An Ownership-Based Framework of the U.S. Current Account, 1992–2002

In this report, the Bureau of Economic Analysis (BEA) updates its supplemental, ownership-based framework of the current-account portion of the U.S. international transactions accounts. This update presents revised estimates for 1992–2000, new detailed estimates for 2001, and summary estimates of the major current-account aggregates in the framework for 2002.¹ A technical note that presents information on the conceptual basis of the ownership-based framework follows the highlights of this updated presentation.²

Highlights of the updated presentation are as follows:

- Net receipts by U.S. parents of direct investment income from the sales by their foreign affiliates were \$142.9 billion in 2002, up from \$124.3 billion in 2001. Net payments to foreign parents of direct investment income from the sales by their U.S. affiliates were \$49.5 billion in 2002, up from \$17.8 billion in 2001 (table 1).
- In 2001 (the latest year for which the detailed estimates are available), the net receipts of \$124.3 billion consisted of \$121.7 billion from nonbank foreign affiliates and \$2.7 billion from bank foreign affiliates. For the parents of nonbank affiliates, the net receipts resulted from sales by foreign affiliates of \$2,929.6 billion less deductions of \$2,807.9 billion (such as for labor, capital, and purchased inputs).³ The net payments of \$17.8 billion in 2001 consisted of \$15.1 billion by nonbank U.S. affiliates and \$2.7 billion by bank U.S. affiliates. For nonbank U.S. affiliates, the net payments resulted from sales of \$2,354.1 billion less deductions of \$2,339.0 billion.

3. These detailed estimates can only be provided for nonbank affiliates.

Note. Jeffrey H. Lowe prepared this report.

- In 2002, the total value of foreign sales accruing to the U.S. economy was \$1,117.0 billion (net income receipts of U.S. parents from the sales by their foreign affiliates of \$142.9 billion plus U.S. exports of goods and services of \$974.1 billion). The total value of U.S. sales accruing to foreign economies was \$1,441.6 billion (net income payments to foreign parents from the sales by their U.S. affiliates of \$49.5 billion plus U.S. imports of goods and services of \$1,392.1 billion).
- The resulting U.S. deficit on goods, services, and net receipts from sales by affiliates was \$324.6 billion in 2002 (\$1,117.0 billion less \$1,441.6 billion). This deficit was \$93.4 billion less than the \$418.0 billion deficit on trade in goods and services in the conventional international accounts framework that is based solely on the location of production. The ownership-based deficit was smaller because the receipts of income by U.S. parents from sales by their foreign affiliates exceeded the payments of income to foreign parents from sales by their U.S. affiliates.

The estimates incorporate the results of the 2003 annual revision of the U.S. international transactions accounts.⁴ This revision featured the following improvements: The revised estimates of "other" private services receipts and payments for 1992-2002 incorporate a definitional change in the measurement of insurance services; revised estimates of U.S. dividend and interest receipts on foreign stocks and bonds for 1998–2002 incorporate the results of the U.S. Treasury's benchmark survey of U.S. portfolio investment abroad; new estimates of emigrants' remittances (in "unilateral current transfers, net") for 1992-2002; new estimates of earnings and expenditures of U.S. residents temporarily working abroad (in the "other" income receipts and "other" private services payments accounts, respectively) for 1992-2002; and revised estimates of commissions received from foreign trading on U.S. futures exchanges for 2000-2002. The new ownership-based estimates also incorporate the preliminary results from the 2001 annual surveys of U.S. direct investment abroad and of foreign direct investment in the United States and the final results from the 2000 annual surveys.

^{1.} The latest year for which detailed estimates are available is 2001. The estimates for 1982–2002 are available on BEA's Web site at <www.bea.gov>. Under "International," click on "More," then look under "Supplemental Estimates" for "Ownership-Based Framework of the U.S. Current Account."

^{2.} For additional information on the sources and methods used to prepare the supplemental accounts, see Obie G. Whichard and Jeffrey H. Lowe, "An Ownership-Based Disaggregation of the U.S. Current Account, 1982– 93," SURVEY OF CURRENT BUSINESS 75 (October 1995): 52–61. For a general review of the issues relating to ownership relationships in international transactions, see J. Steven Landefeld, Obie G. Whichard, and Jeffrey H. Lowe, "Alternative Frameworks for U.S. International Transactions," SURVEY 73 (December 1993): 50–61.

^{4.} See Christopher L. Bach, "Annual Revision of the U.S. International Accounts, 1992–2002," SURVEY 83 (July 2003): 32–45.

Technical Note

The ownership-based framework was developed in the early 1990s in response to interest in examining international transactions in order to reflect the increasing importance of multinational companies (MNCs) in world economies and, particularly, the growing tendency of these companies to use locally established affiliates to deliver goods and services to international markets.⁵

In the conventionally constructed current account, the trade balance reflects only the goods and services that are delivered to international markets through cross-border exports and imports. This balance is an important indicator of U.S. performance in foreign markets; it reflects the net value of the transactions in goods and services between U.S. residents (including companies) and foreign residents. Because in the international accounts, affiliates are treated as residents in the country of their location rather than in the country of their owners, the sales of goods and services by foreign affiliates of U.S. companies to other foreign persons and by U.S. affiliates of foreign companies to other U.S. persons are not regarded as exports and imports and are therefore excluded from the trade balance.

In the ownership-based framework, a balance is introduced in which net receipts resulting from sales by affiliates are combined with cross-border exports and imports. Specifically, the net receipts that accrue to U.S. parent companies from the sales by their foreign affiliates are combined with cross-border sales to foreigners by U.S. companies (U.S. exports), and the net payments that accrue to foreign parent companies from the sales by their U.S. affiliates are combined with cross-border sales to the United States by foreign companies (U.S. imports). The difference between these receipts and payments is an indicator of the net effect of United States-foreign commerce on the U.S. economy, and it reflects the perspective that both cross-border trade and sales through affiliates represent methods of active participation in the international markets for goods and services.

Only the net receipts that accrue to the U.S. parent companies, not the gross value of sales by their foreign affiliates, are included in these calculations, because only in the case of sales originating in the United States are most of the costs—such as for labor, capital, and purchased inputs—incurred domestically and accrued to the benefit of the U.S. economy. Similarly, only the net payments that accrue to foreign parent companies, not the gross value of sales by their U.S. affiliates, are included, because only in the case of sales originating abroad are most of the costs incurred abroad and accrued to the benefit of foreign economies. This methodology also eliminates the double-counting that would occur if both the total value of the sales by parents to their affiliates and the subsequent sales by the affiliates to others were included.

Conceptually, the ownership-based framework is fully consistent with the current account in the conventional international transactions accounts, and it can be viewed as a "satellite" of those accounts.⁶ (The current-account balance is the same in both sets of accounts.) The grouping of the income from affiliates with cross-border trade in goods and services recognizes the active role of parent companies in managing and coordinating their affiliates' operations. This direct investment income from affiliates differs fundamentally from income on other types of investments. For example, for U.S. direct investment abroad, direct investment income represents U.S. companies' returns on sales that for reasons such as efficiency, transport costs, or the avoidance of trade barriers are made by affiliates in foreign countries rather than by U.S. parent companies; other investment income represents returns on passive investments, such as on foreign stocks and bonds.⁷ Indeed, in many cases, a portion of the income from affiliates may be regarded as a kind of implicit management fee that compensates parent companies for undertaking active roles in the operations of their affiliates.

In addition, the most detailed presentation of the framework provides information on ownership relationships by disaggregating the trade in goods and in services into trade between affiliated parties (that is, trade within MNCs) and trade between unaffiliated parties. It also shows how receipts and payments of direct investment income are derived from the production and sales by affiliates. To highlight the links between the income and the activities that produce it, the income is designated "net receipts" or "net payments" of direct investment income resulting from sales by affiliates. In the addenda to table 1, the framework also provides information on the U.S. content and the foreign content of affiliates' sales and on the extent to which such content results from the affiliates' own value added.

^{5.} Among those calling for more information on ownership was a National Academy of Sciences study panel. See Anne Y. Kester, ed., *Behind the Numbers: U.S. Trade in the World Economy*, National Research Council, Panel on Foreign Trade Statistics (Washington, DC: National Academy Press, 1992).

^{6.} According to the international *System of National Accounts*, satellite accounts augment the central national accounts by "expanding the analytical capacity of national accounting for selected areas...in a flexible manner, without overburdening or disrupting the central system"; they may introduce additional information, alternative accounting frameworks, or "complementary or alternative concepts," while maintaining links to the central accounts. See Commission of the European Communities, International Monetary Fund, Organisation for Economic Co-operation and Development, United Nations, and World Bank, *System of National Accounts*, 1993 (Brussels/Luxembourg, New York, Paris, and Washington, DC, 1993):489.

^{7.} Direct investment income consists of net receipts of earnings and of interest by parents from their affiliates.

Table 1. Ownership-Based Framework of the U.S. Current Account, 1992–2002

[Billions of dollars]

Line		1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002 ¹
1	Exports of goods and services and income receipts (ITA table 1, line 1)	748.9	776.9	868.5	1,005.6	1,077.1	1,194.9	1,191.2	1,255.7	1,416.9	1,284.9	1,229.6
2	Receipts resulting from exports of goods and services or sales by foreign affiliates	674.0	709.6	780.0	889.0	953.4	1,049.2	1,036.5	1,097.1	1,221.9	1,131.9	1,117.0
_3	Exports of goods and services, total (ITA table 1, line 2)	616.5	642.4	702.6	793.7	850.9	933.9	932.6	965.5	1,070.1	1,007.6	974.1
3a 3b	Goods, balance of payments basis (ITA table 1, line 3) Services (ITA table 1, line 4)	439.6 176.8	456.9 185.4	502.9 199.8	575.2 218.5	612.1 238.8	678.4 255.5	670.4 262.1	684.0 281.5	772.0 298.1	718.7 288.9	681.9 292.2
4	To unaffiliated foreigners.	429.2	448.8	473.1	540.5	580.8	632.8	644.2	674.6	754.8	693.9	
4a	Goods	284.9	295.8	313.4	365.3	389.5	428.8	436.5	455.2	523.0	473.8	
4b 5	Services To affiliated foreigners	144.3 187.2	152.9 193.6	159.7 229.5	175.2 253.2	191.3 270.1	203.9 301.1	207.7 288.4	219.4 290.9	231.7 315.3	220.1 313.7	
5a	Goods	154.8	161.1	189.4	209.9	222.6	249.6	233.9	228.8	248.9	244.9	
5b 6	Services To foreign affiliates of U.S. parents	32.5 131.4	32.5 139.6	40.1 170.8	43.3 187.1	47.5 198.6	51.6 226.9	54.5 218.8	62.1 218.7	66.3 234.1	68.8 230.4	
6a	Goods	106.0	113.8	138.3	152.7	161.8	186.5	176.3	168.9	182.7	178.6	
6b	Services	25.4	25.8	32.6	34.4	36.8	40.4	42.5	49.8	51.4	51.8	
7 7a	To foreign parent groups of U.S. affiliates Goods	55.8 48.8	54.0 47.4	58.7 51.1	66.2 57.2	71.5 60.8	74.2 63.0	69.6 57.6	72.2 59.9	81.2 66.2	83.3 66.3	
7b	Services	7.1	6.7	7.5	8.9	10.7	11.2	12.0	12.3	15.0	17.0	
8	Net receipts by U.S. parents of direct investment income resulting from sales by		07.0			400 5	445.0	404.0	404.0	454.0	404.0	440.0
9	their foreign affiliates (ITA table 1, line 14) Nonbank affiliates	57.5 55.3	67.2 63.5	77.3 73.4	95.3 92.0	102.5 99.2	115.3 112.0	104.0 103.2	131.6 130.7	151.8 149.6	124.3 121.7	142.9 140.7
10	Sales by foreign affiliates	1,574.1	1,570.6	1,757.4	2,040.7	2,233.7	2,350.9	2,370.0	2,611.8	2,905.5	2,929.6	
11	Less: Foreign affiliates' purchases of goods and services directly from the United	1474	157.6	102.0	010.0	000.0	060.0	049.0	046.0	060 7	056.0	
12	States	147.4 1,106.9	157.6 1,089.1	192.0 1,200.0	212.3 1,379.3	230.9 1,509.5	260.9 1,556.0	248.9 1,601.2	246.3 1,787.3	260.7 1,989.1	256.8 2,032.4	
13	Compensation of employees of foreign affiliates	201.5	201.1	224.3	240.8	252.6	261.4	263.6	295.3	310.8	308.3	
14 15	Other Less: Sales by foreign affiliates to other foreign affiliates of the same parent	905.3 264.5	887.9 260.4	975.7 292.0	1,138.5 357.1	1,256.9 394.1	1,294.6 422.0	1,337.6 416.6	1,492.0 447.5	1,678.4 506.1	1,724.1 518.7	
16	Bank affiliates	2.2	3.7	3.9	3.2	3.3	3.3	0.7	1.0	2.2	2.7	2.3
17	Other income receipts	74.9	67.3	88.5	116.7	123.8	145.7	154.7	158.6	195.0	153.0	112.6
18 19	Other private receipts on U.Sowned assets abroad (ITA table 1, line 15) U.S. Government receipts (ITA table 1, line 16)	66.0 7.1	60.4 5.1	82.4 4.1	109.8 4.7	117.0 4.6	139.9 3.6	148.6 3.6	152.6 3.2	188.2 3.8	146.4 3.6	106.1 3.3
20	Compensation of employees (ITA table 1, line 17)	1.8	1.8	1.9	2.2	2.2	2.3	2.4	2.7	2.9	3.1	3.2
21	Imports of goods and services and income payments (ITA table 1, line 18)	763.7	821.8	948.6	1,075.7	1,155.5	1,281.3	1,347.5	1,499.8	1,772.7	1,632.1	1,651.7
22	Payments resulting from imports of goods and services or sales by U.S. affiliates	656.8	719.5	822.0	919.1	986.8	1,083.9	1,134.1	1,280.1	1,502.3	1,383.2	1,441.6
23	Imports of goods and services, total (ITA table 1, line 19)	654.6	711.5	799.8	888.8	953.7	1,040.9	1,095.7	1,226.7	1,445.4	1,365.4	1,392.1
23a 23b	Goods, balance of payments basis (ITA table 1, line 20) Services (ITA table 1, line 21)	536.5 118.1	589.4 122.1	668.7 131.1	749.4 139.4	803.1 150.6	876.5 164.4	917.1 178.6	1,030.0 196.7	1,224.4 221.0	1,145.9 219.5	1,164.7 227.4
24	From unaffiliated foreigners	409.9	449.6	493.9	556.4	598.0	666.7	706.2	793.7	939.4	859.9	
24a 24b	Goods	304.8 105.1	341.5 108.1	379.2 114.7	435.9 120.5	468.3 129.7	526.7 140.1	555.6 150.6	633.1 160.5	759.7 179.7	683.8 176.1	
240	Services From affiliated foreigners	244.7	262.0	305.9	332.4	355.8	374.2	389.5	433.0	506.1	505.5	
25a	Goods	231.7	247.9	289.5	313.5	334.8	349.8	361.5	396.8	464.7	462.1	
25b 26	Services From foreign affiliates of U.S. parents	13.0 99.4	14.1 103.1	16.4 121.8	18.9 129.7	21.0 145.0	24.4 157.8	28.0 168.6	36.2 184.8	41.3 209.9	43.4 198.5	
26a	Goods	93.9	97.1	114.9	122.3	137.2	147.5	156.4	167.0	191.2	179.2	
26b 27	Services From foreign parent groups of U.S. affiliates	5.5 145.3	6.0 158.9	7.0 184.1	7.4 202.7	7.8 210.8	10.4 216.3	12.2 221.0	17.8 248.2	18.7 296.2	19.3 307.0	
27a	Goods	137.8	150.8	174.6	191.2	197.7	202.4	205.2	229.9	273.6	282.9	
27b	Services	7.5	8.1	9.4	11.4	13.1	14.0	15.8	18.4	22.6	24.0	
28	Net payments to foreign parents of direct investment income resulting from sales by their U.S. affiliates (ITA table 1, line 31)	2.2	7.9	22.2	30.3	33.1	43.0	38.4	53.4	56.9	17.8	49.5
29	Nonbank affiliates	2.4	7.5	19.3	25.7	30.2	39.3	35.8	50.5	53.3	15.1	47.0
30 31	Sales by U.S. affiliates Less: U.S. affiliates' purchases of goods and services directly from abroad	1,232.0	1,329.4	1,443.5	1,544.6	1,667.6	1,726.3	1,875.5	2,044.4	2,334.7	2,354.1	
32	Less: Costs and profits accruing to U.S. persons	192.0 1,037.6	208.7 1,113.3	241.8 1,182.4	262.3 1,256.6	281.8 1,355.6	278.9 1,408.2	307.8 1,531.8	343.4 1,650.5	394.7 1,886.6	393.5 1,945.5	
32 33 34	Compensation of employees of U.S. affiliates	182.1	193.0	200.6	206.4	220.6	233.5	262.1	292.7	332.2	350.6	
34 35	Other Less: Sales by U.S. affiliates to other U.S. affiliates of the same parent ²	855.5 n.a.	920.3 n.a.	981.8 n.a.	1,050.2 n.a.	1,135.0 n.a.	1,174.7 n.a.	1,269.7 n.a.	1,357.8 n.a.	1,554.5 n.a.	1,594.9 n.a.	n.a.
36	Bank affiliates	-0.2	0.5	2.8	4.6	2.9	3.7	2.6	3.0	3.6	2.7	2.4
37	Other income payments	106.9	102.3	126.6	156.6	168.7	197.4	213.3	219.7	270.3	248.8	210.1
38 39	Other private payments on foreign-owned assets in the United States (ITA table 1, line 32) . U.S. Government payments (ITA table 1, line 33)	63.1 39.1	57.8 39.4	76.5 44.2	96.5 53.8	97.1 65.3	112.1 78.6	127.1 79.3	137.1 74.5	179.9 83.0	160.0 80.7	127.7 73.9
40	Compensation of employees (ITA table 1, line 34)	4.8	5.1	6.0	6.3	6.3	6.7	7.0	8.0	7.5	8.1	8.4
41	Unilateral current transfers, net (ITA table 1, line 35)	-33.2	-37.1	-37.6	-35.2	-38.9	-41.3	-48.4	-46.8	-55.7	-46.6	-58.9
40	Memoranda:	00.0	00.0	07.0	05.4	100.0	407.0	100.0	001.0	075.4	057.0	440.0
42 43	Balance on goods and services (line 3 minus line 23, and ITA table 1, line 73) Balance on goods, services, and net receipts from sales by affiliates (line 2 minus line 22)	-38.2 17.2	-69.2 -9.9	-97.2 -42.0	-95.1 -30.1	-102.9 -33.5	-107.0 -34.7	-163.2 -97.6	-261.2 -183.0	-375.4 -280.5	-357.8 -251.3	-418.0 -324.6
44	Balance on current account (line 1 minus line 21 plus line 41, and ITA table 1, line 76)	-48.0	-82.0	-117.7	-105.2	-117.2	-127.7	-204.7	-290.8	-411.5	-393.7	-480.9
	Addenda:											
45	Source of the content of foreign nonbank affiliates' sales: ³ Sales to nonaffiliates and change in inventories, total (line 10 minus line 15 plus the											
	change in inventories)	1,304.1	1,301.7	1,484.5	1,700.0	1,844.4	1,933.4	1,959.2	2,160.6	2,406.8	2,401.1	
46 47	Foreign content Value added by foreign affiliates of U.S. parents	1,156.6 440.6	1,144.1 442.2	1,292.5 494.1	1,487.7 560.9	1,613.6 595.7	1,672.5 620.8	1,710.3 608.5	1,914.3 666.7	2,146.1 702.9	2,144.3 678.1	
48	Other foreign content 4	716.1	701.9	798.4	926.8	1,017.9	1,051.7	1,101.8	1,247.7	1,443.1	1,466.2	
49	U.S. content	147.4	157.6	192.0	212.3	230.9	260.9	248.9	246.3	260.7	256.8	
50	Source of the content of U.S. nonbank affiliates' sales: ³ Sales to nonaffiliates and change in inventories, total (line 30 minus line 35 plus the											
50	Sales to nonattiliates and change in inventories, total (line 30 minus line 35 plus the change in inventories)	1,235.5	1,336.6	1,449.7	1,551.4	1,671.7	1,730.8	1,887.2	2,056.1	2,349.9	2,351.7	
51	U.S. content	1,043.5	1,127.9	1,207.9	1,289.2	1,390.0	1,451.9	1,579.4	1,712.7	1,955.1	1,958.1	
52 53	Value added by U.S. affiliates of foreign parents Other U.S. content ⁵	266.3 777.2	285.7 842.1	313.0 894.9	322.6 966.5	358.1 1,031.9	389.4 1,062.4	419.8 1,159.6	457.7 1,255.0	516.7 1,438.5	486.6 1,471.6	
54	Foreign content.	192.0	208.7	241.8	262.3	281.8	278.9	307.8	343.4	394.7	393.5	

The estimates in this column are from the international transactions accounts, which are published quarterly. Estimates are not yet available for the items from BEA's annual surveys of U.S. direct investment abroad and of foreign direct investment in the United States, which are processed in the 2 years following the year of coverage. The preliminary estimates for 2002 will be published in the second half of 2004.
Conceptually, sales by U.S. affiliates to other U.S. affiliates are generally required to report to BEA on a fully consolidated basis, most of these sales are eliminated through consolidation, and the remaining amount is thought to be immaterial.
The sales exclude the affiliates' sales to other affiliates of their parent. For U.S. affiliates, data on sales to other affiliates.

ates are unavailable.

4. Line 48, other foreign content—which equals purchases from foreign persons by foreign affiliates—is overstated to the extent that it includes U.S. exports that are embodied in purchases of goods and services from foreign suppliers. 5. Line 53, other U.S. content—which equals purchases from U.S. persons by U.S. affiliates—is overstated to the extent that it includes U.S. imports that are embodied in purchases of goods and services from U.S. suppliers.

ITA International transactions accounts

n.a. Not available Note. Details may not add to totals because of rounding.