

TABLE 31. Domestic full-time equivalent R&D scientists and engineers, total and federally funded, by industry and company size: 2008  
(Thousands of employees)

Industry and company size	NAICS code	Total	Federally funded
All industries	21–23, 31–33, 42–81	832	61
Manufacturing industries	31–33	430	30
Food	311	4	*
Beverage and tobacco products	312	2	0
Textiles, apparel, and leather products	313–316	2	*
Wood products	321	1	0
Paper	322	6	*
Printing and related support activities	323	1	*
Petroleum and coal products	324	1	0
Chemicals	325	105	1
Basic chemicals	3251	10	*
Resin, synthetic rubber, fibers, and filaments	3252	2	*
Pesticide, fertilizer, and other agricultural chemical	3253	4	*
Pharmaceuticals and medicines	3254	74	1
Soap, cleaning compound, and toilet preparation	3256	8	*
Paint, coating, adhesive, and other chemical	3255, 3259	7	*
Plastics and rubber products	326	6	*
Nonmetallic mineral products	327	4	*
Primary metals	331	2	*
Fabricated metal products	332	11	*
Machinery	333	23	*
Agricultural implements	33311	2	0
Semiconductor machinery	333295	5	*
Engine, turbine, and power transmission equipment	3336	4	*
Other machinery	other 333	12	*
Computer and electronic products	334	135	11
Communications equipment	3342	27	1
Semiconductor and other electronic components	3344	41	1
Navigational, measuring, electromedical, and control instruments	3345	37	8
Electromedical, electrotherapeutic, and irradiation apparatus	334510, 334517	16	1
Search, detection, navigation, guidance, aeronautical, and nautical system and instruments	334511	9	6
Other measuring and controlling instruments	other 3345	12	1
Computer and peripheral equipment and other computer and electronic products	3341, 3343, 3346	31	1
Electrical equipment, appliances, and components	335	11	1
Transportation equipment	336	82	16
Automobiles, bodies, trailers, and parts	3361–3363	34	*
Aerospace products and parts	3364	45	16
Aircraft, aircraft engine, and aircraft parts	336411–336413	40	12
Guided missile, space vehicle, and related parts	336414, 336415, 336419	5	4
Military armored vehicle, tank, and tank components	336992	*	*
Other transportation equipment	other 336	2	0
Furniture and related products	337	3	*
Miscellaneous manufacturing	339	32	1
Medical equipment and supplies	3391	25	*
Other miscellaneous manufacturing	3399	7	*
Nonmanufacturing industries	21–23, 42–81	402	30
Mining, extraction, and support activities	21	2	*
Utilities	22	*	*
Construction	23	*	0
Wholesale trade	42	4	* i
Retail trade	44, 45	4	0
Electronic shopping and mail-order houses	4541	4	0
Other retail trade	other 44, 45	* i	0
Transportation and warehousing	48, 49	1	*
Information	51	244	1

TABLE 31. Domestic full-time equivalent R&D scientists and engineers, total and federally funded, by industry and company size: 2008  
(Thousands of employees)

Industry and company size	NAICS code	Total	Federally funded
Publishing	511	222	1
Newspaper, periodical, book, and directory publishers	5111	1	0
Software publishers	5112	221	1
Telecommunications	517	3	*
Internet service providers, Web search portals, and data processing services	518	18	*
Other information	other 51	1	0
Finance and insurance	52	4	0
Real estate and rental and leasing	53	1 i	0
Professional, scientific, and technical services	54	133	28
Architectural, engineering, and related services	5413	19	5
Computer systems design and related services	5415	57	8
Scientific R&D services	5417	42	8
Other professional, scientific, and technical services	other 54	15	6
Health care services	621–623	4	1
Other nonmanufacturing	55, 56, 61, 624, 71, 72, 81	4	*
All companies	21–23, 31–33, 42–81	832	61
Small companies (number of domestic employees) <sup>a</sup>			
5–499	–	314	26
5–99	–	237	21
5–49	–	203	15
5–24	–	169	9
25–49	–	34	6
50–99	–	34	6
100–249	–	46	4
250–499	–	31	2
Medium and large companies (number of domestic employees)			
500–999	–	34	2
1,000–4,999	–	119	4
5,000–9,999	–	59	3
10,000–24,999	–	108	5
25,000 or more	–	198	20

\* = amount < \$500,000; i = value > 50% of estimate is a combination of imputation and reweighting to account for nonresponse.

NAICS = 2002 North American Industry Classification System.

<sup>a</sup> Upper bound based on U.S. Small Business Administration's definition of small business; Business R&D and Innovation Survey (BRDIS) does not include companies with fewer than five domestic employees. After 2008 BRDIS sample was selected and surveyed, an error was identified that resulted in excluding 226,884 single-establishment companies with five paid employees from sample frame. Most excluded establishments were classified in industries with low R&D intensities, such as construction, retail trade, and service sectors. Based on available information for these small single-establishment companies, their contribution to 2008 R&D estimates is estimated to be negligible.

NOTES: Detail may not add to total because of rounding. Industry classification based on dominant business code for domestic R&D performance where available. For companies that did not report business codes, classification used for sampling was assigned. Statistics are representative of companies located in United States that performed or funded R&D.

SOURCE: National Science Foundation/National Center for Science and Engineering Statistics and U.S. Census Bureau, Business R&D and Innovation Survey, 2008.