Release date: September 2021 Revised date: December 2022

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Building floorspace (square feet)						
1,001 to 5,000	2,833	8,025	9,717	2.8	676	57
5,001 to 10,000	1,359	10,204	9,085	7.5	982	61
10,001 to 25,000	981	15,838	12,244	16.1	1,225	65
25,001 to 50,000	386	13,957	10,744	36.2	1,279	78
50,001 to 100,000	218	15,302	12,846	70.3	1,165	79
100,001 to 200,000	93	13,003	11,428	140.2	1,123	84
200,001 to 500,000	40	11,776	10,508	293.9	1,109	96
Over 500,000	9	8,317	9,224	947.6	897	115
Principal building activity						
Education	437	13,623	10,370	31.1	1,314	51
Food sales	163	1,006	917	6.2	1,097	110
Food service	286	1,385	2,884	4.8	480	81
Health care	137	4,018	6,656	29.3	604	60
Inpatient	9	2,259	3,597	264.8	628	168
Outpatient	129	1,760	3,059	13.7	575	52
Lodging	207	6,976	2,764	33.7	2,431	165
Mercantile	517	10,781	8,882	20.9	1,214	64
Retail (other than mall)	350	5,193	3,251	14.8	1,597	66
Enclosed and strip malls	167	5,588	5,631	33.5	992	61
Office	970	16,662	32,843	17.2	507	54
Public assembly	488	7,192	3,338	14.7	2,082	51
Public order and safety	81	1,538	1,587	18.9	954	131
Religious worship	439	5,471	1,948	12.5	2,656	28
Service	867	6,240	4,736	7.2	1,243	53
Warehouse and storage	1,004	17,483	7,081	17.4	2,222	71
Other	113	2,435	1,598	21.5	1,360	82
Vacant	208	1,612	Q	7.8	Q	5
Year constructed						
Before 1920	329	3,600	2,731	10.9	1,222	43
1920 to 1945	379	5,646	5,304	14.9	1,023	54
1946 to 1959	517	6,937	5,487	13.4	1,202	53
1960 to 1969	685	10,360	8,481	15.1	1,161	60
1970 to 1979	831	13,061	10,822	15.7	1,171	59
1980 to 1989	794	13,465	14,755	17.0	878	61
1990 to 1999	921	15,535	13,504	16.9	1,087	65
2000 to 2009	924	17,500	15,696	18.9	1,063	67
2010 to 2018	537	10,319	9,017	19.2	1,082	82
		10,313	J,U1/	±J.∠	1,002	

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Census region and division						
Northeast	793	15,951	15,152	20.1	1,014	64
New England	275	3,749	3,616	13.6	982	75
Middle Atlantic	518	12,202	11,536	23.6	1,024	59
Midwest	1,719	25,932	19,924	15.1	1,225	62
East North Central	1,110	17,561	13,951	15.8	1,195	62
West North Central	609	8,372	5,973	13.7	1,296	60
South	2,143	34,907	30,820	16.3	1,089	60
South Atlantic	1,034	17,923	16,420	17.3	1,060	58
East South Central	347	5,404	3,923	15.6	1,289	59
West South Central	762	11,580	10,477	15.2	1,061	63
West	1,264	19,633	19,900	15.5	935	64
Mountain	484	7,680	8,119	15.9	886	69
Pacific	780	11,952	11,780	15.3	968	61
Climate zone ^b						
Cold or very cold	539	7,044	5,445	13.1	1,224	67
Cool	1,727	26,768	22,477	15.5	1,122	62
Mixed mild	1,216	25,096	23,442	20.6	1,024	61
Warm	1,606	25,085	21,301	15.6	1,134	59
Hot or very hot	831	12,429	13,130	15.0	906	66
Number of floors						
1	4,106	43,576	34,034	10.6	1,188	61
2	1,286	23,300	18,268	18.1	1,231	61
3	370	10,516	8,316	28.5	1,233	64
4 to 9	142	13,031	15,293	92.1	837	88
10 or more	16	6,000	9,886	379.9	605	109
Elevators and escalators (more than one may apply)						
Any elevators	503	36,501	40,521	72.6	887	79
1 elevator	366	14,215	11,669	38.9	1,197	74
2 to 5 elevators	121	13,316	15,470	110.1	844	92
6 or more elevators	16	8,970	13,382	545.7	666	108
Any escalators	14	3,753	4,345	277.8	851	126

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Number of workers (main shift)						
Fewer than 5	3,270	21,065	5,726	6.4	2,898	57
5 to 9	1,116	10,323	7,303	9.2	1,413	62
10 to 19	713	11,348	9,062	15.9	1,252	70
20 to 49	492	16,132	14,185	32.8	1,137	74
50 to 99	201	12,961	12,788	64.5	1,014	73
100 to 249	90	12,442	13,183	138.0	944	82
250 or more	37	12,152	23,548	329.9	516	88
Weekly operating hours						
Fewer than 40	1,370	10,766	5,897	7.9	1,420	14
40 to 48	1,483	18,826	16,706	12.7	1,113	42
49 to 60	1,250	22,845	24,636	18.3	921	54
61 to 84	645	14,736	14,659	22.8	989	74
85 to 167	465	10,038	7,655	21.6	1,270	109
Open continuously	705	19,213	16,243	27.2	1,112	168
Ownership and occupancy						
Nongovernment owned	4,982	74,728	66,568	15.0	1,065	63
Owner occupied	3,249	45,355	37,126	14.0	1,167	62
Leased to tenant or tenants	1,581	28,382	29,442	18.0	936	70
Unoccupied	152	990	0	6.5	N	0
Government owned	937	21,695	19,228	23.2	1,096	58
Federal	70	1,946	2,597	27.7	731	81
State	256	6,888	5,746	26.9	1,181	59
Local	610	12,861	10,885	21.1	1,138	55
Party responsible for operation of energy systems						
Building owner	4,872	79,282	70,432	16.3	1,069	61
Business owner or tenant	831	12,842	10,637	15.4	1,181	62
Property management	97	1,994	2,311	20.7	839	76
Other	118	2,306	2,415	19.5	903	71
Provider of direct input on energy-						
related equipment purchases						
Building owner	5,127	82,862	73,240	16.2	1,076	61
Business owner or tenant	483	7,585	6,376	15.7	1,152	60
Property management	49	1,072	1,170	22.0	901	76
Other	260	4,904	5,010	18.8	947	71

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

		Total	Mean	Mean	Mean	
	Number of	floorspace	Total workers	square feet	square feet per worker ^a	operating hours per week
	buildings	(million		per building		
	(thousand)	square feet)	(thousand)	(thousand)		
All buildings	5,918	96,423	85,796	16.3	1,072	62
Number of establishments						
1	4,719	65,391	50,407	13.9	1,237	64
2 to 5	811	16,431	15,937	20.3	1,020	60
6 to 10	135	5,539	7,206	41.0	760	67
11 to 20	63	3,894	5,751	61.6	676	83
More than 20	19	3,999	6,494	207.0	616	76
Currently unoccupied	170	1,168	0	6.9	N	0
Campus or complex activity						
Not part of a campus or complex	3,622	56,609	50,340	15.6	1,087	60
Primary or secondary school	247	5,106	3,681	20.7	1,376	42
College or university	103	3,761	2,700	36.5	1,339	85
Office complex	141	3,823	8,446	27.2	443	64
Retail complex	250	4,573	4,171	18.3	1,062	55
Storage complex	418	5,684	1,933	13.6	2,319	91
Religious campus or complex	253	3,209	1,692	12.7	1,819	30
Health care complex	60	2,838	4,415	47.1	641	80
Lodging or resort complex	102	1,575	758	15.4	1,895	120
Transportation complex	36	774	600	21.6	1,090	93
Government complex	124	1,706	1,676	13.8	936	61
Other	563	6,765	5,383	12.0	1,180	62
Predominant exterior wall material						
Brick, stone, or stucco	2,490	46,134	43,670	18.5	1,024	61
Concrete (block or poured)	935	19,357	14,995	20.7	1,255	65
Concrete panels	137	8,331	8,022	60.6	1,032	63
Siding or shingles	948	5,992	5,220	6.3	1,046	57
Metal panels	1,250	12,198	6,584	9.8	1,577	64
Window glass	19	2,192	4,522	113.5	480	72
Other	139	2,219	2,783	16.0	763	61
Predominant roof material						
Metal surfacing	2,198	20,936	12,924	9.5	1,424	59
Synthetic or rubber	940	31,563	31,789	33.6	980	68
Built-up	708	19,308	19,471	27.3	970	63
Slate or tile shingles	376	3,997	3,748	10.6	991	61
Wooden materials (including						
shingles)	166	1,568	1,496	9.5	939	78
Asphalt, fiberglass, or						
other shingles	1,311	14,058	11,509	10.7	1,176	58
Concrete	83	1,968	1,931	23.6	1,010	88
Other	136	3,026	2,926	22.2	999	61

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Roof tilt						
Flat	1,914	54,253	55,710	28.3	953	67
Shallow pitch	2,313	27,609	19,619	11.9	1,296	64
Steeper pitch	1,691	14,561	10,466	8.6	1,282	53
Cool roof characteristics (more than one may apply)						
White or reflective coating or paint	1,285	32,799	31,826	25.5	993	64
White or reflective tiles or shingles	140	2,713	2,557	19.3	1,048	68
Aluminum coating	528	6,149	4,472	11.7	1,284	57
Ballasted roof system	114	6,277	6,872	55.2	903	74
Other cool roof property	35	1,603	2,359	45.3	680	76
Renovations since 2000 (more than one may apply)						
Any type of renovation	2,032	45,165	44,948	22.2	985	63
Addition or annex	327	10,854	9,532	33.1	1,130	63
Reduction in floorspace	35	1,784	2,369	51.1	753	63
Roof replacement	847	20,862	20,388	24.6	997	62
Interior wall reconfiguration	709	21,283	25,724	30.0	819	59
Window replacement	484	10,977	11,390	22.7	954	63
HVAC equipment upgrade	1,006	27,575	28,643	27.4	948	62
Lighting upgrade	1,012	29,098	30,404	28.7	947	66
Electrical upgrade	565	15,761	17,063	27.9	910	62
Plumbing system upgrade	584	15,537	17,095	26.6	895	65
Insulation upgrade	307	7,980	8,465	26.0	924	62
Fire, safety, or security upgrade	570	19,985	20,865	35.0	949	71
Structural upgrade	147	4,203	5,041	28.6	818	65
Other	43	1,168	1,027	27.3	1,105	81
No renovations	3,530	43,832	34,581	12.4	1,176	59
Buildings constructed 2013 or later	357	7,426	6,268	20.8	1,119	83

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Energy sources (more than one may apply)						
Electricity	5,613	94,844	85,693	16.9	1,070	62
Natural gas	2,974	67,722	60,519	22.8	1,100	64
Fuel oil	583	21,185	24,121	36.3	866	71
District heat	86	6,745	7,389	78.1	900	79
District chilled water	55	4,288	4,562	77.5	926	74
Propane	676	10,157	6,940	15.0	1,420	61
Wood	105	802	671	7.6	1,112	50
Coal	Q	Q	Q	Q	Q	Q
Solar	99	3,820	3,846	38.6	984	84
Other	79	1,317	1,067	16.7	1,214	74
Space-heating energy sources (more than one may apply)						
Electricity	2,563	45,603	45,698	17.8	982	63
Natural gas	2,587	58,042	50,527	22.4	1,129	62
Fuel oil	266	4,134	3,709	15.6	1,086	60
District heat	83	6,547	7,131	79.3	905	80
Propane	431	3,896	2,736	9.0	1,339	51
Wood	85	422	222	4.9	1,646	49
Coal	Q	Q	Q	Q	Q	Q
Solar	Q	Q	Q	Q	Q	Q
Other	40	443	273	11.1	1,624	54
Primary space-heating						
energy source	4.056	27.640	20.054	110	022	
Electricity	1,856	27,618	29,054	14.9	932	64
Natural gas	2,344	50,060	42,756	21.4	1,149	61
Fuel oil	222	2,223	1,652	10.0	1,281	62
District heat	78	6,090	6,695	78.0	895	79
Propane	338	2,290	1,692	6.8	1,239	47
Wood	Q	Q	Q	Q	Q	Q
Coal	Q	Q	Q	Q	Q	Q
Solar Other	N O	N Q	N Q	N	N Q	N
	Q	Q		Q	Q	Q
Cooling energy sources (more than one may apply)						
Electricity	4,584	84,526	79,784	18.4	1,041	63
Natural gas	4	400	307	90.9	1,302	55
District chilled water	55	4,288	4,562	77.5	926	74

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

		ngs (million	Total	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
	Number of					
	buildings (thousand)		workers (thousand)			
All buildings	5,918	96,423	85,796	16.3	1,072	62
Water-heating energy sources						
(more than one may apply)						
Electricity	2,785	47,125	46,374	16.9	1,000	59
Natural gas	1,885	46,652	42,146	24.8	1,093	69
Fuel oil	72	1,807	1,889	25.1	947	87
District heat	38	4,206	4,919	109.6	851	83
Propane	145	1,947	1,855	13.4	1,033	69
Cooking energy sources						
(more than one may apply)						
Electricity	1,216	30,509	29,469	25.1	1,020	74
Natural gas	727	27,705	26,104	38.1	1,060	80
Propane	159	3,101	2,430	19.5	1,255	75
Energy end uses (more than one may apply)						
Buildings with space heating	4,901	88,661	82,078	18.1	1,057	61
Buildings with cooling	4,631	87,506	82,835	18.9	1,038	63
Buildings with water heating	4,595	87,717	82,235	19.1	1,050	63
Buildings with cooking	1,738	43,580	41,427	25.1	1,039	74
Buildings with manufacturing	322	6,871	5,035	21.4	1,359	56
Buildings with electricity						
generation	706	29,457	32,409	41.7	900	82
Buildings with lighting	5,503	94,103	85,617	17.1	1,065	61
Percentage of floorspace heated						
Not heated	1,017	7,762	3,718	7.6	1,394	64
1 to 50%	693	10,620	6,404	15.3	1,605	56
51 to 99%	905	20,174	20,058	22.3	994	62
100%	3,303	57,867	55,616	17.5	1,017	62
Percentage of floorspace cooled						
Not cooled	1,288	8,917	2,961	6.9	2,022	57
1 to 50%	1,111	19,722	10,727	17.8	1,784	56
51 to 99%	998	26,277	26,432	26.3	990	67
100%	2,522	41,507	45,675	16.5	890	65
Percentage lit when open						
0%	Q	Q	Q	Q	Q	Q
1 to 50%	1,280	14,172	6,476	11.1	2,082	60
51 to 99%	1,784	38,847	37,954	21.8	1,011	64
100%	2,272	39,877	41,135	17.6	953	64
Building never open or electricity not used	513	2,998	183	5.8	2,908	39
		_,,,,,			_,	

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Percentage lit during off hours						
0%	2,062	15,578	10,347	7.6	1,376	49
1 to 50%	3,246	69,800	67,292	21.5	1,017	66
51 to 100%	240	7,243	6,281	30.2	1,085	82
Building always open with						
no off hours	64	2,223	1,773	34.6	1,218	168
Electricity not used	305	1,579	103	5.2	Q	66
Heating equipment (more than one may apply)						
Packaged heating units	2,187	48,064	44,373	22.0	1,073	67
Furnaces	1,621	17,272	13,487	10.7	1,217	53
Individual space heaters						
Boilers	1,246 703	21,122 28,831	17,188 28,263	16.9 41.0	1,208 1,010	59 71
	673	15,110	14,684	22.4	1,010	67
Heat pumps District heat	83	6,547	7,131	79.3	905	80
Duct reheat Other	134 17	7,418 821	9,848	55.2 48.7	747 1,219	61 87
Cooling equipment (more than one may apply) Packaged air-conditioning units	2,565	56,290	53,354	21.9	1,044	66
Residential-type central air						
conditioners	1,309	18,270	16,384	14.0	1,087	58
Individual air conditioners	735	13,619	10,038	18.5	1,337	69
Central chillers	202	17,926	21,716	88.8	820	75
Heat pumps	492	11,098	11,637	22.5	934	65
District chilled water	55	4,288	4,562	77.5	926	74
Swamp coolers	85	2,070	2,103	24.5	953	59
Other	Q	Q	Q	Q	Q	Q
HVAC features (more than one may apply)						
Economizer cycle	747	34,087	37,137	45.6	912	76
Variable air volume (VAV) system	698	29,268	34,745	42.0	835	70
Dedicated outside air system (DOAS)	249	9,027	9,453	36.3	942	72
Demand controlled ventilation (DCV)	349	10,474	9,818	30.0	1,051	67
Regular HVAC maintenance	3,554	78,015	75,319	22.0	1,019	66
Building automation system (BAS)						
controls heating or cooling	933	40,462	44,380	43.3	904	69
Internet-connected or smart						
thermostat	325	5,966	4,778	18.3	1,211	68
Programmable thermostat	1,545	20,882	17,370	13.5	1,182	62

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Main equipment replaced since 2000 (more than one may apply)						
Heating	1,937	32,451	29,569	16.8	1,076	58
Cooling	1,269	23,013	21,847	18.1	1,037	61
Water-heating equipment						
Centralized system	3,538	59,280	52,744	16.8	1,103	64
Distributed system	782	14,307	14,110	18.3	1,000	60
Combination of centralized and						
distributed systems	274	14,129	15,380	51.5	912	67
Generation technologies (more than one may apply)						
Reciprocating engine generators	580	25,163	28,143	43.4	886	81
Solar panels	94	3,750	3,779	39.9	983	80
Other generation technology	43	2,055	2,213	48.0	920	97
Lighting equipment types						
(more than one may apply)						
Incandescent	1,100	21,081	20,077	19.2	1,019	59
Standard fluorescent	4,012	72,912	67,312	18.2	1,054	60
Compact fluorescent	1,130	33,691	34,888	29.8	951	70
High-intensity discharge (HID)	238	11,356	9,532	47.6	1,171	65
Halogen	552	15,012	15,013	27.2	988	65
LED	2,593	61,849	61,176	23.8	996	68
Other	Q	Q	Q	Q	Q	Q
Refrigeration equipment (more than one may apply)						
Any refrigeration	3,850	77,589	73,331	20.2	1,045	64
Walk-in units	706	29,384	29,824	41.6	984	92
Cases or cabinets	837	28,517	29,508	34.1	966	82
Large cold storage areas	69	3,592	2,753	52.1	1,302	102
Commercial ice makers	872	34,672	34,910	39.8	988	82
Residential-type or compact units	3,321	64,735	62,176	19.5	1,028	61
Vending machines	800	42,071	42,256	52.6	992	81
No refrigeration	2,068	18,834	12,465	9.1	1,226	58
TWO TETTISET BUILDIT	۷,000	10,034	12,405	J.1	1,220	

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Office equipment (more than one may apply)						
Desktop computers	3,804	82,012	78,691	21.6	1,037	66
With multiple monitors	1,504	50,844	56,355	33.8	899	65
Laptop computers	2,786	69,375	69,993	24.9	982	64
Dedicated servers	1,400	51,595	56,604	36.8	911	69
Tablets charged in building	1,556	48,778	51,562	31.3	941	68
Large floor-standing office devices ^c	1,456	54,088	58,144	37.2	929	65
Smaller desktop office devices ^c	3,560	74,467	71,347	20.9	1,039	65
Interactive whiteboards	262	16,939	18,450	64.7	917	65
Televisions or video displays	2,451	63,618	63,777	26.0	989	71
Point-of-sale devices or cash						
registers	1,420	33,606	35,979	23.7	933	74
Food preparation or serving areas in non-food service buildings (more than one may apply)						
Snack bar, concession stand, or coffee						
shop	144	10,361	10,567	71.7	980	88
Fast food or small restaurant	160	9,759	10,823	60.9	902	87
Cafeteria or large restaurant	129	14,531	15,160	112.4	958	67
Commercial kitchen or						
food preparation area	284	17,698	15,081	62.3	1,173	88
Small kitchen area	1,018	20,519	18,600	20.2	1,074	70
Separate computer areas (more than one may apply)						
Server closet	1,237	48,722	51,926	39.4	936	67
Data center	116	11,383	14,374	98.3	792	88
Computer-based training room	228	16,556	17,081	72.7	969	72
Student or public computer center	236	12,527	9,728	53.1	1,288	64

Table B1. Summary table: total and means of floorspace, number of workers, and hours of operation, 2018

	Number of buildings (thousand)	Total floorspace (million square feet)	Total workers (thousand)	Mean square feet per building (thousand)	Mean square feet per worker ^a	Mean operating hours per week
All buildings	5,918	96,423	85,796	16.3	1,072	62
Window and interior lighting features (more than one may apply)						
Multipaned windows	3,527	72,694	68,818	20.6	1,034	62
Tinted window glass	1,679	44,363	46,894	26.4	930	61
Reflective window glass	497	17,929	20,883	36.1	849	71
External overhangs or awnings	1,513	28,718	26,663	19.0	1,061	61
Skylights or atriums	509	19,815	18,169	38.9	1,074	67
Light scheduling	910	33,552	36,481	36.9	910	71
Occupancy sensors	1,025	44,304	46,637	43.2	942	71
Multilevel lighting or dimming	332	14,424	15,759	43.4	910	63
Daylight harvesting	138	7,244	9,573	52.6	752	69
Plug-load control	58	1,961	2,132	34.1	913	67
Demand responsive lighting	98	2,045	2,002	20.8	1,003	63
Building automation system (BAS) for lighting	317	16,645	18,648	52.5	890	76
Electric vehicle (EV) charging						
Charging stations associated with the building	132	10,165	11,217	77.1	899	86

Data source: U.S. Energy Information Administration, Form EIA-871A of the 2018 Commercial Buildings Energy Consumption Survey

Notes: Because of rounding, data may not sum to totals. The Guide to the 2018 CBECS Tables and CBECS Terminology contain definitions of terms used in these tables and comparisons between previous CBECS tables. You can access both references from http://www.eia.gov/consumption/commercial/data/2018/.

Data are sample survey estimates with relative standard errors published in a tab on the Excel worksheet for this table.

^aBuildings with zero workers are excluded from this column.

^bClimate zones are based on ASHRAE Standard 169-2021; see https://www.eia.gov/consumption/commercial/maps.php#defined.

^cOffice devices refers to any combination of printers, copiers, scanners, or FAX machines.

Q = Data withheld either because the relative standard error was greater than 50% or the reporting sample had fewer than 20 buildings. N = No buildings in reporting sample.

Release date: September 2021 Revised date: December 2022

workers, and nours of operation	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Building floorspace (square feet)						
1,001 to 5,000	4.9	5.3	5.7	1.9	4.4	3.2
5,001 to 10,000	5.9	5.8	5.6	1.3	5.6	4.9
10,001 to 25,000	5.6	6.1	7.9	1.6	5.4	4.3
25,001 to 50,000	5.6	5.6	6.6	0.9	5.6	3.4
50,001 to 100,000	5.3	5.3	6.9	1.0	4.7	2.6
100,001 to 200,000	5.6	5.5	7.0	0.9	5.6	2.5
200,001 to 500,000	5.0	5.0	6.2	1.0	5.0	2.2
Over 500,000	7.8	8.6	8.3	4.0	6.6	3.0
Principal building activity						
Education	7.8	5.3	5.9	6.8	3.2	2.7
Food sales	14.3	17.0	16.1	12.9	11.4	4.6
Food service	7.7	8.5	9.4	5.7	5.8	3.5
Health care	9.8	5.5	6.0	8.5	3.5	4.1
Inpatient	19.4	7.2	7.9	18.5	4.6	0.0
Outpatient	10.3	8.0	8.9	8.4	5.9	3.7
Lodging	9.4	8.3	10.5	9.6	6.3	1.7
Mercantile	7.3	6.0	6.7	6.6	3.5	3.6
Retail (other than mall)	10.1	8.6	10.0	7.5	5.9	5.1
Enclosed and strip malls	7.6	7.6	7.6	8.4	4.2	3.3
Office	7.2	5.5	5.6	6.9	2.4	2.5
Public assembly	9.1	5.8	9.2	6.9	7.4	6.1
Public order and safety	20.2	15.9	20.4	17.4	12.8	8.7
Religious worship	9.5	9.3	12.4	6.4	9.6	14.7
Service	7.4	8.1	8.4	6.5	6.6	3.3
Warehouse and storage	7.4	7.2	7.2	7.0	6.3	6.1
Other	17.1	15.1	22.5	15.2	13.6	13.8
Vacant	17.2	14.1	56.7	12.3	101.2	28.2
Year constructed						
Before 1920	12.8	10.8	14.9	10.4	9.1	5.7
1920 to 1945	10.7	8.8	10.4	9.8	5.1	7.7
1946 to 1959	8.1	7.6	9.7	6.6	7.3	6.0
1960 to 1969	6.4	5.2	5.2	5.4	4.7	4.4
1970 to 1979	7.4	6.0	6.9	5.6	5.6	6.6
1980 to 1989	7.0	5.9	5.5	6.3	4.3	4.4
1990 to 1999	7.5	6.6	6.7	4.7	4.3	5.4
2000 to 2009	8.0	6.3	7.1	5.5	4.2	4.3
2010 to 2018	11.0	7.6	10.2	9.2	7.8	6.8

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Census region and division						
Northeast	9.9	7.2	6.8	7.1	4.0	4.0
New England	17.8	10.8	9.4	9.6	7.6	5.0
Middle Atlantic	12.0	8.8	8.3	8.6	4.8	4.3
Midwest	10.9	7.4	7.2	6.6	4.9	4.9
East North Central	13.1	10.4	10.0	6.4	6.7	5.8
West North Central	21.0	7.9	6.4	16.2	5.4	9.0
South	7.7	6.1	6.7	4.1	3.4	3.3
South Atlantic	11.0	6.8	8.3	6.9	4.5	4.0
East South Central	18.0	20.3	14.0	3.6	9.1	6.2
West South Central	14.7	11.5	13.7	8.3	5.5	7.1
West	8.1	7.1	7.0	5.8	4.2	3.9
Mountain	15.9	13.1	14.7	12.3	5.7	6.2
Pacific	9.0	8.1	6.1	5.1	5.7	4.6
Climate zone ^b						
Cold or very cold	18.8	17.0	14.6	12.4	8.3	6.4
Cool	11.8	8.3	8.4	7.1	4.6	4.3
Mixed mild	15.1	10.5	10.8	8.4	3.2	4.3
Warm	11.4	10.0	10.1	4.2	4.2	4.2
Hot or very hot	18.8	14.1	12.7	8.1	4.7	3.6
Number of floors						
1	4.3	4.5	4.7	2.7	2.8	2.8
2	5.8	4.4	5.5	3.9	4.4	4.7
3	10.5	7.6	8.8	6.8	6.4	5.4
4 to 9	9.4	6.3	7.1	7.3	4.4	5.0
10 or more	9.8	11.0	9.6	7.7	6.3	4.2
Elevators and escalators (more than one may apply)						
Any elevators	6.5	4.5	5.0	4.3	2.8	3.3
1 elevator	7.7	6.0	7.8	4.5 4.5	4.7	4.7
2 to 5 elevators	6.7	5.2	6.8	3.5	4.7	3.5
6 or more elevators	7.8	8.4	7.6	4.7	4.7	3.2
	28.9			35.6	10.6	
Any escalators	20.9	13.7	15.3	٥.٥٥	10.0	12.6

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Number of workers (main shift)						
Fewer than 5	5.5	5.9	6.0	3.1	4.3	3.6
5 to 9	6.1	6.9	6.1	4.4	4.6	3.0
10 to 19	6.5	7.4	6.5	5.3	5.0	3.8
20 to 49	6.3	4.8	6.1	4.3	3.9	3.4
50 to 99	6.7	5.9	6.6	4.4	4.2	2.8
100 to 249	7.1	5.6	7.1	4.2	4.3	2.4
250 or more	7.2	6.4	6.2	5.7	3.6	3.1
Weekly operating hours						
Fewer than 40	6.1	6.6	10.0	4.9	8.5	5.4
40 to 48	6.2	5.1	5.4	4.4	4.4	0.4
49 to 60	5.2	4.3	4.5	4.1	3.4	0.4
61 to 84	7.6	5.3	6.4	5.8	4.6	0.6
85 to 167	8.6	6.2	6.8	7.5	5.4	1.2
Open continuously	8.1	5.0	5.4	7.2	3.9	0.0
Ownership and occupancy						
Nongovernment owned	3.8	3.3	3.3	2.9	2.4	2.0
Owner occupied	4.3	3.3	3.3	3.5	2.8	2.4
Leased to tenant or tenants	5.5	4.8	4.9	4.4	3.5	3.4
Unoccupied	20.3	19.2	0.0	15.1	0.0	0.0
Government owned	9.5	6.0	8.2	6.0	3.9	5.1
Federal	26.0	16.1	18.9	29.1	9.0	19.2
State	12.9	11.8	15.9	9.4	7.5	10.1
Local	10.1	6.0	7.4	8.1	4.8	5.4
Party responsible for operation of energy systems						
Building owner	4.4	3.2	3.6	2.9	2.3	2.4
Business owner or tenant	6.5	7.2	7.6	5.6	5.3	4.1
Property management	20.7	11.7	13.3	18.3	9.2	15.4
Other	18.8	11.1	17.1	15.8	12.9	21.4
Provider of direct input on energy- related equipment purchases						
Building owner	4.4	3.1	3.6	2.8	2.2	2.2
Business owner or tenant	8.9	8.8	9.1	6.9	6.4	4.9
Property management	25.5	16.2	16.3	25.3	11.3	15.6
Other	10.5	8.1	10.1	8.9	8.2	10.6

•	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Number of establishments						
1	4.6	3.6	4.5	2.7	3.0	2.3
2 to 5	6.0	5.5	5.8	5.5	4.5	3.4
6 to 10	11.5	7.9	9.2	8.8	6.1	5.6
11 to 20	18.0	8.9	10.3	14.6	4.8	9.4
More than 20	18.6	10.1	11.7	14.3	6.1	5.2
Currently unoccupied	18.7	16.5	0.0	13.6	0.0	0.0
Campus or complex activity						
Not part of a campus or complex	4.3	3.7	4.0	3.2	2.7	2.0
Primary or secondary school	12.1	9.4	11.1	8.0	6.1	5.0
College or university	21.8	15.9	17.1	19.6	9.0	16.6
Office complex	12.7	10.0	11.6	12.6	4.8	11.2
Retail complex	13.2	9.2	10.7	11.1	6.4	6.9
Storage complex	14.4	11.0	17.9	10.0	14.3	8.2
Religious campus or complex	11.5	12.0	21.0	7.3	18.9	12.2
Health care complex	18.0	8.2	8.8	15.9	5.4	10.5
Lodging or resort complex	15.1	13.7	20.4	15.6	17.8	8.7
Transportation complex	34.3	33.2	31.7	43.6	22.2	17.0
Government complex	18.1	17.0	15.3	17.8	14.6	14.0
Other	9.2	7.4	9.8	8.6	7.3	9.5
Predominant exterior wall material						
Brick, stone, or stucco	5.3	3.9	4.9	3.4	2.5	3.0
Concrete (block or poured)	5.3	4.8	4.5	5.1	4.2	3.3
Concrete panels	12.1	8.4	10.8	11.5	8.4	7.0
Siding or shingles	7.3	9.3	10.5	6.5	8.3	5.3
Metal panels	7.6	6.0	8.5	5.5	6.4	5.8
Window glass	21.3	11.4	14.3	20.7	7.0	5.6
Other	14.7	13.7	17.3	12.3	11.0	11.6
Predominant roof material						
Metal surfacing	6.2	5.6	6.6	3.5	4.2	4.1
Synthetic or rubber	6.0	4.1	5.5	4.7	3.2	3.0
Built-up	7.7	4.8	4.6	6.4	3.5	4.0
Slate or tile shingles	10.1	10.1	11.0	7.3	8.8	5.5
Wooden materials (including						
shingles)	12.9	17.8	16.1	12.6	12.7	9.3
Asphalt, fiberglass, or						
other shingles	6.2	5.6	7.1	4.1	5.3	5.0
Concrete	20.6	11.9	12.6	17.5	10.9	14.8
Other	15.6	9.8	13.1	12.0	9.4	10.4

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Roof tilt						
Flat	4.9	3.3	3.9	4.1	2.3	3.0
Shallow pitch	5.0	4.8	4.8	3.8	3.2	3.4
Steeper pitch	7.5	5.7	7.4	4.1	6.1	3.9
Cool roof characteristics (more than one may apply)						
White or reflective coating or paint	5.8	4.4	5.5	5.1	3.1	3.5
White or reflective tiles or shingles	15.4	10.4	10.2	13.0	7.1	8.1
Aluminum coating	8.8	9.2	8.2	6.8	6.3	6.5
Ballasted roof system	14.8	9.5	9.8	13.9	6.7	10.2
Other cool roof property	29.3	19.2	26.3	28.7	13.6	17.8
Renovations since 2000 (more than one may apply)						
Any type of renovation	5.0	3.4	3.5	3.7	2.7	3.0
Addition or annex	9.4	6.0	5.7	7.6	4.7	4.8
Reduction in floorspace	22.2	13.2	18.0	20.4	10.7	12.7
Roof replacement	6.8	4.3	5.0	5.2	3.8	4.9
Interior wall reconfiguration	6.0	4.2	4.5	4.9	3.1	3.3
Window replacement	9.5	5.8	6.5	8.6	4.6	6.6
HVAC equipment upgrade	7.0	4.2	4.0	5.4	2.9	4.9
Lighting upgrade	5.9	3.9	3.8	4.5	2.8	3.0
Electrical upgrade	7.1	5.6	5.2	6.1	3.8	4.3
Plumbing system upgrade	7.8	5.2	5.3	6.9	3.4	4.8
Insulation upgrade	9.2	7.8	8.8	9.7	5.2	6.7
Fire, safety, or security upgrade	6.2	4.4	4.7	5.3	3.4	3.6
Structural upgrade	13.9	10.2	10.5	14.0	7.4	8.5
Other	29.5	14.9	15.3	27.3	10.5	24.5
No renovations	4.3	3.9	4.8	2.8	2.4	3.0
Buildings constructed 2013 or later	11.9	8.3	11.6	10.1	8.7	6.9

	RSEs for number of	RSEs for total	RSEs for total	RSEs for mean square feet	RSEs for mean square feet per	RSEs for mean operating hours per
	buildings	floorspace	workers	per building	worker ^a	week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Energy sources						
(more than one may apply)						
Electricity	3.9	3.0	3.3	2.6	2.1	2.0
Natural gas	4.8	3.4	3.4	3.2	2.4	2.4
Fuel oil	9.7	5.4	5.9	9.1	3.5	5.1
District heat	14.7	11.4	10.2	12.3	5.9	5.6
District chilled water	20.1	13.7	13.4	15.7	7.2	6.1
Propane	10.0	7.6	8.4	8.4	4.9	5.8
Wood	24.8	21.5	21.8	17.6	16.1	11.9
Coal	78.7	76.5	69.2	100.5	78.6	166.2
Solar	15.5	11.5	13.0	13.9	6.2	10.0
Other	22.9	18.2	21.0	16.5	15.7	15.1
Space-heating energy sources (more than one may apply)						
Electricity	4.7	3.7	4.2	3.5	2.8	2.6
Natural gas	5.2	3.6	3.7	3.5	2.6	2.5
Fuel oil	13.9	11.6	14.6	12.2	9.4	6.9
District heat	15.4	11.6	10.1	12.9	6.1	5.9
Propane	13.5	13.1	14.4	11.2	8.6	9.1
Wood	27.2	27.3	26.5	12.1	18.8	10.7
Coal	62.8	64.3	62.8	6.6	6.6	0.0
Solar	90.2	61.7	69.1	362.5	109.1	49.3
Other	34.5	31.6	26.8	18.6	21.0	10.8
Primary space-heating						
energy source Electricity	6.4	5.5	5.6	4.2	4.3	3.4
Natural gas	5.5	4.1	4.0	3.7	2.8	2.7
Fuel oil	16.1	15.3	14.7	13.2	9.4	7.4
District heat	15.8		11.7	13.2		5.8
	17.5	12.6 16.9	19.2	11.4	6.3	14.1
Propane						
Wood	33.4	32.9	38.7	14.2	35.2	9.0
Coal	62.8	64.3	62.8	6.6	6.6	0.0
Solar Other	0.0 42.1	0.0 51.1	0.0 38.7	0.0 20.9	0.0 29.2	0.0 7.8
Cooling energy sources						
(more than one may apply)						
Electricity	3.9	3.0	3.2	2.7	2.1	1.9
Natural gas	37.3	24.2	20.7	46.6	18.5	28.6
District chilled water	20.1	13.7	13.4	15.7	7.2	6.1

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Water-heating energy sources (more than one may apply)						
Electricity	4.0	3.6	3.7	3.2	2.8	2.8
Natural gas	5.5	3.7	4.1	3.8	2.5	2.4
Fuel oil	24.0	15.4	22.2	22.1	14.6	15.7
District heat	17.4	12.8	12.0	13.9	6.7	8.4
Propane	15.8	14.7	17.5	12.1	11.2	10.1
Cooking energy sources (more than one may apply)						
Electricity	5.7	3.9	4.4	4.2	2.8	3.1
Natural gas	5.4	3.4	4.1	4.8	2.8	3.5
Propane	14.8	11.7	13.8	12.1	9.3	7.6
Energy end uses						
(more than one may apply)						
Buildings with space heating	4.1	3.0	3.3	2.8	2.2	1.8
Buildings with cooling	3.9	3.0	3.3	2.6	2.0	1.9
Buildings with water heating	3.9	2.9	3.3	2.6	2.1	1.9
Buildings with cooking	5.0	3.1	3.6	3.7	2.2	2.9
Buildings with manufacturing	11.3	7.9	9.7	10.6	6.3	4.7
Buildings with electricity						
generation	7.4	4.4	4.9	6.7	3.2	4.7
Buildings with lighting	3.9	3.0	3.3	2.7	2.1	1.9
Percentage of floorspace heated						
Not heated	8.2	10.0	13.0	5.8	9.5	7.2
1 to 50%	8.5	7.1	8.8	7.2	7.1	4.9
51 to 99%	6.7	5.3	5.8	5.6	4.0	3.7
100%	4.1	3.2	3.7	2.9	2.6	2.1
Percentage of floorspace cooled						
Not cooled	7.1	8.0	10.8	5.9	9.9	7.3
1 to 50%	5.9	5.2	5.1	5.2	3.6	3.1
51 to 99%	6.6	5.1	5.6	5.1	3.1	3.1
100%	4.3	3.5	4.3	3.2	3.0	2.6
Percentage lit when open						
0%	35.1	38.5	48.3	25.5	41.5	13.4
1 to 50%	6.7	6.0	6.9	5.1	7.0	3.3
51 to 99%	4.8	3.6	4.3	3.8	2.5	2.7
100%	4.7	3.8	4.1	3.8	2.8	2.7
Building never open or electricity	44.6	42.4	24.6	7.4	46.0	47.0
not used	11.6	12.1	21.4	7.1	16.0	17.9

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Percentage lit during off hours						
0%	6.5	6.7	6.9	3.9	5.0	4.6
1 to 50%	3.8	3.0	3.6	2.8	2.3	2.0
51 to 100%	10.6	6.7	8.1	10.4	6.1	9.1
Building always open with						
no off hours	15.2	11.6	12.7	14.5	11.7	0.0
Electricity not used	16.0	17.6	29.5	10.1	23.1	15.1
Heating equipment (more than one may apply)						
Packaged heating units	4.0	3.6	3.8	3.2	2.9	2.2
Furnaces	7.2	5.7	6.8	5.2	4.8	4.0
Individual space heaters	5.9	4.8	6.3	4.2	4.2	2.8
Boilers	6.2	4.0	4.6	5.2	2.8	3.5
Heat pumps	7.7	5.4	5.7	6.3	4.1	5.1
District heat	15.4	11.6	10.1	12.9	6.1	5.9
Duct reheat	12.6	7.0	8.1	11.4	5.0	9.2
Other	46.4	24.1	25.7	41.4	13.0	17.9
Cooling equipment (more than one may apply)						
Packaged air-conditioning units	4.3	3.4	3.6	3.4	2.6	2.3
Residential-type central air						
conditioners	7.6	5.2	5.9	4.9	3.9	4.6
Individual air conditioners	6.6	5.3	5.8	5.4	4.4	3.7
Central chillers	9.0	5.0	5.1	8.4	3.1	4.8
Heat pumps	11.0	6.8	7.4	9.6	5.3	6.7
District chilled water	20.1	13.7	13.4	15.7	7.2	6.1
Swamp coolers	12.8	13.1	14.2	11.3	10.1	11.2
Other	53.2	36.4	43.3	67.0	14.4	23.8
HVAC features (more than one may apply)						
Economizer cycle	5.6	3.9	4.6	5.2	2.8	3.3
Variable air volume (VAV) system	8.4	4.9	5.7	7.1	3.0	3.8
Dedicated outside air system (DOAS)	11.0	7.8	9.0	10.1	5.7	7.4
Demand controlled ventilation (DCV)	8.8	5.5	7.2	7.7	5.2	6.0
Regular HVAC maintenance	4.2	3.2	3.7	2.9	2.3	1.7
Building automation system (BAS)						
controls heating or cooling	6.4	3.7	4.5	5.0	2.5	2.9
Internet-connected or smart						
thermostat	12.2	10.5	13.9	8.6	8.6	6.5
Programmable thermostat	4.7	5.4	5.2	3.8	4.2	3.2

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Main equipment replaced since 2000 (more than one may apply)						
Heating	4.9	3.8	4.0	3.7	3.0	3.3
Cooling	4.8	4.3	5.1	4.4	3.3	3.3
Water-heating equipment						
Centralized system	4.4	3.4	4.2	2.7	2.5	2.4
Distributed system	8.9	6.4	7.6	6.7	4.8	3.8
Combination of centralized and distributed systems	8.8	5.2	6.1	7.2	4.4	5.3
Generation technologies (more than one may apply)						
Reciprocating engine generators	8.8	4.8	5.1	8.1	3.6	5.6
Solar panels	15.4	11.5	13.3	13.6	6.4	9.8
Other generation technology	21.4	14.4	16.6	16.9	8.6	10.7
Lighting equipment types (more than one may apply)						
Incandescent	7.8	4.5	5.9	6.2	4.0	4.5
Standard fluorescent	4.2	3.4	3.6	2.8	2.3	2.3
Compact fluorescent	5.2	4.2	5.1	4.5	2.7	3.3
High-intensity discharge (HID)	9.8	7.1	8.0	9.1	5.4	7.7
Halogen	8.0	4.2	4.5	7.6	4.1	4.8
LED	3.6	2.9	3.6	3.0	2.3	2.1
Other	57.3	24.1	35.0	71.8	19.9	10.3
Refrigeration equipment (more than one may apply)						
Any refrigeration	4.1	3.0	3.5	2.8	2.2	1.8
Walk-in units	5.4	3.4	3.8	4.8	2.5	2.1
Cases or cabinets	5.8	3.7	4.1	4.6	2.8	3.0
Large cold storage areas	17.2	11.3	11.7	16.6	6.6	6.3
Commercial ice makers	5.5	3.5	4.4	4.7	2.8	2.6
Residential-type or compact units	4.3	3.2	3.8	3.1	2.5	2.1
Vending machines	6.1	3.8	4.5	5.0	2.8	2.5
No refrigeration	5.3	5.3	6.8	4.6	6.4	5.3

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Office equipment (more than one may apply)						
Desktop computers	4.0	2.9	3.4	2.7	2.1	1.8
With multiple monitors	5.0	3.5	4.1	3.9	2.3	2.8
Laptop computers	4.0	3.0	3.6	2.9	2.3	2.0
Dedicated servers	4.9	3.3	3.7	4.1	2.5	2.3
Tablets charged in building	4.4	3.3	4.1	3.7	2.2	2.7
Large floor-standing office devices ^c	4.4	3.0	3.6	3.7	2.3	2.3
Smaller desktop office devices ^c	4.1	3.1	3.7	2.7	2.2	1.9
Interactive whiteboards	8.7	4.5	5.2	7.5	3.4	4.2
Televisions or video displays	3.8	3.0	3.7	3.0	2.4	1.8
Point-of-sale devices or cash						
registers	5.2	3.4	4.0	4.4	2.8	2.4
Food preparation or serving areas in non-food service buildings (more than one may apply)						
Snack bar, concession stand, or coffee						
shop	11.0	6.7	8.5	11.3	5.0	6.2
Fast food or small restaurant	9.4	5.9	7.0	9.9	4.9	5.1
Cafeteria or large restaurant	7.7	4.6	5.5	7.2	3.8	5.6
Commercial kitchen or						
food preparation area	8.5	4.4	5.0	7.3	3.0	5.1
Small kitchen area	6.5	4.7	5.9	5.1	3.6	4.3
Separate computer areas (more than one may apply)						
Server closet	5.3	3.4	3.7	4.4	2.5	2.2
Data center	13.1	6.7	6.3	13.4	4.7	10.0
Computer-based training room	8.4	4.6	5.0	7.6	3.2	4.2
Student or public computer center	8.0	4.6	5.2	8.4	3.2	4.7

	RSEs for number of buildings	RSEs for total floorspace	RSEs for total workers	RSEs for mean square feet per building	RSEs for mean square feet per worker ^a	RSEs for mean operating hours per week
All buildings	3.9	3.1	3.3	2.6	2.1	2.1
Window and interior lighting features (more than one may						
apply)	1.2		2.7	2.0	2.4	2.4
Multipaned windows	4.2	3.2	3.7	2.9	2.4	2.1
Tinted window glass	4.2	3.4	3.9	3.5	2.6	2.9
Reflective window glass	7.0	5.6	5.6	5.6	3.5	4.1
External overhangs or awnings	5.0	4.5	4.3	3.6	2.6	3.2
Skylights or atriums	7.1	4.5	6.1	7.1	4.5	3.7
Light scheduling	5.2	4.1	4.9	4.6	2.9	3.2
Occupancy sensors	6.5	3.8	4.5	5.3	2.5	2.8
Multilevel lighting or dimming	10.0	6.6	8.0	7.9	4.6	5.9
Daylight harvesting	12.0	6.3	8.3	11.2	5.1	7.3
Plug-load control	18.4	12.2	14.5	19.6	10.0	12.4
Demand responsive lighting	30.7	15.2	14.2	23.2	11.5	20.6
Building automation system (BAS) for						
lighting	9.3	5.2	6.2	8.0	4.1	5.0
Electric vehicle (EV) charging						
Charging stations associated with the						
building	11.5	7.2	9.2	11.1	6.2	7.2

Data source: U.S. Energy Information Administration, Forms EIA-871A of the 2018 Commercial Buildings Energy Consumption Survey

Note: RSE is a measure of the reliability or precision of a survey statistic. Variability occurs in survey statistics because the different samples that
could be drawn would each produce different values for the survey statistics. Estimation of Standard Errors and What is a Relative Standard

Error (RSE)? contain more information on how RSEs are estimated and used. Both references can be accessed from

https://www.eia.gov/consumption/commercial/survey-background-technical-information.php.

^aBuildings with zero workers are excluded from this column.

^bClimate zones are based on ASHRAE Standard 169-2021; see https://www.eia.gov/consumption/commercial/maps.php#defined.

^cOffice devices refers to any combination of printers, copiers, scanners, or FAX machines.