



Digital Commerce: Alibaba's Contributions to the U.S. Economy by State and Industry

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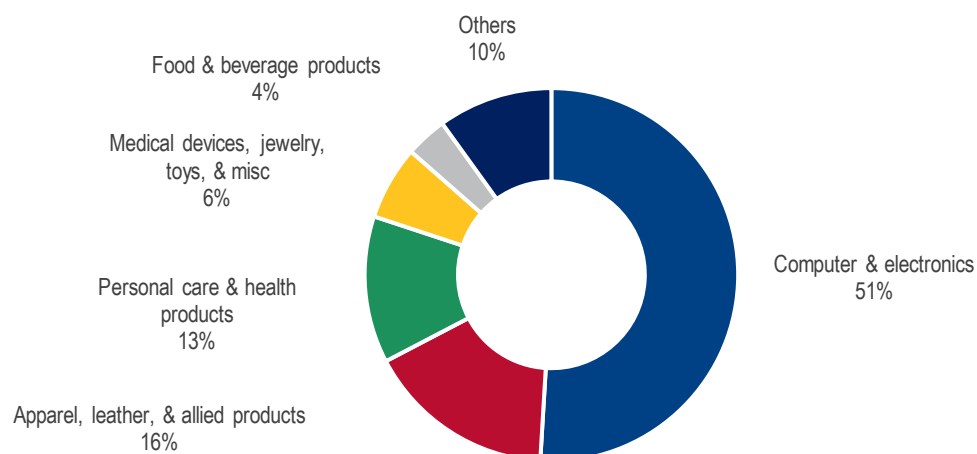
Alibaba offers multiple e-commerce platforms that enable sellers, ranging from large global brands to small and medium sized businesses to offer their products internationally and reach more than a billion consumers in China and other markets. In 2021, large and small U.S. brands sold nearly \$61.4 billion worth of products to Chinese consumers on Alibaba's e-commerce platforms, a 37% increase from 2019 and 11% from 2020.

The Alibaba platforms included in this report are Taobao Global, Tmall, Tmall Global, Freshippo, and Koala. As part of Alibaba's Taobao Marketplace, one of the world's largest consumer-to-consumer (C2C) platforms, Taobao Global connects companies outside of China to a network of around 60,000 independent online Chinese retailers. In this way, Taobao creates a channel for smaller global brands to sell their products in China, one of the world's largest and fastest-growing digital consumer markets. Tmall and Tmall Global, Alibaba's business-to-consumer (B2C) platforms, provide online stores for global brands and their authorized retailers to sell products directly to Chinese consumers. Freshippo and Koala platforms provide Chinese consumers with high-quality imported products and diverse shopping experiences.

U.S. brands sell a wide range of products, from consumer staples to luxury goods, on Alibaba platforms. In 2021, the three largest product categories were computers & electronics (51% of product sales from U.S. brands), apparel & leather products (16%), and personal care & health products (13%). (Figure 1)

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Figure 1.
Computers & electronics accounted for 51% of U.S. products sold on Alibaba platforms in 2021²



U.S. brands sell their products directly and indirectly to Chinese customers on Alibaba platforms using various business models. Smaller brands often choose to work with retail partners who already own and operate online stores on Taobao Global. This model allows companies, especially small businesses, to efficiently market and sell their products to Chinese consumers. In contrast, many larger brands tend to sell directly to consumers through their own online “flagship” stores on Tmall and Tmall Global, or they authorize retailers to sell their products in exclusive or specialized stores on those platforms. Brands that own and operate flagship stores receive nearly all revenues from products sold on Alibaba platforms. Brands that use online retailers to sell to Chinese consumers on Alibaba receive the revenue from product sales minus compensation paid to retail partners for their services. These global retail partners are estimated to receive 28% of total sales of U.S. products on Alibaba’s platforms which is in line with the practices of the broader global retail industry. In fact, during 2019-2021, global retailers’ gross margin averaged 26.2% and online retailers’ gross margin averaged 38.8%.³

Chinese shoppers purchase billions of dollars’ worth of U.S. products on Alibaba’s platforms every year, generating revenue for U.S. brands and benefitting the U.S. economy. After subtracting revenues that flow to global retail partners, U.S. brands are estimated to have generated approximately \$44.7 billion in 2021. In addition to generating revenues directly for the brands, U.S. products sold on Alibaba’s platforms produce substantial spillover benefits to companies along the supply chain and in communities in the United States. These spillover benefits, commonly referred to as indirect and induced effects, are estimated using official industry economic multipliers. In 2021, U.S. brands generated \$44.7 billion in direct revenues (also called “output”) from products sold on Alibaba, which created an additional \$38.0 billion in indirect and induced

² Alibaba.

³ Damadoran Online Data.

output for companies along the supply chain and in local communities; in total, U.S. brands' sales on Alibaba platforms supported \$82.7 billion in gross output across the United States.

Sales of U.S. products on Alibaba's platforms increase economic activity in the United States. This new activity is value-added to the U.S. gross domestic product (GDP); it is calculated by subtracting the costs of intermediary goods and services from gross output. In 2021, sales of products from U.S. brands on Alibaba directly contributed \$36.1 billion to U.S. GDP and supported an additional \$11.2 billion in indirect and induced contributions. In total, sales of U.S. products on Alibaba added \$47.3 billion to U.S. GDP in 2021.

U.S. brands employ production and non-production workers to produce and sell their products and manage operations in the United States. In 2021, sales of products from U.S. brands on Alibaba created 168,880 direct U.S. jobs and supported an additional 221,146 indirect and induced jobs along the supply chain and in communities. These 390,026 jobs, in total, generate wages and support individuals and families across the country. In 2021, a total of \$31.4 billion was paid to workers in connection with sales of U.S. products on Alibaba's platforms, including \$16.9 billion in direct wages and salaries paid by U.S. brands and \$14.5 billion in indirect and induced wages. (Table 1)

Table 1.
Sales of products from U.S. brands on Alibaba platforms create ripple effects in the U.S. economy⁴

	Direct Impact (\$M)	Indirect and Induced Impact (\$M)	Total Impact (\$M)
Gross Revenue/Output (\$M)	\$44,667.4	\$38,018.3	\$82,685.7
Value-Added (\$M)	\$36,131.1	\$11,198.2	\$47,329.3
Production and Non-Production Jobs	168,880	221,146	390,026
Wages and Salaries (\$M)	\$16,871.2	\$14,544.9	\$31,416.1

The economic contributions of Alibaba on the U.S. economy are distributed across states. The largest division is the Pacific which generated \$20.1 billion in output, followed by East North Central (\$11.1 billion), and South Atlantic (\$10.6 billion). (Table 2)

⁴ Alibaba; Bureau of Economic Analysis; ndp | analytics.

Table 2.
Alibaba economic contributions are realized across the United States⁵

	Output (\$M)	Value-Added (\$M)	Jobs	Wages (\$M)
MIDWEST				
East North Central (IL, IN, MI, OH, WI)	\$11,138.5	\$6,003.7	48,611.5	\$3,019.3
West North Central (IA, KS, MN, MO, NE, ND, SD)	\$6,690.7	\$3,669.8	27,653.5	\$1,781.3
NORTHEAST				
Middle Atlantic (NJ, NY, PA)	\$8,644.3	\$4,977.7	40,668.0	\$2,796.1
New England (CT, MA, ME, NH, RI, VT)	\$7,259.8	\$4,478.6	25,328.7	\$2,062.3
SOUTH				
East South Central (AL, KY, MI, TN)	\$3,310.8	\$1,700.2	16,316.7	\$829.9
South Atlantic (DC, DE, FL, GA, MD, NC, SC, VA, WV)	\$10,643.2	\$6,018.7	51,901.3	\$3,400.9
West South Central (AR, LA, OK, TX)	\$9,700.9	\$5,306.5	45,394.1	\$3,275.1
WEST				
Mountain (AZ, CO, ID, MT, NV, NM, UT, WY)	\$5,233.5	\$3,169.7	26,359.6	\$1,895.8
Pacific (AK, CA, HI, OR, WA)	\$20,064.0	\$12,004.3	107,792.4	\$12,355.4

Alibaba's platforms provide a variety of vehicles for premium brands, smaller brands, and entrepreneurs in the U.S. to penetrate the world's largest consumer market of more than 1.4 billion people. Utilizing innovative technology, Alibaba provides U.S. brands with the tools they need to sell their products — from consumer electronics to fresh produce — to Chinese consumers across many demographics. Like all other cross-border trading activities, products sold in China, directly and indirectly, create positive economic effects for the U.S. economy.

⁵ Geographic divisions are defined by the U.S. Census Bureau.

Data Sources and Methodology

This report relies on data provided by the Alibaba, official industry statistics, and economic multipliers compiled and published by U.S. governmental agencies, and third-party research. Below are data descriptions and sources of four major datasets used in this report.

1. Alibaba provided annual sales in 2021 by business unit, store type, and product category. The business units included in this study are Taobao Global, Tmall, Tmall Global, Freshippo, and Koala. The store types included are Taobao Global stores, Tmall and Tmall Global flagship stores, Tmall and Tmall Global exclusive stores, Tmall and Tmall Global specialized stores, Freshippo stores, and Koala stores. Alibaba sales data are classified into 171 product categories.
2. Alibaba also provided a range of estimated gross profits of global retail partners by product category and store type. Retail partners' gross profits are total sales on Alibaba platforms minus the cost of goods sold paid to the U.S. brands who leveraged the platforms and retail partners. Global retail partners, who are independent retailers and not employed by the Alibaba Group, help U.S. brands market and sell their products on Alibaba platforms. Less than half of the retail partners for U.S. brands on Tmall Global are U.S. retail partners, while most retail partners in Taobao Global, Tmall, Freshippo, and Koala are Chinese retailers.
3. Official industry statistics by state, including gross output, value-added, employment, and wages, were obtained from the U.S. Bureau of Economic Analysis (BEA) and the Census. The industry data are classified based on the North America Industry Classification System (NAICS) codes at 2-digit level and 3-digit level.
4. Official industry-level economic multipliers by state were obtained from U.S. Bureau of Economic Analysis (BEA). The agency's Regional Input-Output Modeling System (RIMS II) calculates and publishes economic multipliers (indirect and induced impacts) of gross output, value-added, employment, and wages by industry and by state.

Using Alibaba's proprietary sales data and estimated gross profits of global retail partners as well as U.S. official industry statistics and economic multipliers by state, the study estimated the total direct, indirect, and induced impacts of products from U.S. brands sold on Alibaba platforms to the U.S. economy by state. Below are the major calculations used to quantify the economic impacts.

1. Revenues of U.S. brands from products sold on Alibaba platforms:
 - a. Annual sales include revenues of U.S. brands and gross profits of global retail partners. The study estimated the average gross profits of retail partners on Alibaba platforms by business unit and product category to calculate revenues received by U.S. brands from sales of their products on Alibaba platforms.
 - b. The study created concordances to map Alibaba's 171 product categories to 26 manufacturing and non-manufacturing industries, based on 2-digit and 3-digit NAICS codes. The study then categorized product-level revenues of U.S. brands in 2021 into 26 NAICS industries.

2. Direct economic impacts by industry by state:
 - a. Output: The study used the industry production distribution across all U.S. states published by BEA and Census to estimate the impacts of Alibaba sales on U.S. production by industry by state.
 - b. Value-added/Contribution to GDP: The study applied value-added-to-output ratios from BEA to calculate the direct value-added of U.S. brands for each of 26 NAICS industries in each state.
 - c. Employment: The study divided the annual revenue of U.S. brands by gross output per employee from BEA by state to calculate direct jobs in each of the 26 NAICS industries in each state.
 - d. Wages: The study applied BEA's wage-per-employee data to the number of estimated jobs to calculate direct wages for each of the 26 NAICS industries in each state.

3. Indirect and induced economic impacts by industry: We used BEA's economic multipliers to calculate indirect and induced impacts of output, value-added, employment, and wages in each NAICS industry in each state.

4. Total economic impact to the U.S. economy is the sum of direct, indirect, and induced economic impacts. Total economic impact to region Census' Geographic divisions that are defined by the U.S. Census Bureau.

The NAICS codes that correspond to the categories in this study's tables and charts are below.

	NAICS Codes
Manufacturing products	31-33
Computer & electronic products	334
Apparel & leather products	315-6
Personal care, health, & cleaning products	325
Medical devices, jewelry, toys, & other misc. products	339
Food & beverage products	311-2
Electrical equipment & appliances	335
Furniture	337
Baby diapers, paper supplies, & packaging	322
Motor vehicles and parts & bikes	336
Hardware/tools, & kitchen/tableware	332
Other manufacturing products	All other 31-33
Non-manufacturing products	11, 44-45, 51, 54, 61, 62, 71, 72