



## APPENDIX TABLE 8-20

## USPTO patents granted in analysis of biological materials, by region, country, or economy: 2000-16

(Number)

Region, country, or economy	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
World	852	958	880	874	866	707	954	980	1,010	1,029	1,519	1,519	1,522	1,697	1,722	1,747	1,757
North America	572	658	593	606	597	498	639	663	656	668	965	951	939	1,021	989	1,022	1,019
Canada	33	36	31	38	34	19	34	35	33	28	47	44	48	47	39	51	45
Mexico	0	0	0	0	2	0	0	0	0	1	1	1	0	1	2	2	1
Puerto Rico	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
United States	539	622	562	568	562	478	605	628	623	639	917	905	891	973	948	969	972
All others	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Central and South America	2	3	2	3	4	2	4	1	1	1	1	3	3	6	6	5	3
Argentina	1	0	0	0	1	0	1	0	0	0	0	1	0	0	2	1	1
Brazil	0	1	0	2	2	1	2	0	1	1	0	2	2	2	3	1	1
All others	1	2	2	0	0	2	1	1	0	0	0	0	1	3	1	4	1
Europe	192	190	183	177	165	125	179	184	177	189	300	298	295	353	401	363	366
EU	181	176	173	166	150	118	170	172	164	176	284	280	269	329	374	334	330
Austria	3	4	4	3	3	1	1	4	3	3	8	5	11	9	11	9	7
Belgium	4	4	3	10	6	3	10	8	9	9	11	14	9	10	19	14	14
Denmark	8	6	10	9	6	6	4	5	4	1	8	10	8	11	11	11	9



Region, country, or economy	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
Finland	6	10	10	5	4	5	5	2	5	6	9	6	10	5	6	11	9
France	30	23	25	22	18	22	33	25	29	26	41	38	38	54	64	55	58
Germany	58	67	57	54	53	31	52	54	47	66	109	102	90	114	109	98	97
Hungary	0	1	0	0	0	0	1	0	1	0	1	0	1	1	2	1	1
Ireland	2	2	2	1	1	0	3	1	0	0	1	2	2	5	2	3	2
Italy	5	3	4	6	4	3	4	4	7	6	10	12	11	13	17	13	15
Netherlands	9	6	4	8	8	5	3	8	9	11	13	14	12	12	22	24	15
Spain	1	1	2	3	1	1	1	3	6	6	3	3	4	4	7	9	11
Sweden	16	11	14	11	13	10	11	17	11	11	16	21	20	17	26	17	25
United Kingdom	37	37	37	33	31	31	41	40	33	29	51	49	49	67	73	66	60
All others	1	1	0	0	1	1	1	1	1	2	4	4	2	7	6	3	7
Other Europe	12	13	11	10	15	7	9	13	13	13	16	19	26	23	27	30	36
Former Soviet Union	0	0	0	1	0	0	0	0	1	0	0	0	1	1	0	0	0
Norway	2	4	1	2	3	2	0	4	4	4	1	4	8	5	5	5	6
Russia	1	1	1	4	1	0	0	2	2	1	3	1	1	4	3	3	4
Switzerland	6	7	8	4	11	4	7	6	6	7	11	14	15	14	17	20	24
All others	2	1	0	0	0	0	1	0	1	1	1	0	1	0	2	2	2
Asia	68	87	82	72	84	70	107	112	154	144	223	237	252	272	285	304	313
China	0	2	2	2	2	0	2	4	9	6	18	12	25	18	27	26	30





EU = European Union; USPTO = U.S. Patent and Trademark Office.

**Note(s)**

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Patents are allocated according to patent inventorship information. Patents are fractionally allocated among regions, countries, or economies based on the proportion of residences of all named inventors. The EU includes 28 member countries. China includes Hong Kong. Patents are classified under the World Intellectual Property Organization (WIPO) classification of patents, which classifies International Patent Classification (IPC) codes under 35 technical fields. IPC reformed codes take into account changes that were made to the WIPO classification in 2006 under the eighth version of the classification and were used to prepare these data. However, because PatentsView only provides the original IPC codes as they appeared on patents and not the IPC reformed codes, current Cooperative Patent Classification codes on patents were converted back to the most recent IPC classification to prepare these statistics. Fractional counts of patents were assigned to each technological field on patents to assign the proper weight of a patent to the corresponding technological fields under the classification.

**Source(s)**

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Science-Metrix; PatentsView and USPTO patent data, accessed April 2017.

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