

Commodity Movements Originating in California Summary of 1993 CFS

In California, the CFS measured \$639 billion of goods weighing 707 million tons. California accounted for approximately 11 percent of the value and 7 percent of the weight of total U.S. shipments. The CFS data cover shipments by establishments in mining, manufacturing, wholesale, and selected retail and service industries. The data exclude most shipments of crude oil; therefore, the totals and percentages do not fully reflect the contribution of pipeline shipments.

The major commodities shipped by vary when measured by value and by weight of the shipments. The major commodities by value in California were: food and kindred products; electrical machinery; transport equipment; machinery including computers; and petroleum or coal products. The top two commodities by weight were: petroleum or coal products; and nonmetallic minerals. Other important commodities shipped by weight were: food and kindred products, clay, concrete, glass or stone, and lumber or wood products excluding furniture.

Local transportation of freight is important to California's commerce. The distribution of commodities by domestic destination and distance of shipments reflects the importance of local transport. The CFS shows that in 1993, about 61 percent of the value and 91 percent of the weight of total shipments from California were shipped to destinations within the state. Almost 40 percent of the value and about 68 percent of the weight of all shipments were between places less than 50 miles apart. In comparison, about 30 percent of the value and 56 percent of the weight of total U.S. shipments were between places less than 50 miles apart. In California, almost half (48 percent) of the value of shipments and over three-quarters (77 percent) of the weight of shipments were between places less than 100 miles apart. These percentages also reflect the "domestic distance" of exports to overseas. The CFS measures the "domestic distance" of exports as the distance between the place of origin and the port of export.

About 39 percent of the value and 9 percent of the weight of all shipments from California went to other states. Important destination states by value of shipments were: Texas, Arizona, New York, Illinois, and Florida. Important destination states by weight of shipments were: Oregon, Arizona, Nevada, Texas, and Washington.

Most commodities (67 percent of the value and 74 percent of the weight) were moved by trucks. Air accounted for nearly 5 percent of the value of shipments. And pipelines moved approximately 14 percent of the weight. The CFS data confirm the rising importance of parcel, U.S. postal, and courier services that have emerged in recent years. In 1993, this mode of transport was used to move 2.8 million tons of goods worth \$91 billion or 14 percent of the value of all shipments in California. In comparison, about 9 percent of the value of total U.S. shipments were moved by this mode.

1993 Commodity Flow Survey State Summary: California
 Tabulation by the Bureau of Transportation Statistics, U.S. Department of Transportation

Summary	Value	Weight
Total shipments originating in California	\$638.5 billion	706.5 million tons
Percent of total U.S. shipments (preliminary U.S. estimate)	10.6	7.2

Commodity Shipments Originating in California Ranked by Value		Commodity Shipments Originating in California Ranked by Weight	
Commodity	Percent of value	Commodity	Percent of weight
Food or kindred products	14.0	Petroleum or coal products	29.1
Electrical machinery and equipment	12.7	Nonmetallic minerals	19.1
Transportation equipment	10.5	Food or kindred products	11.2
Machinery, including computers	9.7	Clay, concrete, glass or stone	11.0
Petroleum or coal products	7.0	Lumber or wood products	4.4
Other commodities	46.1	Other commodities	25.2
Total	100.0	Total	100.0

Domestic Destinations of Shipments Originating in California Ranked by Value		Domestic Destinations of Shipments Originating in California Ranked by Weight	
State	Percent of value	State	Percent of weight
California	61.2	California	91.2
Texas	3.6	Oregon	1.3
Arizona	2.9	Arizona	1.0
New York	2.3	Nevada	0.8
Illinois	2.0	Texas	0.7
Florida	1.8	Washington	0.7
Other States	26.2	Other States	4.3
Total	100.0	Total	100.0

Modes of Transportation for Shipments Originating in California		
Modes	Percent of value	Percent of weight
Parcel, U.S. Postal Service, or courier service	14.2	0.4
Truck (for-hire, private, and both private truck and for-hire truck)	67.4	73.7
Air (including truck and air)	4.7	**
Rail	1.7	2.2
Water (inland water, Great Lakes, deep sea, truck and water, and rail and water)	0.1	-
Pipeline*	2.7	14.3
Truck and rail intermodal combination	0.7	0.2
Other intermodal (truck and pipeline, inland and Gt. Lakes, inland and deep sea)	0.5	1.8
Other, unknown, and withheld for sampling and disclosure reasons	8.0	7.4
Total	100.0	100.0

Domestic Distance Shipped for Commodities Originating in California		
Distance	Percent of value	Percent of weight
Less than 50 miles	39.2	68.3
50 to 99 miles	8.5	8.7
100 to 249 miles	6.6	7.6
250 to 499 miles	11.0	8.6
500 to 749 miles	3.6	1.5
750 to 999 miles	3.6	1.0
1,000 to 1,499 miles	5.1	0.9
1,500 to 1,999 miles	8.3	1.6
2,000 miles or more	14.0	1.7
Total	100.0	100.0

* CFS data for pipelines exclude most shipments of crude oil.

** Some or all data suppressed to avoid disclosure or because data are statistically unreliable.

- Represents zero or less than 1 unit of measurement.

NOTE: Data are estimates based on a sample and subject to error. See Appendix B, "Reliability of the Data," in source document.

SOURCE: U.S. Department of Commerce, Bureau of the Census, 1992 Census of Transportation, Communications, and Utilities, 1993 Commodity Flow Survey, TC92-CF (Washington, DC: 1996).

90-Percent Confidence Intervals for 1993 Commodity Flow Survey State Summary: California

Tabulation by the Bureau of Transportation Statistics, U.S. Department of Transportation

Summary	Value	Weight
Total shipments originating in California (in billion \$ and million tons)	613.29 - 663.71	598.42 - 814.58
Percent of total U.S. shipments (preliminary U.S. estimate)	10.11 - 11.09	6.08 - 8.32

Commodity Shipments Originating in California Ranked by Value		Commodity Shipments Originating in California Ranked by Weight	
Commodity	Percent of value	Commodity	Percent of weight
Food or kindred products	13.1 - 14.9	Petroleum or coal products	20.9 - 37.4
Electrical machinery and equipment	11.3 - 14.1	Nonmetallic minerals	15.1 - 23.1
Transportation equipment	7.5 - 13.6	Food or kindred products	9.4 - 13.0
Machinery, including computers	7.6 - 11.8	Clay, concrete, glass or stone	8.7 - 13.3
Petroleum or coal products	5.1 - 8.9	Lumber or wood products	3.5 - 5.3
Other commodities	(NA)	Other commodities	(NA)
Total	(X)	Total	(X)

Domestic Destinations of Shipments Originating in California Ranked by Value		Domestic Destinations of Shipments Originating in California Ranked by Weight	
State	Percent of value	State	Percent of weight
California	59.9 - 62.5	California	90.4 - 92.0
Texas	3.1 - 4.1	Oregon	1.1 - 1.5
Arizona	2.4 - 3.4	Arizona	0.7 - 1.3
New York	2.0 - 2.6	Nevada	0.6 - 1.0
Illinois	1.7 - 2.3	Texas	0.5 - 0.9
Florida	1.5 - 2.1	Washington	0.5 - 0.9
Other States	(NA)	Other States	(NA)
Total	(X)	Total	(X)

Modes of Transportation for Shipments Originating in California		
Modes	Percent of value	Percent of weight
Parcel, U.S. Postal Service, or courier service	13.1 - 15.4	0.2 - 0.6
Truck (for-hire, private, and both private truck and for-hire truck)	65.5 - 69.3	70.4 - 77.0
Air (including truck and air)	4.1 - 5.3	(X)
Rail	1.2 - 2.2	1.9 - 2.5
Water (inland water, Great Lakes, deep sea, truck and water, and rail and water)	(X)	(X)
Pipeline*	1.6 - 3.9	10.0 - 18.6
Truck and rail intermodal combination	0.5 - 0.9	(X)
Other intermodal (truck and pipeline, inland and Gt. Lakes, inland and deep sea)	0.3 - 0.7	0.8 - 2.8
Other, unknown, and withheld for sampling and disclosure reasons	6.0 - 10.0	5.3 - 9.5
Total	(X)	(X)

Domestic Distance Shipped for Commodities Originating in California		
Distance	Percent of value	Percent of weight
Less than 50 miles	37.4 - 41.0	66.0 - 70.6
50 to 99 miles	7.8 - 9.2	7.4 - 10.0
100 to 249 miles	6.1 - 7.1	5.8 - 9.4
250 to 499 miles	10.3 - 11.7	7.0 - 10.3
500 to 749 miles	3.3 - 3.9	1.3 - 1.7
750 to 999 miles	2.9 - 4.3	0.7 - 1.3
1,000 to 1,499 miles	4.4 - 5.8	0.7 - 1.1
1,500 to 1,999 miles	7.6 - 9.0	1.3 - 1.9
2,000 miles or more	12.5 - 15.5	1.4 - 2.0
Total	(X)	(X)

* CFS data for pipelines exclude most shipments of crude oil.

NA Not available.

X Not applicable.

NOTE: For explanation of 90-percent confidence intervals see Appendix B, "Reliability of the Data," in source document.

SOURCE: U.S. Department of Commerce, Bureau of the Census, *1992 Census of Transportation, Communications, and Utilities, 1993 Commodity Flow Survey*, TC92-CF (Washington, DC: 1996).

The Commodity Flow Survey (CFS) is a comprehensive effort to learn where and how goods are shipped in the U.S. The CFS measures shipments of commodities by establishments with paid employees and engaged in manufacturing, mining, wholesale trade, or selected retail and services industries. Prior commodity surveys covered shipments only by manufacturing firms. Commodity flows are estimated for a universe of approximately 900,000 establishments.

Data collected on individual shipments include total value, total weight, commodity type, modes of transport, domestic origin and destination; data for export shipments include the city and country of destination, mode and port of exit. Information is also obtained on whether shipments are containerized or a hazardous material. Some firms provided data concerning on-site shipping facilities and access to shipping facilities, plus data on ownership and leasing of transportation equipment.

The CFS is conducted by the Bureau of the Census as part of the Economic Census. Funding and technical guidance is provided by the U.S. Department of Transportation. Initiated for 1993, the CFS is scheduled for 1997 and every 5 years thereafter for years ending in 2 and 7. Commodity surveys were conducted between 1963 and 1982, but data for 1982 were not published. No data were collected for 1987. Participants will report for a sample of shipments during a 2-week period each quarter during the reporting year.

The CFS is a mail-out/mail-back survey of 200,000 sampled employer establishments in selected industries. Establishments were selected by stratified sample, with strata based on geographic location and industry. Geographic strata are the 89 National Transportation Analysis Regions (NTARs), which provide nationwide coverage and are aggregations of Bureau of Economic Analysis economic areas. Within the strata, all establishments with annualized employment above a specified cutoff were selected with certainty, and the remaining smaller establishments were sampled with probability proportional to annualized payroll.

For 1993, each sampled establishment reported on a sample of individual shipments during a 2 week period in each calendar quarter. In addition, about 20,000 establishments will provide information on transportation facilities and arrangements in their final reporting period.

For further information about survey design and printed products, contact the Commodity Flow Survey Branch, Services Division, Bureau of the Census, Washington, DC 20233, or by calling 301/457-2805 or 2114. For information on related data programs and studies, contact the Bureau of Transportation Statistics at 202/366-DATA for voice, 202/366-3640 for fax, or CFS@BTS.GOV for e-mail.