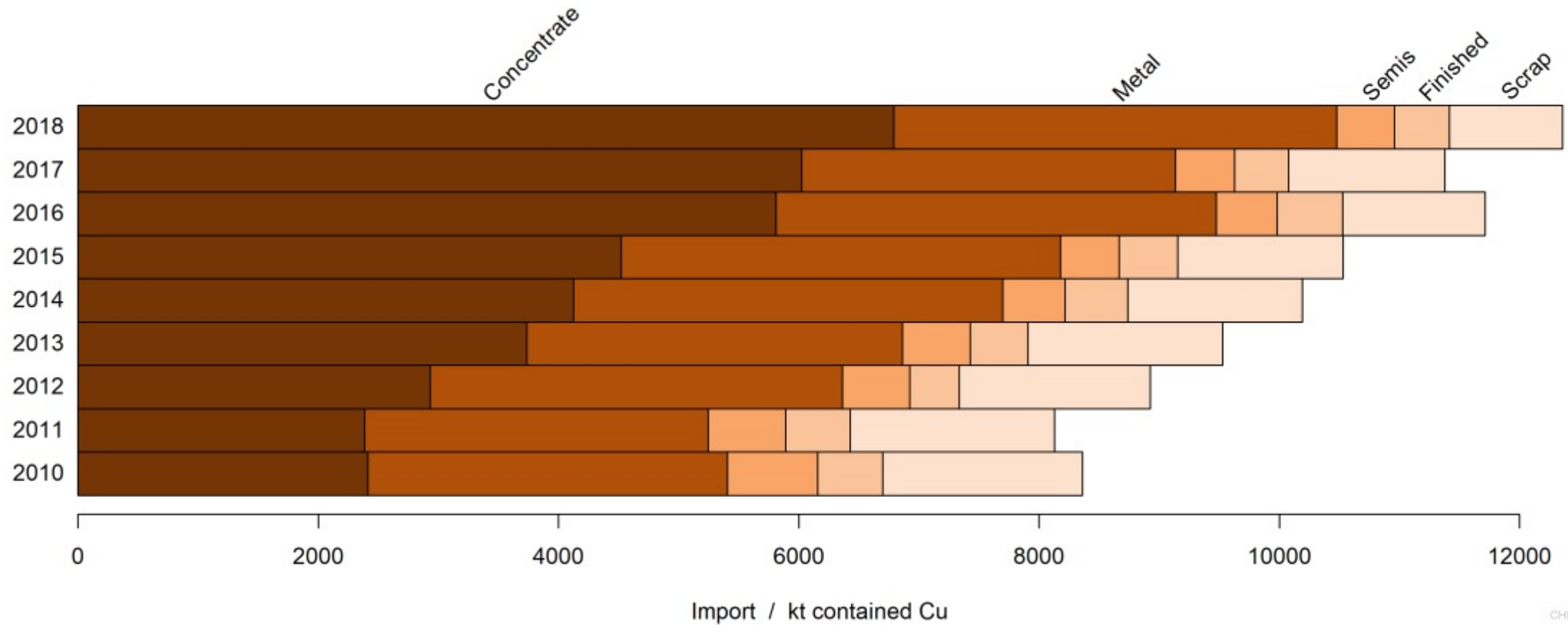


China (contained copper, 2018): Significant imports of concentrate and metal, mostly exports of finished products



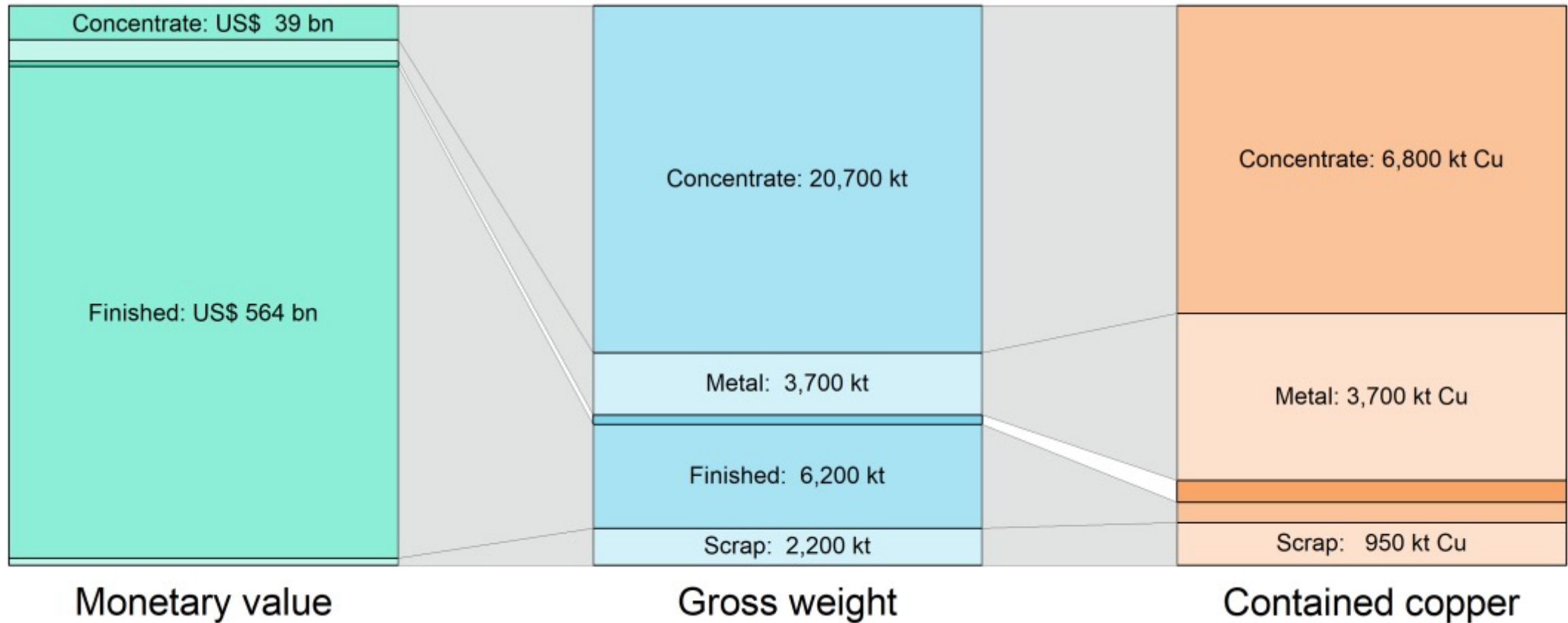
Raw data from UN comtrade (2020)

China: Largest increase in imports of concentrate, decrease in scrap imports



CHN
Raw data from UN comtrade (2020)

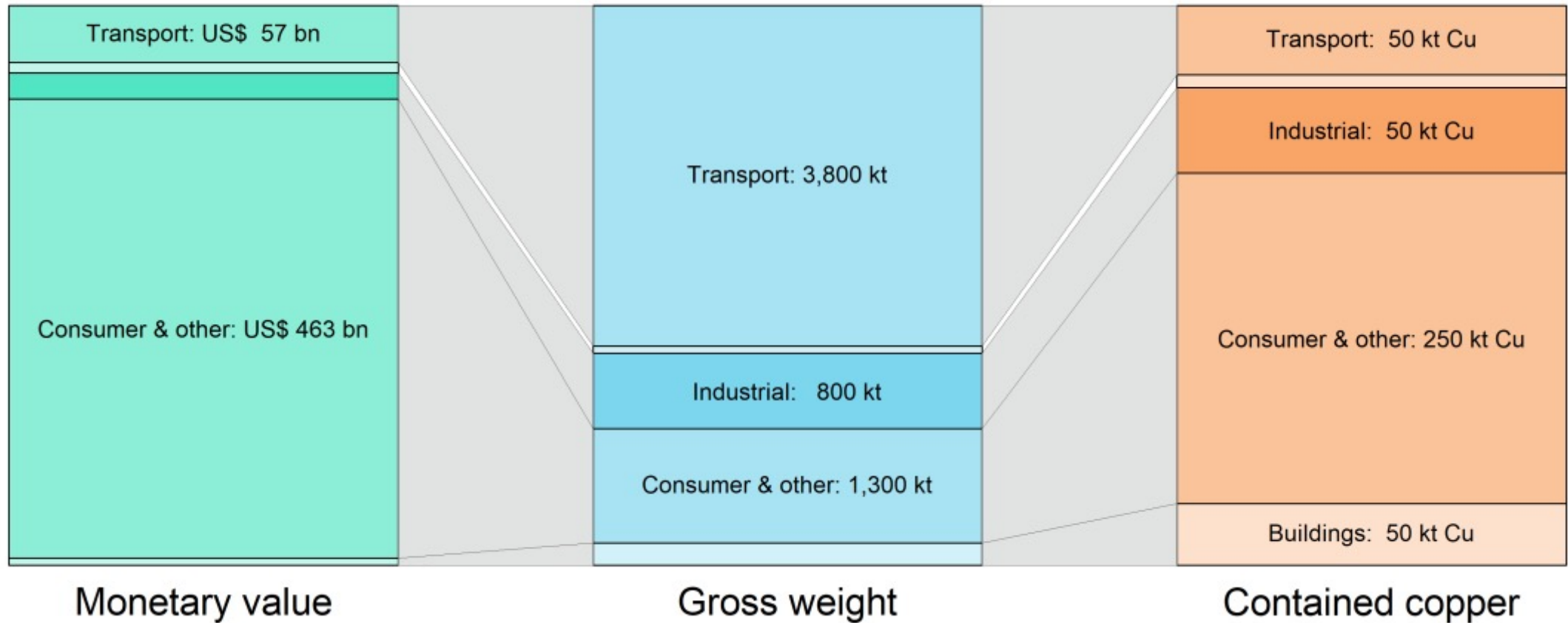
China (2018): Import value vs. net weight vs. copper content



CHN Import 2018

Raw data from UN comtrade (2020)

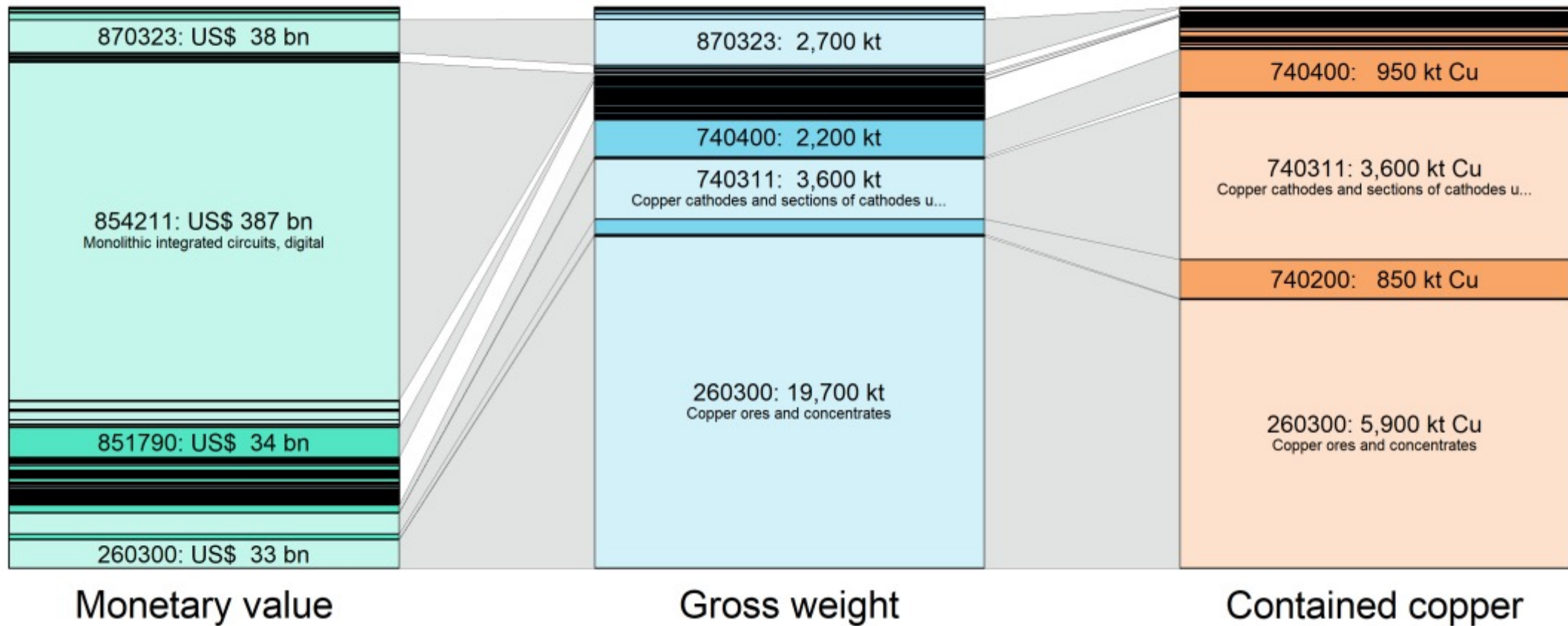
China finished products in detail (2018): Import value vs. net weight vs. copper content



CHN Import 2018

Raw data from UN comtrade (2020)

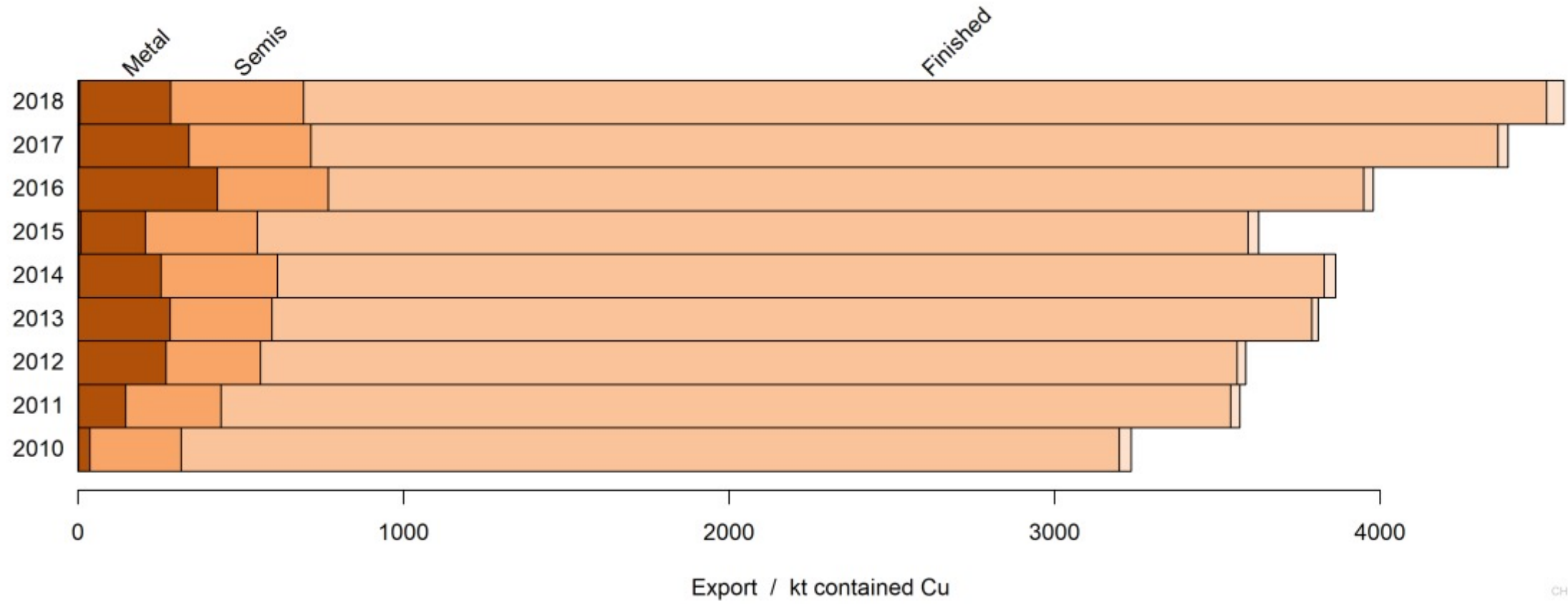
China (2018): Import value vs. net weight vs. copper content for individual commodity codes



CHN Import 2018

Raw data from UN comtrade (2020)

China: Finished products dominate exports and largely determine growth; metal and semis have become significant



CHN
Raw data from UN comtrade (2020)

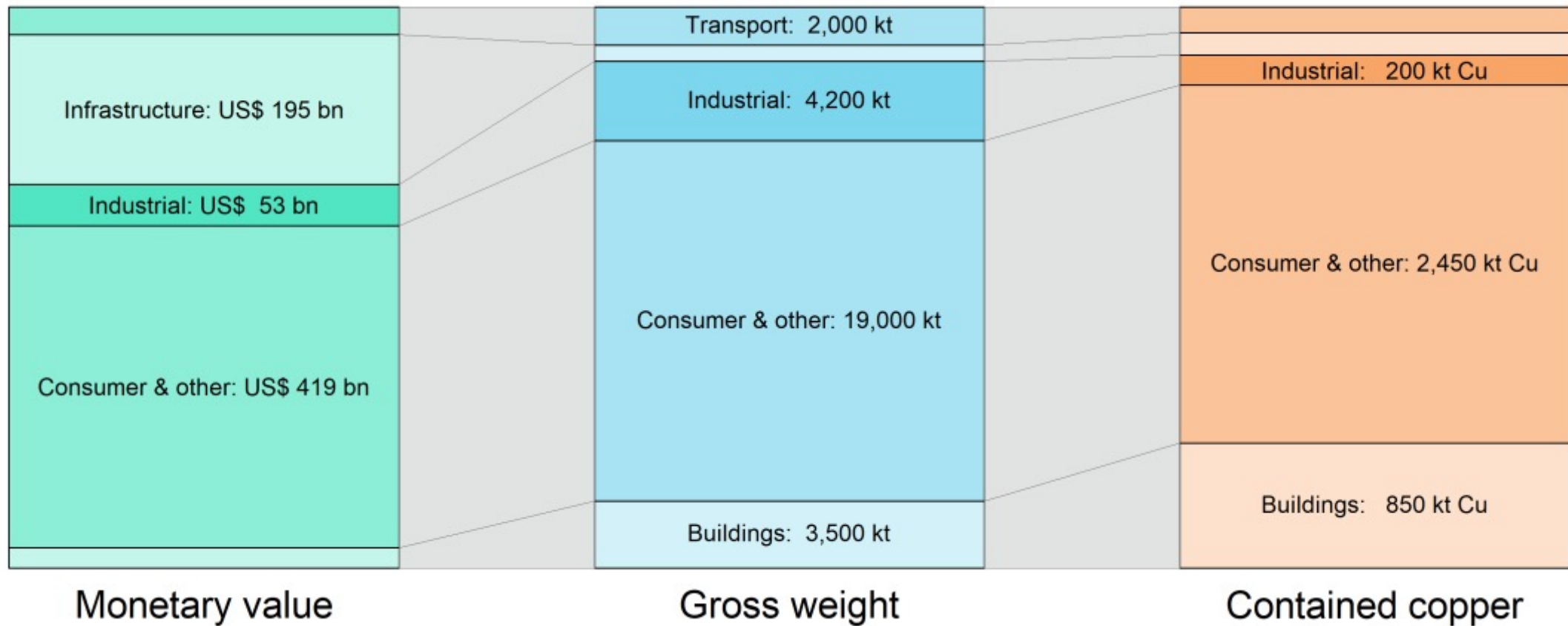
China (2018): Export value vs. net weight vs. copper content



CHN Export 2018

Raw data from UN comtrade (2020)

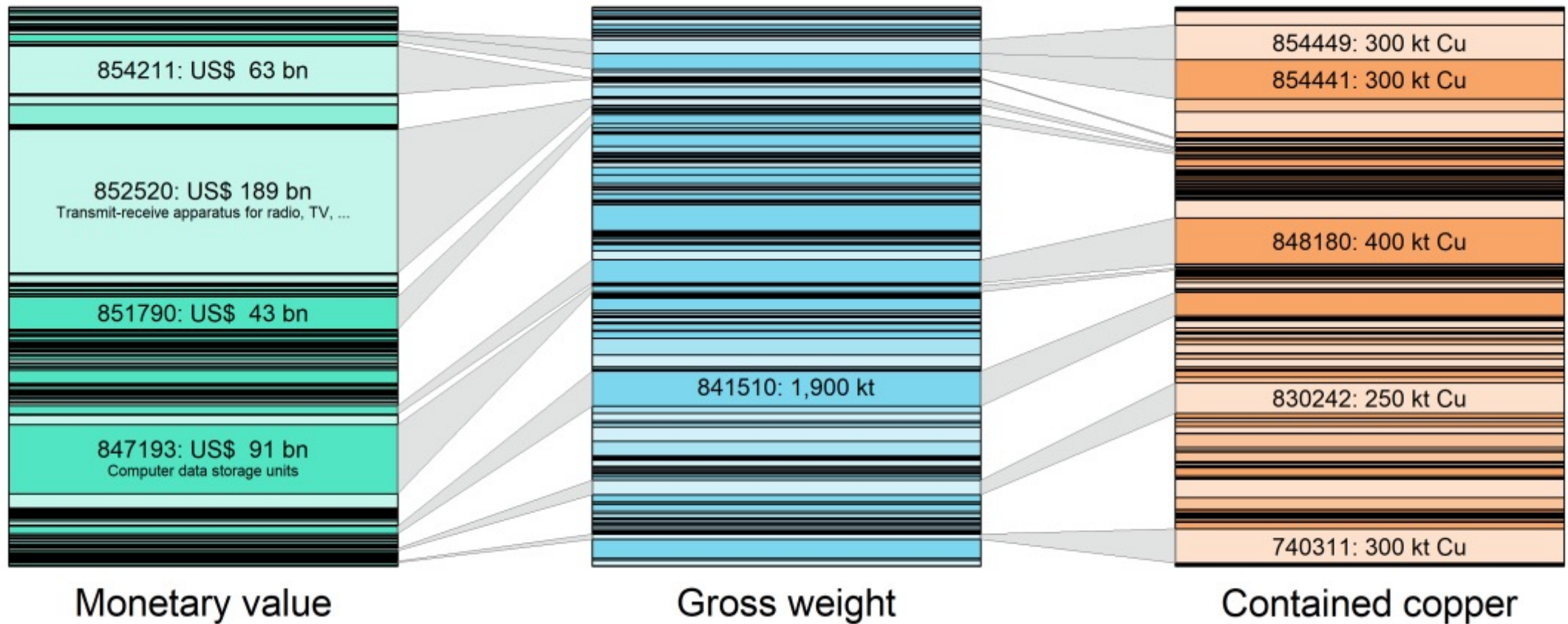
China finished products in detail (2018): Export value vs. net weight vs. copper content



CHN Export 2018

Raw data from UN comtrade (2020)

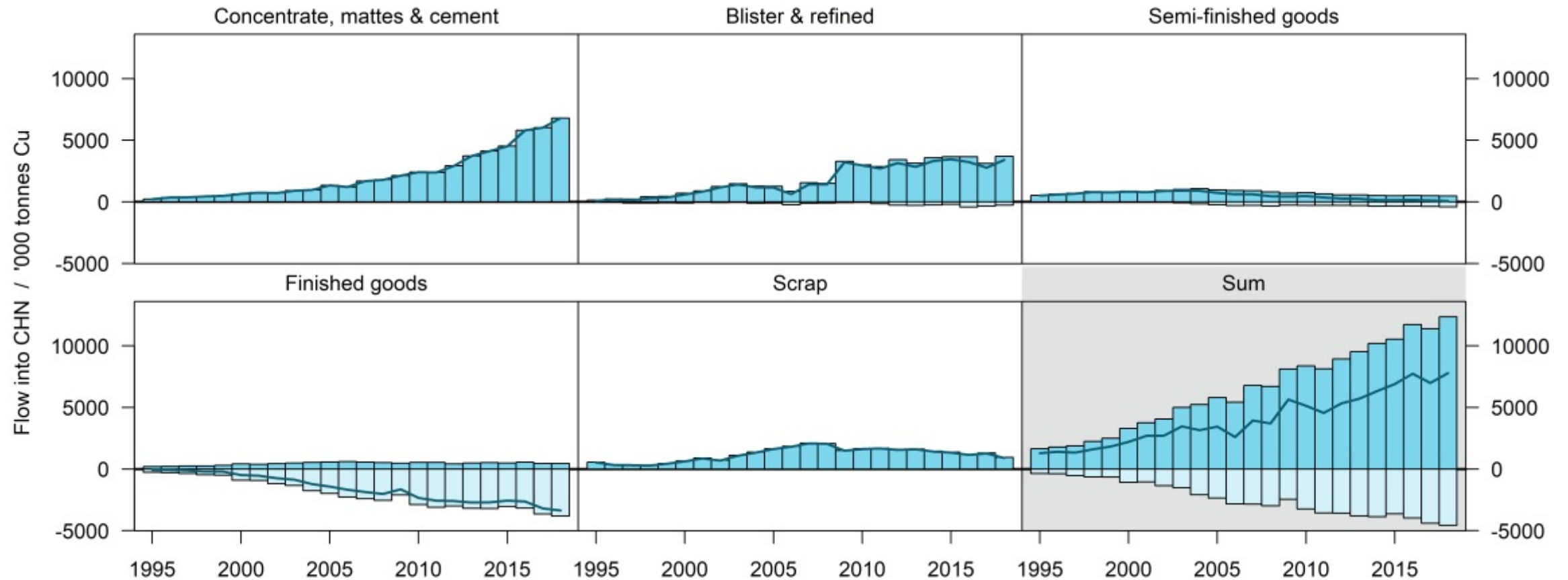
China in more detail (2018): Export value vs. net weight vs. copper content for individual commodity codes



CHN Export 2018

Raw data from UN comtrade (2020)

China over time: Net trade in contained copper



Raw data from UN comtrade (2020)

COPPER EMBEDDED IN OVERSEAS TRADE FLOWS

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