

World Intellectual Property Indicators 2020



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World Intellectual Property Organization
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CH-1211 Geneva 20, Switzerland

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Foreword

Our shared human drive to innovate and create is a primary force for positive change – for economic, cultural and social advancement. The tools of the modern intellectual property (IP) system – patents, trademarks, designs, geographical indications, copyright and others – ensure that those sparks of genius are channeled to market as life-enhancing products. As the United Nations agency promoting the worldwide use of IP, one element of WIPO's mandate is to craft knowledge products that document the latest trends in IP, innovation and creativity to promote the use of IP for the benefit of all.

That is why each year we produce our unique, benchmark *World Intellectual Property Indicators* (WIPI) report, which draws on WIPO's central position in the global IP system to collect and analyze IP data from some 150 national and regional offices around the world.

The *World Intellectual Property Indicators 2020* report covers 2019 data, predating the human and economic shock of the COVID-19 pandemic. What this year's WIPI documents, however, is a strong foundation of IP activity that will serve as a base for new advancements as the pandemic subsides.

In 2019, trademark and industrial design filing activity increased by 5.9% and 1.3%, respectively. A 3% decline in global patent applications, the first fall in a decade, was driven by a drop in filings by Chinese residents amidst an overall shift in regulations there aimed at optimizing application structures. Excluding China, global patent filings rose 2.3% – the highest rate of growth in years.

The rich data and insights contained in this report are of critical value to a broad audience. Policy makers use it to understand a competitive global economic environment. IP offices, as well as WIPO, use the figures to guide their operational planning. Researchers rely on our findings to understand which technologies are being developed, and where. The private sector and IP professionals can benefit from data in the WIPI identifying trends affecting their industry and the economy at large. I sincerely hope all WIPI readers find this report illuminating.

I would like to thank our member states, as well as national and regional IP authorities, for sharing their annual statistics with WIPO – especially in light of the many constraints due to the pandemic's containment measures. Their invaluable cooperation makes the *World Intellectual Property Indicators* possible.



Daren TANG
Director General

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Further information

Online resources

The electronic version of this report and the underlying data can be downloaded at www.wipo.int/ipstats. This webpage also provides a link to the IP Statistics Data Center, offering access to WIPO's statistical data.

Contact information

Economics and Statistics Division
Website: www.wipo.int/ipstats
e-mail: ipstats.mail@wipo.int

Key numbers

Patents	2018	2019	Growth rate (%)	Share of world total (%)
Applications worldwide	3,325,400	3,224,200	-3.0	100.0
China	1,542,002	1,400,661	-9.2	43.4
U.S.	597,141	621,453	4.1	19.3
Japan	313,567	307,969	-1.8	9.6

Utility models

Applications worldwide	2,146,600	2,341,180	9.1	100.0
China	2,072,311	2,268,190	9.5	96.9
Germany	12,307	11,668	-5.2	0.5
Russian Federation	9,747	10,136	4.0	0.4

Trademarks

Application class counts worldwide	14,314,000	15,153,700	5.9	100.0
China	7,365,352	7,833,081	6.4	51.7
U.S.	640,100	672,681	5.1	4.4
Japan	512,106	546,244	6.7	3.6

Industrial designs

Application design counts worldwide	1,343,800	1,360,900	1.3	100.0
China	708,799	711,617	0.4	52.3
EUIPO (EU office)	108,553	113,319	4.4	8.3
Republic of Korea	68,310	69,360	1.5	5.1

Plant varieties

Applications worldwide	19,880	21,430	7.8	100.0
China	5,760	7,834	36.0	36.6
Community Plant Variety Office (EU)	3,554	3,525	-0.8	16.4
U.S.	1,609	1,590	-1.2	7.4

Source: WIPO Statistics Database, September 2020.

Overview of IP filing activity

Table 1. Ranking of total (resident and abroad) IP filing activity by origin, 2019

Origin	Patents	Marks	Designs	Origin	Patents	Marks	Designs
China	1	1	1	Bulgaria	59	43	36
U.S.	2	2	4	Morocco	69	48	22
Germany	5	4	2	Chile	40	32	76
Japan	3	3	8	Cyprus (b)	65	56	28
Republic of Korea	4	10	3	Colombia	54	36	60
France	6	6	6	Hungary	43	60	50
U.K.	7	7	9	Pakistan	62	35	57
Italy	11	13	5	Slovakia	56	54	59
India	10	8	13	Belarus	44	65	62
Switzerland	8	14	10	United Arab Emirates	51	51	71
Iran (Islamic Republic of)	20	5	12	Greece (b)	47	80	47
Russian Federation	12	9	17	Liechtenstein (a)	42	90	49
Turkey	22	11	7	Croatia	67	64	54
Netherlands	9	20	14	Sri Lanka	61	72	55
Australia	19	16	16	Peru	77	37	79
Spain	23	17	11	Slovenia (a, b, c)	58	79	58
Sweden	13	26	15	Uzbekistan	60	66	69
Canada	14	15	26	Bangladesh	94	69	39
Brazil	24	12	20	Mongolia	93	59	51
Austria (c)	16	24	25	Serbia	70	71	63
Poland (c)	29	23	18	Lithuania	74	73	65
Ukraine	33	21	19	Estonia	71	74	70
Denmark	18	40	21	Kazakhstan (a, c)	48	50	117
Belgium	17	34	30	Kenya	64	76	77
China, Hong Kong SAR	35	25	24	Azerbaijan	55	83	80
Mexico	32	18	38	Malta	63	77	83
Indonesia	30	27	33	Syrian Arab Republic	86	62	78
Thailand	39	29	23	Republic of Moldova	87	86	56
Czech Republic	34	31	29	Latvia	78	81	73
Portugal	37	30	27	Monaco	81	68	84
Singapore	26	28	40	China, Macao SAR	80	94	67
Viet Nam	49	19	31	Madagascar	..	95	66
Israel	15	55	32	Barbados (c)	52	109	82
Finland	21	46	37	Armenia	76	82	93
Luxembourg	31	49	35	Ecuador	113	52	88
Argentina	50	22	45	Georgia	94	89	75
Norway	28	47	43	Costa Rica	89	61	110
New Zealand	36	39	46	Côte d'Ivoire (a, b, c)	68	108	85
Egypt	45	45	34	Iceland	72	98	91
Saudi Arabia	25	42	60	Algeria (b)	88	138	41
South Africa	41	44	42	Mauritius	101	85	81
Malaysia	38	38	53	Qatar (c)	83	97	90
Philippines	53	33	44	Cameroon (a, b, c)	57	116	98
Ireland (b)	27	53	52	Oman	109	58	106
Romania	46	41	48	Bosnia and Herzegovina	106	104	68

Origin	Patents	Marks	Designs
Cuba	89	87	103
Sudan (c)	72	100	109
Panama	104	70	108
Yemen	105	84	95
Jordan	112	88	87

Origin	Patents	Marks	Designs
Jamaica	122	92	74
Nigeria (a, c)	134	57	101
Antigua and Barbuda (a, b)	66	133	..
Senegal (a, b, c)	75	122	105
Dominican Republic	114	67	122

Note: Rankings are based on the total numbers of applications filed by origin. Patent data refer to numbers of equivalent patent applications. Trademark data refer to numbers of equivalent trademark applications based on class counts – that is, the number of classes specified in applications. Industrial design data refer to numbers of equivalent industrial design applications based on design counts – that is, the number of designs contained in applications. This table lists those origins for which at least two types of IP filing data are available.

(a) Data on patent applications at the national IP office are not available.

(b) Data on trademark applications at the national IP office are not available.

(c) Data on industrial design applications at the national IP office are not available.

Source: WIPO Statistics Database, September 2020.

Table 2. Ranking of resident IP activity by origin, 2019

Origin	Patents	Marks	Designs
China	1	1	1
U.S.	2	3	8
Japan	3	2	9
Germany	5	7	3
Republic of Korea	4	10	2
France	6	6	5
India	8	5	12
Iran (Islamic Republic of)	11	4	11
Italy	10	13	4
Turkey	14	8	6
U.K.	9	12	7
Russian Federation	7	9	15
Brazil	16	11	16
Netherlands	13	21	13
Spain	22	15	10
Switzerland	12	24	19
Ukraine	26	19	14
Poland	18	22	..
Australia	25	17	20
Indonesia	23	23	25
Sweden	15	34	22
Austria	17	33	..
Canada	19	16	42
Mexico	31	14	33
Portugal	34	25	21

Origin	Patents	Marks	Designs
Viet Nam	39	18	24
Thailand	38	29	18
Denmark	20	47	23
Belgium	21	41	32
Czech Republic	35	35	27
Egypt	33	38	26
Argentina	45	20	35
Philippines	43	26	34
Romania	37	37	37
China, Hong Kong SAR	52	31	29
Finland	24	53	38
Malaysia	32	39	44
South Africa	40	40	36
Saudi Arabia	28	36	55
Morocco	61	43	17
Ireland	36	..	46
Norway	29	46	49
Greece	44	..	39
Singapore	27	50	53
Bulgaria	58	44	30
Pakistan	54	28	50
Colombia	48	32	56
Israel	30	72	41
Algeria	67	..	31
Hungary	42	63	43

WORLD INTELLECTUAL PROPERTY INDICATORS 2020

Origin	Patents	Marks	Designs
New Zealand	53	42	57
Luxembourg	41	66	47
Chile	46	27	82
Sri Lanka	51	61	48
Bangladesh	76	57	28
Peru	63	30	69
Slovakia	56	54	54
Mongolia	74	52	40
Uzbekistan	50	58	61
Croatia	59	62	52
Belarus	49	67	58
Kenya	55	64	66
Cyprus	79	..	45
Syrian Arab Republic	64	56	67
Lithuania	65	70	60

Origin	Patents	Marks	Designs
Republic of Moldova	72	79	51
Azerbaijan	60	76	68
Ecuador	87	45	75
Serbia	62	78	69
Madagascar	..	82	59
Estonia	75	73	65
United Arab Emirates	70	65	80
Georgia	72	81	63
Latvia	68	86	64
Sudan	57	92	..
Liechtenstein (a)	47	108	71
Armenia	66	75	87
Panama	83	69	..
Yemen	77	71	84
Oman	84	51	99

Note: Rankings are based on the numbers of resident applications filed by origin. Patent data refer to numbers of equivalent patent applications. Trademark data refer to numbers of equivalent trademark applications based on class counts – that is, the number of classes specified in applications. Industrial design data refer to numbers of equivalent industrial design applications based on design counts – that is, the number of designs contained in applications. This table lists origins for which at least two types of IP filing data are available.

(a) Data on patent applications at the national IP office are not available.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

Patents

Highlights

Patent applications worldwide decreased by 3% in 2019 – the first decline since the 2009 financial crisis

Applicants around the world filed 3.2 million patent applications in 2019. This represents a 3% decrease on the previous year and the first decline since the 2009 financial crisis (figure 1.1). A substantial decline in filings in China was the main driver of the decrease in the global total – the China patent office received around 141,300 fewer applications in 2019 than it had in 2018. Japan (-5,598), the Russian Federation (-2,446) and the United Kingdom (U.K.) (-1,691) also received considerably fewer applications in 2019.

Of the 3.2 million applications filed worldwide in 2019, resident applicants filed 2.2 million (69.2% of the total), while non-resident applicant filed the remaining million (30.8%). Resident share decreased from 71.5% in 2018 to 69.2% in 2019, mainly due to the fall in resident filings in China.

The long-term trend shows patent applications growing worldwide every year since 1995, apart from 2002, 2009 and 2019, when they decreased by 0.9%, 3.8% and 3%, respectively.

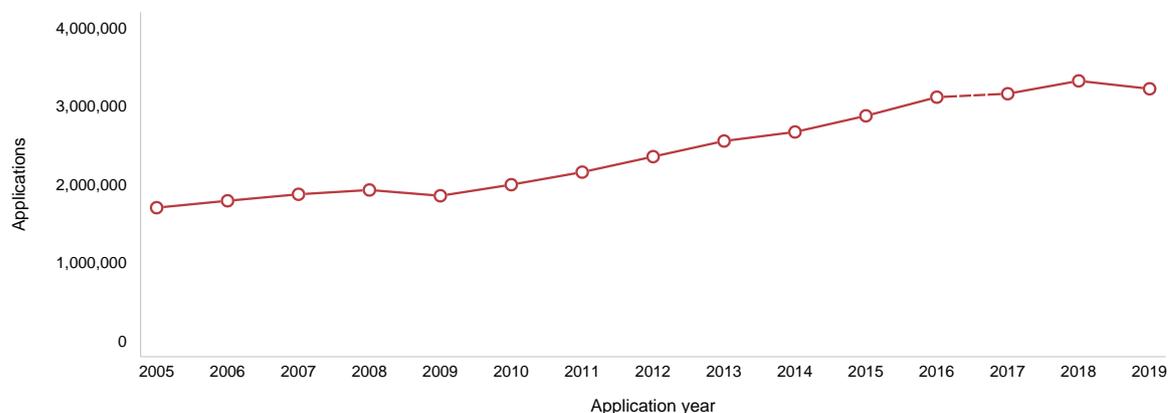
Despite a substantial decline, the China office received the highest number of patent applications in 2019

The National Intellectual Property Administration of the People's Republic of China (CNIPA) received 1.4 million patent applications in 2019. This is more than twice the amount received by the United States Patent and Trademark Office (USPTO). The USPTO ranked second, with 621,453 applications, followed by the Japan Patent Office (JPO), with 307,969 applications, the Korean Intellectual Property Office (KIPO), with 218,975 applications, and the European Patent Office (EPO), with 181,479 applications. Together, the top five offices accounted for 84.7% of the world total in 2019, which is 8.3 percentage points higher than their combined share for 2009. Among the top five offices, China's share of the world total has increased considerably over the past ten years – from 17% in 2009 to 43.4% in 2019.

The composition and ranking of the top 10 offices have both remained relatively stable since 2009. The top 10 offices has remained the same, except that in some years Australia has been among the top 10 offices, while in others it has lost its place to Brazil. In addition, China moved up from third position in 2009 to claim the top spot in 2011 and has continued to head the ranking for the past nine years. Figure 1.2 shows the patent applications received by the top 10 offices, broken down by resident and non-resident filings. The intellectual property (IP) offices of China (88.8%), Germany (69.2%), Japan (79.7%), the Republic of Korea (78.4%) and the Russian Federation (65.7%) received the bulk of their applications from resident applicants. In contrast, Australia (91.1%), Canada (88.4%) and India (63.7%) reported a large proportion of non-resident filings.

Patent applications filed worldwide amounted to 3.2 million in 2019

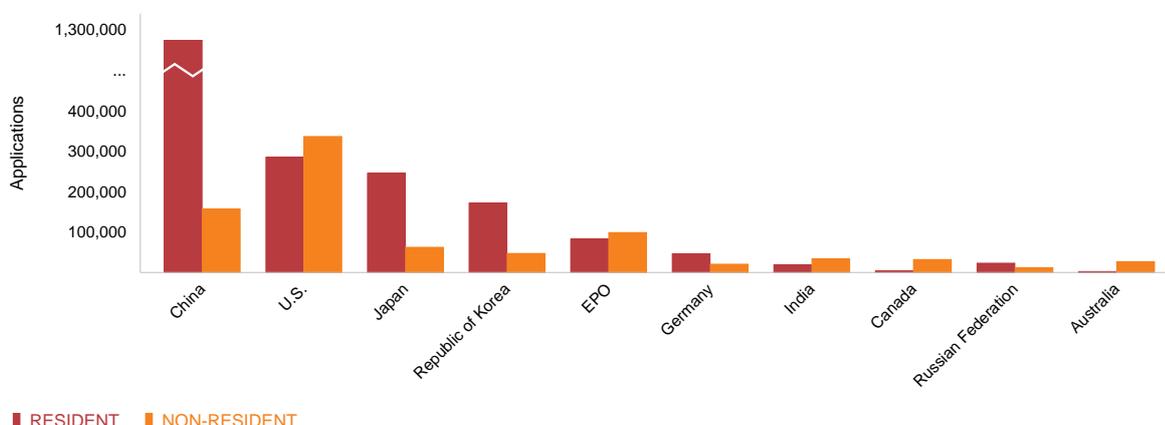
1.1. Patent applications worldwide, 2005–2019



Source: Figure A1.

China's office received more than twice the amount of applications received by the U.S.

1.2. Patent applications at the top 10 offices, 2019



Source: Figure A8.

Among the top five offices, the Republic of Korea (+4.3%), the EPO (+4.1%) and the U.S. (+4.1%) recorded a growth in applications in 2019; in contrast, both China (−9.2%) and Japan (−1.8%) saw a decline. After experiencing year-on-year growth for the past 24 years, China's office saw a sharp fall in filings in 2019. A marked decline in resident filings – from 1.4 million in 2018 down to 1.2 million – drove this fall in total filings. The patent office of Japan has experienced either falls in applications or negligible growth since 2005, mainly as a result of a persistent decline in resident applications. The EPO saw a third consecutive year of growth in 2019, while the U.S. office returned to growth following a decline the previous year. The Republic of Korea's office saw a second successive year of growth in applications.

Among the top 20 offices, 11 had a greater number of patent applications in 2019 than in 2018 (figure A9). The largest increases were in Singapore (+19.3%), Indonesia (+17.7%) and India (+7.1%). The strong growth seen in India and Indonesia was driven primarily by an increase in resident applications, whereas conversely a strong growth in non-resident applications was the main driver of total growth in Singapore.

Of the nine offices among the top 20 to have received fewer applications in 2019 than in 2018, China (−9.2%) reported the steepest decline, due mainly to a fall in resident applications. The U.K. (−8.1%), the Russian Federation (−6.4%) and the Islamic Republic of Iran (−5.3%) likewise recorded considerable annual drops. A fall in both resident and non-resident filings contributed to the total decrease in those offices.

Looking outside the top 20 offices to selected offices of low- and middle-income countries shows that the offices of Turkey (8,088), Malaysia (7,551) and South Africa (6,914) each received a high number of patent applications in 2019 (figure A10). In terms of growth rate, Honduras (+19.9%), Kenya (+17.1%), Bangladesh (+12.2%), Turkey (+8.3%) and Morocco (+7.6%) recorded a particularly rapid growth in 2019. An increase in non-resident applications was the main driver of total growth in Bangladesh and Morocco, whereas resident applications were the primary driver in Kenya and Turkey (figure A11). A resident versus non-resident breakdown is not available for Honduras.

Among regional offices, the African Regional Intellectual Property Organization (ARIPO) (+4.5%) reported strong growth, whereas the African Intellectual Property Organization (OAPI) (−6.7%) saw a substantial decrease. The Eurasian Patent Organization (EAPO) (−0.2%) saw a small decline. At most of the offices of low- and middle-income countries, the bulk of applications are filed by non-resident applicants. As a result, an overall increase or decrease in applications received by these offices is determined mainly by the filing behavior of non-resident applicants.

Offices located in Asia received 65% of all applications filed worldwide in 2019

Of the top 20 offices, nine were located in Asia, six in Europe, two each in North America and Latin America and the Caribbean (LAC), and one in Oceania. South

Africa is the highest ranked African office, in 25th place. Offices located in Asia received around 2.1 million applications in 2019, representing 65% of the world total (figure 1.3). The combined total for Europe and North America was just above the 1 million mark. Asia's share of all applications filed worldwide increased from 50.9% in 2009 to 65% in 2019. This was primarily driven by a strong growth in filings in China, accounting for 67% of all applications filed in the region. Offices in North America accounted for just over one-fifth of the 2019 world total, while those in Europe accounted for just above one-tenth. The combined share for Africa, LAC and Oceania was 3.3%. The shares of all the world's regions except Asia have gradually declined over the past decade due to the rapid growth in applications filed in China.

Included among the top 20 list were 12 offices located in high-income, seven in upper middle-income and one in lower middle-income countries. The distribution of applications by income group shows that the offices of high-income countries accounted for 49.4% all applications filed worldwide in 2019, while offices of upper middle-income countries accounted for 48%

of the total (table A5). There has been a sizeable shift in the distribution of applications toward the upper middle-income group in recent years, which is largely explained by the strong growth in filings in China and a decline in Japan. The overall share for offices of upper middle-income countries has almost doubled in the past ten years, growing from 24.2% in 2009 to 48% in 2019; however, excluding China from the upper middle-income group shows the share for the remainder of this income group to have actually declined from 7.2% in 2009 to 4.6% in 2019.

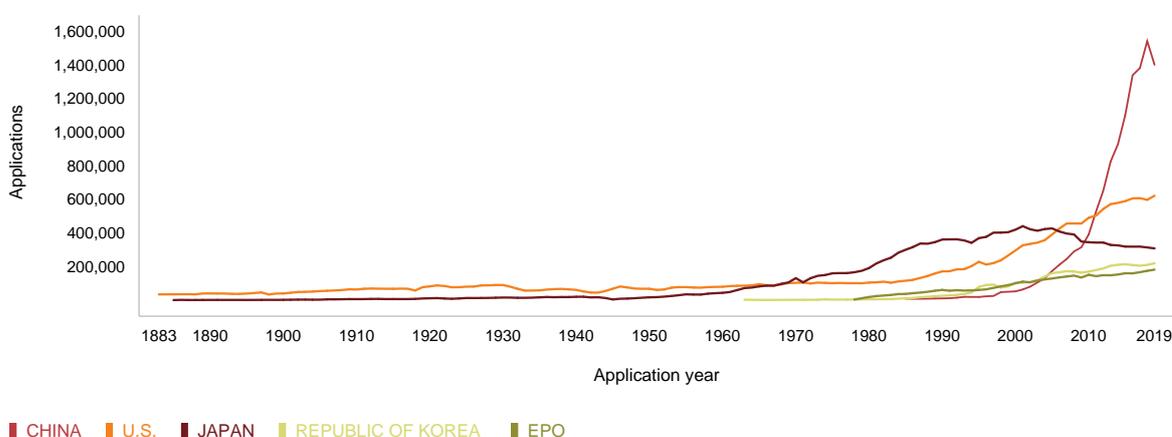
U.S. applicants filed around 236,000 patent applications abroad

Applications received by offices from resident and non-resident applicants are referred to as office data, whereas applications filed by applicants at a national/regional office (resident applications) or at foreign offices (applications abroad) are referred to as origin data. Here, patent statistics based on the origin of residence of the first named applicant are reported in order to complement the picture of patent activity worldwide.

Patent filings since 1883

From 1883 to 1963, the patent office of the U.S. was the leading office for world filings. Application numbers in Japan and the U.S. remained stable until the early 1970s, at which time Japan began to experience rapid growth – a pattern also observed for the U.S. from the 1980s onward. Among the top five offices, Japan surpassed the U.S. in 1968 and maintained top position until 2005. Since the early 2000s, however, the number of applications filed in Japan has followed a downward trend. Both the EPO and the Republic of Korea have seen increases each year since the early 1980s, as has China since 1995. China surpassed the EPO and the Republic of Korea in 2005, Japan in 2010 and the U.S. in 2011 – and it now receives the highest number of applications worldwide. There has been a gradual upward trend in the combined share of the top five offices in the world total – from 76.4% in 2009 to 84.7% in 2019.

Trend in patent applications for the top five offices, 1883–2019

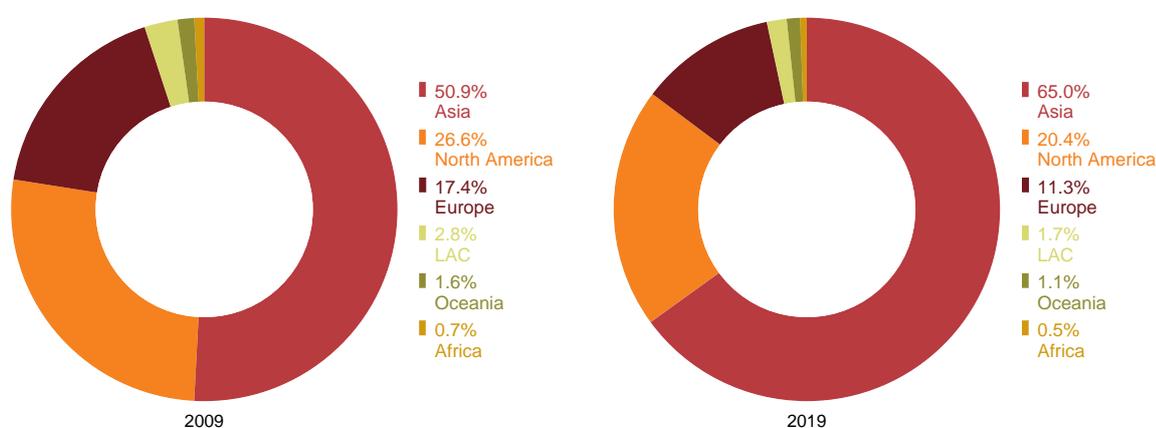


Note: The IP office of the Soviet Union – not represented in this figure – was the leading office globally in terms of filings from 1964 to 1969. Like Japan and the U.S., the office of the Soviet Union saw the amount of applications it received remain stable until the early 1960s, after which it recorded a rapid growth in applications filed.

Source: Figure A7.

Offices located in Asia received 65% of all patent applications filed worldwide

1.3. Patent applications by region, 2009 and 2019



Source: Table A6.

Equivalent application count

Applications at regional IP offices are equivalent to multiple applications in countries that are members of the organizations establishing those offices. In particular, to calculate the number of equivalent applications for the African Intellectual Property Organization (OAPI), the Eurasian Patent Organization (EAPO) and the Patent Office of the Cooperation Council for the Arab States of the Gulf (GCC Patent Office), each application is multiplied by the corresponding number of member states. For African Regional Intellectual Property Organization (ARIPO) and the European Patent Office (EPO) data, each application is counted as one application abroad, if the applicant does not reside in a member state, or as one resident application and one application abroad, if the applicant resides in a member state. The equivalent application concept is used to report data by origin.

Applicants from China filed around 1.3 million equivalent patent applications worldwide in 2019 (resident plus abroad filings). China was followed by the U.S. (521,145), Japan (452,130), the Republic of Korea (248,427) and Germany (178,184) (figure A18). However, the distribution of resident and abroad filings differs considerably between these offices. For example, only 6.3% of all applications from China are filed abroad. In contrast, filings abroad constitute 58.8% of total applications from Germany. For Japan (45.7%) and the U.S. (45.3%), filings abroad accounted for around 45% of all applications. Among the top 20 origins, applica-

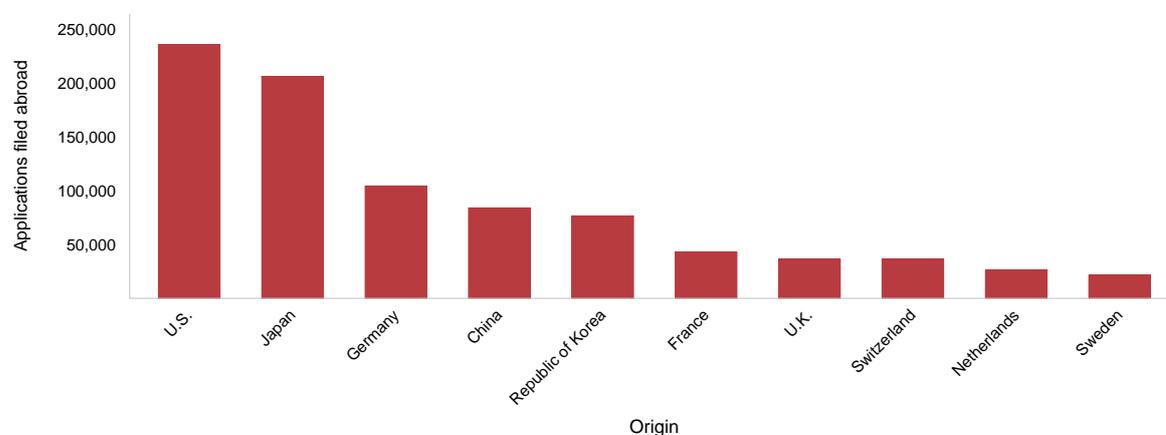
tions filed abroad made up more than 80% of the totals for Canada (82.7%) and Israel (91.5%), whereas less than one-third of total applications originating from China (6.3%), the Islamic Republic of Iran (1.2%), the Republic of Korea (30.9%) and the Russian Federation (20%) were filed abroad.

U.S. applicants filed the highest number of equivalent applications abroad (236,032) in 2019, followed by Japan (206,758), Germany (104,736), China (84,279) and the Republic of Korea (76,824) (figure 1.4). Filing abroad for Switzerland and the U.K. is of a similar magnitude – around 36,000 –, while that for Canada, Italy and Sweden ranged from 18,000 to 22,000. Among the 10 origins reported in figure 1.4, China (+21.2%), the Republic of Korea (+6%), Sweden (+3.5%) and the U.S. (+3.1%) saw a strong average annual growth in applications abroad between 2009 and 2019. For all other origins, growth ranged from between 0.4% to 2.7% over the same period.

The flow of non-resident applications between origins and offices shows U.S. applicants accounting for a large proportion of non-resident filings in Australia (48.4%), Canada (51.9%), the EPO (46.6%) and Mexico (47.7%). Applicants residing in Japan accounted for more than 30% of all non-resident applications filed in China (31.1%), Germany (38.2%) and the Republic of Korea (31.6%). German applicants accounted for one-quarter of all non-resident applications filed in France (25.6%) and Italy (25.1%) (table A19).

U.S. applicants filed the highest number of applications abroad

1.4. Patent applications filed abroad by the top 10 origins, 2019



Source: Figure A18.

The Republic of Korea continues to file the highest number of patents per unit of GDP

Variations in patenting activity across countries reflect differences in the size and the structure of their economies. It is therefore informative to examine resident patent activity with regard to population, research and development spending, gross domestic product (GDP) and other variables.

With 7,779 resident patent applications per unit of USD 100 billion GDP, the Republic of Korea continued to file the greatest number of patent applications (figure 1.5). China (5,520) had the second highest ratio in 2019, followed by Japan (4,691), Germany (1,642) and Switzerland (1,634). The U.S. (1,389), Sweden (1,130), Denmark (1,128), Finland (1,127) and the Netherlands (927) make up the other top 10 origins. Among the top 10 origins, China has seen a considerable improvement in its resident patent applications to GDP ratio, increasing from 2,133 in 2009 to 5,520 in 2019. Conversely, Japan has seen the biggest fall, with its ratio decreasing from 6,409 to 4,691 over the same period.

A number of countries with a low resident patent applications count, such as Austria, Denmark, Finland and Norway, rank among the top 20 origins, when resident patent applications are adjusted by GDP (figure A37). The list of top 20 origins is predominantly comprised of high-income countries; however, three middle-income countries – China, the Russian Federation and Ukraine – also feature. Large middle-income origins,

such as Brazil (177), India (211), Malaysia (118), Mexico (52) and South Africa (78), have a low resident patent applications per GDP ratio. In fact, Malaysia and South Africa has seen their ratio decline over the past five years. Malaysia's decreased from 169 in 2015 to 118 in 2019, while that of South Africa fell from 125 down to 78 over the same period.

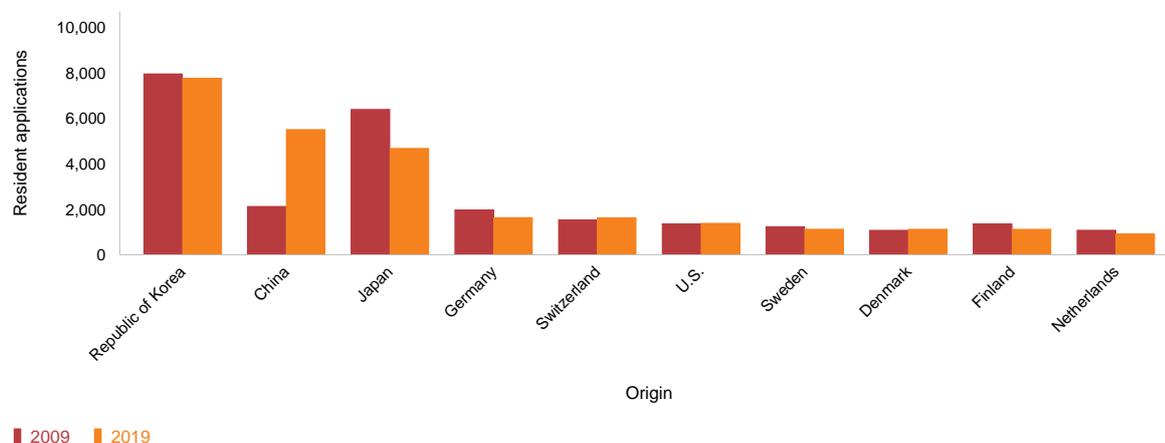
The profile of resident applications per million population is similar to that adjusted by GDP, but shows some subtle differences. The list of top 10 origins for resident applications per GDP and by population is the same, albeit with a different ranking. The Republic of Korea retains its lead when resident applications are expressed per population, Japan ranks second and Switzerland third, ahead of China and Germany (figure A38). Going beyond the top 10 origins, shows Israel, the Islamic Republic of Iran and Singapore to be among the top 20 origins for resident patent application per population, which was not the case for patents per GDP.

Patent filings for unique inventions grew by 11.4% in 2017 – a third consecutive year of double-digit growth

Patent applicants traditionally file at their national offices and then subsequently abroad. This means that some inventions are recorded more than once. To take this into account, WIPO has developed indicators for patent families, and the trend in patent families mirrors that for patent applications.

European origins occupy six of the top 10 spots for resident patent applications per unit of GDP

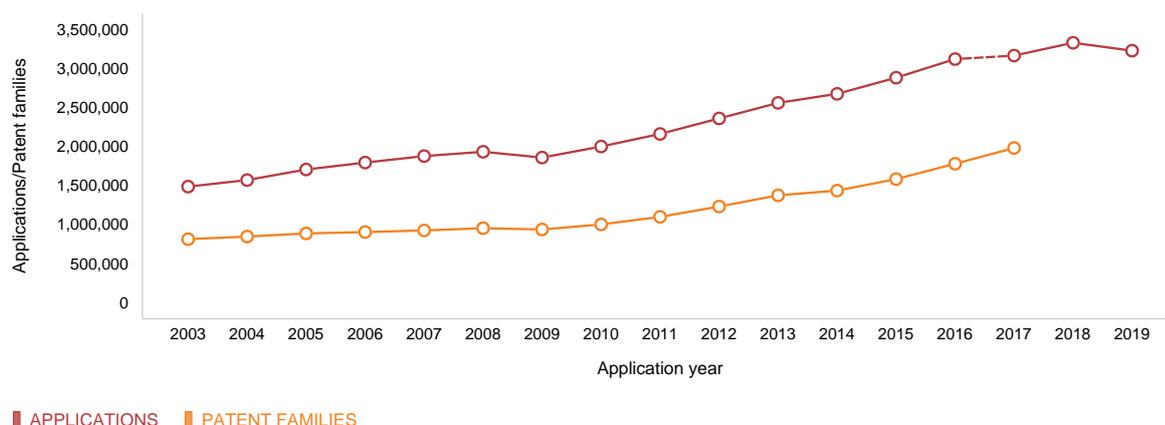
1.5 Resident patent applications per USD 100 billion GDP for the top 10 origins, 2009 and 2019



Source: Figure A37.

Patent filings for unique inventions reached 1.98 million in 2017

1.6. Patent applications and patent families worldwide, 2003–2019



Sources: Figures A1 and A23.

Patent families worldwide grew by 11.4% in 2017. This follows a 12.4% growth in 2016 and a 10.3% one in 2015. The total number of patent families worldwide amounted to 1.98 million in 2017 (figure 1.6). Applicants from China accounted for more than three-fifths of all patent families (62.7%) in 2016, followed by Japan (11.7%), the U.S. (8.3%) and the Republic of Korea (6.5%). However, as regards foreign-oriented patent families, the U.S. (167,080) and Japan (149,649) created by far the most such families for the period 2015–2016 (figure A26), and far more than Germany (56,378), the Republic of Korea (51,509) or China (46,619).

The size of a patent family (i.e., the number of offices where a patent is filed) reflects its geographical coverage. Around 85% of patent families created worldwide between 2015 and 2017 were filed at a single office (figure A24). There is considerable variation among top origins, however. For example, around three-fifths of total patent families originating from the Netherlands cover two or more offices. France (53.4%), Sweden (57.9%) and Switzerland (57.2%) had more than half of their patent families covering two or more offices, whereas this was the case for less than one-tenth of the patent families for China (2.1%), Brazil (8.5%) and the Russian Federation (4.1%).

Patent families

A patent family is a set of interrelated patent applications filed at one or more offices to protect the same invention. The patent applications in a family are interlinked by one or more of the following: priority claim, Patent Cooperation Treaty (PCT) national phase entry, continuation, continuation-in-part, internal priority and addition or division. A special subset comprises foreign-oriented patent families – that is, those patent families that have at least one filing office which differs from the office of the applicant's country of origin. Some foreign-related patent families include only one filing office, because applicants may choose to file only with a foreign office. For example, if a Canadian applicant files a patent application directly with the United States Patent and Trademark Office (USPTO) without having previously filed with the patent office of Canada, that patent family will constitute a foreign-oriented patent family with just one office.

Worldwide, patent applications relating to computer technology accounted for 7.3% of all published applications in 2018

In 2018 – the latest year for which complete data are available due to the delay between application and publication – computer technology was the most frequently featured technology in published patent applications worldwide, with 234,667 published applications (table A29). It was followed by electrical machinery (215,828), measurement (164,255), medical technology (147,542) and digital communication (146,416). Together, these five fields accounted for 28.4% of all published applications globally.

Among the top 10 technology fields, machine tools (+11.7%), other special machines (+11.4%) and chemical engineering (+11.4%) witnessed the fastest average annual growth between 2008 and 2018. Every top 10 technology field underwent a growth in published applications between 2008 and 2018, the slowest growth being for computer technology (+5.8%) and medical technology (+6.5%).

Among the top 10 origins in the period from 2016 to 2018, China and the U.S. filed most heavily in computer technology (figure A30); Japan and the Republic of Korea in electrical machinery; France and Germany in transport; Switzerland and the U.K. in pharmaceuticals; the Netherlands in medical technology; and the Russian Federation in food chemistry.

Among the large middle-income countries in the period from 2016 to 2018, applicants residing in India (18.1%

of total published applications) and Mexico (9.9%) filed most heavily in pharmaceuticals; Brazil (7.2%) in other special machines; Malaysia (7.4%) in computer technology; Thailand (15.9%) in optics; and Turkey (8.4%) in transport.

India's patent office granted 69.5% more patents in 2019 than in 2018

Offices carry out a formal and substantive examination before deciding whether to issue a patent. The procedure for granting a patent varies between offices, and differences in the numbers of patents granted among offices depend on factors such as examination capacity and procedural delays. For this reason, application data for a given year should not be compared with grant data from the same year.

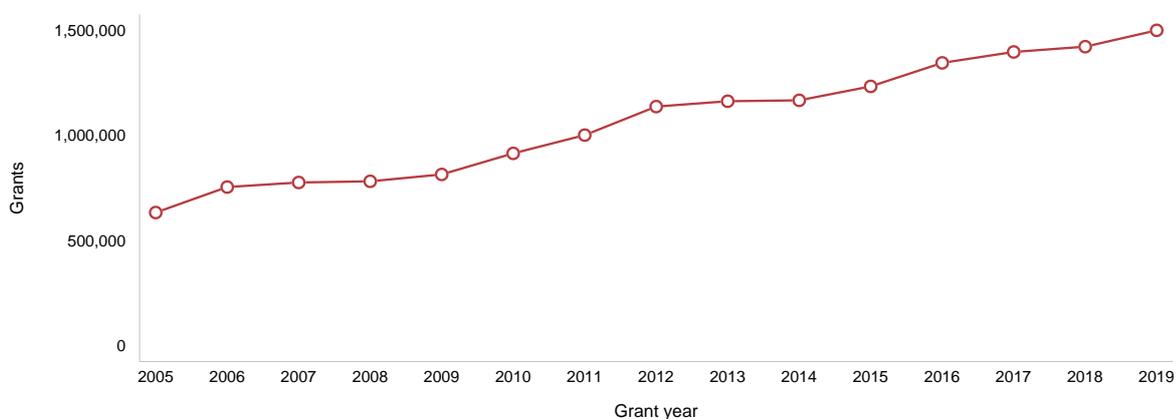
In 2019, an estimated 1.5 million patents were granted worldwide, up 5.5% on 2018 figures (figure 1.7). China (452,804) issued the highest number of patents in 2019, followed by the U.S. (354,430), Japan (179,910), the EPO (137,782) and the Republic of Korea (125,661) (figure A15). Among the top 10 offices, India granted 69.5% more patents in 2019 than it had in 2018. The U.S. (+15.2%) and Germany (+11.5%) also recorded a double-digit growth in patents granted in 2019. For both Germany and India, 2019 was a fourth successive year of growth. Strong growth moved India up three spots to seventh position in the ranking, while Germany remained in ninth position. The offices of Japan (–7.5%), the Russian Federation (–4.9%) and Australia (–0.3%) issued fewer patents in 2019 than in 2018. For Japan, this was a third successive year of decline in the number of patents granted – this reflects the downward trend in applications filed in Japan since the early 2000s.

Looking beyond the top 10 offices to the top 20 list, France granted 13,593 patents in 2019. Brazil (10,947) and Indonesia (10,514) each issued more than 10,500 patents (figure A15). The offices of Indonesia (+65%), Italy (+34.1%) and South Africa (+29.8%) recorded the fastest growth among the top 20 offices in 2019. In contrast, China, Hong Kong SAR (–29.7%) and Singapore (–19%) both experienced double-digit declines, mainly driven by a fall in non-resident grants.

Asia's share of worldwide patent grants was 55.3% in 2019. This is 1.8 percentage points below its 2018 share. Offices located in North America accounted for one-quarter (25.1%) of patent grants worldwide in 2019, while offices in Europe accounted for 16% of the world total (table A13). The combined share for Africa, LAC and Oceania was 3.7%.

Patents granted worldwide reached 1.5 million in 2019

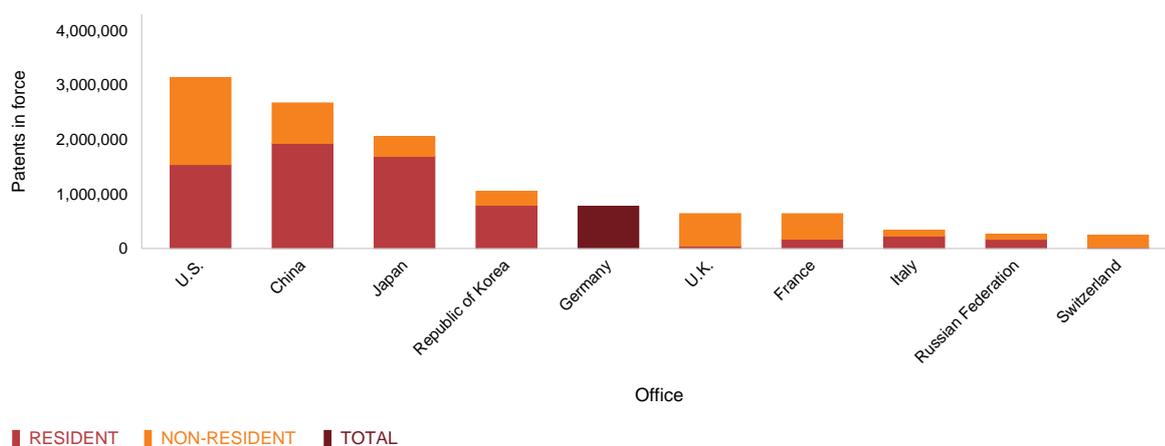
1.7. Patent grants worldwide, 2005–2019



Source: Figure A3.

3.1 million patents were in force in the U.S.

1.8. Patents in force at the top 10 offices, 2019



Source: Figure A40.

Around 15 million patents were in force globally in 2019

Patent rights generally last for up to 20 years from the date an application is filed. An estimated 14.9 million patents were in force across 127 jurisdictions in 2019, representing an increase of 7% on 2018 figures. In 2019, the highest number of patents in force was recorded in the U.S. (3.1 million), followed by China (2.7 million), Japan (2.1 million) and the Republic of Korea (1 million) (figure 1.8). However, the source of the patents in force in those jurisdictions differs considerably. More than half

of all patents in force in the U.S. originated from non-resident applicants, while resident applicants accounted for the bulk of patents in force in Japan (82.1%), the Republic of Korea (75.5%), and China (72.1%) (figure A40).

Holders must pay maintenance/renewal fees to maintain the validity of their patents, and may opt to let a patent lapse before the end of its full term. For the 86 offices that reported their in-force data broken down by year of filing, around 42.9% of patents granted remained in force for at least seven years after the filing date, and about 18.6% lasted the full 20 years (figure A41).

Although patents can be maintained for 20 years, the average age of patents varies across offices. For example, the average age of all patents in force in 2019 in Thailand was 12.7 years, while in the Republic of Korea and China it was 8.4 and 7.6 years, respectively. Along with Thailand, India (12.4 years), Viet Nam (11.8), Chile (11.6) and Germany (11.2) also had a high average age of patents in force (figure A42).

Patent examination outcomes vary greatly across offices

Patent offices examine applications and decide whether to grant patent rights. Examination processes differ across offices, which makes cross-country comparisons difficult. Every effort has, however, been made to compile examination outcome data based on common definitions and concepts.

The proportion of withdrawn or abandoned applications was largest in Thailand (71.8%), Ecuador (71.7%), the Philippines (57.1%) and India (54.2%). Around three-quarters of the applications examined in 2019 resulted in patents being granted at the offices of Australia, Japan and the Russian Federation. Morocco and the Republic of Korea also had a large proportion of patents granted for applications processed (figure A43).

Among 10 selected offices, China, India and the U.S. granted patents for fewer than 43% of all applications processed in 2019 (figure 1.9). The shares of rejected applications were highest in China, the Republic of Korea and the U.S.

The offices of China and the U.S. each had around 1 million pending patent applications in 2019

Patent offices must assess whether the claims made in applications meet the standards of novelty, non-obviousness and industrial applicability defined in national laws. Processing patents therefore consumes time and resources. The total number of potentially pending applications worldwide stood at 5.4 million in 2019, 4% fewer than in 2018. This estimate is based on data from 110 offices.

The USPTO had the highest number of pending applications (1.1 million) in 2019 (figure A44). It was followed by China (992,227), Japan (904,906), the EPO (587,510) and Germany (387,767). Among these five offices, China (+2.1%) and Germany (+1.8%) saw an increase in pending applications in 2019 compared to 2018,

whereas the EPO (–5.5%), Japan (–2%) and the U.S. (–1.6%) all managed to reduce their stock of pending applications. The Republic of Korea reduced its stock of pending applications by 31.9% in 2019.

Among selected middle-income countries, Brazil (185,499), India (153,265) and Mexico (51,269) had a substantial number of pending applications in 2019. However, all three – Brazil (–5.5%), India (–9.8%) and Mexico (–1.8%) – saw a reduction in pending applications in 2019 compared with a year earlier.

Pending applications

Pending applications are all patent applications, at any stage in the process, awaiting a final decision by a patent office, including those applications for which applicants have not filed a request for examination (where applicable).

China in 2019 surpassed the U.S. to become top filer of international patent applications

An international treaty administered by WIPO, the Patent Cooperation Treaty (PCT) allows applicants to seek patent protection for an invention simultaneously in a large number of countries by filing a single PCT international application. The granting of patents remains under the control of national and regional patent offices and is carried out in what is called the “national phase” or “regional phase.”

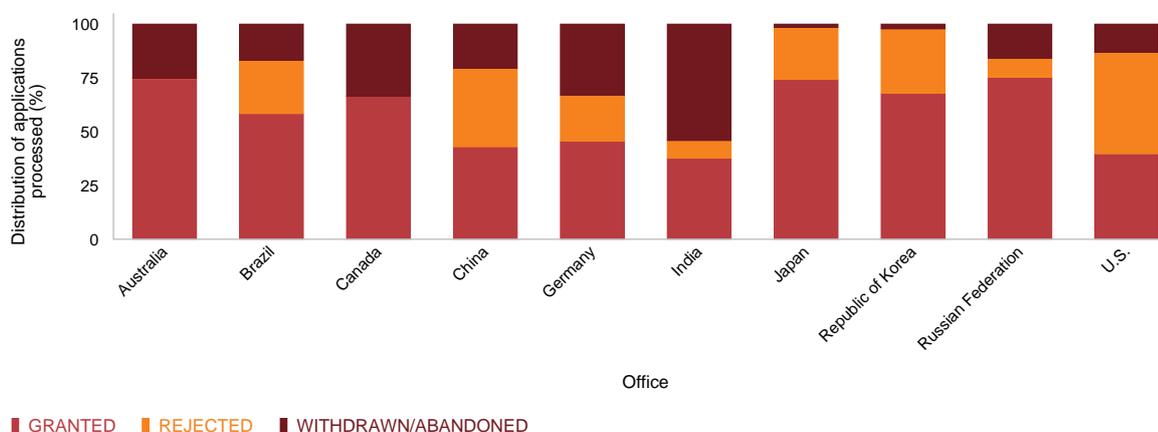
International patent applications filed via the PCT grew by 5.2% (265,800 applications) in 2019, representing a tenth consecutive year of growth. Applicants residing in China (58,990) filed the greatest number of PCT patent applications in 2019, followed closely by applicants from the U.S. (57,840) and Japan (52,660). Germany and the Republic of Korea ranked fourth and fifth, respectively, with 19,353 and 19,085 applications (figure A50).

Among the top 20 origins, Turkey (+46.7%), the Republic of Korea (+12.8%), Canada (+12.2%) and China (+10.6%) recorded a double-digit annual growth in 2019. Spain (+8.1%), Japan (+5.9%) and Israel (+5.7%) also recorded strong growth. In contrast, Finland (–9.8%), Australia (–3.2%), the Netherlands (–3%), Austria (–2.7%) and Germany (–2%) reported declines.

Applicants based in Asia accounted for 52.4% of all PCT applications filed in 2019, while Europe (23.2%) and North America (22.8%) accounted for less than one-quarter each.

The proportion of rejected applications was largest in the U.S.

1.9. Distribution of patent examination outcomes for selected offices, 2019



Source: Figure A43.

Women inventors accounted for only 18.7% of all inventors listed in PCT applications in 2019

In 2019, women accounted for 18.7% of all inventors listed in PCT applications and men the remaining 81.3% (figure A33). The proportion of women inventors increased from 11.8% in 2005 to 18.7% in 2019. Moreover, the proportion of women inventors has grown in each of the world's geographical regions over the past decade. About 34.9% of PCT applications named at least one woman as inventor in 2019, and 94.1% named at least one man as inventor (figure A34). The share of PCT applications with at least one woman as inventor rose from 22.6% in 2005 to 34.9% in 2019, while the share for inventors who are men decreased within the same period from 97% down to 94.1%.

The gender gap among PCT inventors varies considerably across countries. Within the top 20 origins, China (32.4%), the Republic of Korea (27.3%) and Australia (19.9%) had the largest proportions of inventors who were women in 2019 (figure A35). Conversely, Japan (10.7%), Germany (10.5%) and Austria (8.7%) had the lowest.

Fields of technology related to the life sciences had comparatively high shares of PCT applications with women inventors in 2019. Women represented more than one-quarter of inventors listed in published PCT applications in the fields of biotechnology (31%), pharmaceuticals (30.4%), food chemistry (30.1%), organic fine chemistry (27.6%) and analysis of biological materials (27.1%) (figure A36).

Utility model applications filed worldwide grew by 9.1% in 2019

A utility model is a special form of patent right granted by a state or jurisdiction to an inventor or the inventor's assignee for a fixed period of time. The terms and conditions for granting a utility model differ slightly from those for normal patents, including a shorter term of protection and less stringent eligibility requirements.

In 2019, the total number of utility model applications worldwide reached 2.34 million, up by 9.1% on 2018 (figure A53). The IP office of China received 96.9% of the world total – the other 79 offices accounted for just 3.1%. The IP office of China received nearly 2.3 million applications in 2019, followed by Germany (11,668), the Russian Federation (10,136), Ukraine (8,458) and the Republic of Korea (5,447) (figure A54). The long-term trend shows utility model applications at the offices of Germany, Japan and the Republic of Korea declined substantially between 2009 and 2019. For example, applications at the office of Germany decreased from 17,306 in 2009 to 11,668 in 2019, while in the Republic of Korea applications declined from 17,144 in 2009 to 5,447 in 2019. In contrast, China saw enormous growth over the same period – applications increasing from 310,771 in 2009 to 2.3 million by 2019.

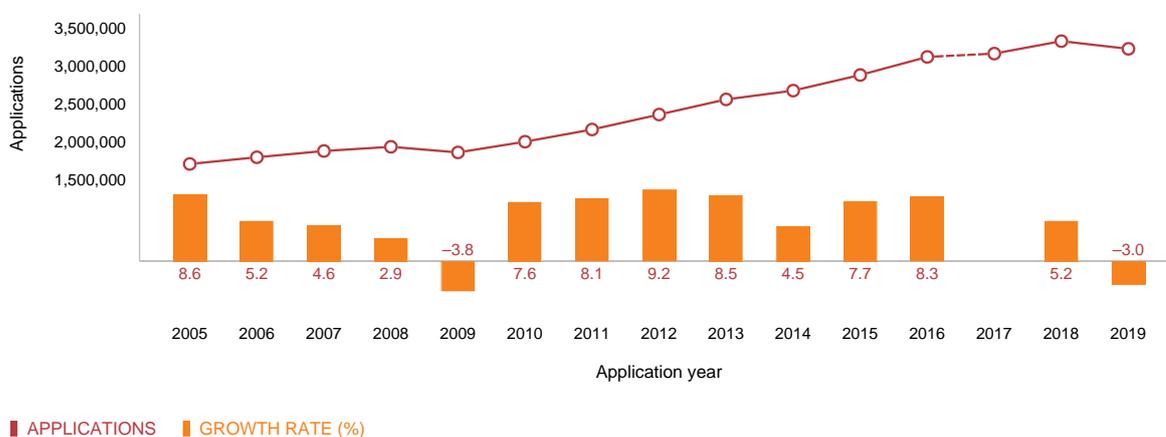
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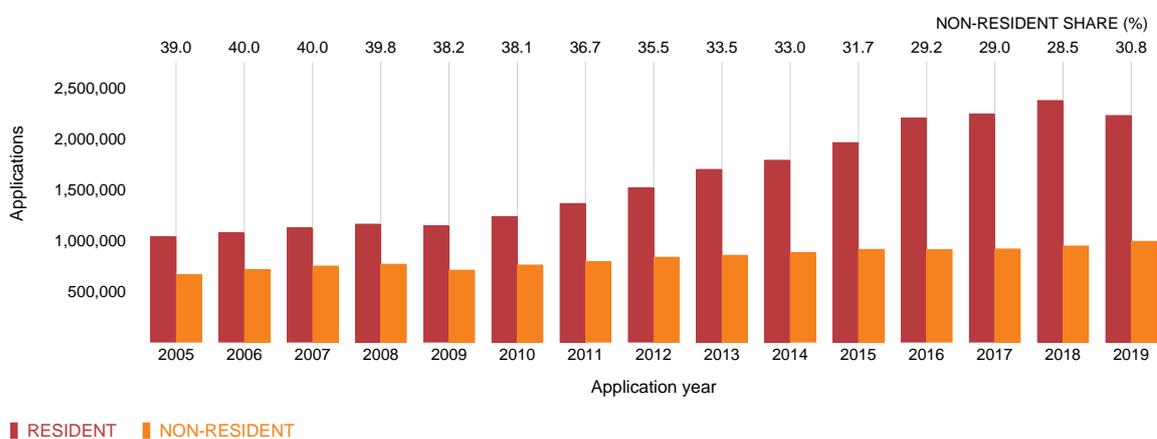
Patent applications and grants worldwide

A1. Trend in patent applications worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 162 patent offices. These totals include applications filed directly with national and regional offices and applications entering offices through the Patent Cooperation Treaty national phase (where applicable). China's pre-2017 data are not comparable due to a change in methodology. Due to this break in the data series, and to the large number of filings in China, it is not possible to report an accurate 2017 growth rate at world level (see the data description section in Additional information for details).
Source: WIPO Statistics Database, September 2020.

A2. Resident and non-resident patent applications worldwide, 2005–2019



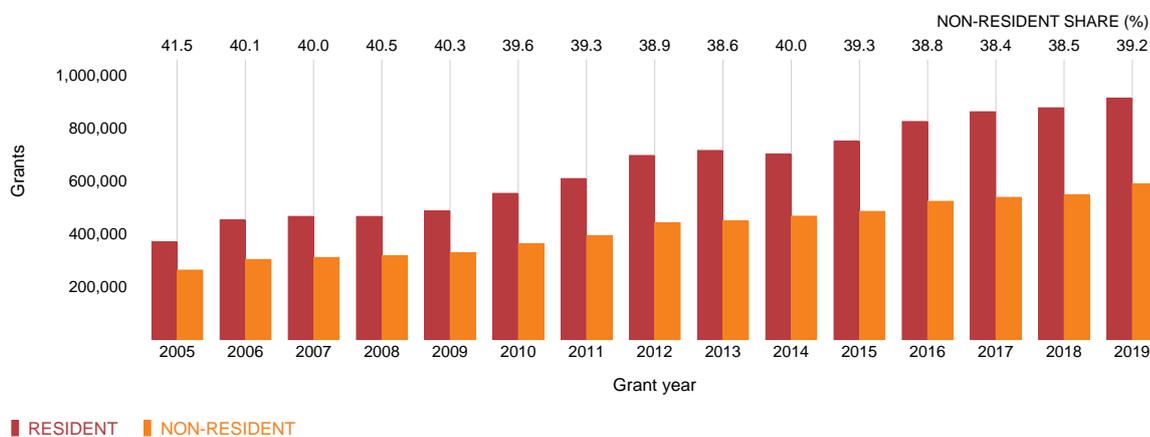
Note: World totals are WIPO estimates using data covering 162 patent offices. These totals include applications filed directly with national and regional offices and applications entering offices through the Patent Cooperation Treaty national phase (where applicable). See the glossary for definitions of resident and non-resident.
Source: WIPO Statistics Database, September 2020.

A3. Trend in patent grants worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 150 patent offices. These totals include patent grants based on applications filed directly with national and regional offices and patents granted by offices on the basis of the Patent Cooperation Treaty national phase (where applicable).
Source: WIPO Statistics Database, September 2020.

A4. Resident and non-resident patent grants worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 150 patent offices. These totals include patent grants based on applications filed directly with national and regional offices and patents granted by offices on the basis of the Patent Cooperation Treaty national phase (where applicable). See the glossary for definitions of resident and non-resident.
Source: WIPO Statistics Database, September 2020.

Patent applications and grants by office

A5. Patent applications by income group, 2009 and 2019

Income group	Number of applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
High-income	1,343,900	1,593,400	62.6	56.6	72.4	49.4	1.7
Upper middle-income	449,100	1,548,200	63.3	84.2	24.2	48.0	13.2
Lower middle-income	53,300	80,600	22.3	32.5	2.9	2.5	4.2
Low-income	9,600	2,000	90.6	30.0	0.5	0.1	-14.5
World	1,855,900	3,224,200	61.8	69.2	100.0	100.0	5.7

Note: Totals by income group are WIPO estimates using data covering 162 offices. Each category includes the following number of offices: high-income countries/economies (62), upper middle-income (48), lower middle-income (35) and low-income (17). European Patent Office data are allocated to the high-income group, because most of its member states are high-income countries. For the same reason, data for the African Regional Intellectual Property Organization and the African Intellectual Property Organization are allocated to the low-income group, while those for the Eurasian Patent Organization are allocated to the lower middle-income group. For information on income group classification, see the data description section in Additional information.

Source: WIPO Statistics Database, September 2020.

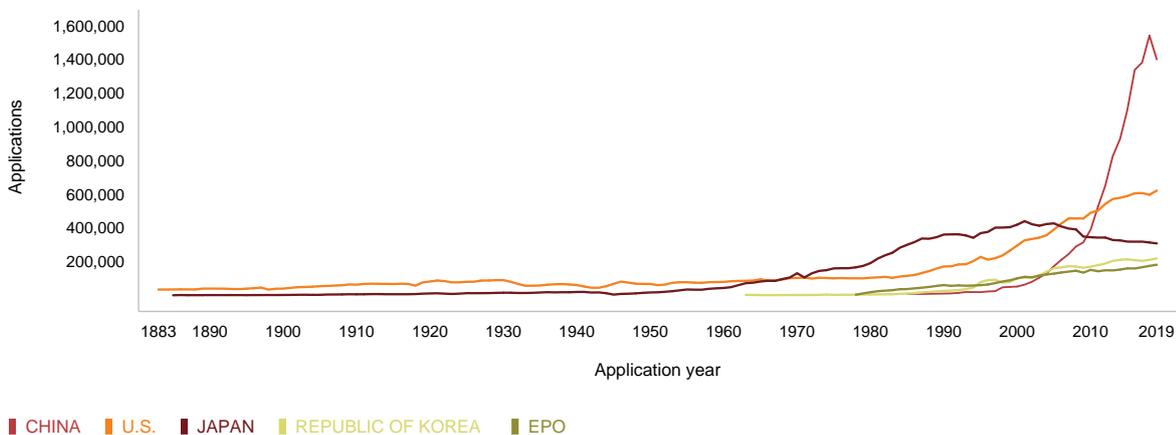
A6. Patent applications by region, 2009 and 2019

Region	Number of applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
Africa	12,600	16,100	16.7	18.6	0.7	0.5	2.5
Asia	944,000	2,094,800	73.2	81.8	50.9	65.0	8.3
Europe	323,400	363,900	65.9	58.5	17.4	11.3	1.2
Latin America and the Caribbean	52,200	55,700	12.5	15.3	2.8	1.7	0.7
North America	493,600	657,900	46.6	44.0	26.6	20.4	2.9
Oceania	30,100	35,800	13.6	8.4	1.6	1.1	1.7
World	1,855,900	3,224,200	61.8	69.2	100.0	100.0	5.7

Note: Totals by geographical region are WIPO estimates using data covering 162 offices. Each region includes the following number of offices: Africa (33), Asia (46), Europe (45), Latin America and the Caribbean (32), North America (2) and Oceania (4).

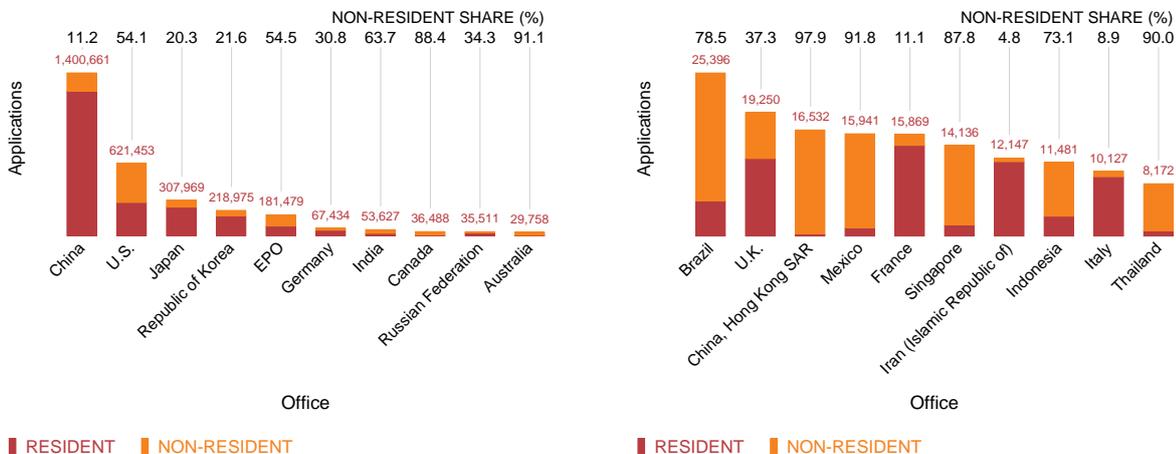
Source: WIPO Statistics Database, September 2020.

A7. Trend in patent applications for the top five offices, 1883–2019



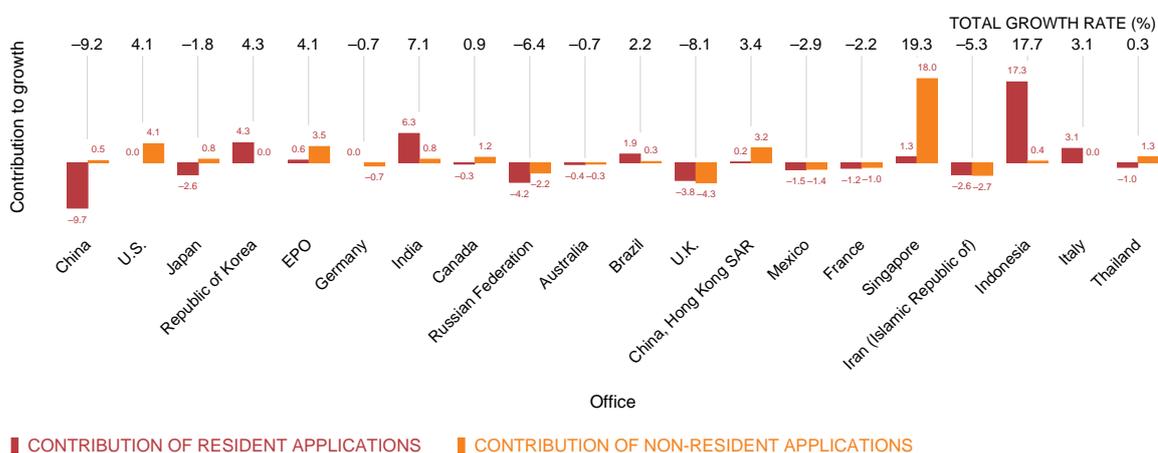
Note: EPO is the European Patent Office. The top five offices were selected based on their 2019 totals.
Source: WIPO Statistics Database, September 2020.

A8. Patent applications at the top 20 offices, 2019



Note: EPO is the European Patent Office. In general, national offices of the EPO member states receive lower volumes of applications, because applicants may apply via the EPO to seek protection within any EPO member state.
Source: WIPO Statistics Database, September 2020.

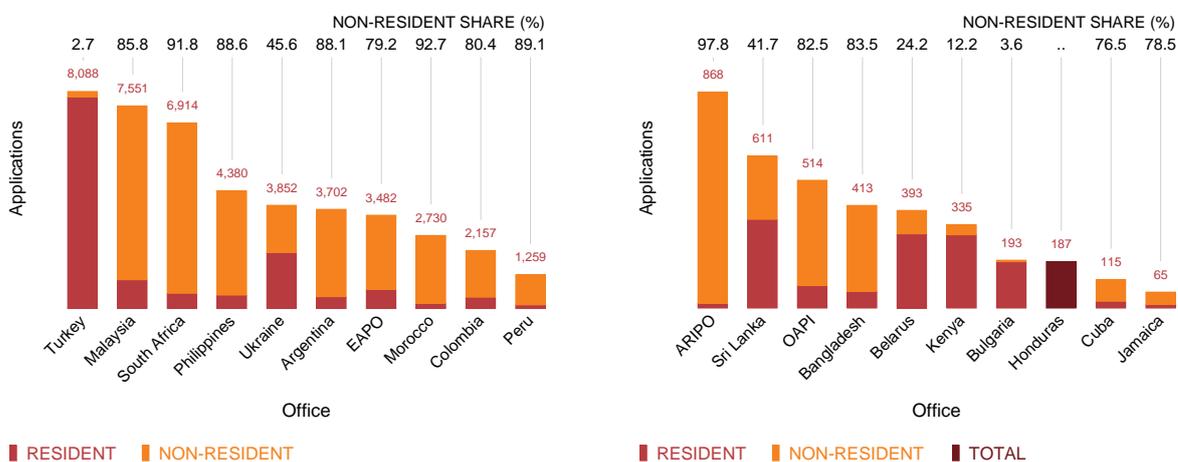
A9. Contribution of resident and non-resident applications to total growth for the top 20 offices, 2018–2019



Note: EPO is the European Patent Office. This figure shows the total growth or decrease in applications at each office, broken down by the respective contributions of resident and non-resident applications. For example, applications filed at the IP office of India grew by 7.1%. Growth in resident applications accounted for 6.3 percentage points of this increase, while the remaining 0.8 percentage point reflected growth in non-resident applications.

Source: WIPO Statistics Database, September 2020.

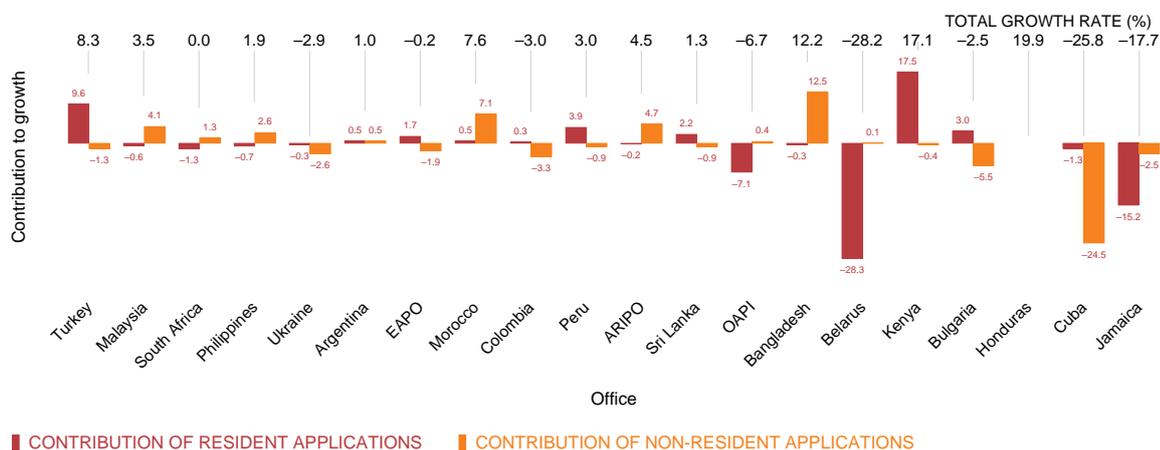
A10. Patent applications at offices of selected low- and middle-income countries, 2019



Note: ARIPO is the African Regional Intellectual Property Organization, EAPO is the Eurasian Patent Organization and OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all offices are presented in table A58.

Source: WIPO Statistics Database, September 2020.

A11. Contribution of resident and non-resident applications to total growth for offices of selected low- and middle-income countries, 2018–2019



Note: ARIPO is the African Regional Intellectual Property Organization, EAPO is the Eurasian Patent Organization and OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). This figure shows the total growth or decrease in applications at each office, broken down by the respective contributions of resident and non-resident applications. For example, applications filed in Morocco grew by 7.6%. Growth in resident applications accounted for 0.5 percentage point of this increase, while the remaining 7.1 percentage points came from growth in non-resident applications. A resident versus non-resident breakdown is not available for Honduras.

Source: WIPO Statistics Database, September 2020.

A12. Patent grants by income group, 2009 and 2019

Income group	Number of applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
High-income	589,500	920,200	45.5	34.3	72.4	61.3	4.6
Upper middle-income	201,000	545,300	12.8	26.1	24.7	36.3	10.5
Lower middle-income	17,200	34,200	0.6	0.4	2.1	2.3	7.1
Low-income	7,000	1,200	0.8	0.0	0.9	0.1	-16.2
World	814,700	1,500,900	59.7	60.8	100.0	100.0	6.3

Note: Totals by income group are WIPO estimates using data covering 150 offices. Each category includes the following number of offices: high-income countries/economies (59), upper middle-income (45), lower middle-income (29) and low-income (17). European Patent Office data are allocated to the high-income group, because most of its member states are high-income countries. For similar a reason, data for the African Regional Intellectual Property Organization and the African Intellectual Property Organization are allocated to the low-income group, while those for the Eurasian Patent Organization are allocated to the lower middle-income group. For information on income group classification, see the data description section in Additional information.

Source: WIPO Statistics Database, September 2020.

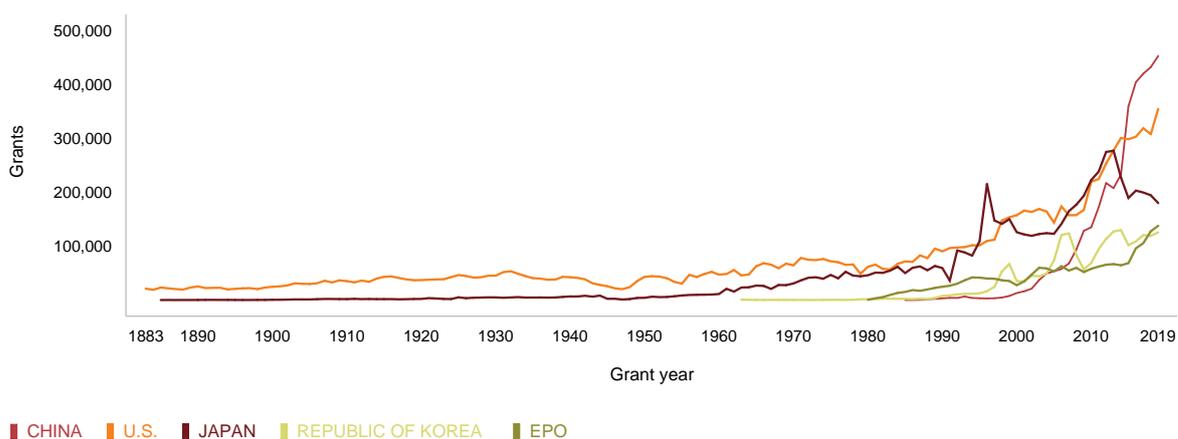
A13. Patent grants by region, 2009 and 2019

Region	Number of applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
Africa	5,500	9,900	0.2	0.1	0.7	0.7	6.1
Asia	424,300	829,700	35.6	40.6	52.1	55.3	6.9
Europe	164,300	239,400	13.3	8.6	20.2	16.0	3.8
Latin America and the Caribbean	17,900	26,800	0.1	0.1	2.2	1.8	4.1
North America	186,900	376,400	10.4	11.3	22.9	25.1	7.3
Oceania	15,800	18,700	0.2	0.1	1.9	1.2	1.7
World	814,700	1,500,900	59.7	60.8	100.0	100.0	6.3

Note: Totals by geographical region are WIPO estimates using data covering 150 offices. Each region includes the following number of offices: Africa (28), Asia (43), Europe (45), Latin America and the Caribbean (28), North America (2) and Oceania (4).

Source: WIPO Statistics Database, September 2020.

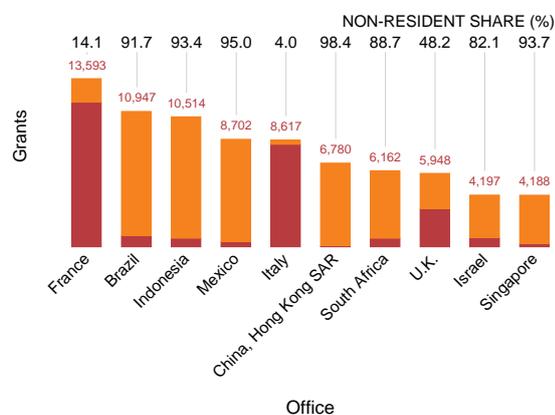
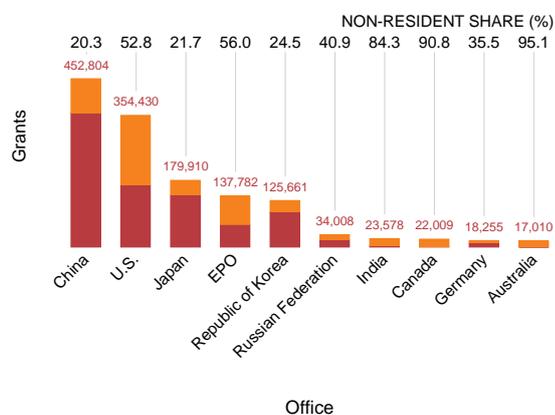
A14. Trend in patent grants for the top five offices, 1883–2019



Note: EPO is the European Patent Office. The top five offices were selected based on their 2019 totals.

Source: WIPO Statistics Database, September 2020.

A15. Patent grants for the top 20 offices, 2019



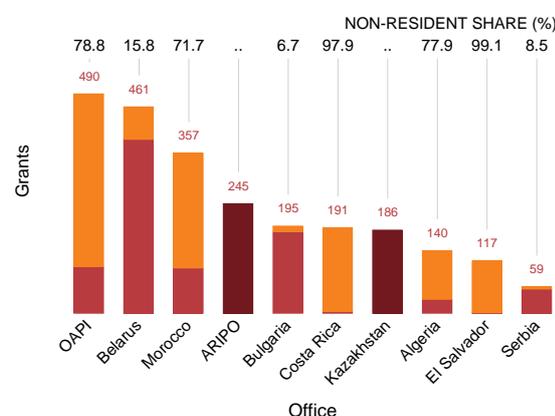
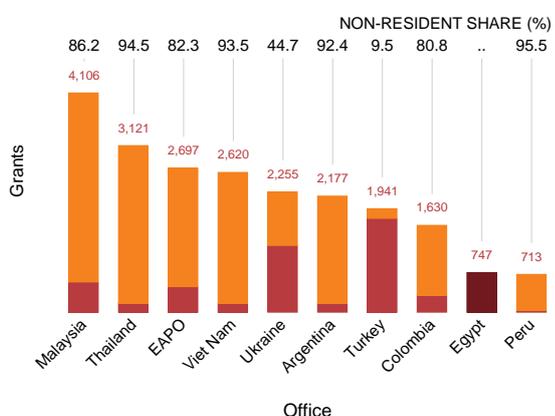
■ RESIDENT ■ NON-RESIDENT

■ RESIDENT ■ NON-RESIDENT

Note: EPO is the European Patent Office. The procedure for issuing patents varies between offices, and differences in the numbers of patents granted among offices depend on factors such as examination capacity and procedural delays. The examination process can also be a lengthy one therefore there is a time lag between application and grant dates. For this reason, data on applications for a given year should not be compared with data on grants for the same year.

Source: WIPO Statistics Database, September 2020.

A16. Patent grants for offices of selected low- and middle-income countries, 2019



■ RESIDENT ■ NON-RESIDENT ■ TOTAL

■ RESIDENT ■ NON-RESIDENT ■ TOTAL

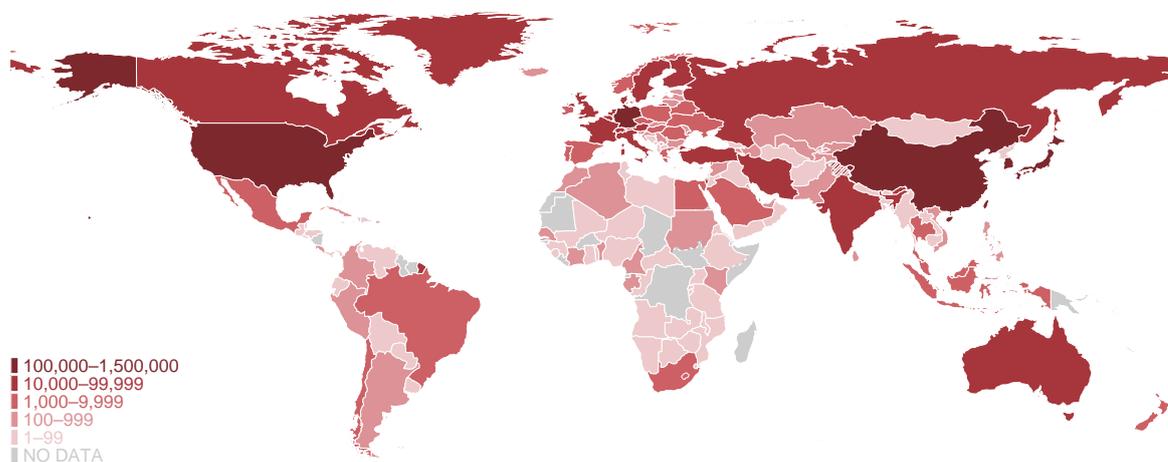
Note: ARIPO is the African Regional Intellectual Property Organization, EAPO is the Eurasian Patent Organization and OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all offices are presented in table A59.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

Patent applications and grants by origin

A17. Equivalent patent applications by origin, 2019



Note: Patent filing activity by origin includes resident applications and applications filed abroad. The origin of a patent application is determined by the residence of the first named applicant. Applications filed at regional offices are considered equivalent to multiple applications in the relevant member states. See the glossary for the definition of equivalent application.

Source: WIPO Statistics Database, September 2020.

A18. Equivalent patent applications for the top 20 origins, 2019



Note: Patent activity by origin includes resident applications and applications filed abroad. The origin of a patent application is determined by the residence of the first named applicant. Applications filed at regional offices are considered equivalent to multiple applications in the relevant member states. See the glossary for the definition of equivalent application.

Source: WIPO Statistics Database, September 2020.

A19. Patent applications for the top 20 offices and origins, 2019

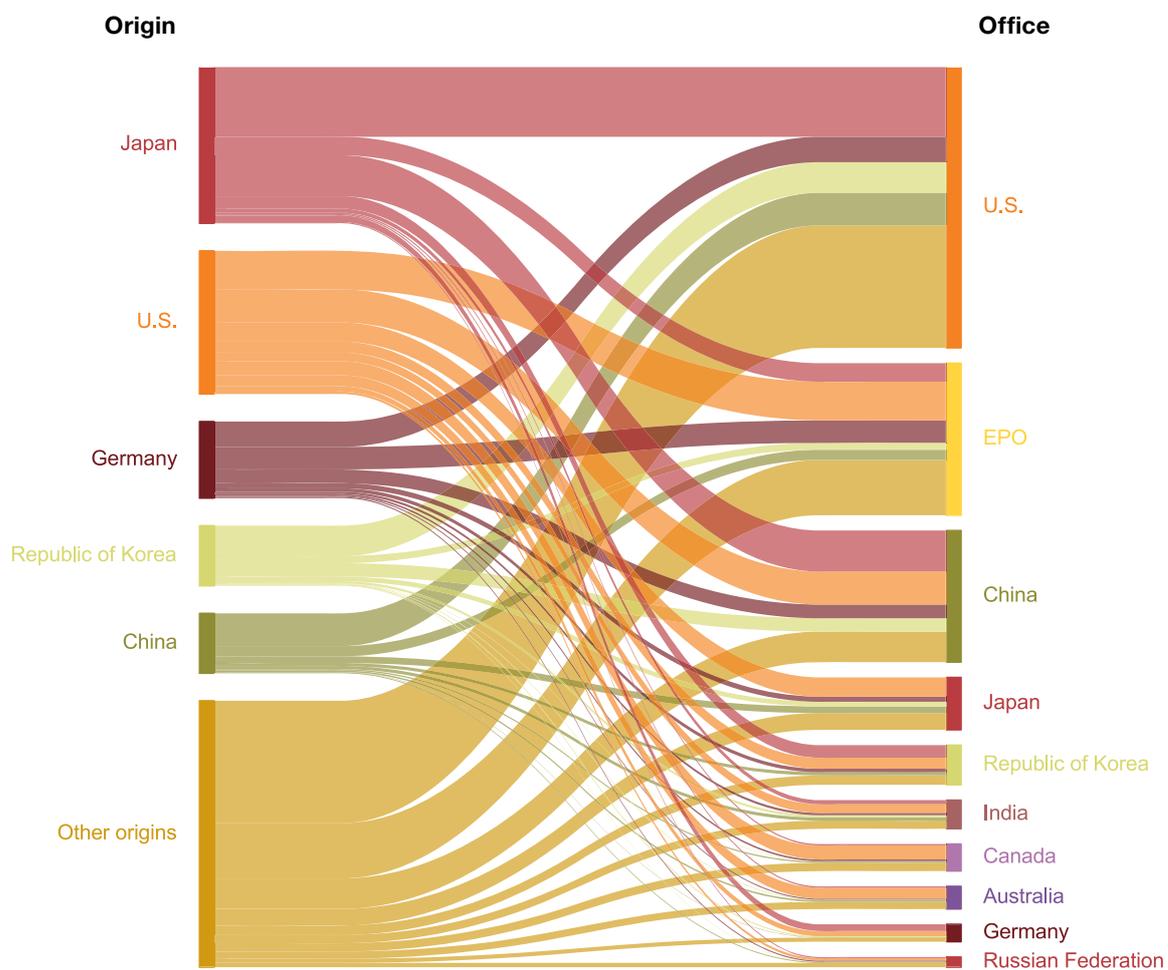
Origin	Office									
	Australia	Brazil	Canada	China	China, Hong Kong SAR	EPO	France	Germany	India	Indonesia
Australia	2,637	187	533	757	193	995	8	26	308	96
Austria	177	189	264	1,032	79	2,341	10	713	248	40
Belgium	314	255	321	799	119	2,432	87	122	249	68
Canada	568	195	4,238	1,168	272	1,839	11	126	324	34
China	1,832	1,204	1,486	1,243,568	1,740	12,163	89	449	3,767	765
Denmark	249	220	295	1,037	111	2,402	1	27	339	67
France	749	1,133	1,554	4,826	307	10,231	14,103	460	1,204	233
Germany	1,311	1,750	2,045	16,421	856	26,816	452	46,632	2,754	372
India	211	171	189	321	43	643	13	38	19,454	137
Iran (Islamic Republic of)	3		4	2		6			3	
Israel	440	247	435	1,018	148	1,547	5	16	356	18
Italy	350	556	587	1,845	216	4,464	85	114	553	71
Japan	1,573	1,602	1,659	48,867	1,433	22,094	278	7,956	4,853	2,532
Netherlands	439	718	490	3,348	212	6,953	20	149	1,173	292
Republic of Korea	733	356	401	16,019	298	8,332	18	1,262	2,673	498
Russian Federation	35	64	76	220	18	244	8	40	82	38
Sweden	565	533	496	2,638	232	4,380	48	380	1,025	159
Switzerland	1,029	974	1,150	3,820	953	8,248	96	810	1,136	337
U.K.	1,131	632	1,257	2,957	724	6,143	49	341	956	141
U.S.	13,125	7,555	16,738	39,450	6,162	46,128	186	6,207	10,405	1,571
Others/Unknown	2,287	6,855	2,270	10,548	2,416	13,078	302	1,566	1,765	4,012
Total	29,758	25,396	36,488	1,400,661	16,532	181,479	15,869	67,434	53,627	11,481

Origin	Office									
	Iran (Islamic Republic of)	Italy	Japan	Mexico	Republic of Korea	Russian Federation	Singapore	Thailand	U.K.	U.S.
Australia	6	2	496	134	225	94	200	24	130	3,528
Austria		12	487	110	334	160	89	16	9	2,557
Belgium	7	47	479	148	320	148	99	22	132	2,584
Canada	12	4	1	254	410	78	123	9	198	13,432
China	38	136	7,947	555	3,723	1,071	1,100	205	739	39,055
Denmark		1	435	133	182	157	83	18	40	2,206
France	64	64	2,525	510	1,544	692	337	97	131	11,690
Germany	60	225	6,207	994	4,222	1,364	554	176	476	30,290
India	19	2	227	99	132	63	88	32	48	10,478
Iran (Islamic Republic of)	11,569				1	3			1	105
Israel		6	744	144	356	115	122	14	97	8,351
Italy		9,229	842	265	458	424	82	24	37	5,154
Japan	40	26	245,372	1,156	14,990	1,292	2,115	1,647	560	84,435
Netherlands	18	5	1,991	332	987	512	147	59	152	4,815
Republic of Korea	28	1	5,634	306	171,603	397	444	123	156	36,424
Russian Federation	32	4	116	33	93	23,337	24	9	7	1,241
Sweden	11	46	1,207	364	789	448	102	36	153	5,242
Switzerland	58	104	2,640	745	1,307	785	427	107	323	5,336
U.K.	19	28	1,907	355	1,061	422	419	27	12,061	14,124
U.S.	83	60	22,867	6,978	13,111	2,862	4,564	464	2,148	285,113
Others/Unknown	83	125	5,845	2,326	3,127	1,087	3,017	5,063	1,652	55,293
Total	12,147	10,127	307,969	15,941	218,975	35,511	14,136	8,172	19,250	621,453

Note: EPO is the European Patent Office. Origin data are based on absolute counts, not equivalent counts. The top 20 offices and origins are selected based on the available 2019 data, broken down by country of origin.

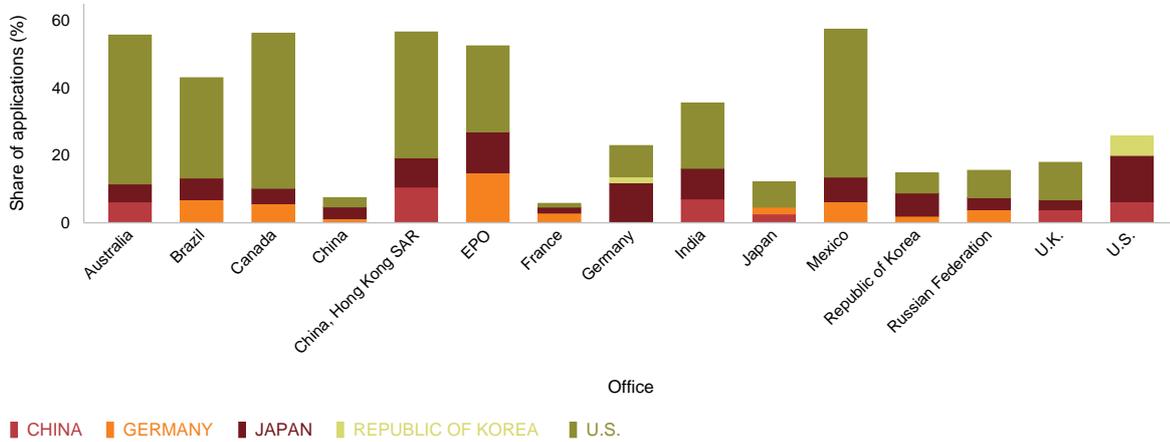
Source: WIPO Statistics Database, September 2020.

A20. Flows of non-resident patent applications between the top five origins and the top 10 offices, 2019



Note: EPO is the European Patent Office. Origin data are based on absolute counts, not equivalent counts.
 Source: WIPO Statistics Database, September 2020.

A21. Distribution of patent applications for the top 15 offices and selected origins, 2019



Note: EPO is the European Patent Office. Origin data are based on absolute counts, not equivalent counts.
 Source: WIPO Statistics Database, September 2020.

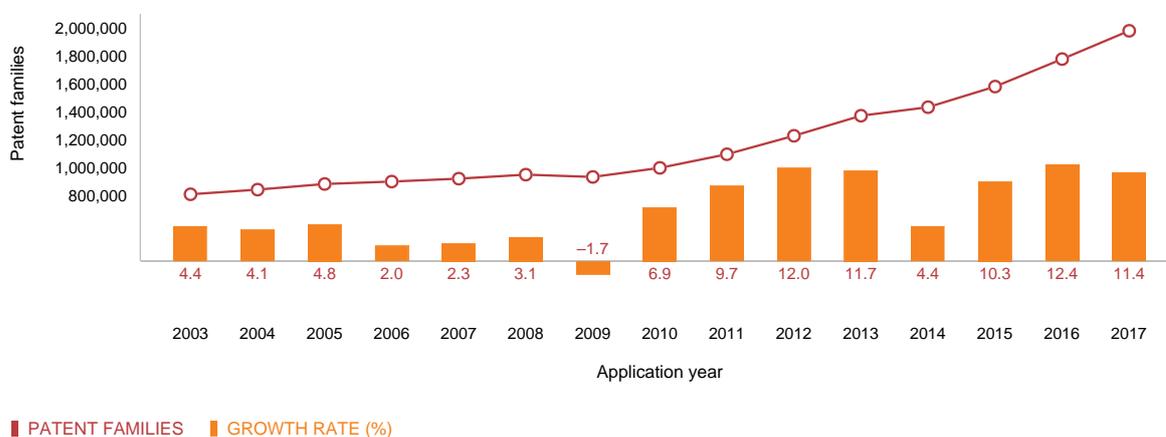
A22. Equivalent patent grants for the top 20 origins, 2019



Note: See the glossary for the definition of equivalent grant.
 Source: WIPO Statistics Database, September 2020.

Patent families

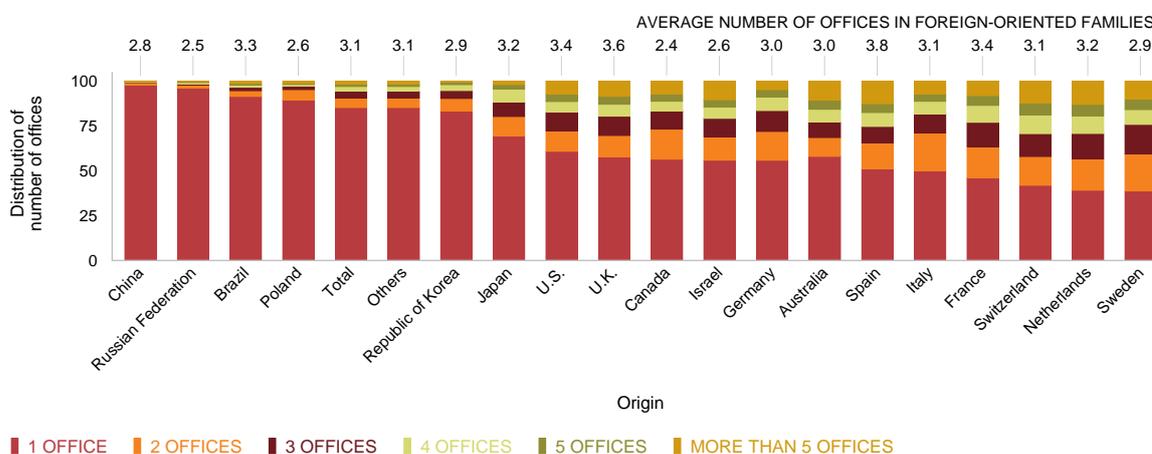
A23. Trend in patent families worldwide, 2003–2017



Note: Applicants often file patent applications in multiple jurisdictions therefore some inventions are recorded more than once. To take this into account, WIPO has indicators related to patent families, defined as patent applications interlinked by one or more of the following: priority claim, Patent Cooperation Treaty national phase entry, continuation, continuation-in-part, internal priority and addition or division. Patent families here include only those associated with patent applications for inventions and exclude patent families associated with utility model applications.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

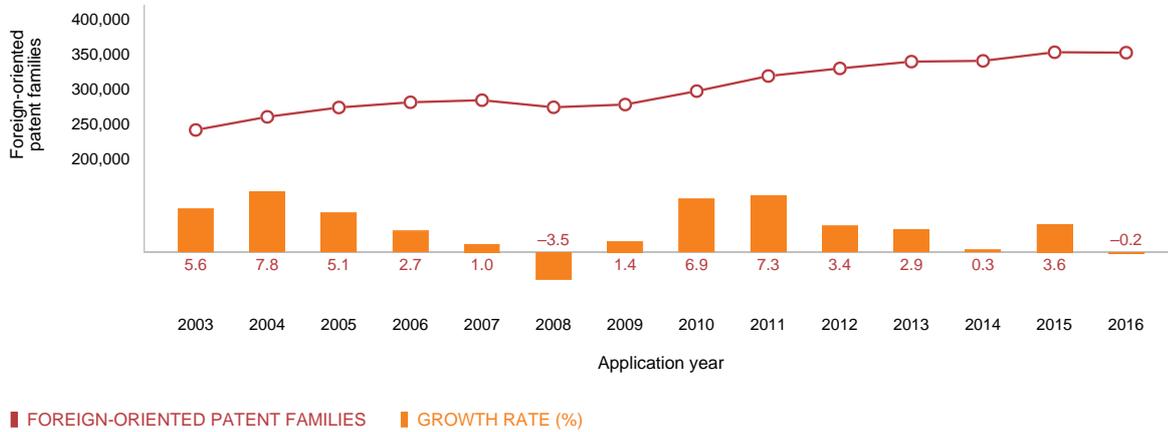
A24. Distribution of patent families by number of offices for the top origins, 2015–2017



Note: A patent family is defined as patent applications interlinked by one or more of the following: priority claim, Patent Cooperation Treaty national phase entry, continuation, continuation-in-part, internal priority and addition or division. Patent families here include only those associated with patent applications for inventions and exclude patent families associated with utility model applications.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

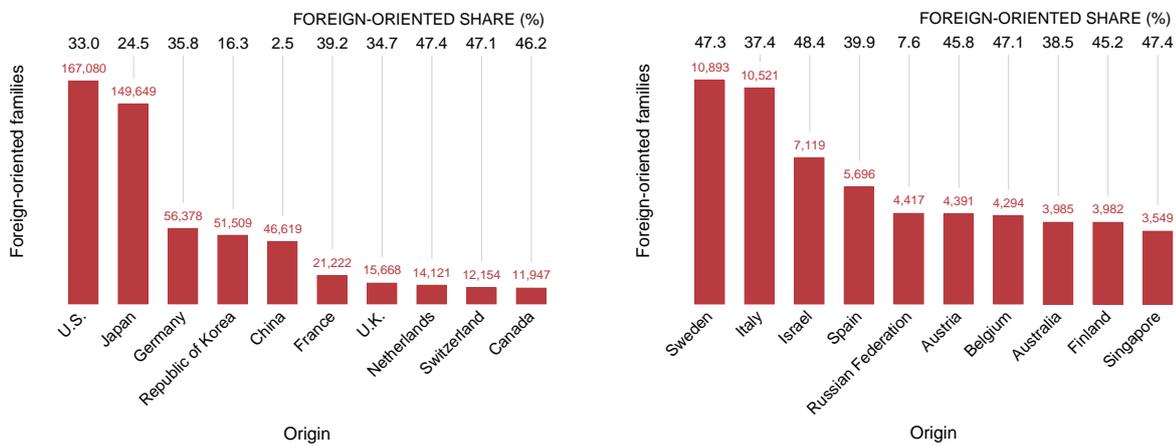
A25. Trend in foreign-oriented patent families worldwide, 2003–2016



Note: A special subset of patent families comprises foreign-oriented patent families: this includes only patent families that have at least one filing office different from the office of the applicant's country of origin. Some foreign-oriented patent families include only one filing office, because applicants may choose to file directly with a foreign office. For example, if a Canadian applicant files a patent application directly with the United States Patent and Trademark Office (USPTO) without having previously filed with the patent office of Canada, that application and any applications filed subsequently with the USPTO will form a foreign-oriented patent family.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

A26. Foreign-oriented patent families for the top 20 origins, 2015–2016



Note: A special subset of patent families comprises foreign-oriented patent families: this includes only patent families that have at least one filing office different from the office of the applicant's country of origin. Some foreign-oriented patent families include only one filing office, because applicants may choose to file directly with a foreign office. For example, if a Canadian applicant files a patent application directly with the United States Patent and Trademark Office (USPTO) without having previously filed with the patent office of Canada, that application and any applications filed subsequently with the USPTO will form a foreign-oriented patent family.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

A27. Distribution of technology fields for selected applicants based on patent families, 2015–2017

Field of technology	Applicant									
	Canon Inc	Samsung Electronics	State Grid Corp of China	Mitsubishi Electric Corp	IBM	Toyota Jidosha KK	Huawei Technologies	Toshiba KK	LG Electronics Inc	Robert Bosch GmbH
Electrical machinery, apparatus, energy	2.8	4.8	30.5	20.6	1.2	23.4	2.3	14.9	5.0	15.2
Audio-visual technology	16.3	9.2	1.6	4.7	2.8	0.9	4.1	5.1	5.5	2.4
Telecommunications	6.4	8.0	2.0	4.3	1.4	0.3	10.9	5.0	10.7	0.9
Digital communication	3.3	18.5	4.2	3.8	14.0	0.7	55.8	4.4	37.5	2.5
Basic communication processes	0.3	1.9	0.2	1.6	1.0	0.2	2.0	2.1	0.6	0.5
Computer technology	13.8	23.6	6.9	6.4	49.5	2.2	18.1	12.8	5.3	3.8
IT methods for management	0.4	1.4	10.2	1.2	6.2	0.6	0.8	2.5	0.9	0.4
Semiconductors	2.6	12.8	0.1	6.8	11.1	2.9	0.8	13.2	2.7	1.6
Optics	29.5	3.4	0.5	3.1	0.9	0.2	1.6	3.5	1.7	1.4
Measurement	2.4	3.1	20.9	6.5	2.9	4.0	1.4	6.7	1.7	11.6
Analysis of biological materials	0.0	0.2	0.2	0.0	0.2	0.0	0.0	0.2	0.1	0.4
Control	0.6	1.1	5.0	4.8	2.7	4.0	0.7	5.4	1.1	5.2
Medical technology	4.1	2.6	0.1	0.5	1.3	0.7	0.3	1.6	0.6	0.8
Organic fine chemistry	0.1	0.3	0.1	0.0	0.2	0.0	0.0	0.1	0.0	0.0
Biotechnology	0.0	0.2	0.1	0.0	0.1	0.1	0.0	0.1	0.0	0.1
Pharmaceuticals	0.0	0.1	0.0	0.0	0.1	0.0	0.0	0.0	0.0	0.0
Macromolecular chemistry, polymers	0.3	0.3	0.3	0.1	0.4	0.1	0.0	0.1	0.1	0.1
Food chemistry	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.3	0.0
Basic materials chemistry	0.9	0.6	0.4	0.1	0.3	0.2	0.2	0.3	0.1	0.1
Materials, metallurgy	0.1	0.3	0.5	0.2	0.1	1.7	0.1	1.2	0.2	0.7
Surface technology, coating	0.4	0.6	0.4	0.4	0.2	1.5	0.1	1.8	0.2	0.5
Micro-structural and nano-technology	0.1	0.2	0.0	0.0	0.2	0.0	0.0	0.2	0.0	1.4
Chemical engineering	0.2	0.4	1.2	0.5	0.3	1.0	0.0	1.5	1.0	0.8
Environmental technology	0.5	0.2	0.6	0.6	0.1	2.7	0.0	2.5	0.7	2.4
Handling	3.1	0.4	2.5	4.9	0.2	1.1	0.1	2.0	1.3	1.4
Machine tools	0.2	0.2	2.5	1.4	0.1	2.4	0.0	0.8	0.2	4.8
Engines, pumps, turbines	0.1	0.2	0.9	3.6	0.1	12.0	0.0	4.6	2.6	15.0
Textile and paper machines	9.2	0.0	0.1	0.4	0.1	0.1	0.0	1.3	0.1	0.1
Other special machines	1.4	0.3	0.8	0.5	0.3	1.3	0.0	0.5	0.4	1.6
Thermal processes and apparatus	0.0	1.4	0.6	13.3	0.2	0.5	0.2	1.4	6.7	1.4
Mechanical elements	0.5	0.3	1.3	1.1	0.1	9.7	0.1	0.7	0.6	6.3
Transport	0.1	0.5	0.7	4.2	0.7	24.5	0.3	2.2	2.1	15.4
Furniture, games	0.0	0.9	0.4	2.5	0.3	0.4	0.0	0.3	2.8	0.2
Other consumer goods	0.1	2.0	1.0	1.5	0.1	0.1	0.1	0.7	6.7	0.4
Civil engineering	0.0	0.2	3.4	0.4	0.1	0.4	0.0	0.3	0.5	0.5

Note: WIPO's International Patent Classification (IPC) technology concordance table was used to convert IPC symbols into 35 corresponding fields of technology. For an electronic version of the IPC technology concordance table, visit www.wipo.int/ipstats.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

A28. Distribution of technology fields for selected universities and PROs based on patent families, 2015–2017

Field of technology	Applicant											
	Zhejiang University	Harbin Institute of Technology	CEA	CNRS	Fraunhofer Ges Forschung	DLR	AIST	Tokyo University	Korea Electronics Telecomm	KAIST	University of California	MIT
Electrical machinery, apparatus, energy	6.4	10.1	13.2	6.2	5.5	6.7	8.8	8.2	3.8	7.9	4.5	4.9
Audio-visual technology	0.6	1.0	1.9	0.6	6.0	0.7	1.0	1.3	4.8	3.0	0.6	1.6
Telecommunications	1.2	2.8	2.0	0.9	5.1	2.7	1.1	0.7	13.1	5.4	1.2	2.6
Digital communication	1.8	3.5	2.0	0.2	6.0	3.1	0.3	0.8	42.5	8.3	0.8	1.6
Basic communication processes	0.4	0.5	2.4	0.6	1.2	2.6	0.6	0.5	2.7	1.6	0.8	0.7
Computer technology	10.8	10.4	7.5	4.4	7.8	3.1	2.6	5.6	12.4	15.5	4.3	7.3
IT methods for management	1.6	0.7	0.1	0.0	0.3	0.4	0.5	1.0	2.2	2.3	0.1	0.4
Semiconductors	1.3	0.8	19.0	5.5	4.9	1.1	10.0	3.3	3.1	6.7	3.8	4.9
Optics	1.6	2.7	4.3	4.9	5.6	2.1	3.6	2.8	4.4	4.8	2.7	3.6
Measurement	14.6	16.7	12.8	9.9	11.7	14.8	14.2	10.9	3.0	8.3	6.1	7.9
Analysis of biological materials	1.1	0.4	1.1	3.5	1.6	0.3	2.2	4.7	0.2	1.9	4.7	4.5
Control	4.5	3.7	0.7	0.4	0.7	4.9	0.7	1.4	1.8	1.2	0.5	1.2
Medical technology	2.7	1.8	2.0	4.6	3.7	1.7	3.5	7.6	1.7	4.3	12.0	8.2
Organic fine chemistry	3.5	0.9	0.9	8.4	0.6	0.2	6.5	3.0	0.1	0.8	6.4	2.8
Biotechnology	4.9	1.0	0.8	9.6	2.8	0.2	6.1	13.2	0.1	3.7	16.6	15.3
Pharmaceuticals	3.1	0.7	0.5	10.3	1.4	0.0	1.7	7.1	0.0	1.5	17.5	8.4
Macromolecular chemistry, polymers	2.5	1.4	0.6	4.0	1.5	0.2	2.3	4.1	0.0	1.6	1.6	1.8
Food chemistry	2.7	1.1	0.1	0.4	0.5	0.0	0.8	0.6	0.0	0.2	0.7	0.7
Basic materials chemistry	2.3	1.8	1.4	1.5	2.2	0.8	3.1	2.4	0.2	1.0	1.7	1.8
Materials, metallurgy	3.5	6.4	3.0	5.0	3.4	2.4	9.5	2.7	0.4	2.2	1.7	1.4
Surface technology, coating	1.1	2.6	3.7	2.1	3.5	1.4	3.5	1.6	0.4	1.9	1.1	2.2
Micro-structural and nano-technology	0.8	0.9	2.9	1.9	1.1	0.0	2.1	1.1	0.2	1.1	1.0	1.3
Chemical engineering	3.5	2.3	2.9	6.2	2.6	0.6	5.4	1.9	0.6	3.9	3.3	4.5
Environmental technology	3.8	3.7	2.0	1.4	0.9	0.7	1.9	0.8	0.1	0.9	0.9	1.5
Handling	1.2	3.6	1.2	0.4	1.8	6.8	0.7	0.9	0.1	1.0	0.5	1.0
Machine tools	1.4	5.6	0.7	0.0	5.1	1.1	1.1	0.8	0.1	0.1	0.3	0.3
Engines, pumps, turbines	1.7	1.3	2.3	1.4	0.8	4.6	0.9	0.8	0.3	1.4	0.5	0.9
Textile and paper machines	0.6	0.6	0.2	1.0	1.1	1.5	1.3	0.6	0.2	0.5	0.3	0.5
Other special machines	3.7	1.8	1.8	1.6	3.9	8.9	2.5	3.7	0.4	1.7	1.5	2.9
Thermal processes and apparatus	1.8	1.3	3.3	0.7	1.9	6.8	0.5	0.8	0.0	0.5	0.7	0.4
Mechanical elements	1.9	1.7	0.8	0.6	1.4	3.3	0.0	0.5	0.0	0.6	0.2	0.7
Transport	2.4	3.6	0.9	0.3	1.6	15.4	0.2	0.9	0.7	1.9	0.5	1.3
Furniture, games	0.6	0.2	0.2	0.2	0.3	0.3	0.2	0.1	0.2	0.5	0.2	0.0
Other consumer goods	0.6	0.2	0.4	0.7	0.8	0.5	0.3	0.3	0.0	0.4	0.2	0.6
Civil engineering	4.1	2.2	0.4	0.8	0.6	0.2	0.2	3.3	0.2	1.2	0.2	0.5

Note: PRO means public research organization. A patent family is defined as patent applications interlinked by one or more of the following: priority claim, Patent Cooperation Treaty national phase entry, continuation, continuation-in-part, internal priority and addition or division. Patent families include only those associated with patent applications for inventions and exclude patent families associated with utility model applications. Le Centre national de la recherche scientifique (CNRS); Le Commissariat à l'énergie atomique et aux énergies alternatives (CEA); Deutsches Zentrum für Luft- und Raumfahrt E.V. (DLR); Korea Advanced Institute of Science and Technology (KAIST); Massachusetts Institute of Technology (MIT); and National Institute of Advanced Industrial Science and Technology (AIST).

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

Published patent applications by field of technology

A29. Published patent applications worldwide by field of technology, 2008, 2013 and 2018

Field of technology		Number of published applications			Share of total (%) 2018	Average growth (%) 2008–2018
		2008	2013	2018		
Electrical engineering	Electrical machinery, apparatus, energy	105,240	161,425	215,828	6.7	7.4
	Audio-visual technology	89,036	77,060	84,910	2.7	-0.5
	Telecommunications	67,118	51,822	58,569	1.8	-1.4
	Digital communication	69,759	101,123	146,416	4.6	7.7
	Basic communication processes	17,750	16,496	16,290	0.5	-0.9
	Computer technology	133,095	167,186	234,667	7.3	5.8
	IT methods for management	22,108	33,994	61,970	1.9	10.9
	Semiconductors	79,893	86,936	85,523	2.7	0.7
Instruments	Optics	74,090	65,941	73,276	2.3	-0.1
	Measurement	72,287	103,998	164,255	5.1	8.6
	Analysis of biological materials	11,558	13,102	19,347	0.6	5.3
	Control	28,745	37,290	76,597	2.4	10.3
	Medical technology	78,317	94,881	147,542	4.6	6.5
Chemistry	Organic fine chemistry	56,034	55,818	67,202	2.1	1.8
	Biotechnology	36,600	45,798	65,562	2.0	6.0
	Pharmaceuticals	76,203	80,128	102,853	3.2	3.0
	Macromolecular chemistry, polymers	28,409	37,179	53,900	1.7	6.6
	Food chemistry	23,683	42,146	69,971	2.2	11.4
	Basic materials chemistry	41,663	60,805	92,275	2.9	8.3
	Materials, metallurgy	34,557	52,827	79,735	2.5	8.7
	Surface technology, coating	30,711	39,155	49,910	1.6	5.0
	Micro-structural and nano-technology	2,756	4,547	5,600	0.2	7.3
	Chemical engineering	35,609	48,966	104,736	3.3	11.4
	Environmental technology	22,751	33,976	66,826	2.1	11.4
Mechanical engineering	Handling	43,224	55,795	103,680	3.2	9.1
	Machine tools	38,423	61,237	116,133	3.6	11.7
	Engines, pumps, turbines	43,825	62,418	65,807	2.1	4.1
	Textile and paper machines	33,982	36,005	49,470	1.5	3.8
	Other special machines	46,881	66,635	138,379	4.3	11.4
	Thermal processes and apparatus	25,968	36,430	55,016	1.7	7.8
	Mechanical elements	47,837	59,104	84,275	2.6	5.8
	Transport	67,992	89,618	141,048	4.4	7.6
Other fields	Furniture, games	45,338	52,462	89,011	2.8	7.0
	Other consumer goods	32,193	41,198	64,110	2.0	7.1
	Civil engineering	53,330	73,968	122,747	3.8	8.7
	Unknown	37,201	31,591	25,863	0.8	-3.6
Total		1,754,166	2,179,060	3,199,299	100.0	6.2

Note: Data refer to published patent applications. There is a minimum delay of 18 months between the application date and the publication date. WIPO's International Patent Classification (IPC) technology concordance table was used to convert IPC symbols into 35 corresponding fields of technology. For an electronic version of the IPC technology concordance table, visit www.wipo.int/ipstats.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

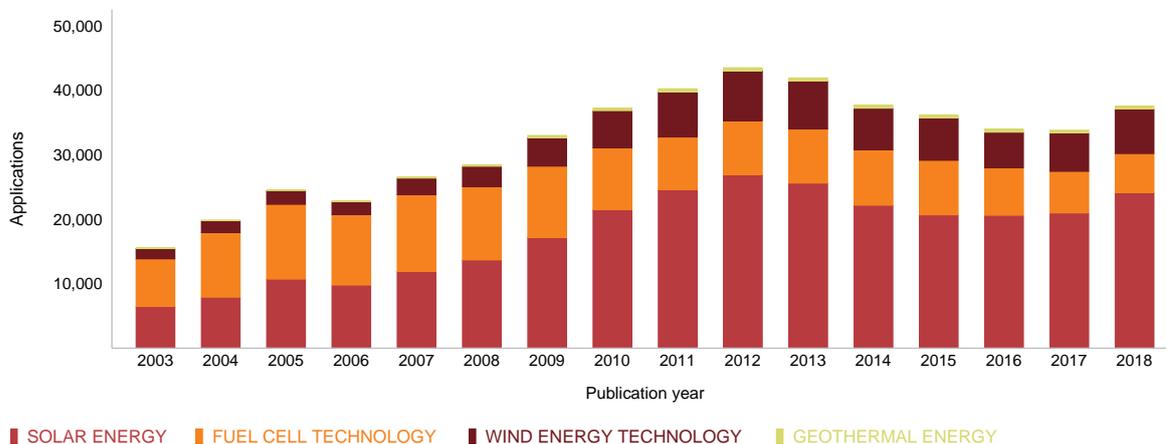
A30. Distribution of published patent applications by technology field for the top 10 origins, 2016–2018

Field of technology	Origin									
	China	U.S.	Japan	Republic of Korea	Germany	France	U.K.	Switzerland	Netherlands	Russian Federation
Electrical machinery, apparatus, energy	6.6	4.4	10.1	8.7	8.8	6.4	5.4	5.9	7.0	3.5
Audio-visual technology	2.2	2.7	4.5	5.1	1.5	2.2	1.8	0.9	2.2	0.6
Telecommunications	1.7	2.3	2.4	2.7	0.9	1.9	1.6	0.5	1.3	1.4
Digital communication	4.6	7.8	2.9	6.3	1.7	4.5	3.0	1.3	2.3	0.7
Basic communication processes	0.3	0.8	0.8	0.6	0.6	0.6	0.7	0.3	0.8	0.7
Computer technology	7.3	12.5	5.8	8.2	3.1	5.2	6.8	2.6	6.1	2.8
IT methods for management	1.8	2.8	1.3	3.0	0.5	0.9	1.4	0.7	0.6	0.5
Semiconductors	1.4	2.9	5.4	6.2	2.3	2.1	1.2	0.7	3.1	0.8
Optics	1.4	1.8	6.1	3.4	1.8	1.9	1.4	1.0	4.9	0.8
Measurement	6.0	4.0	4.4	3.7	5.9	4.9	5.0	7.5	5.2	7.7
Analysis of biological materials	0.5	0.9	0.4	0.5	0.6	0.9	1.3	1.2	0.6	2.1
Control	2.8	2.1	2.2	1.7	2.1	1.5	1.7	1.6	1.2	1.8
Medical technology	2.7	8.5	3.7	3.7	4.6	4.6	6.8	7.8	11.6	7.2
Organic fine chemistry	1.9	2.9	1.5	1.8	3.2	4.6	4.9	6.3	3.8	1.7
Biotechnology	1.5	3.9	1.0	1.5	1.9	3.0	4.6	6.1	3.7	1.7
Pharmaceuticals	3.3	5.9	1.3	2.0	2.5	4.1	7.6	10.4	3.4	4.1
Macromolecular chemistry, polymers	1.9	1.4	2.3	1.4	2.0	1.8	0.8	1.9	3.4	0.9
Food chemistry	3.9	1.0	0.8	2.0	0.4	0.9	1.0	3.6	3.2	12.0
Basic materials chemistry	4.0	2.7	2.2	1.8	3.2	2.3	3.1	3.0	4.8	2.7
Materials, metallurgy	3.4	1.1	2.4	1.9	2.0	2.4	1.6	1.4	0.8	4.5
Surface technology, coating	1.5	1.3	2.5	1.4	1.7	1.5	1.1	1.5	1.4	1.4
Micro-structural and nano-technology	0.2	0.2	0.1	0.1	0.2	0.2	0.2	0.1	0.1	0.8
Chemical engineering	4.0	1.9	1.4	2.2	2.7	2.7	3.2	2.3	2.7	3.8
Environmental technology	2.9	1.0	1.2	1.6	1.5	1.4	1.9	0.9	1.6	2.6
Handling	3.5	2.0	3.0	2.2	3.4	2.5	2.7	6.6	3.0	0.9
Machine tools	4.9	1.4	2.4	1.9	3.7	1.4	1.2	1.8	1.1	2.4
Engines, pumps, turbines	1.3	2.4	3.0	1.8	5.9	4.6	3.3	2.0	0.9	4.5
Textile and paper machines	1.6	0.9	2.5	0.9	1.5	0.7	0.9	2.3	1.4	0.4
Other special machines	5.1	2.9	2.9	3.0	3.9	4.0	2.7	2.7	5.0	5.6
Thermal processes and apparatus	2.1	0.8	1.8	1.9	1.6	1.6	1.1	1.0	1.0	1.6
Mechanical elements	2.2	1.9	3.3	2.4	7.3	4.3	3.3	2.0	1.5	3.9
Transport	2.9	3.8	5.8	5.1	10.3	11.0	5.2	1.9	2.3	4.6
Furniture, games	2.5	2.1	4.4	2.7	1.7	1.5	2.9	2.8	2.4	1.2
Other consumer goods	1.9	1.7	1.5	2.9	1.9	2.7	4.3	5.7	2.2	1.2
Civil engineering	4.3	3.1	2.3	3.9	3.1	3.2	4.5	2.0	3.6	6.6

Note: Data refer to published patent applications. There is a minimum delay of 18 months between the application date and the publication date. WIPO's International Patent Classification (IPC) technology concordance table was used to convert IPC symbols into 35 corresponding fields of technology. For an electronic version of the IPC technology concordance table, visit www.wipo.int/ipstats. The top 10 origins were selected based on their 2016–2018 total published applications.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

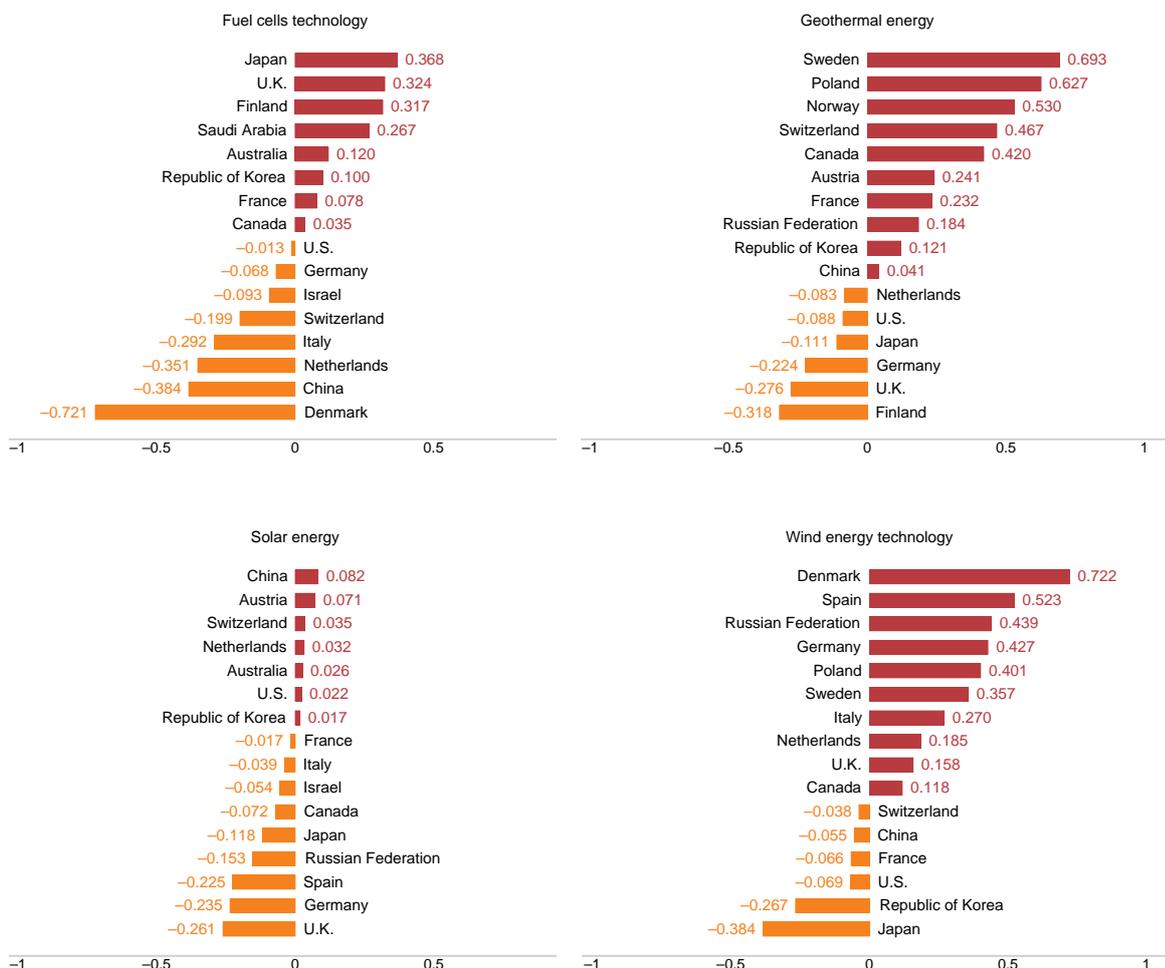
A31. Trend in patent applications in energy-related technologies, 2003–2018



Note: For definitions of the technologies – fuel cells, geothermal, solar and wind energy – see annex A. The correspondence between International Patent Classification (IPC) symbols and technology fields is not always apparent (there is no one-to-one correspondence). It is therefore difficult to capture all patents in a specific technology field. Even so, the IPC-based definitions are likely to capture the vast majority of patent applications in these areas. Data refer to published patent applications.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

A32. Relative specialization for patent applications in energy-related technologies for the top origins, 2016–2018



Note: For definitions of the technologies – fuel cells, geothermal, solar and wind energy – see annex A. The correspondence between International Patent Classification (IPC) symbols and technology fields is not always apparent (there is no one-to-one correspondence). It is therefore difficult to capture all patents in a specific technology field. Even so, the IPC-based definitions are likely to capture the vast majority of patent applications in these areas. Data refer to published patent applications.

Sources: WIPO Statistics Database and EPO PATSTAT database, September 2020.

Participation of women inventors in PCT applications

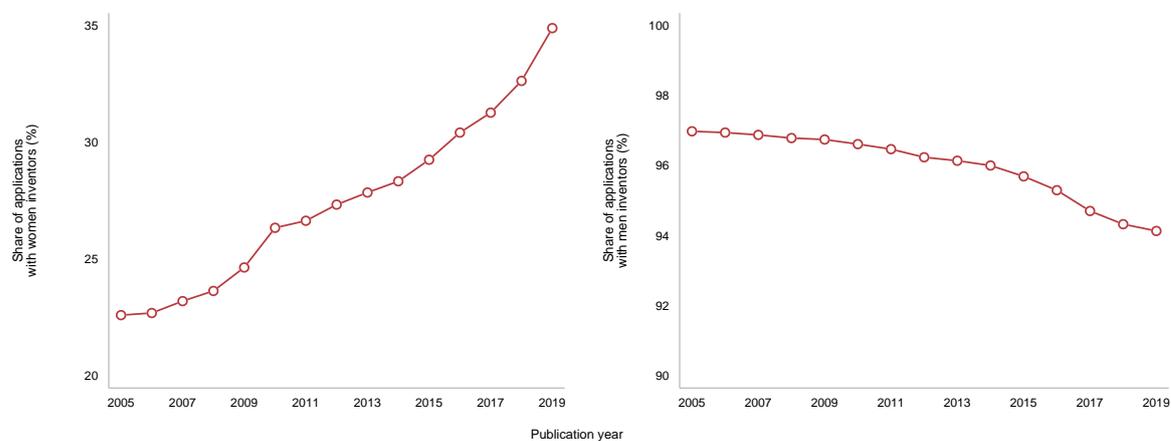
A33. Share of women among listed inventors in PCT applications, 2005–2019



Note: In order to attribute gender to inventors' names recorded in PCT applications, WIPO produced a world gender-name dictionary based on information from 13 different public sources. Gender is attributed to a given name on a country-by-country basis, because certain names may be considered male in one country but female in another.

Source: WIPO Statistics Database, September 2020.

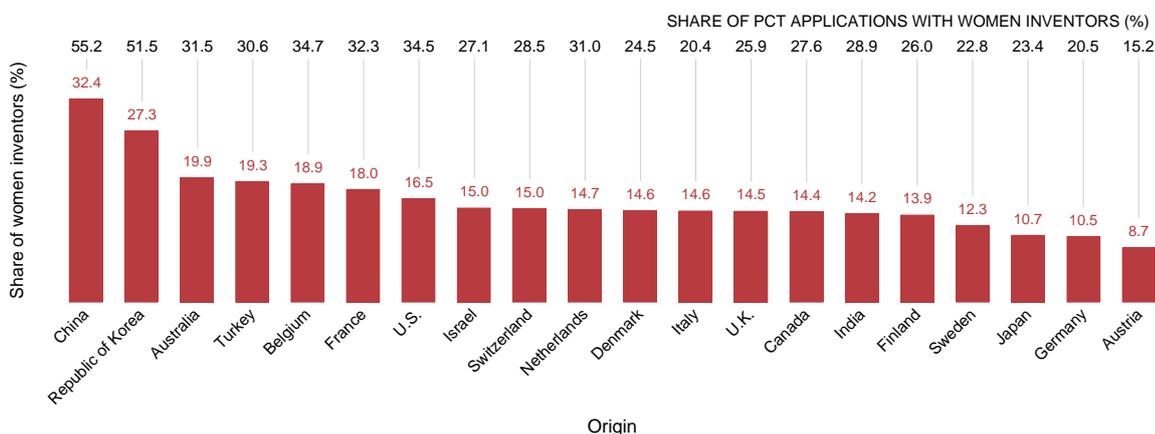
A34. Share of PCT applications with at least one woman as inventor and with at least one man as inventor, 2005–2019



Note: In order to attribute gender to inventors' names recorded in PCT applications, WIPO produced a gender-name dictionary based on information from 13 different public sources. Gender is attributed to a given name on a country-by-country basis, because certain names may be considered male in one country but female in another.

Source: WIPO Statistics Database, September 2020.

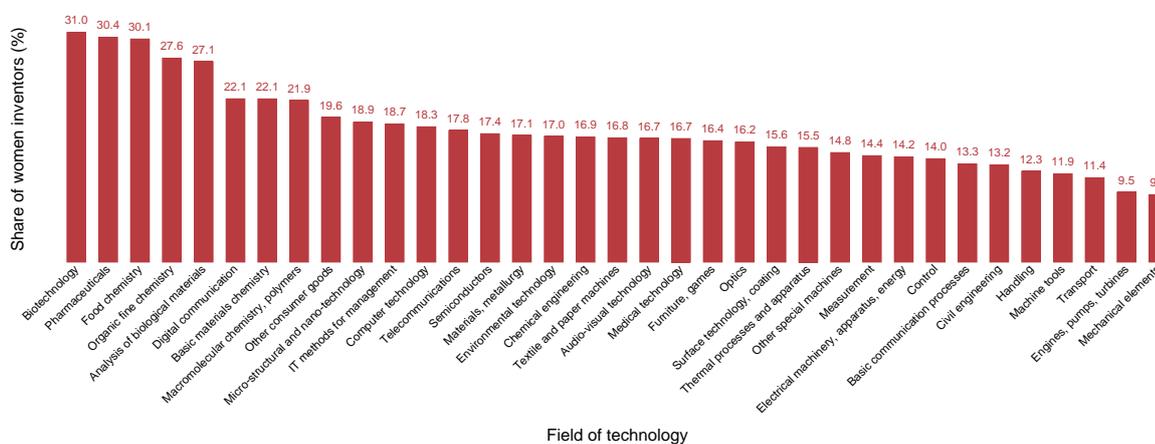
A35. Share of women among listed inventors and share of PCT applications with at least one woman as inventor for the top 20 origins, 2019



Note: In order to attribute gender to inventors' names recorded in PCT applications, WIPO produced a gender-name dictionary based on information from 13 different public sources. Gender is attributed to a given name on a country-by-country basis, because certain names may be considered male in one country but female in another.

Source: WIPO Statistics Database, September 2020.

A36. Share of PCT patent applications with women inventors by field of technology, 2019

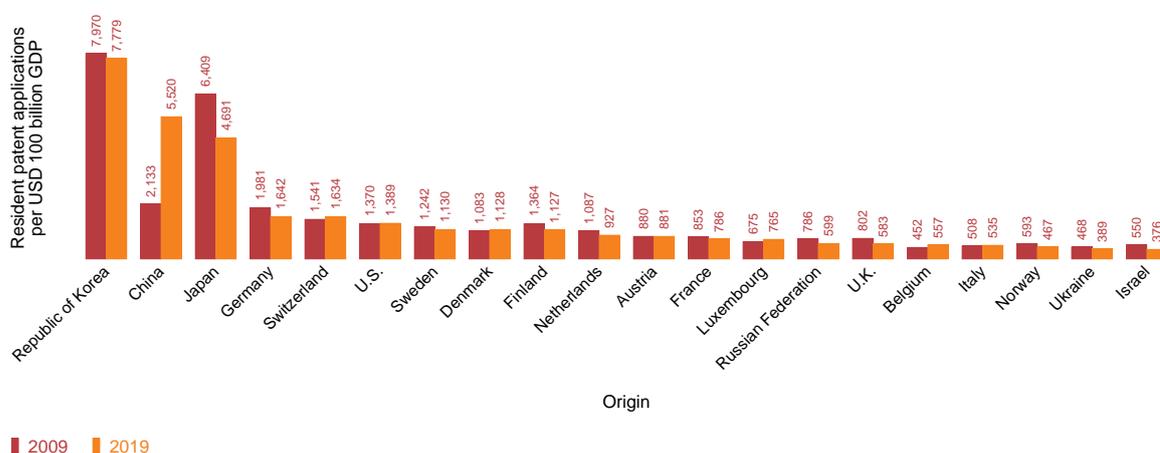


Note: In order to attribute gender to inventors' names recorded in PCT applications, WIPO produced a gender-name dictionary based on information from 13 different public sources. Gender is attributed to a given name on a country-by-country basis, because certain names may be considered male in one country but female in another.

Source: WIPO Statistics Database, September 2020.

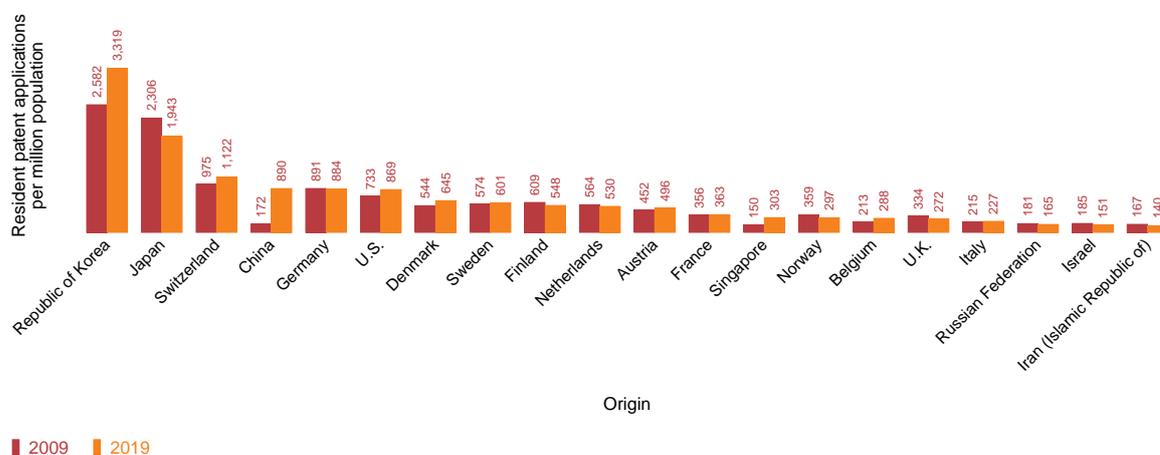
Patent applications in relation to GDP and population

A37. Resident patent applications per USD 100 billion GDP for the top 20 origins, 2009 and 2019



Note: GDP data are in 2017 US purchasing power parity (PPP) dollars. The top 20 origins were included if they had a GDP greater than USD 25 billion PPP and more than 100 resident patent applications. Due to space constraints, only the top 20 origins to fulfil these criteria are presented.
Sources: WIPO Statistics Database and World Bank, September 2020.

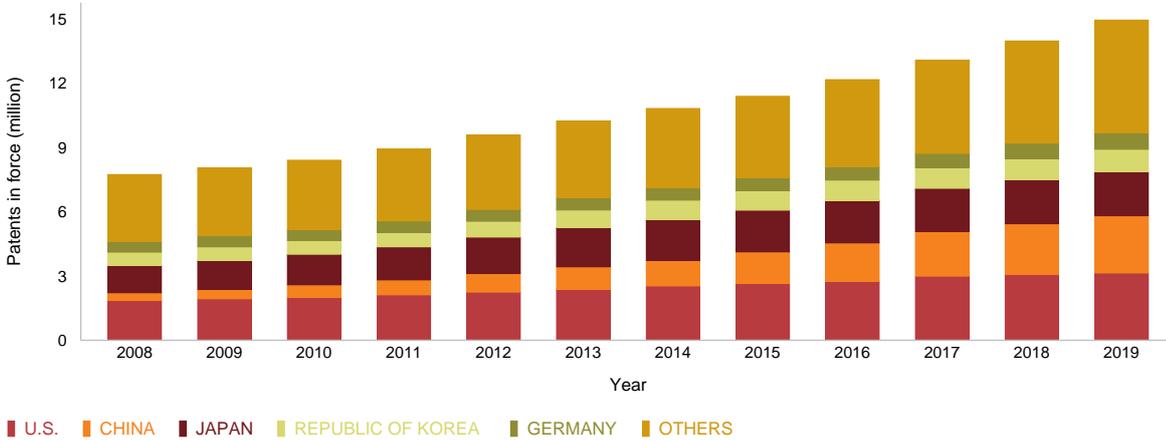
A38. Resident patent applications per million population for the top 20 origins, 2009 and 2019



Note: The top 20 origins were included if they had a population greater than 5 million and if they had more than 100 resident patent applications. Due to space constraints, only the top 20 origins to fulfil these criteria are presented.
Sources: WIPO Statistics Database and World Bank, September 2020.

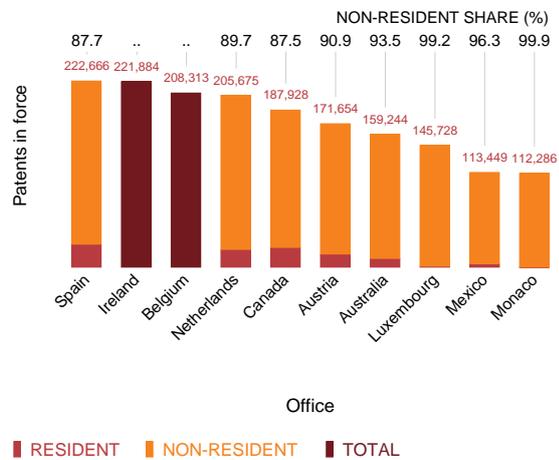
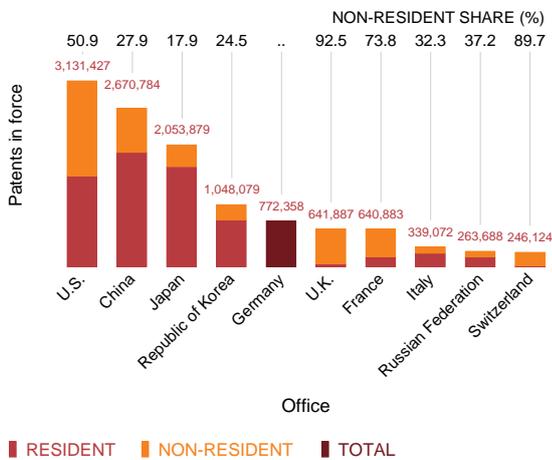
Patents in force

A39. Trend in patents in force worldwide, 2008–2019



Note: World totals are WIPO estimates using data covering 127 offices.
Source: WIPO Statistics Database, September 2020.

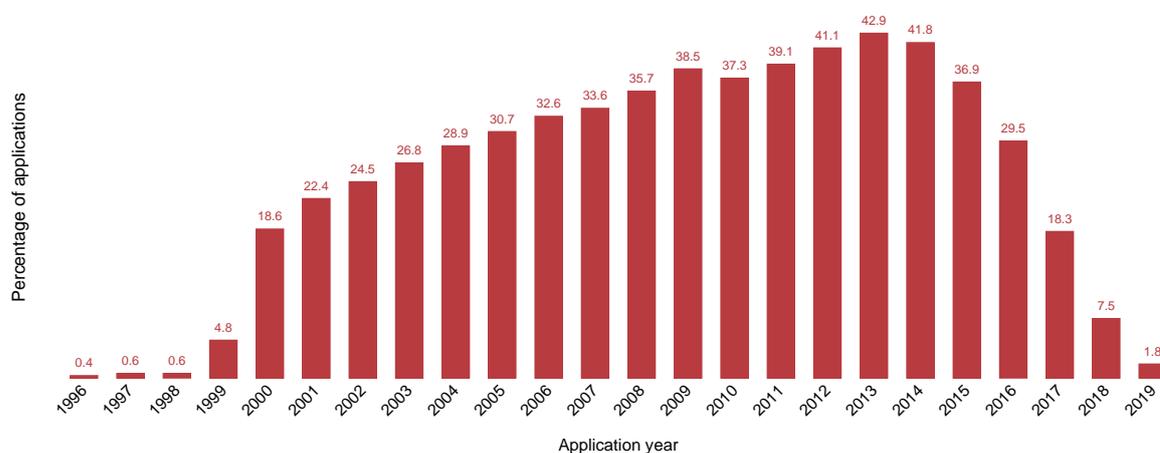
A40. Patents in force at the top 20 offices, 2019



.. indicates not available.

Source: WIPO Statistics Database, September 2020.

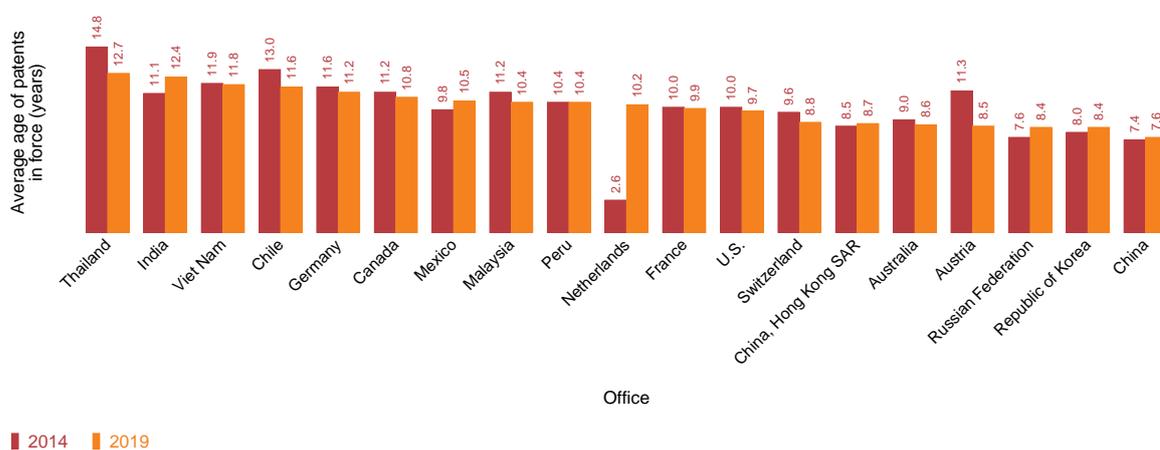
A41. Patents in force in 2019 as a percentage of total applications



Note: Percentages are calculated as the number of patent applications filed in year t and in force in 2019, divided by the total number of patent applications filed in year t . Patent holders must pay maintenance fees to maintain the validity of their patents. Depending on technological and commercial considerations, patent holders may opt to let a patent lapse before the end of the full protection term. This figure shows the distribution of patents in force in 2019 as a percentage of total applications in the year of filing. However, not all offices provide these data. Data for 86 offices show that 42.9% of the applications for which patents were eventually granted remained in force for at least 7 years after the application date. About 18.6% of these patents lasted the full 20-year patent term.

Source: WIPO Statistics Database, September 2020.

A42. Average age of patents in force at selected offices, 2014 and 2019

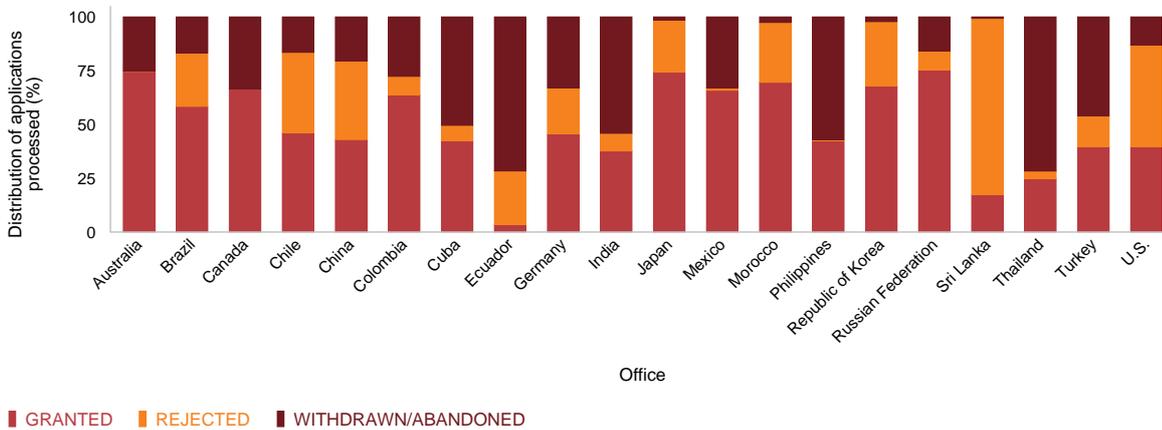


Note: The average age of patents in force is calculated using the following formula: $\frac{\sum(p \cdot y)}{\sum p}$, where p is the number of patents in force and y the number of years between filing and reporting year.

Source: WIPO Statistics Database, September 2020.

Patent office procedural data

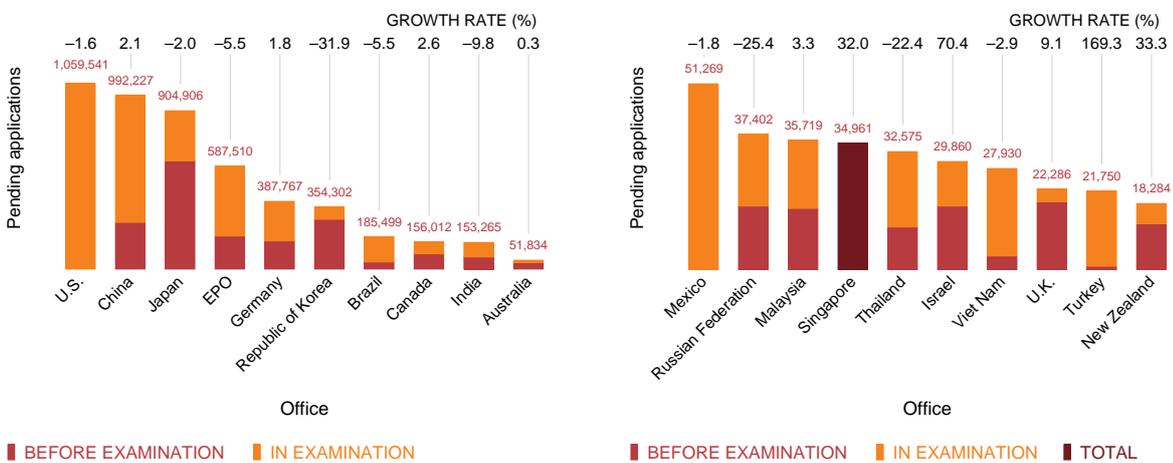
A43. Distribution of patent examination outcomes for selected offices, 2019



Note: The share of applications granted should not be interpreted as grant rates, as they are based on the examination date rather than the date when the application was filed. The number of grants in a given year relates to applications filed in previous years. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in patent procedures between offices, data cannot be fully harmonized. Therefore, caution should be exercised when making comparisons across offices.

Source: WIPO Statistics Database, September 2020.

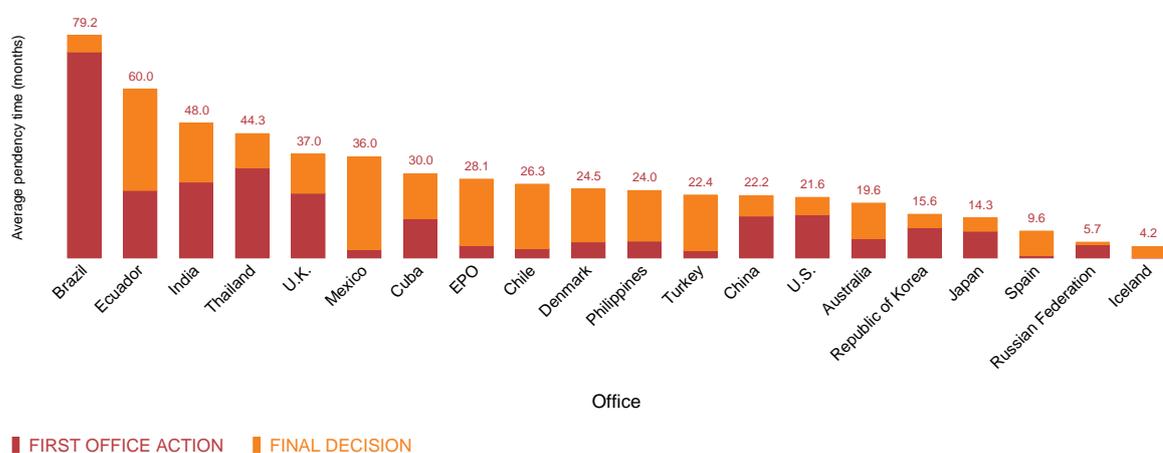
A44. Potentially pending applications at the top 20 offices, 2019



Note: EPO is the European Patent Office. Application processing varies between offices, making it difficult to measure pending applications. In some offices, patent applications automatically proceed to the examination stage, unless applicants withdraw them; in others, applications do not proceed to examination, unless applicants file a separate request for examination. To take account of procedural differences, pending application data are separated between (a) all patent applications, at any stage in the process, that are awaiting a final decision by a patent office, including those for which applicants have not filed a request for examination (where applicable), and (b) patent applications undergoing examination for which the applicant has requested examination (where such separate requests are necessary).

Source: WIPO Statistics Database, September 2020.

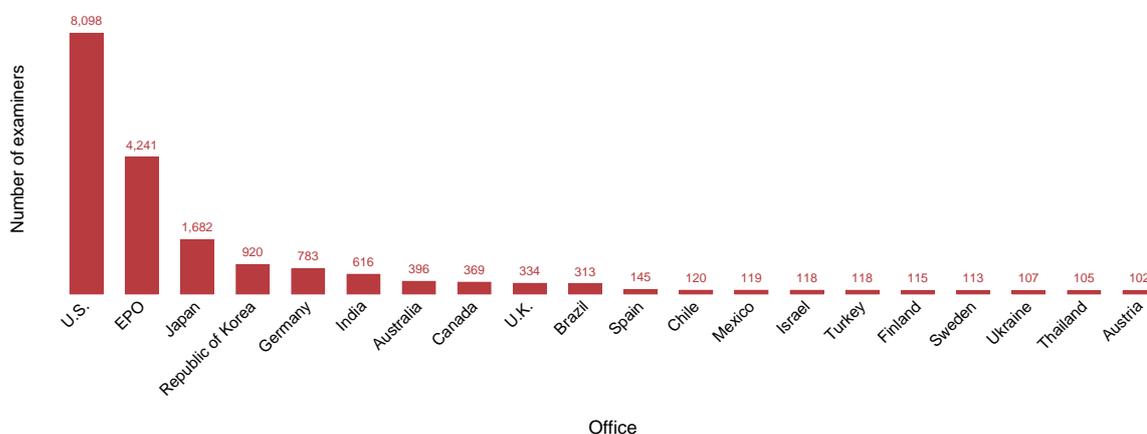
A45. Average pendency times for first office action and final decision at selected offices, 2019



Note: EPO is the European Patent Office. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in patent procedures between offices, data cannot be fully harmonized. Therefore, caution should be exercised when making comparisons across offices.

Source: WIPO Statistics Database, September 2020.

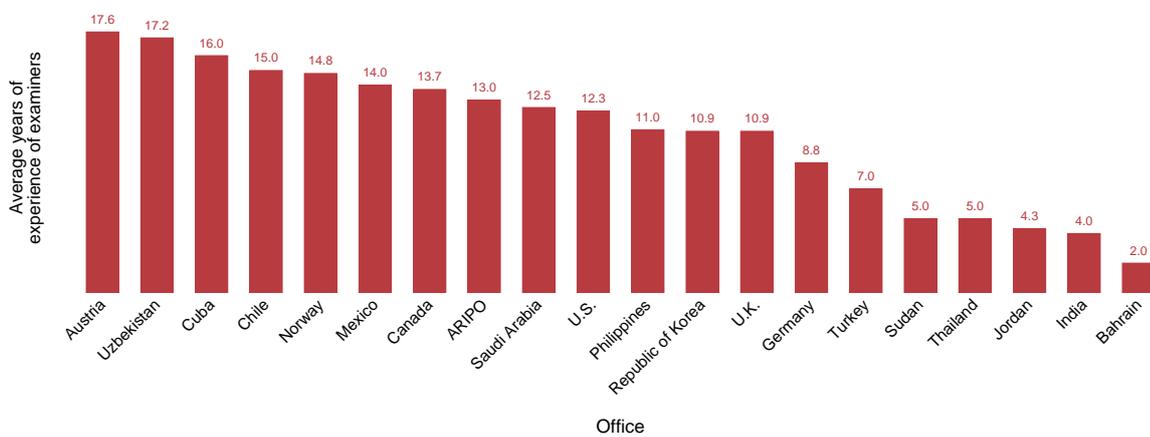
A46. Number of patent examiners for selected offices, 2019



Note: EPO is the European Patent Office.

Source: WIPO Statistics Database, September 2020.

A47. Average years of experience of patent examiners for selected offices, 2019



Note: ARIPO is the African Regional Intellectual Property Organization.
 Source: WIPO Statistics Database, September 2020.

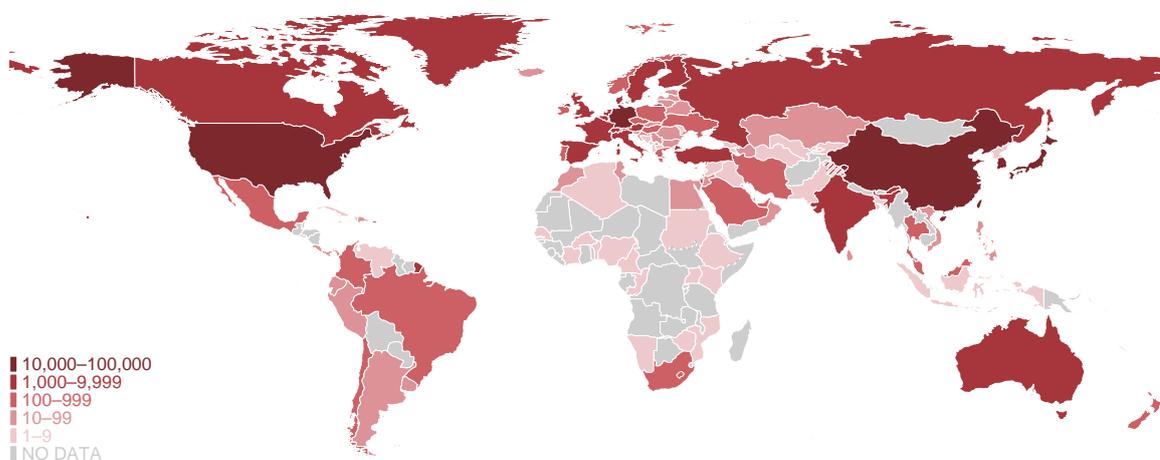
Patent applications filed through the Patent Cooperation Treaty (PCT) System

A48. Trend in PCT applications, 2005–2019



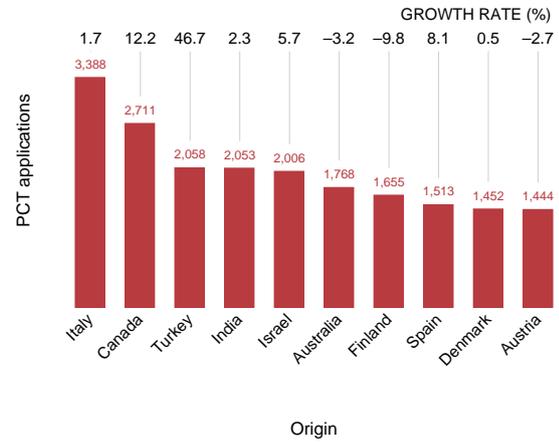
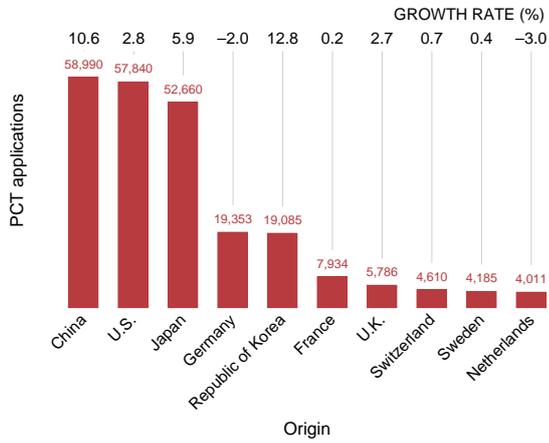
Note: Data refer to the international phase of the Patent Cooperation Treaty System. Counts are based on the international application date.
Source: WIPO Statistics Database, September 2020.

A49. PCT applications by origin, 2019



Note: Data refer to the international phase of the Patent Cooperation Treaty System. Counts are based on the residency of the first named applicant and the international application date.
Source: WIPO Statistics Database, September 2020.

A50. PCT applications for the top 20 origins, 2019



Note: Data refer to the international phase of the Patent Cooperation Treaty System. Counts are based on the residency of the first named applicant and the international application date.

Source: WIPO Statistics Database, September 2020.

Patent prosecution highway (PPH)

A51. PPH requests by office of first filing and offices of later examination, 2019

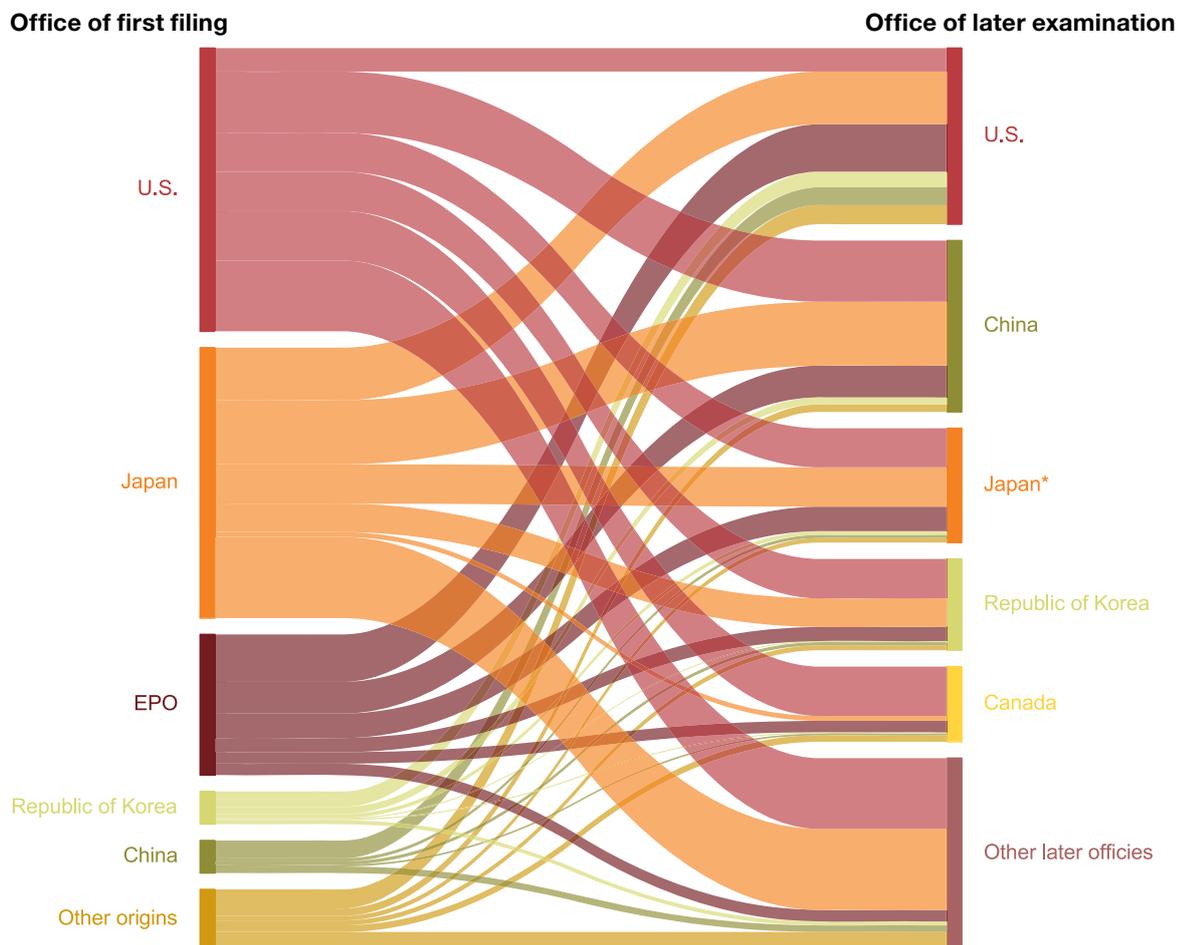
Office of later examination	Office of first filing															Total
	Australia	Canada	China	Denmark	EPO	Finland	Germany	Israel	Japan	Republic of Korea	Russian Federation	Singapore	U.K.	U.S.	Others/Unknown	
Australia	48	7	21	16	67	2	37	5	90	16	1	3	43	875	90	1,321
Canada	79	104	67		430	6	5	4	185	43	19	8	11	1,866	15	2,842
China		21		57	1,198	18	84	11	2,417	267	32	9	24	2,313	28	6,479
EPO	8	42	101					16	474	62	14	9		650		1,376
Germany			14	2		12		1	930	8	3	1	23	219	1	1,214
Indonesia									462					2	1	465
Israel	17	4	8		152		1	30	21	11	1	2	4	273	1	525
Japan*	37	11	116	19	926	7	24	7	1,489	143	16	25	9	1,476	17	4,322
Lithuania			22	1				2			4	3			91	123
Mexico		12	4		136				173	2		2		297	17	643
Republic of Korea	27	6	123	27	536	6	17	6	1,077	42	18	27	8	1,492	41	3,453
Russian Federation	1		7		17	2	1	1	29	10			2	84	2	156
Singapore	4		44		12	1		2	33	2		2		47		147
Thailand									545							545
U.K.	3	1	20						23	5				114		166
U.S.	89	124	676	17	1,794	38	86	77	1,992	592	94	35	63	886	96	6,659
Viet Nam									198	31						229
Others/Unknown	3	12	7	1	49	8	1	1	88	2	2	0	13	116	14	317
Total	316	344	1,230	140	5,317	100	256	163	10,226	1,236	204	123	203	10,710	414	30,982

Note: EPO is the European Patent Office. A patent prosecution highway is a bilateral agreement between two offices that enables applicants to request a fast-track examination whereby patent examiners can use the work already undertaken by the other office.

* indicates data based on office of earlier examination rather than office of first filing.

Source: WIPO Statistics Database, September 2020.

A52. Flows of PPH requests between offices of first filing and offices of later examination, 2019



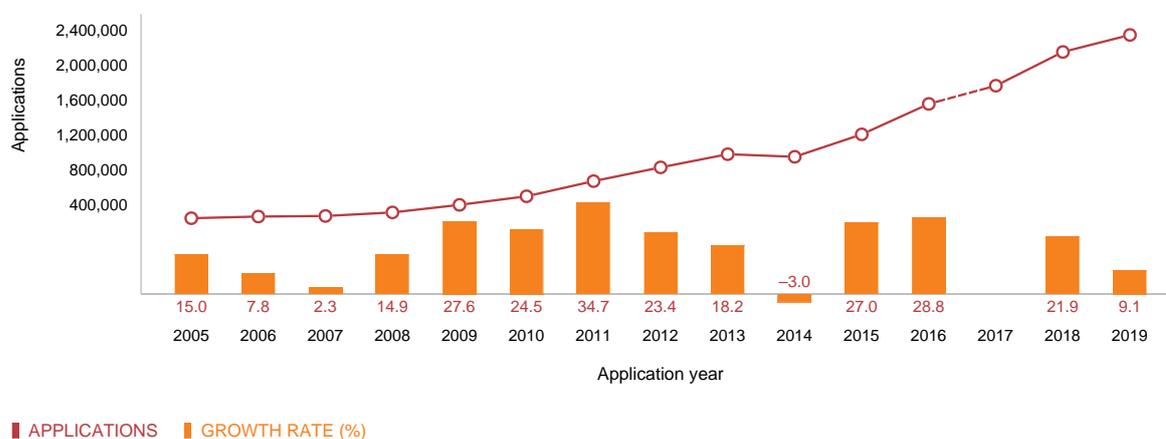
Note: EPO is the European Patent Office. Japan data refers to the office of earlier examination rather than the office of first filing. A patent prosecution highway (PPH) is a bilateral agreement between two offices that enables applicants to request a fast-track examination whereby patent examiners can use the work already undertaken by the other office. This graph shows the flows of PPH requests between offices of first filing and offices of later examination.

* indicates data based on office of earlier examination rather than office of first filing.

Source: WIPO Statistics Database, September 2020.

Utility model applications

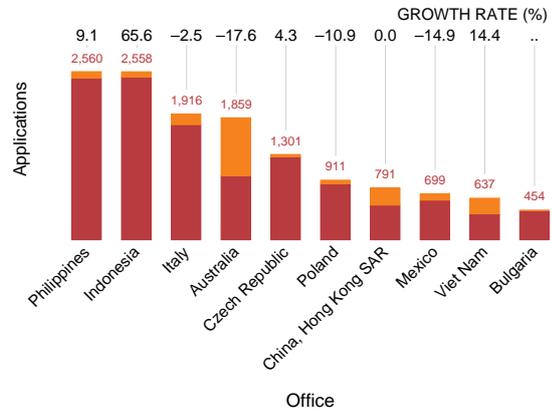
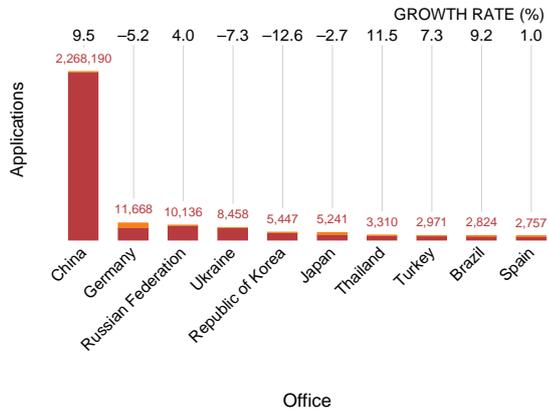
A53. Trend in utility model applications worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 80 patent offices. These totals include applications filed directly with national and regional offices and applications entering offices through the Patent Cooperation Treaty national phase (where applicable). China's pre-2017 data are not comparable due a change in methodology. Due to this break in the data series and to the large number of filings in China, it is not possible to report accurately the 2017 growth rate at world level (see the data description section in Additional information for details).

Source: WIPO Statistics Database, September 2020.

A54. Utility model applications for the top 20 offices, 2019



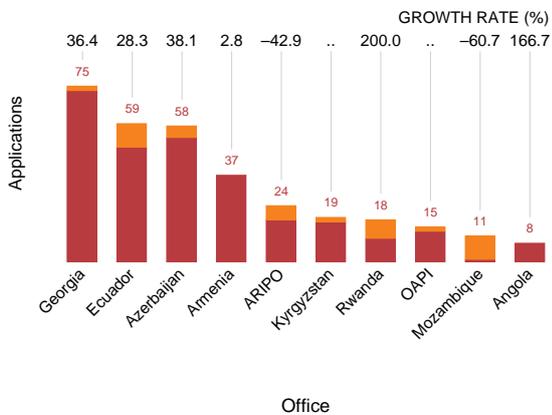
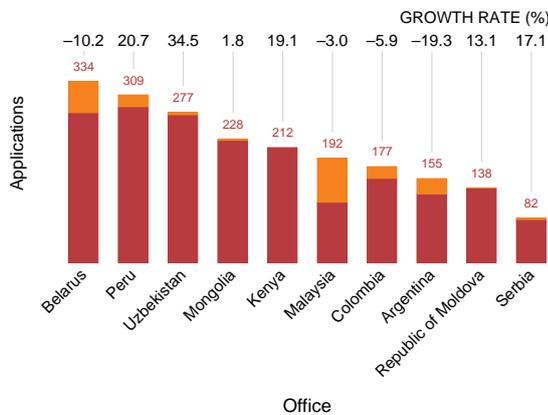
■ RESIDENT ■ NON-RESIDENT

■ RESIDENT ■ NON-RESIDENT

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

A55. Utility model applications for offices of selected low- and middle-income countries, 2019



■ RESIDENT ■ NON-RESIDENT

■ RESIDENT ■ NON-RESIDENT

Note: ARIPO is the African Regional Intellectual Property Organization and OAPI is the African Intellectual Property Organization.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

Microorganisms

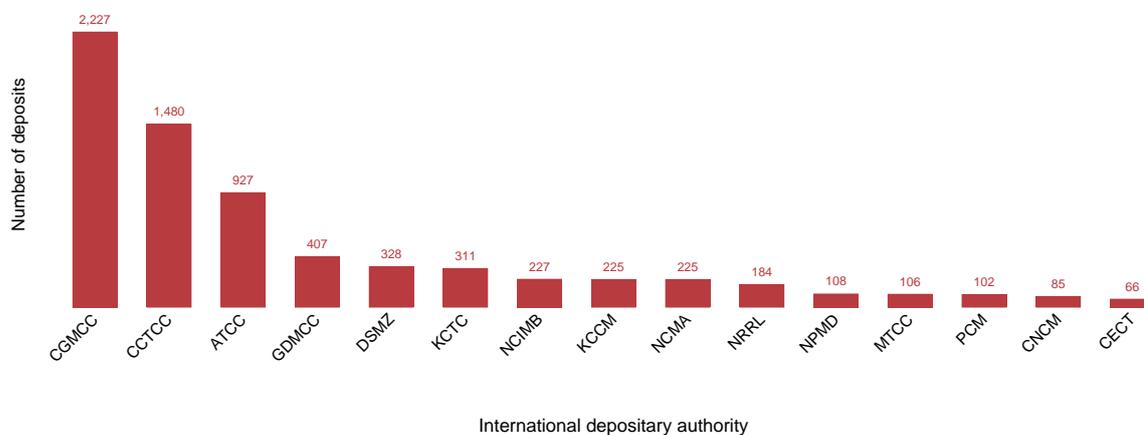
A56. Trend in microorganism deposits worldwide, 2005–2019



Note: Deposits of microorganisms for patent procedures are important for biotechnological inventions. Disclosing an invention is a requirement for receiving a patent.

Source: WIPO Statistics Database, September 2020.

A57. Deposits at the top international depository authorities, 2019



Note: ATCC is the American Type Culture Collection (U.S.), CCTCC is the China Center for Type Culture Collection (China), CECT is the Colección Española de Cultivos Tipo (Spain), CGMCC is the China General Microbiological Culture Collection Center (China), CNCM is the Collection Nationale de Cultures de Micro-organismes (France), DSMZ is the Leibniz-Institut DSMZ (Deutsche Sammlung von Mikroorganismen und Zellkulturen GmbH; Germany), GDMCC is the Guangdong Microbial Culture Collection Center (China), KCCM is the Korean Culture Center of Microorganisms (Republic of Korea), KCTC is the Korean Collection for Type Cultures (Republic of Korea), MTCC is the Microbial Type Culture Collection and Gene Bank (India), NCIMB is the National Collection of Industrial, Food and Marine Bacteria (U.K.), NCMA is the Provasoli-Guillard National Center for Marine Algae and Microbiota (U.S.), NPMD is the National Institute of Technology and Evaluation, Patent Microorganisms Depository (Japan), NRRL is the Agriculture Research Service Culture Collection (U.S.) and PCM is the Polish Collection of Microorganisms (Poland).

Source: WIPO Statistics Database, September 2020.

Statistical tables

A58. Patent applications by office and origin, 2019

Name	Applications by office			Equivalent applications by origin Total ^(a)	PCT international applications		PCT national phase entry	
	Total	Resident	Non-resident		Receiving office	Origin	Office	Origin
Afghanistan (b)	..	..	..	9	n.a.	0	..	1
African Intellectual Property Organization	514	90	424	n.a.	2	n.a.	408	n.a.
African Regional Intellectual Property Organization	868	19	849	n.a.	1	n.a.	816	n.a.
Albania	5	4	1	24	1	3	..	3
Algeria	638	113	525	119	6	9	503	..
Andorra	15	3	12	53	n.a.	4	..	45
Angola (c)	110	2	108	3	n.a.	0	108	..
Antigua and Barbuda (b)	..	..	..	343	0	47	..	266
Argentina	3,702	442	3,260	815	n.a.	36	..	122
Armenia	116	112	4	211	0	3	1	14
Aruba (b)	..	..	..	24	n.a.	0	..	21
Australia	29,758	2,637	27,121	12,568	1,604	1,768	20,908	7,886
Austria	2,274	2,066	208	14,459	499	1,444	429	6,842
Azerbaijan	167	147	20	584	10	12	16	11
Bahamas (b)	..	..	..	81	n.a.	2	..	40
Bahrain	326	4	322	79	0	2	316	47
Bangladesh	413	68	345	89	n.a.	2	..	2
Barbados (c)	31	31	0	786	n.a.	79	31	212
Belarus	393	298	95	1,284	18	16	64	36
Belgium	1,133	876	257	14,195	0	1,355	..	7,609
Belize	32	0	32	15	0	0	32	12
Benin (b,d,g)	n.a.	n.a.	n.a.	102	n.a.	1	n.a.	..
Bermuda (b)	..	..	..	125	n.a.	15	..	69
Bhutan (b)	..	..	..	2	n.a.	0	..	1
Bolivia (Plurinational State of) (b)	..	..	..	33	n.a.	0	..	5
Bosnia and Herzegovina	59	45	14	61	2	2	5	8
Botswana	2	2	0	3	0	0	..	..
Brazil	25,396	5,464	19,932	7,409	617	644	18,270	1,118
Brunei Darussalam	141	7	134	21	1	2	129	8
Bulgaria	193	186	7	466	34	49	4	129
Burkina Faso (b,d,g)	n.a.	n.a.	n.a.	..	n.a.	1	n.a.	..
Burundi (b)	..	..	..	7	n.a.	0	..	6
Cabo Verde	1	0	1	..	n.a.	0	..	..
Cambodia (b)	..	..	..	2	0	0	..	1
Cameroon (b,d,g)	n.a.	n.a.	n.a.	528	n.a.	1	n.a.	..
Canada	36,488	4,238	32,250	24,469	2,056	2,711	28,577	8,262
Central African Republic (b,d,g)	n.a.	n.a.	n.a.	17	n.a.	0	n.a.	..
Chile	3,237	438	2,799	1,657	195	224	2,739	893
China	1,400,661	1,243,568	157,093	1,327,847	60,993	58,990	89,249	47,631
China, Hong Kong SAR	16,532	346	16,186	2,180	n.a.	0	..	429
China, Macao SAR	38	0	38	160	n.a.	0	..	61
Colombia	2,157	422	1,735	638	17	127	1,665	102
Congo (b,d,g)	n.a.	n.a.	n.a.	87	n.a.	1	n.a.	1
Costa Rica	499	16	483	114	3	12	474	20
Côte d'Ivoire (b,d,g)	n.a.	n.a.	n.a.	308	n.a.	1	n.a.	..

Name	Applications by office			Equivalent applications by origin	PCT international applications		PCT national phase entry	
	Total	Resident	Non-resident	Total ^(a)	Receiving office	Origin	Office	Origin
Croatia	211	195	16	327	31	41	5	89
Cuba	115	27	88	114	9	9	85	65
Curaçao (b)	..	..	..	21	n.a.	0	..	11
Cyprus	5	4	1	354	2	44	..	175
Czech Republic	813	765	48	2,267	123	186	18	604
Democratic People's Republic of Korea (b)	..	..	..	41	1	1	..	12
Denmark	1,579	1,351	228	13,163	445	1,452	86	6,995
Dominican Republic	243	23	220	45	12	13	220	13
Ecuador	437	29	408	46	0	18	401	11
Egypt	2,183	1,027	1,156	1,183	36	44	1,123	56
El Salvador	148	1	147	3	1	2	145	..
Eritrea (b)	..	..	..	1	n.a.	0	..	..
Estonia	32	31	1	278	1	38	..	78
Eswatini (b,f)	..	..	..	32	n.a.	0	..	29
Ethiopia (b)	..	..	..	1	n.a.	1	..	..
Eurasian Patent Organization	3,482	724	2,758	n.a.	8	n.a.	2,581	n.a.
European Patent Office	181,479	82,584	98,895	n.a.	38,028	n.a.	105,681	n.a.
European Union (b)	..	..	..	1	n.a.	0	..	..
Fiji (b)	..	..	..	..	n.a.	1	..	..
Finland	1,396	1,321	75	11,470	958	1,655	22	6,059
France	15,869	14,103	1,766	67,294	3,217	7,934	..	31,698
Gabon (b,d,g)	n.a.	n.a.	n.a.	139	n.a.	0	n.a.	3
Gambia (f)	16	0	16	..	n.a.	0	16	..
Georgia	197	85	112	89	4	6	110	1
Germany	67,434	46,632	20,802	178,184	1,527	19,353	7,507	69,050
Ghana (b)	..	..	..	6	0	0	..	4
Greece	594	356	238	1,164	91	123	..	435
Guatemala	238	7	231	13	0	0	222	..
Guinea (b,d,g)	n.a.	n.a.	n.a.	5	n.a.	0	n.a.	3
Honduras	187	0	187	1	0	0	179	..
Hungary	450	427	23	1,443	104	157	13	762
Iceland	62	47	15	252	19	41	8	113
India	53,627	19,454	34,173	34,015	981	2,053	28,155	4,171
Indonesia	11,481	3,093	8,388	3,141	1	7	7,440	100
International Bureau (b)	..	..	..	n.a.	12,909	n.a.	..	n.a.
Iran (Islamic Republic of)	12,147	11,569	578	11,705	35	229	..	26
Iraq (b)	..	..	..	9	n.a.	2	..	3
Ireland	93	58	35	6,484	10	642	..	2,616
Israel	7,738	1,368	6,370	16,078	1,450	2,006	6,649	6,874
Italy	10,127	9,229	898	32,001	404	3,388	..	13,488
Jamaica	65	14	51	26	n.a.	1	..	3
Japan	307,969	245,372	62,597	452,130	51,691	52,660	66,968	128,395
Jordan	311	21	290	49	12	19	254	10
Kazakhstan (b)	..	..	..	902	24	27	..	55
Kenya	335	294	41	372	3	8	36	7
Kuwait (b)	..	..	..	129	n.a.	5	..	1

Name	Applications by office			Equivalent applications by origin Total ^(a)	PCT international applications		PCT national phase entry	
	Total	Resident	Non-resident		Receiving office	Origin	Office	Origin
Kyrgyzstan	93	92	1	161	1	2	..	..
Lao People's Democratic Republic (b,c)	..	..	..	1	n.a.	0	..	..
Latvia	87	82	5	177	1	36	..	51
Lebanon (b)	..	..	..	79	n.a.	3	..	8
Libya (b)	..	..	..	7	0	0	..	6
Liechtenstein (b,e)	..	..	..	1,449	n.a.	265	..	857
Lithuania	123	90	33	246	1	32	..	97
Luxembourg	476	117	359	2,701	0	348	..	1,828
Madagascar (c)	30	0	30	..	n.a.	0	28	..
Malawi (b)	..	..	..	2	0	0	..	..
Malaysia	7,551	1,071	6,480	2,122	188	202	5,511	448
Mali (b,d,g)	n.a.	n.a.	n.a.	59	n.a.	0	n.a.	..
Malta	12	5	7	378	0	38	..	191
Marshall Islands (b)	..	..	..	2	n.a.	0	..	..
Mauritius	27	4	23	70	n.a.	10	..	14
Mexico	15,941	1,305	14,636	2,534	174	220	12,516	769
Monaco	15	10	5	159	0	12	..	59
Mongolia	170	84	86	90	0	0	80	4
Montenegro (c)	16	16	0	18	1	1	..	..
Morocco	2,730	199	2,531	292	28	34	2,178	79
Mozambique (f)	47	23	24	23	n.a.	1	23	..
Myanmar (b)	..	..	..	3	n.a.	0	..	..
Namibia (f)	20	8	12	20	n.a.	3	8	10
Nepal (b)	..	..	..	29	n.a.	0	..	..
Netherlands	2,677	2,228	449	35,359	894	4,011	..	20,336
Netherlands Antilles (b)	..	..	..	2	n.a.	0	..	2
New Zealand	6,014	324	5,690	2,173	164	250	4,414	1,112
Niger (b,d,g)	n.a.	n.a.	n.a.	53	n.a.	0	n.a.	..
Nigeria (b,c)	..	..	..	13	n.a.	1	..	2
North Macedonia (b)	..	..	..	8	5	5	..	..
Norway	1,539	957	582	6,225	314	781	562	3,750
Oman (c)	506	30	476	54	10	10	468	6
Pakistan	874	313	561	411	n.a.	1	..	6
Palau (b)	..	..	..	1	n.a.	0	..	..
Panama	362	34	328	64	0	17	324	20
Paraguay (b)	..	..	..	4	n.a.	0	..	2
Patent Office of the Cooperation Council for the Arab States of the Gulf	2,162	593	1,569	n.a.	n.a.	n.a.	..	n.a.
Peru	1,259	137	1,122	182	25	26	1,074	38
Philippines	4,380	501	3,879	674	13	21	3,495	34
Poland	3,999	3,887	112	6,174	202	364	53	993
Portugal	807	703	104	2,148	54	196	11	923
Qatar	838	39	799	130	17	25	814	47
Republic of Korea	218,975	171,603	47,372	248,427	18,899	19,085	39,021	30,678
Republic of Moldova	100	85	15	123	6	7	7	21
Romania	939	881	58	1,181	38	42	19	78

Name	Applications by office			Equivalent applications by origin	PCT international applications		PCT national phase entry	
	Total	Resident	Non-resident	Total ^(a)	Receiving office	Origin	Office	Origin
Russian Federation	35,511	23,337	12,174	29,711	1,247	1,218	9,882	2,844
Rwanda (b)	..	..	..	1	0	0	..	..
Saint Kitts and Nevis (b)	..	..	..	28	0	5	..	27
Saint Lucia (b,c)	..	..	..	71	n.a.	0	..	38
Saint Vincent and the Grenadines (c)	3	0	3	..	n.a.	0	3	..
Samoa	3	2	1	70	n.a.	1	..	17
San Marino	752	11	741	65	1	5	1	22
Saudi Arabia	3,651	1,188	2,463	7,401	31	552	2,691	1,615
Senegal (b,d,g)	n.a.	n.a.	n.a.	221	n.a.	4	n.a.	..
Serbia	177	168	9	290	32	38	7	56
Seychelles	12	0	12	36	0	1	6	7
Sierra Leone (b,f)	..	..	..	2	n.a.	0	..	..
Singapore	14,136	1,727	12,409	7,354	654	1,029	8,914	2,693
Slovakia	234	206	28	568	22	41	5	253
Slovenia (b)	..	..	..	515	35	89	..	267
South Africa	6,914	567	6,347	1,514	80	281	5,834	792
Spain	1,447	1,288	159	9,920	958	1,513	89	4,514
Sri Lanka (c)	611	356	255	412	n.a.	17	241	39
Sudan	245	238	7	252	3	3	4	9
Sweden	2,190	1,802	388	27,721	1,360	4,185	70	17,982
Switzerland	1,717	1,369	348	45,988	64	4,610	73	24,792
Syrian Arab Republic	153	121	32	124	3	3	32	1
Tajikistan	2	1	1	105	0	0	1	..
Thailand	8,172	821	7,351	1,766	71	146	6,528	589
Togo (b,d,g)	n.a.	n.a.	n.a.	34	n.a.	0	n.a.	..
Trinidad and Tobago	113	1	112	9	0	3	112	3
Tunisia (b)	..	..	..	14	10	11	..	5
Turkey	8,088	7,871	217	10,043	1,747	2,058	274	1,679
Turkmenistan (b)	..	..	..	1	0	1	..	..
Uganda (b,f)	..	..	..	2	0	2	..	..
Ukraine	3,852	2,097	1,755	2,467	171	184	1,554	154
United Arab Emirates (c)	1,904	58	1,846	791	n.a.	108	1,797	246
United Kingdom	19,250	12,061	7,189	54,762	3,829	5,786	2,291	24,415
United Republic of Tanzania (b,f)	..	..	..	8	n.a.	0	..	1
United States of America	621,453	285,113	336,340	521,145	56,228	57,840	121,600	184,921
Uruguay (b)	..	..	..	61	n.a.	10	..	42
Uzbekistan	543	374	169	456	0	1	153	52
Venezuela (Bolivarian Republic of) (b)	..	..	..	23	n.a.	1	..	5
Viet Nam	7,520	720	6,800	838	23	34	5,861	35
Yemen	75	60	15	63	n.a.	0	..	..
Zambia	23	2	21	3	0	0	21	..
Zimbabwe (b)	..	..	..	10	0	2	..	3
Others/Unknown	..	..	..	58,645	n.a.	240	..	11,139
Total (2019 estimates)	3,224,200	2,231,200	993,000	n.a.	265,800	265,800	632,700	n.a.

- (a) Equivalent applications by origin data are incomplete because some offices do not report by origin.
 - (b) The office did not report resident applications therefore the equivalent applications by origin data may be incomplete.
 - (c) The International Bureau acts as the receiving office for PCT applications.
 - (d) The African Intellectual Property Organization (OAPI) acts as the receiving office for PCT applications.
 - (e) The Swiss Federal Institute of Intellectual Property (IFPI) acts as the receiving office for PCT applications.
 - (f) The African Regional Intellectual Property Organization (ARIPO) acts as the receiving office for PCT applications.
 - (g) The African Intellectual Property Organization (OAPI) acts as the national office for patent applications.
- .. indicates not available.
n.a. indicates not applicable.
Source: WIPO Statistics Database, September 2020.

A59. Patent grants by office and origin, and patents in force, 2019

Name	Total	Resident	Grants by office		Equivalent grants by origin	
			Non-resident	Total ^(a)	In force by office	Total
Afghanistan	..	..	..	..	5	..
African Intellectual Property Organization	490	104	386	n.a.	..	..
African Regional Intellectual Property Organization	245	0	245	n.a.	1,921	..
Albania	2	2	0	4	6,017	..
Algeria	140	31	109	34	4,496	..
Andorra	11	1	10	13	20	..
Angola	..	..	..	1	..	..
Antigua and Barbuda	..	..	..	27	..	..
Argentina	2,177	165	2,012	368	..	..
Armenia	100	97	3	148	219	..
Aruba	..	..	..	5	..	..
Australia	17,010	829	16,181	5,676	159,244	..
Austria	1,112	973	139	9,435	171,654	..
Azerbaijan	102	87	15	364	236	..
Bahamas	..	..	..	70	..	..
Bahrain	74	0	74	6	130	..
Bangladesh	129	..	..	17	1,429	..
Barbados	..	..	..	589	..	..
Belarus	461	388	73	1,486	1,813	..
Belgium	998	813	185	8,568	208,313	..
Belize	9	0	9	8	41	..
Benin (b)	n.a.	n.a.	n.a.	97	..	..
Bermuda	..	..	..	104	..	..
Bolivia (Plurinational State of)	..	..	..	3	..	..
Bonaire, Sint Eustatius and Saba	..	..	..	1	..	..
Bosnia and Herzegovina	2	0	2	10	184	..
Botswana	..	..	..	1	2,040	..
Brazil	10,947	906	10,041	1,853	39,538	..
Brunei Darussalam	46	0	46	3	780	..
Bulgaria	195	182	13	334	14,342	..
Burkina Faso (b)	n.a.	n.a.	n.a.	85	..	..
Burundi	..	..	..	1	..	..
Cabo Verde	..	..	..	1	..	..
Cambodia	..	..	..	2	..	..
Cameroon (b)	n.a.	n.a.	n.a.	582	..	..
Canada	22,009	2,035	19,974	14,636	187,928	..
Central African Republic (b)	n.a.	n.a.	n.a.	55	..	..
Chad (b)	n.a.	n.a.	n.a.	17	..	..
Chile	1,490	282	1,208	550	14,438	..
China	452,804	360,919	91,885	399,878	2,670,784	..
China, Hong Kong SAR	6,780	107	6,673	1,232	51,949	..
China, Macao SAR	20	0	20	67	366	..
Colombia	1,630	313	1,317	417	8,211	..
Comoros	..	..	..	11	..	..

Name	Total	Resident	Grants by office		Equivalent grants by origin	
			Non-resident	Total ^(a)	In force by office	Total
Congo (b)	n.a.	n.a.	n.a.	17	..	..
Cook Islands	..	..	..	1	..	..
Costa Rica	191	4	187	26	1,068	..
Côte d'Ivoire (b)	n.a.	n.a.	n.a.	289	..	..
Croatia	20	6	14	83	10,059	..
Cuba	89	4	85	80	648	..
Curaçao	..	..	..	11	..	..
Cyprus	1	1	0	210	16	..
Czech Republic	509	467	42	1,510	48,391	..
Democratic People's Republic of Korea	..	..	..	18	..	..
Democratic Republic of the Congo	..	..	..	2	..	..
Denmark	501	291	210	7,014	65,967	..
Dominica	..	..	..	4	..	..
Dominican Republic	158	10	148	16	758	..
Ecuador	17	3	14	8	71	..
Egypt	747	0	747	50	5,827	..
El Salvador	117	1	116	3	..	..
Equatorial Guinea (b)	n.a.	n.a.	n.a.	175	..	..
Eritrea	..	..	..	2	..	..
Estonia	5	5	0	156	11,194	..
Eswatini	..	..	..	13	..	..
Eurasian Patent Organization	2,697	477	2,220	n.a.	n.a.	..
European Patent Office	137,782	60,569	77,213	n.a.	n.a.	..
Finland	505	453	52	8,692	54,501	..
France	13,593	11,673	1,920	51,855	640,883	..
Gabon (b)	n.a.	n.a.	n.a.	51	..	..
Gambia	16	0	16	..	..	..
Georgia	115	31	84	41	986	..
Germany	18,255	11,770	6,485	105,181	772,358	..
Ghana	..	..	..	1	..	..
Greece	248	237	11	686	28,321	..
Guatemala	50	0	50	6	883	..
Guinea (b)	n.a.	n.a.	n.a.	72	..	..
Guyana	..	..	..	2	..	..
Haiti	..	..	..	1	..	..
Honduras	85	0	85	1	267	..
Hungary	135	109	26	655	31,958	..
Iceland	9	6	3	140	8,481	..
India	23,578	3,690	19,888	10,804	76,556	..
Indonesia	10,514	696	9,818	714	..	..
Iran (Islamic Republic of)	2,769	2,484	285	2,580	53,565	..
Iraq	..	..	..	4	..	..
Ireland	48	17	31	3,459	221,884	..
Israel	4,197	750	3,447	8,251	34,892	..

Name	Total	Grants by office		Equivalent grants by origin	In force by office
		Resident	Non-resident	Total ^(a)	Total
Italy	8,617	8,275	342	25,017	339,072
Jamaica	1	1	0	15	..
Japan	179,910	140,865	39,045	283,926	2,053,879
Jordan	88	5	83	37	554
Kazakhstan	186	0	186	377	2,891
Kenya	28	5	23	24	..
Kiribati	..	..	..	42	..
Kuwait	..	..	..	51	..
Kyrgyzstan	67	65	2	111	223
Latvia	52	40	12	94	9,928
Lebanon	..	..	..	36	..
Lesotho	..	..	..	10	..
Libya	..	..	..	1	..
Liechtenstein	..	..	..	752	..
Lithuania	112	77	35	154	455
Luxembourg	326	10	316	2,136	145,728
Madagascar	15	1	14	2	234
Malaysia	4,106	565	3,541	1,162	27,309
Mali (b)	n.a.	n.a.	n.a.	74	..
Malta	22	5	17	226	325
Marshall Islands	..	..	..	1	..
Mauritania (b)	n.a.	n.a.	n.a.	51	..
Mauritius	4	3	1	34	..
Mexico	8,702	438	8,264	1,145	113,449
Monaco	4	2	2	116	112,286
Mongolia	177	69	108	71	1,155
Montenegro	7	7	0	9	..
Morocco	357	101	256	164	8,737
Mozambique	..	..	..	2	3,041
Myanmar	..	..	..	2	..
Namibia	30	5	25	8	643
Netherlands	1,936	1,578	358	24,436	205,675
Netherlands Antilles	..	..	..	3	..
New Zealand	1,642	94	1,548	1,160	30,519
Nicaragua	..	..	..	1	..
Niger (b)	n.a.	n.a.	n.a.	87	..
Nigeria	..	..	..	5	..
North Macedonia	..	..	..	3	7,445
Norway	1,211	494	717	3,538	42,202
Oman	91	0	91	26	506
Pakistan	268	31	237	59	1,861
Palau	..	..	..	12	..
Panama	133	0	133	37	1,343
Paraguay	..	..	..	9	..
Patent Office of the Cooperation Council for the Arab States of the Gulf	1,264	210	1,054	n.a.	7,993
Peru	713	32	681	59	3,432

Name	Total	Resident	Grants by office		Equivalent grants by origin	In force by office
			Non-resident	Total ^(a)	Total	
Philippines	1,458	49	1,409	149	24,797	
Poland	3,042	2,947	95	4,093	91,974	
Portugal	80	74	6	609	40,052	
Qatar	15	1	14	77	..	
Republic of Korea	125,661	94,852	30,809	141,552	1,048,079	
Republic of Moldova	57	29	28	42	317	
Romania	357	349	8	509	24,809	
Russian Federation	34,008	20,113	13,895	23,401	263,688	
Rwanda	75	1	74	1	..	
Saint Kitts and Nevis	..	..	..	4	..
Saint Vincent and the Grenadines	2	0	2	7	19	
Samoa	3	3	0	48	56	
San Marino	753	7	746	39	..	
Sao Tome and Principe	..	..	..	2	6
Saudi Arabia	480	86	394	2,956	3,829	
Senegal (b)	n.a.	n.a.	n.a.	307	..	
Serbia	59	54	5	109	6,773	
Seychelles	..	..	..	31	209
Singapore	4,188	264	3,924	3,568	47,310	
Slovakia	91	68	23	267	20,981	
Slovenia	..	..	..	288	..
South Africa	6,162	694	5,468	1,556	76,936	
Spain	1,272	1,175	97	5,748	222,666	
Sri Lanka	175	40	135	55	781	
Sudan	139	131	8	138	..	
Sweden	920	793	127	18,721	107,032	
Switzerland	615	436	179	27,386	246,124	
Syrian Arab Republic	58	40	18	52	..	
Tajikistan	1	..	..	17	..
Thailand	3,121	172	2,949	503	16,204	
Togo (b)	n.a.	n.a.	n.a.	79	..	
Tonga	..	..	..	35	..
Trinidad and Tobago	68	0	68	8	..	
Tunisia	..	..	..	15	..
Turkey	1,941	1,756	185	2,989	81,685	
Turkmenistan	..	..	..	9	..
Uganda	..	..	..	1	..
Ukraine	2,255	1,248	1,007	1,511	22,440	
United Arab Emirates	1,278	4	1,274	389	1,592	
United Kingdom	5,948	3,081	2,867	28,464	641,887	
United Republic of Tanzania	5	5	0	5	..	
United States of America	354,430	167,115	187,315	309,644	3,131,427	
Uruguay	..	..	..	18	..
Uzbekistan	378	181	197	210	1,161	
Vanuatu	..	..	..	1	..
Venezuela (Bolivarian Republic of)	..	..	..	9	..
Viet Nam	2,620	169	2,451	217	18,575	

Name	Total	Resident	Grants by office		Equivalent grants by origin	In force by office
			Non-resident	Total ^(a)	Total	
Yemen	13	2	11	24	76	
Zambia	9	1	8	159	7,726	
Zimbabwe	..	..	..	2	..
Others/Unknown	..	..	..	20,261	..
Total (2019 estimates)	1,500,900	912,100	588,800	n.a.	14,945,800	

(a) Equivalent grants by origin data are incomplete, because some offices do not report by origin.

(b) The African Intellectual Property Organization (OAPI) acts as the national office for patent grants.

.. indicates not available.

n.a. indicates not applicable.

Source: WIPO Statistics Database, September 2020.

A60. Patent office procedural data, 2019

Office	Total applications processed	Granted	Rejected	Withdrawn or abandoned	Number of examiners (FTE)	First office action (months)	Final office decision (months)
African Intellectual Property Organization	..	..	..	..	4.0	..	..
African Regional Intellectual Property Organization	..	..	2	88	7.0	20.0	27.0
Albania	..	2	..	..	2.0	2.5	12.0
Algeria	..	140	311	..	7.0	11.0	15.0
Armenia	113	96	3	14	8.0	1.5	3.1
Australia	22,783	17,010	43	5,730	396.2	7.0	19.6
Austria	2,240	1,112	1,013	115	102.0	7.2	19.4
Azerbaijan	297	183	10	104	12.0	..	..
Bahrain	382	73	223	86	5.0	4.0	12.0
Bangladesh	391	129	259	3	8.0	10.0	19.5
Belarus	549	449	97	3	14.0	13.5	17.5
Bosnia and Herzegovina	..	..	..	..	7.0	2.0	30.0
Brazil	18,785	10,947	4,694	3,144	313.0	73.2	79.2
Canada	..	22,009	..	11,148	369.0	10.0	25.5
Chile	4,383	2,026	1,629	728	120.0	3.4	26.3
China	1,056,575	452,804	386,352	217,419	..	14.9	22.2
China, Hong Kong SAR	..	..	..	1	6.0	..	..
China, Macao SAR	..	20	23	..	..	5.5	11.1
Colombia	2,501	1,594	213	694	46.0	8.4	15.5
Croatia	51	20	26	5	6.0	51.0	61.0
Cuba	210	89	15	106	12.0	14.0	30.0
Czech Republic	1,083	509	225	349	32.0	..	..
Denmark	1,823	501	2	1,320	58.6	5.7	24.5
Dominican Republic	..	..	297	..	..	..	..
Ecuador	487	17	121	349	5.0	24.0	60.0
Egypt	1,034	572	58	404	100.0	18.0	..
El Salvador	..	..	..	..	2.0	..	..
Estonia	24	5	3	16	9.0	8.0	25.7
European Patent Office	..	137,782	..	..	4,241.0	4.4	28.1
Finland	1,414	505	8	901	115.0	6.7	27.1
France	15,970	13,318	2,070	582	101.0	..	..
Georgia	243	115	21	107	18.0	15.0	21.0
Germany	40,135	18,255	8,588	13,292	783.8	..	..
Guatemala	117	50	23	44	3.0	..	..
Hungary	663	135	58	470	43.0	6.0	20.0
Iceland	..	..	..	..	..	0.2	4.2
India	62,757	23,578	5,157	34,022	616.0	27.0	48.0
Indonesia	16,635	10,372	106	6,157	111.0	0.1	10.0
Iran (Islamic Republic of)	2,984	1,469	880	635	20.0	5.0	9.0
Israel	7,433	4,200	13	3,220	118.0	29.4	45.8
Japan	226,441	167,945	54,779	3,717	1,682.0	9.5	14.3
Jordan	402	88	312	2	6.0	12.0	24.0
Latvia	80	52	15	13	6.0	..	..
Lithuania	108	100	6	2	6.0	0.5	3.0
Madagascar	29	15	3	11	2.0	24.0	24.0
Mexico	14,701	9,673	153	4,875	119.0	3.0	36.0
Monaco	..	4	..	3	2.0	4.0	7.0
Mongolia	272	220	49	3	3.0	12.0	14.0
Montenegro	..	284	..	1	3.0	2.0	20.0
Morocco	740	514	206	20	16.0	6.0	26.0
Mozambique	..	..	..	..	2.0	..	..
Namibia	..	..	..	..	1.0	..	..
New Zealand	..	1,691	..	1,652	60.0	5.5	16.0
Norway	2,484	1,211	10	1,263	71.0	6.5	26.8
Oman	..	..	..	..	7.0	..	..
Pakistan	..	268	..	89	9.0	18.0	36.0
Panama	..	133	..	28	..	..	..
Patent Office of the Cooperation Council for the Arab States of the Gulf	1,378	1,264	104	10	34.0	14.0	34.2
Peru	..	1,378	305	..	30.0	24.5	39.2
Philippines	3,135	1,327	17	1,791	100.0	6.0	24.0

Office	Total applications processed	Granted	Rejected	Withdrawn or abandoned	Number of examiners (FTE)	First office action (months)	Final office decision (months)
Portugal	270	74	168	28	16.0	..	33.5
Qatar	..	15	113	..	4.0	6.0	24.0
Republic of Korea	170,160	115,302	50,944	3,914	920.0	10.8	15.6
Republic of Moldova	127	61	20	46	10.0	4.0	14.0
Romania	871	357	296	218	38.0	12.0	45.0
Russian Federation	45,742	34,458	4,039	7,245	..	4.9	5.7
Saint Vincent and the Grenadines	..	2	..	1	2.0	0.3	6.0
Samoa	..	1	..	..	..	1.0	..
Sao Tome and Principe	..	..	..	..	3.0	18.0	25.0
Saudi Arabia	1,964	480	747	737	34.0	25.0	30.0
Serbia	235	59	111	65	13.0	12.0	18.0
Seychelles	..	22	..	..	..	..	..
Singapore	..	..	..	..	100.0	..	..
Slovakia	194	91	39	64	26.0	42.1	43.0
Spain	6,828	5,673	307	848	145.0	0.8	9.6
Sri Lanka	1,012	175	829	8	8.0	47.2	68.6
Sudan	241	135	8	98	8.0	..	2.0
Sweden	2,369	920	44	1,405	113.8	7.4	33.3
Tajikistan	..	1	..	..	7.0	2.0	3.0
Thailand	12,590	3,121	435	9,034	105.0	32.0	44.3
Trinidad and Tobago	..	..	..	..	5.0	..	..
Turkey	4,508	1,788	638	2,082	118.0	2.7	22.4
Ukraine	3,586	2,319	196	1,071	107.0	13.5	17.2
United Arab Emirates	..	1,278	..	1	24.0	38.8	..
United Kingdom	..	5,948	17,808	..	334.0	23.0	37.0
United States of America	895,388	354,426	422,616	118,346	8,098.0	15.5	21.6
Uzbekistan	808	424	117	267	9.0	2.0	46.0
Viet Nam	4,518	2,620	1,688	210	70.0	36.3	49.9
Zambia	..	..	..	..	2.0	..	..

Note: FTE is full time equivalent. Grant data differ slightly from grant data reported elsewhere in this report due to different dates of extraction. Every effort has been made to compile procedural data based on common definitions and concepts, but procedural differences make it extremely difficult to fully harmonize such data. For instance, "rejection" is not recorded as a final decision in Canada. Applicants are informed of the action that they must take or questions that they must answer in order for their application to be considered, and if an applicant cannot provide the required information, they are regarded as having abandoned the application. A similar situation exists in Australia.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

A61. Utility model applications and grants by office and origin, 2019

Name	Applications by office			Equivalent applications by origin	Grants by office		
	Total	Resident	Non-resident	Total ⁽⁶⁾	Total	Resident	Non-resident
African Intellectual Property Organization	15	13	2	n.a.	11	10	1
African Regional Intellectual Property Organization	24	18	6	n.a.	12	4	8
Albania	1	0	1	2	1	0	1
Andorra	..	..	..	1	..	..	..
Angola	8	8	0	8	..	..	..
Argentina	155	127	28	136	48	36	12
Armenia	37	37	0	38	32	32	0
Australia	1,859	976	883	1,082	1,792	945	847
Austria	450	324	126	635	465	321	144
Azerbaijan	58	53	5	54	16	12	4
Bahamas	..	..	..	2	..	..	..
Bangladesh	..	..	..	1	..	..	..
Barbados	..	..	..	16	..	..	..
Belarus	334	276	58	378	308	235	73
Belgium	..	..	..	142	..	..	..
Bermuda	..	..	..	1	..	..	..
Bolivia (Plurinational State of)	..	..	..	1	..	..	..
Bosnia and Herzegovina	..	..	..	1	..	..	..
Botswana	15	15	0	15	11	11	0
Brazil	2,824	2,757	67	2,798	900	838	62
Brunei Darussalam	..	..	..	1	..	..	..
Bulgaria	454	449	5	454	338	330	8
Canada	..	..	..	92	..	..	..
Chile	138	111	27	121	81	51	30
China	2,268,190	2,259,765	8,425	2,262,072	1,582,274	1,574,205	8,069
China, Hong Kong SAR	791	528	263	612	520	358	162
China, Macao SAR	32	12	20	52	2	1	1
Colombia	177	155	22	168	56	51	5
Costa Rica	8	4	4	15	5	4	1
Croatia	59	55	4	55	63	60	3
Cuba	5	5	0	6	..	..	..
Cyprus	..	..	..	119	..	..	..
Czech Republic	1,301	1,260	41	1,408	1,128	1,082	46
Democratic People's Republic of Korea	..	..	..	2	..	..	..
Denmark	110	80	30	147	80	60	20
Dominican Republic	22	15	7	15	15	9	6
Ecuador	59	49	10	50	6	2	4
Egypt	..	..	..	1	..	..	..
El Salvador	5	4	1	4	..	..	..
Estonia	73	64	9	75	30	27	3
Finland	313	286	27	442	289	262	27
France	454	223	231	820	..	..	..
Georgia	75	73	2	73	30	27	3
Germany	11,668	8,432	3,236	9,515	10,295	7,177	3,118
Greece	29	15	14	20	33	25	8
Guatemala	11	7	4	8	2	1	1
Honduras	3	0	3	..	..	..	..
Hungary	255	239	16	279	168	147	21
India	..	..	..	36	..	..	..

Name	Applications by office			Equivalent applications by origin	Grants by office		
	Total	Resident	Non-resident	Total ^(a)	Total	Resident	Non-resident
Indonesia	2,558	2,473	85	2,493	687	607	80
Iran (Islamic Republic of)	..	..	..	2	..	..	..
Ireland	124	99	25	122	83	24	59
Israel	..	..	..	102	..	..	..
Italy	1,916	1,750	166	2,233	1,601	1,500	101
Japan	5,241	3,693	1,548	6,471	5,033	3,535	1,498
Jordan	..	..	..	6	..	..	..
Kazakhstan	..	..	..	22	124	0	124
Kenya	212	212	0	212	32	31	1
Kuwait	..	..	..	1	..	..	..
Kyrgyzstan	19	17	2	17	26	22	4
Latvia	..	..	..	10	..	..	..
Lebanon	..	..	..	1	..	..	..
Libya	..	..	..	1	..	..	..
Liechtenstein	..	..	..	19	..	..	..
Lithuania	..	..	..	2	..	..	..
Luxembourg	..	..	..	25	..	..	..
Malaysia	192	111	81	160	107	90	17
Mali	..	..	..	6	..	..	..
Malta	..	..	..	5	..	..	..
Mauritius	..	..	..	1	..	..	..
Mexico	699	603	96	626	259	215	44
Mongolia	228	225	3	225	166	164	2
Montenegro	..	..	..	1	..	..	..
Morocco	..	..	..	1	..	..	..
Mozambique	11	1	10	1	11	1	10
Namibia	8	8	0	8	6	6	0
Netherlands	..	..	..	285	..	..	..
New Zealand	..	..	..	50	..	..	..
Niger	..	..	..	1	..	..	..
Nigeria	..	..	..	1	..	..	..
Norway	..	..	..	20	..	..	..
Panama	3	1	2	3	4	2	2
Peru	309	287	22	292	208	174	34
Philippines	2,560	2,461	99	2,466	1,123	1,095	28
Poland	911	855	56	912	654	603	51
Portugal	93	54	39	64	72	43	29
Qatar	..	..	..	1	..	..	..
Republic of Korea	5,447	4,975	472	6,067	2,417	2,238	179
Republic of Moldova	138	137	1	138	79	78	1
Romania	46	41	5	43	47	32	15
Russian Federation	10,136	9,717	419	9,828	8,848	8,370	478
Rwanda	18	10	8	10	11	3	8
Saint Lucia	..	..	..	1	..	..	..
Samoa	3	3	0	16	..	..	..
San Marino	..	..	..	5	..	..	..
Saudi Arabia	..	..	..	3	..	..	..

Name	Applications by office			Equivalent applications by origin	Grants by office		
	Total	Resident	Non-resident	Total ^(a)	Total	Resident	Non-resident
Serbia	82	79	3	81	57	55	2
Seychelles	..	..	..	2	..	..	..
Singapore	..	..	..	592	..	..	..
Slovakia	325	281	44	330	322	267	55
Slovenia	..	..	..	7	..	..	..
South Africa	..	..	..	31	..	..	..
Spain	2,757	2,604	153	2,839	2,455	2,312	143
Sri Lanka	..	..	..	1	..	..	..
Sweden	..	..	..	151	..	..	..
Switzerland	..	..	..	430	..	..	..
Thailand	3,310	3,170	140	3,248	1,010	921	89
Tunisia	..	..	..	1	..	..	..
Turkey	2,971	2,906	65	2,935	690	661	29
Ukraine	8,458	8,351	107	8,489	8,412	8,288	124
United Arab Emirates	9	1	8	5	3	0	3
United Kingdom	..	..	..	253	..	..	..
United Republic of Tanzania	1	1	0	1	..	..	..
United States of America	..	..	..	2,403	..	..	..
Uruguay	..	..	..	5	..	..	..
Uzbekistan	277	272	5	275	110	108	2
Venezuela (Bolivarian Republic of)	..	..	..	2	..	..	..
Viet Nam	637	395	242	401	312	230	82
Yemen	..	..	..	..	1	1	0
Zimbabwe	..	..	..	1	..	..	..
Others/Unknown	..	..	..	2,308	..	..	..
Total (2019 estimates)	2,341,180	2,323,540	17,640	n.a.	..	..	..

(a) Equivalent applications by origin data are incomplete, because some offices do not report by origin.

.. indicates not available.

n.a. indicates not applicable.

Source: WIPO Statistics Database, September 2020.

Trademarks

Highlights

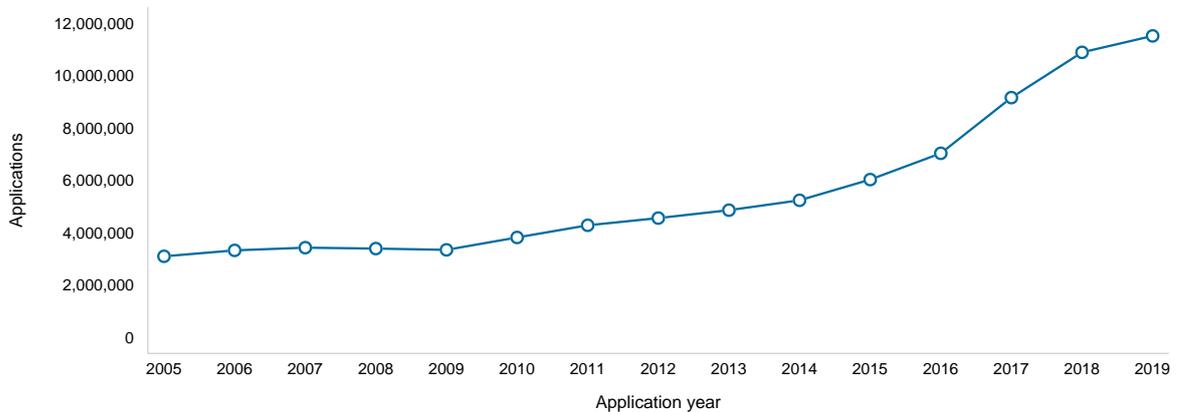
Applications increased by 5.8% in 2019

An estimated 11.5 million trademark applications were filed worldwide in 2019. This is almost 630,000 more than filed in 2018 and represents a growth rate of 5.8% (figure 2.1). This marks a tenth consecutive year of growth following the end of the global financial crisis, but is considerably lower than the extraordinary increase of 18.9% seen in 2018 and the even higher one of 30.2% recorded the year before that in 2017. Trademark applications filed each year have almost quadrupled since 2005, largely due to the double-digit annual growth rates recorded in six out of the last 15 years, and despite the small declines seen in both 2008 and 2009.

When differences in filing systems across national and regional offices are harmonized using the application class count, trademark filing activity in 2019 saw a similar increase of 5.9% on the previous year. The total number of classes specified in applications – known as the application class count – reached an estimated 15.2 million (figure 2.2).

Worldwide trademark applications reached an estimated 11.5 million in 2019

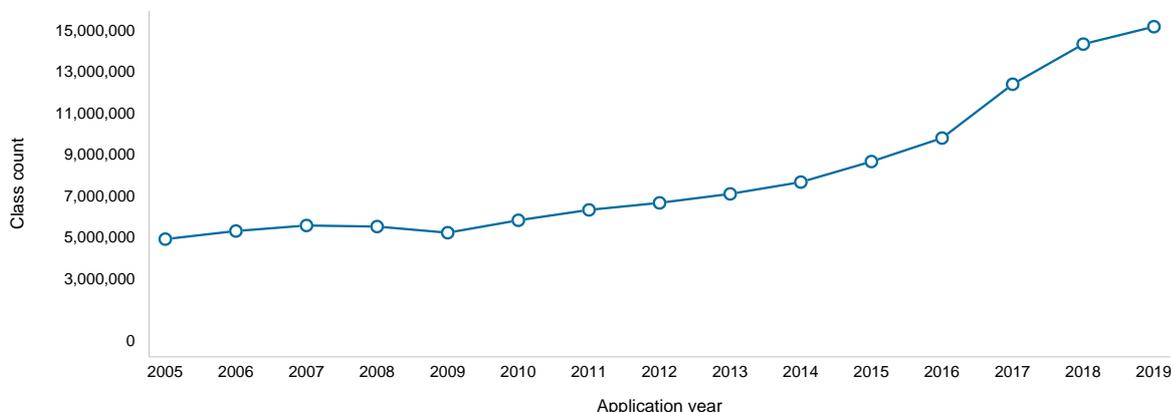
2.1. Trademark applications worldwide, 2005–2019



Source: Figure B1.

The total number of classes specified in trademark applications increased by 5.9% from 2018 to 2019

2.2. Trademark application class counts worldwide, 2005–2019



Source: Figure B2.

Class count

A trademark application may refer to different classes of goods or services. Many offices use the Nice Classification, an international classification of goods and services for registering trademarks and service marks. Applications received at these offices are classified in one or more of the 45 Nice classes (see www.wipo.int/classifications/nice). Some offices allow single-class filing only, meaning that applicants have to file a separate application for each class. Others permit multi-class filings, enabling applicants to file a single application in which a number of classes can be specified. To improve international comparisons of the numbers of applications received, it helps to compare class counts across offices. Class counts are also used to make trademark registration activity internationally comparable. This method for comparing offices began in 2004, the first year for which complete class count data are available.

Offices with the most filing activity

As with other forms of intellectual property (IP), the increase in world total trademark filing activity (measured in application class counts) is largely the result of the sheer volume of trademark applications filed in China. For example, in 2019, the IP office of China accounted for 55.7% of the annual increase in global trademark filing activity using this measure, albeit down from the exceptionally high shares of between 73% and 84% it comprised each year from 2016 to 2018. China's office was followed by those of the Islamic Republic of Iran, accounting for 8.4% of total annual growth, Brazil

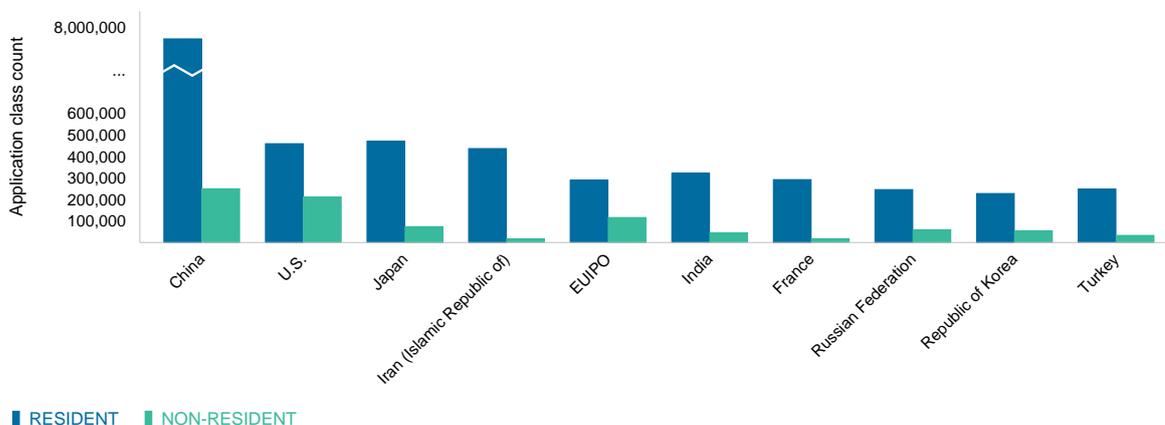
(5.4%), the Russian Federation (5.2%), Turkey (4.5%), Japan (4.1%), the United States of America (U.S.) (3.9%) and India (3%), each constituting considerably smaller portions of the total increase.

The office of China's class count of 7.8 million was followed by a count of 672,681 at the office of the U.S. (figure 2.3). These have been the two top offices since the early 2000s, but since 2006 China's class count has grown from about twice that of the U.S. to almost 12 times as much in both 2018 and 2019. This is due in large part to the high number of trademark applications filed by Chinese residents in China. These two top-ranked offices were followed by those of both Japan (546,244), the Islamic Republic of Iran (454,925) and by the European Union Intellectual Property Office (EUIPO) (407,712). The top five offices in 2019 were the same as in 2018. Likewise, about 65% of worldwide trademark filing activity was concentrated at these five offices alone, up from the 37% held by the top five offices of a decade earlier in 2009, when they comprised China, France, Germany and the U.S., as well as the EUIPO.

Of the top 20 offices, 18 had higher levels of trademark filing activity in 2019 than in 2018. Five recorded growth between 11% and 19% and one surpassed 20%. The largest increases were in Brazil (+22.3%) and Viet Nam (+19.3%), followed by the Islamic Republic of Iran (+18.4%), the Russian Federation (+16.5%), Turkey (+15.5%) and the United Kingdom (U.K.) (+11.2%). In contrast, the offices of Australia (-4.9%) and Indonesia (-2.3%) each saw a decrease on the year before (figure B11).

Non-resident applicants accounted for only between 3–6% of total trademark filing activity in China, the Islamic Republic of Iran and France

2.3. Trademark application class counts for the top 10 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.

Source: Figure B10.

In 2019, nine of the top 20 offices were located in either low- or middle-income countries, up from seven in 2009. For other offices located in selected low- and middle-income countries, Argentina (64,385), the Philippines (62,672), Thailand (66,411) and Ukraine (79,416) saw comparatively high volumes of trademark filing activity. Among the 20 selected offices located in countries from these income groups, annual growth exceeded 10% in Costa Rica (+16.7%), Peru (+15%), Cambodia (+13.1%) and Mozambique (+11.6%) (figure B13). However, the offices of Thailand (-15.1%), Argentina (-10.2%) and Nigeria (-10%) recorded double-digit decreases in trademark filing activity from 2018 to 2019, while the offices of Bulgaria (-7.9%), the Republic of Moldova (-4.7%), South Africa (-2.6%) and the African Intellectual Property Organization (OAPI) (-0.6%) saw smaller declines.

At most offices, trademark applications are filed mainly by residents seeking protection within their domestic jurisdiction. In 2019, residents filing at their respective home or regional offices accounted for 84.3% of global filing activity, with the remaining 15.7% associated with non-resident filings (figure B3). Over the last decade, the growth in domestic filings has outpaced that of non-resident filings. This is demonstrated by an annual increase of 6.5% in the world resident application class count in 2019. At only 2.4%, the increase in the application class count for non-residents was much lower in comparison.

Due primarily to the large amount of resident trademark applications filed in China, the global non-resident

share of filing activity has declined by about 16 percentage points, from 32.1% in 2008 to 15.7% in 2019. However, when the figures for China are excluded, the non-resident share is seen to have fallen by only around six percentage points over this period.

Recording much larger proportions than the global non-resident share, six of the top 20 offices received one-third or more of their total filing activity from non-residents, with Switzerland (57.7%), Canada (52.5%), Indonesia (52.5%), Australia (44.1%), the U.K. (35.4%) and Viet Nam (33.7%) recording the highest shares. The lowest non-resident shares were at the offices of France (5.9%), the Islamic Republic of Iran (3.8%) and China (3.2%). The low non-resident shares for France and several other European Union (EU) member state offices, such as those of Germany (10.8%) and Italy (12.4%), can be explained by the fact that many non-resident applicants file for protection in these countries via the EUIPO. A notable exception is at the office of the U.K., where 35.4% of trademark filing activity in 2019 came from abroad. The U.K.'s non-resident share was just 15% in 2015, but has grown each year since the U.K. voted in a referendum in 2016 to leave the European Union.

Resident filing activity overwhelmingly drove the double-digit annual growth in Brazil, the Islamic Republic of Iran, the Russian Federation, Turkey and Viet Nam from 2018 to 2019, whereas non-resident filing activity accounted for the entirety of the overall growth in Canada and Switzerland and for most of the total growth in the U.K. and the U.S. (figure B11). In Australia, the decline in

total filing activity can be attributed to a drop in both resident and non-resident applications. For Indonesia, however, filing activity by non-residents at its office increased strongly on the previous year, but this was more than offset by a sharp decline in resident filing activity, resulting in a net annual decrease.

The list of top 20 offices in 2019 is the same as in 2018, but ranked somewhat differently. The large increase in trademark filing activity at the office of the Islamic Republic of Iran moved it from fifth in the ranking in 2018 up to the fourth spot in 2019. The office of the Russian Federation also saw its ranking move up one spot from 9th to 8th in 2019. Brazil's impressive year-on-year growth saw it move from 12th position in 2018 to rank 11th in 2019, ahead of Germany. Similarly, the office of Viet Nam's high annual growth meant it jumped from 19th in 2018 up to 17th position in 2019, recording higher filing activity than either the offices of Italy or Switzerland.

Total application class counts at offices of high-income economies grew by 4.2% between 2009 and 2019 (figure B7). This is lower than the average annual growth rates for all other income groups. The highest growth (+17.7%) over this period was recorded for offices of upper middle-income countries. Offices of lower middle-income (+7.4%) and low-income (+5.2%) countries also saw growth over the same period.

Similarly to 2018, 11 of the top 20 offices in 2019 were in high-income economies. Seven were in upper middle-income countries (Brazil, China, Indonesia, the Islamic Republic of Iran, Mexico, the Russian Federation and Turkey) and two in lower middle-income countries (India and Viet Nam). In 2019, the offices of high-income countries together received 27.1% of the total global filing activity, down from 52.3% in 2009. In contrast, the share for offices of upper middle-income countries rose from 37.5% in 2009 to 65.9% in 2019, due to a combined high average annual growth rate (figure 2.4). Even when China's statistics are removed from the upper middle-income group, the application class count for the remaining countries in this group still grew between 2009 and 2019, but at a lower rate of 6.6%. However, if China is omitted from the count, the combined share of the world total claimed by upper middle-income countries actually decreased from 21.7% to 14.2% over this period. The shares of total filing activity for lower middle-income (6.4% in 2019) and low-income countries (0.6%) also fell between 2009 and 2019, albeit to a lesser extent.

Eight of the top 20 ranking offices in 2019 were located in Asia, seven in Europe, two each in Latin America and the Caribbean (LAC) and North America, and one in Oceania. Offices in Asia accounted for 70.6% of all

trademark filing activity, up from their combined share of 38.7% in 2009. This partly explains the decline in overall shares for the other five geographical regions over the same period (figure 2.5). Offices in Europe accounted for 15.4% of the world total in 2019, followed by North America (5.7%), LAC (5.3%), Africa (1.7%) and Oceania (1.3%).

Equivalent application class count

Applications filed at some regional IP offices are equivalent to multiple applications in countries that are members of the organizations establishing those offices. For example, to calculate the number of equivalent applications for the EUIPO, each application is multiplied by the corresponding number of EU member states. So, an application filed with the EUIPO by an applicant residing outside the EU is counted as 28 applications abroad – equivalent to the 28 member countries of the EU in 2019. An application filed by an applicant residing in an EU country is counted as 1 resident application and 27 applications abroad for 2019. The same multiplier is applied to the classes specified in these applications. The equivalent application class count concept is used for reporting data by origin.

German applicants continue to file the greatest number of applications abroad

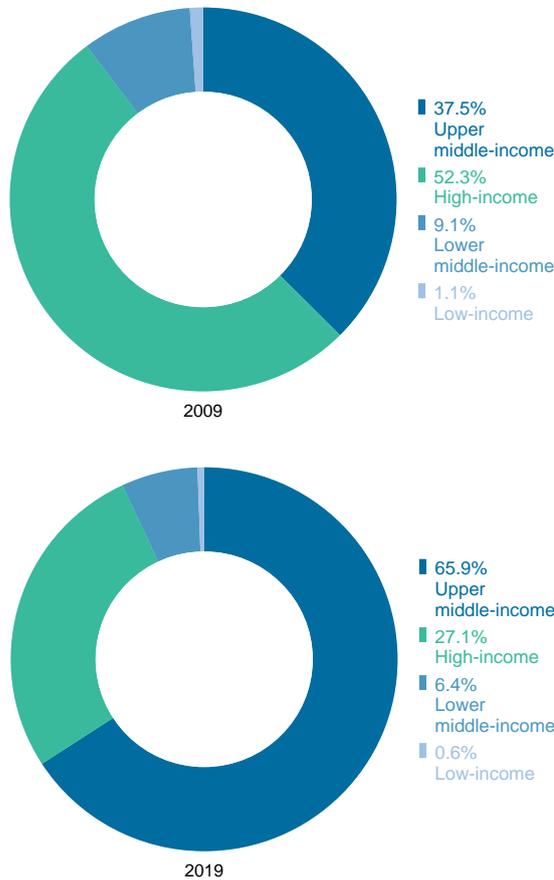
Trademark applications received by offices from resident and non-resident applicants are referred to as office data, whereas applications filed by applicants at a national/regional office (resident applications) or at foreign offices (applications abroad) are referred to as origin data. Here, trademark statistics based on the origin of the residence of the applicant are reported in order to complement the picture of trademark filing activity worldwide.

In terms of filing activity abroad based on equivalent class count, more applicants from Germany seek protection for their trademarks outside their country than from any other origin, a position Germany has held since 2006. In 2019, German filing activity abroad recorded an equivalent application class count of 2.1 million, followed by applicants from the U.S. (1.4 million), the U.K. (1.1 million) and China (1 million) (figure B22).¹ The high equivalent class counts for applications abroad from these origins can be explained not only by their high application class counts at numerous offices abroad, but also by their frequent use of the EUIPO – with its multiplier effect – to seek protection within the EU as a whole.

Looking at absolute counts – and so removing the EUIPO's multiplier effect – 96% of all filing activity (application class counts) by China-based applicants

The share for offices of upper middle-income countries increased from 37.5% in 2009 to 65.9% in 2019

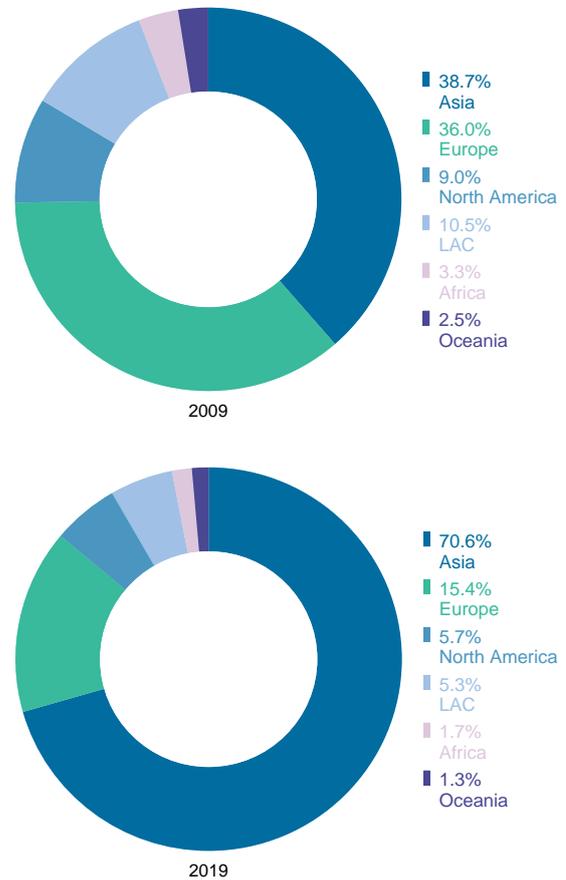
2.4. Trademark application class counts by income group, 2009 and 2019



Source: Table B7.

Offices located in Asia accounted for 70.6% of all trademark filing activity in 2019

2.5. Trademark application class counts by region, 2009 and 2019



Source: Table B8.

in 2019 was in China alone, with only 4% attributed to those seeking protection abroad. In fact, for each year over the last two decades, at least 93% of all filing activity by China-based applicants has been domestic. Similarly to China-based applicants, those residing in many low- and middle-income countries with high trademark filing volumes, such as Brazil, India, the Islamic Republic of Iran, Mexico, Turkey and Viet Nam, directed less than 10% of their trademark filing activity to seeking protection abroad. For applicants based in the Islamic Republic of Iran, only 0.3% of their total filing activity was directed abroad. The shares for resident filing – between 75% and 78% – and filing abroad – between 22% and 25% – were similar for applicants from France, Japan, the Republic of Korea and Spain.

Among the top 20 origins, 75% of filing activity by Switzerland-based applicants occurred outside the

country. This was followed by the U.K. (51%), the U.S. (47%) and the Netherlands (41%) in terms of applications abroad as a proportion of total filing activity.

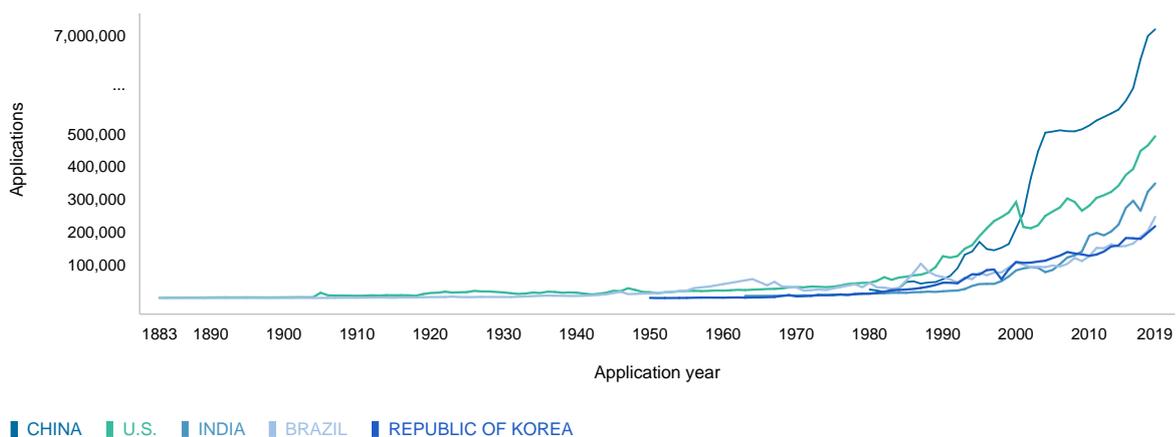
Between 21% and 24% of all trademark filing activity by applicants from the upper middle-income countries Guatemala (21%), Kazakhstan (24%), Malaysia (22%) and Thailand (21%) took place abroad. This is in contrast to Bulgaria-based applicants who had a much higher proportion (44%) of total filing activity that took place abroad. For lower middle-income countries Angola, Nigeria and Pakistan, this share was only between 2–3%.

When deciding where to seek trademark protection, applicants consider such factors as the relative appeal of various foreign markets in which to sell their goods and services, geographical proximity to these markets or well-established historical ties between the trademark

Trademark applications filed since 1883

Trademark applications were fairly low and stable up until the mid-1980s. Applications filed at China's office took off in the 1990s, and in 2001 exceeded those received by the U.S. office, making it the largest office in terms of the amount of applications received. Even so, filings at the U.S. office have more than doubled since the mid-1990s, despite declines in 2001 and 2002 at the end of the dot-com era and again during the global financial crisis in 2008 and 2009. Having remained below 100,000 until 2006, India's trademark annual filings are now approximately 349,000. Trademark applications filed in Brazil are nearing 250,000, while those filed in the Republic of Korea are approaching 220,000.

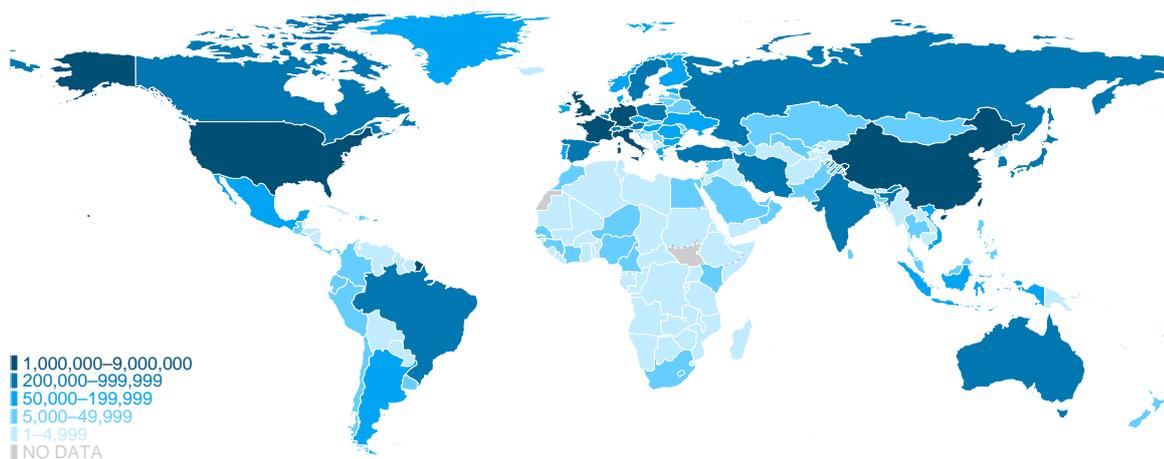
Trend in trademark applications for the top five offices, 1883–2019



Source: Figure B9.

Trademark filing activity was concentrated in a few origins

2.6. Equivalent trademark application class counts by origin, 2019



Source: Map B19.

holder's country of residence and the destination country. For example, 20% of all non-resident filing activity in India in 2019 came from U.S. applicants, followed by 14% from China and 10% from Germany. Together, applicants from these three countries accounted for 44% of all non-resident trademark filing activity in India for that year (figure 2.7). Applicants from China (34%) accounted for by far the largest share of non-resident trademark filing activity in the U.S., followed by the much smaller shares held by applicants from Canada (9%) and the U.K. (8%), for a combined share of over half (51%) of all filing activity the U.S. received from abroad. In China, the three origins that recorded the largest shares of total non-resident filing activity were the U.S. (22%), Japan (12%) and the U.K. (10%), together accounting for 44% of the non-resident filing in China. For the EUIPO, 63% of its non-resident filing activity originated from applicants based in just three countries: the U.S. (31%), China (21%) and Switzerland (11%).

In addition to being the most active foreign filers in the U.S., applicants from China were also the most active at seven of the top 20 offices ranked in terms of filing activity. These offices are those of France, Germany, Indonesia, the Islamic Republic of Iran, Italy, Thailand and Viet Nam, accounting for between 17% and 28% of application class counts in filings received from abroad. Germany-based applicants filed the largest volumes of non-resident trademarks received by the offices of Switzerland and Turkey. Similar to their large share of

total foreign filing activity in China, applicants located in Japan were also either the second or third largest origin of foreign filing activity in regional neighbors China, Hong Kong SAR, Indonesia, the Republic of Korea, Thailand and Viet Nam.

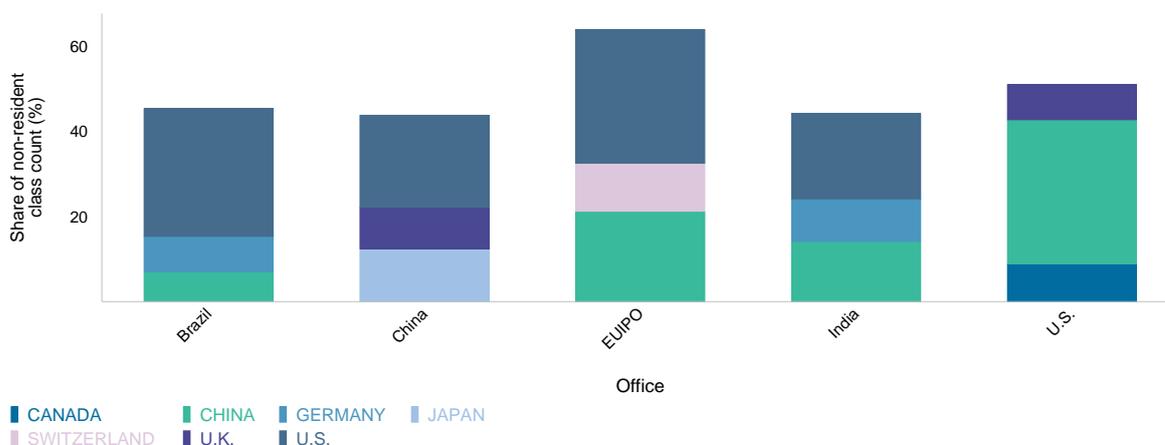
Adjusting for GDP and population

Variations in trademark filing activity across countries reflect differences in the size and structure of their economies. It is therefore informative to examine resident application class counts with regard to gross domestic product (GDP) or the size of population.

When resident trademark applications are viewed as class counts and adjusted according to GDP, countries with a relatively lower number of classes specified in resident applications, such as Australia and South Africa, may rank higher than some countries that show higher class counts, for example, the U.S. Of selected origins, China (33,660), the Republic of Korea (10,359), Brazil (7,075) and Germany (6,314) had among the highest ratios of resident application class count to GDP in 2019 (figure 2.8). China (+26,755), the U.K. (+4,624) and Brazil (+3,588) saw particularly large increases in resident application class count per unit of GDP between 2009 and 2019. In contrast, Germany (-494) and Australia (-327) saw the largest decreases in their class count to GDP ratio over the same period.

Applicants from the U.S. were the most active foreign filers in Brazil, China, India and at the EUIPO

2.7. Share of total non-resident filing activity by origin at selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.
Source: Figure B25.

Data reflecting application class count per million population show that China, with a population of about 1.4 billion, had a resident application class count of 5,425 per million population – one of the most intensive among all countries of origin in 2019. Germany, with a population of around 83.1 million, recorded a resident application class count of 3,398 per million population. New Zealand whose population was far lower, at approximately 4.9 million in 2019, had a comparable resident application class count per million population ratio of 3,677. Among other selected origins, this ratio ranged from just under 2,000 to almost 3,000 for the following: Singapore (1,950), the U.K. (2,619) and Turkey (2,982). It was between 1,000 and around 1,400 for Brazil (1,037) Armenia (1,323) and the U.S. (1,402). Barbados, Colombia and Ecuador each had ratios between 565 and 810, while those for Egypt, India and Uzbekistan were between about 230 and 240 (figure B34).

Which classes and industries attracted the most filing activity from applicants filing abroad?

Trademarks are registered in relation to particular classes of goods or services. The Nice Classification of goods and services is used in the international trademark system and at certain national and regional offices. Nice Classification statistics offer insights

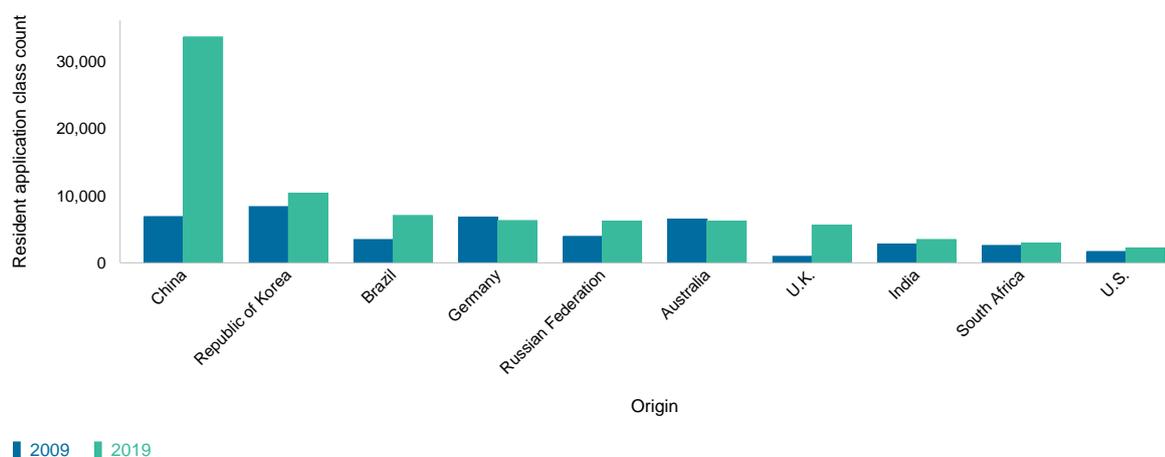
into the relative importance of different goods and services. In 2019, goods class 9, which includes scientific, photographic, measuring instruments, recording equipment, computers and software, was represented in 11% of all reported non-resident trademark filing activity by class. Nice class 9 is followed by services class 35 (7.6%), which covers advertising, business management, business administration and office functions, and by goods class 5 and services class 42, which each accounted for 5.5% of the total. Goods class 5 relates to pharmaceutical preparations, baby food, dietary supplements for humans and animals, disinfectants, fungicides and herbicides, and services class 42 includes scientific and technological services, design and development of computer hardware and software (figure B26).

The 11 service-related classes accounted for 30.4% of all Nice classes specified in applications filed abroad in 2019, up from 26.6% in 2005. Services classes accounted for between 30% and 35% of all filing activity in Canada, China, India and Indonesia, and about 50% or more at the offices of Brazil, France, Japan and Mexico.

It is useful to group the 45 Nice classes into 10 industry sectors. Research and technology was the top sector in which applicants sought trademark protection abroad in 2019, accounting for 19.4% of the global non-resident trademark filing activity reported. It was followed by

Brazil, China and the U.K. each saw a large increase in resident application class count per unit of GDP between 2009 and 2019

2.8. Resident trademark application class count per USD 100 billion GDP for selected origins, 2009 and 2019



Source: Figure B33.

the health (14.5%), clothing and accessories (12.2%) and agriculture (11.6%) sectors. Trademarks relating to leisure and education (10%) and business services (9.9%) accounted for the next largest shares of the total. In contrast, industries relating to chemicals (3.1%) and construction (5.4%) accounted for the smallest shares of filing activity abroad (figure B28).

Research and technology was the sector to attract the largest proportion of total filing activity at the EUIPO (20.8%) and at the offices of France (18.1%), Japan (25.7%) and the U.S. (18.4%) (figure B29). Agriculture was the top sector in China (22.5%), the Republic of Korea (18.4%) and the Russian Federation (15.8%) and ranked among the top three sectors at seven of the top 10 offices. Filing activity for marks relating to the health sector attracted the largest share of applications filed in India (21.6%) and the second largest in the Republic of Korea (16.2%). Business services topped the list of industry sectors in both the Islamic Republic of Iran (21.1%) and Turkey (21.6%), the largest shares of all trademark filing activity. Like agriculture, the business services sector also appeared among the top three sectors at seven of the top 10 offices. Filing activity relating to leisure and education was either the second or third most popular sector for trademark filing at four of the top 10 offices, and clothing and accessories featured as the second or third top sector at three offices: China, India and the U.S. Only the office of the Islamic Republic of Iran (20.1%) included the transportation sector among its top three sectors.

A total of 9.2 million trademark registrations were recorded worldwide in 2019

After concluding the examination process, an office may decide to register a trademark. The number of registrations issued can fluctuate greatly from year to year, due in part to the amount of resources offices dedicate to examining trademark applications. For this reason, it is not possible to accurately compare the number of applications filed at an office in any given year with the number of registrations issued by that office in the same year.

The estimated 9.2 million trademark registrations recorded worldwide in 2019 represents an increase of 18.9%, or about 1.5 million additional registrations, on the previous year's total (figure B4).

Just as class counts make application activity internationally comparable, they also permit a more meaningful comparison of registrations. In 2019, an estimated 11.8 million classes were specified in trademark registra-

tions, resulting in a growth of 16.9% over the previous year's total (figure B5). This is considerably lower than the 32.6% increase recorded in 2018, but still ranks as the third highest growth rate over the last decade and a half. The office of China saw a high annual growth rate of 28.2%, accounting for over four-fifths (83 percentage points) of the total global annual increase.

China's office registered trademarks in which about 6.4 million classes were specified, accounting for over half (54%) of all trademark registration activity recorded in 2019. It was followed by the office of the U.S. (439,483), the EUIPO (362,874) and the office of India (323,001) (figure B17).

Along with the high annual growth seen in China, several other offices among the top 20 experienced large increases in registration activity, including Canada (+153.7%), the U.K. (+16.1%), the U.S. (+14.2%) and Viet Nam (+37.7%). In contrast, the offices of Italy (-37.8%), Mexico (-12.9%) and India (-10.2%) saw the most significant declines among the top 20.

Active trademarks grew by 15.2%

Unlike most forms of IP, trademarks can be maintained indefinitely by the payment of renewal fees at defined time intervals. In 2019, there were an estimated 58.2 million active trademark registrations at 146 IP offices worldwide, representing an increase of 15.2% on 2018 figures (figure B37).

Once again, the office of China accounted for the greatest number of trademark registrations in force in 2019, with about 25.2 million. It was followed by the offices of the U.S., with almost 2.8 million registrations in force, India recording 2 million and Japan 1.9 million. Each reporting between 1.3 and just over 1.5 million trademark registrations in force, the EUIPO and the offices of Brazil, France and the Republic of Korea also recorded high numbers of active trademarks. The offices of Mexico (1.2 million) and Turkey (1.1 million) had a comparable number of trademark registrations in force, while Italy (505,684) and Switzerland (514,825) were also of a similar magnitude (figure B38).

About 15.8 million trademark registrations in force at 77 offices in 2019 can be distributed according to the year in which they were initially registered. This represents 59% of a total of approximately 26.7 million trademark registrations recorded at these offices between 1995 and 2019.

Just over one-fifth (22.2%) of those trademarks registered in 1995 remained in force in 2019, a testimony

to the enduring value of marks (figure B39). For those registered in 2010 and later, the percentage rises above 65%. Over half (52%) of the 15.8 million registrations in force have a recent registration date, dating back only to 2013.

Demand for Madrid international trademark registrations continues to grow

To obtain trademark protection in multiple countries or jurisdictions, applicants can either file their applications directly at each individual office – known as the Paris route – or file an application for international registration through the Madrid System – the Madrid route (see glossary). The Paris route involves filing separate applications directly at IP offices in the countries or regions where protection is sought (under the Paris Convention for the Protection of Industrial Property). In contrast, by paying a single set of fees in one currency (Swiss francs), the Madrid System allows trademark holders to submit a single application in one language (English, French or Spanish), indicating the Madrid members where protection is sought (designations).

In 2019, the Madrid System afforded trademark holders the ability to obtain protection for their branded products and services in an area covering a total of 122 countries. Combined, Madrid members represent 63% of all countries that are home to about 80% of the world's population, and in which close to 89% of global GDP occurs, with the potential to increase these shares as membership grows.

Applicants filed an estimated 64,400 international trademark applications² under the WIPO-administered Madrid System in 2019 (figure B47). This is an increase of almost 3,500 on the previous year, resulting in annual growth of 5.7% and marking a 10th year of uninterrupted expansion. Strong growth in Madrid applications from the U.S. was the main driver. The rise in filings (+1,261) from applicants based in the U.S. alone accounted for over one-third (37 percentage points) of the overall rise in Madrid applications filed worldwide. Increases in Madrid applications from Switzerland (+344) and Turkey (+543) also contributed a substantial 10 and 16 percentage points, respectively, to overall growth.

Recording double-digit growth for the second year in a row, applicants based in the U.S. continued to top the list of those origins with the greatest number of international applications filed via the Madrid System. A strong year-on-year growth of 14.3% resulted from the estimated 10,087 Madrid applications filed by U.S.-based applicants in 2019. This was followed

by applications from Germany (7,700), China (6,339), France (4,437) and Switzerland (3,729) (figure B49). As mentioned above, applicants located in the U.S. filed 1,261 more Madrid applications in 2019 than in 2018. For comparison, applicants in Germany filed only 156 more than in the previous year and for China the increase was 71. As for applicants based in France, they filed 83 fewer applications than the year before.

For the third year in a row, the EU (27,102) attracted the most designations in Madrid applications in 2019, followed by China (24,423) and the U.S. (23,851) (figure B50). This means that in 2019 Madrid applicants sought to extend protection for their marks to the 28 EU member countries as a whole more than they did to any other Madrid member jurisdiction. Like China, nine of the top 20 designated Madrid members were middle-income countries, notably India (12,414), Mexico (10,715), the Russian Federation (16,090) and Turkey (8,996). Among the top destinations for international trademark registration via the Madrid System, the U.K. was the one to see the biggest surge in annual growth of 36.4%, almost 9 percentage points more than its increase in 2018, and occurring during the lead-up to Brexit. For further information and statistics, see WIPO's *Madrid Yearly Review 2020*.

- 1 Equivalent application class counts differ from absolute class counts, which are presented in figure B20, and do not take into account the multiplying effect of regional offices.
- 2 Because of the time lag in transmittal of applications from offices of origin to the International Bureau (IB) of WIPO, Madrid applications are estimated.

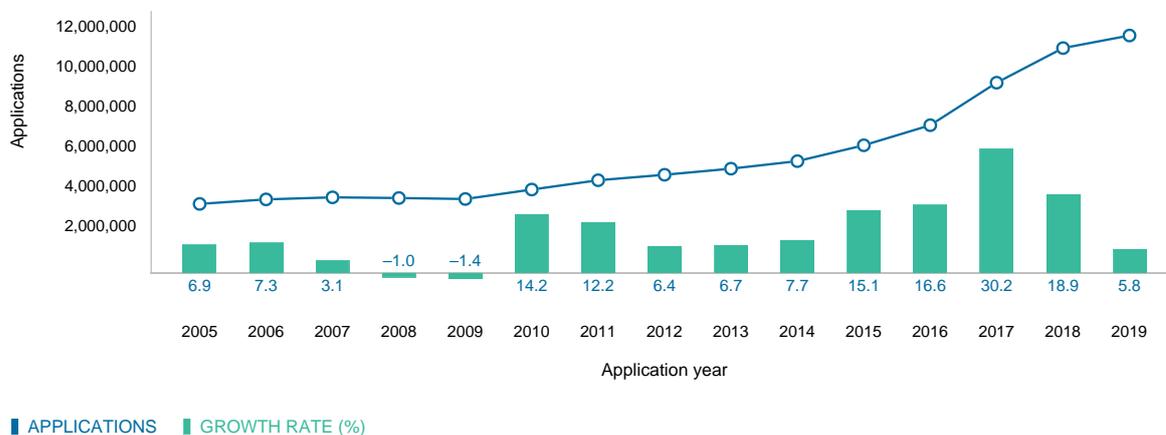
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Trademark applications and registrations worldwide

B1. Trend in trademark applications worldwide, 2005–2019



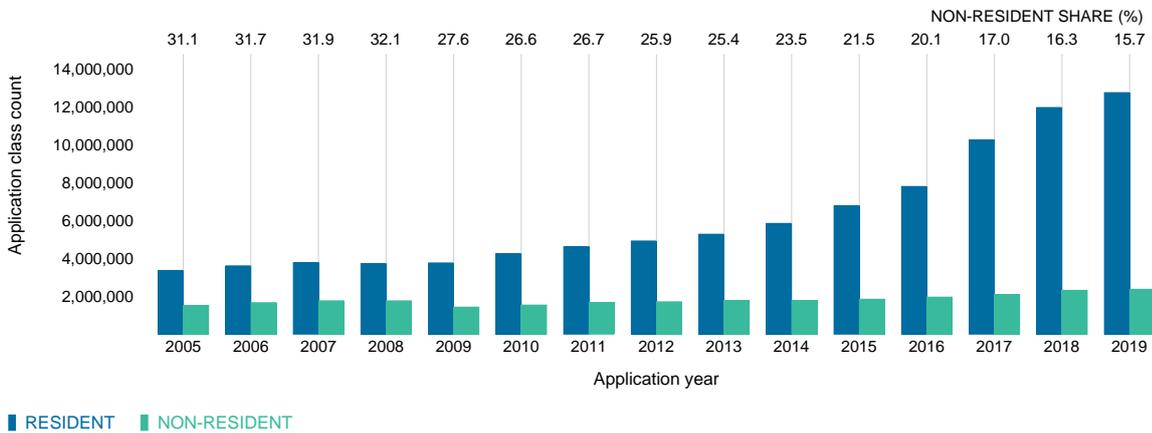
Note: World totals are WIPO estimates using data covering 168 IP offices. Each total includes the number of applications filed directly with national and regional offices (the Paris route), as well as the number of designations received by offices via the Madrid System (where applicable).
Source: WIPO Statistics Database, September 2020.

B2. Trend in trademark application class counts worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 168 IP offices. These totals include class counts in applications filed directly with national and regional offices (the Paris route), as well as class counts in designations received by offices via the Madrid System (where applicable). See the glossary for the definition of class count.
Source: WIPO Statistics Database, September 2020.

B3. Resident and non-resident trademark application class counts worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 168 IP offices. These totals include class counts in applications filed directly with national and regional offices (the Paris route), as well as class counts in designations received by offices via the Madrid System (where applicable). See the glossary for definitions of class count, resident and non-resident.
 Source: WIPO Statistics Database, September 2020.

B4. Trend in trademark registrations worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 168 IP offices. Each total includes the number of registrations issued by national and regional offices for applications filed directly with offices (the Paris route), as well as the number of designations received by offices via the Madrid System (where applicable).
 Source: WIPO Statistics Database, September 2020.

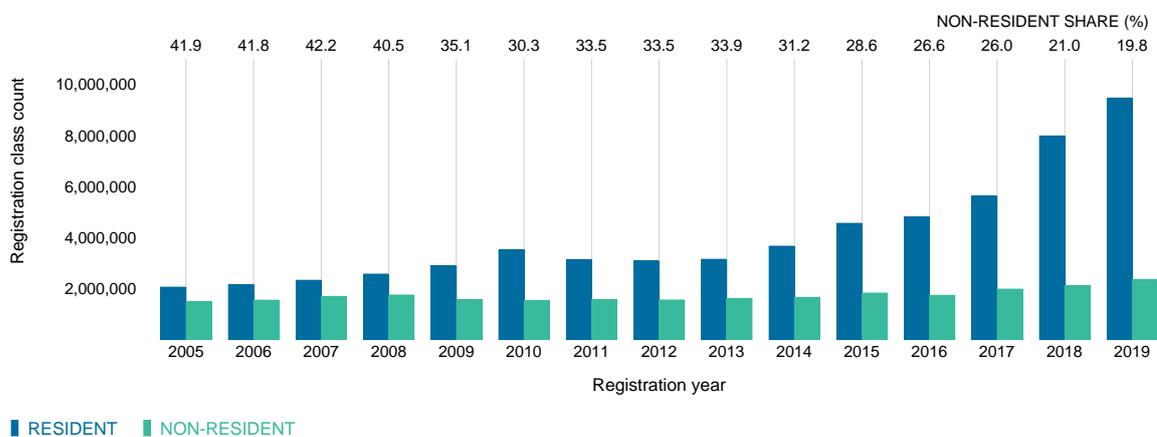
B5. Trend in trademark registration class counts worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 168 IP offices. These totals include class counts in registrations issued by national and regional offices for applications filed directly with offices (the Paris route), as well as designations received by offices via the Madrid System (where applicable). See the glossary for the definition of class count.

Source: WIPO Statistics Database, September 2020.

B6. Resident and non-resident trademark registration class counts worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 168 IP offices. These totals include class counts in registrations issued by national and regional offices for applications filed directly with offices (the Paris route), as well as for designations received by offices via the Madrid System (where applicable). See the glossary for definitions of class count, resident and non-resident.

Source: WIPO Statistics Database, September 2020.

Trademark applications and registrations by office

B7. Trademark application class counts by income group, 2009 and 2019

Income group	Application class count		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
High-income	2,730,000	4,104,400	71.2	69.9	52.3	27.1	4.2
Upper middle-income	1,956,900	9,983,100	76.7	92.2	37.5	65.9	17.7
<i>Upper middle-income without China</i>	<i>1,129,800</i>	<i>2,150,000</i>	<i>67.2</i>	<i>75.2</i>	<i>21.7</i>	<i>14.2</i>	<i>6.6</i>
Lower middle-income	473,800	971,200	64.4	67.9	9.1	6.4	7.4
Low-income	57,100	95,000	43.4	44.0	1.1	0.6	5.2
World	5,217,800	15,153,700	72.4	84.3	100.0	100.0	11.3

Note: Totals by income group are WIPO estimates using data covering 168 IP offices. Each category includes the following number of offices: high-income (64), upper middle-income (48), lower middle-income (37) and low-income (19). Data for the European Union Intellectual Property Office are allocated to the high-income group, because most EU member states are high-income countries. For the same reason, data for the African Regional Intellectual Property Organization and the African Intellectual Property Organization are allocated to the low-income group. For information on income group classification, see the data description section in Additional information.

Source: WIPO Statistics Database, September 2020.

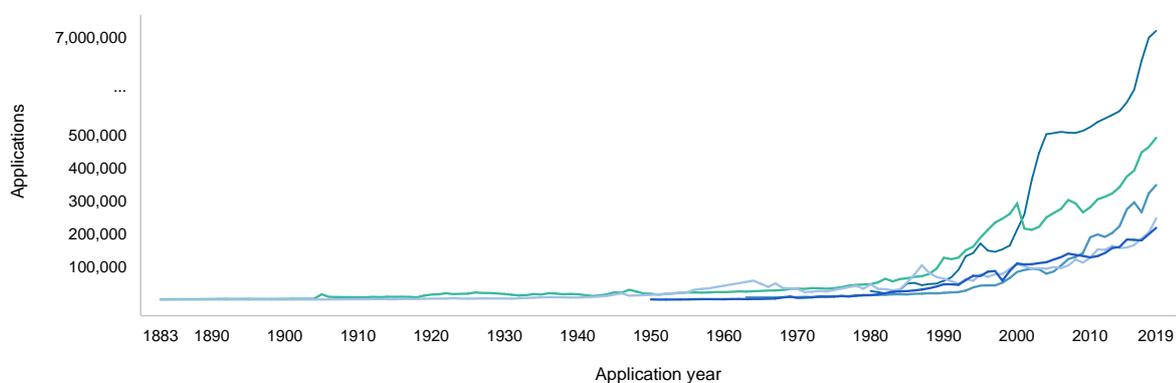
B8. Trademark application class counts by region, 2009 and 2019

Region	Application class count		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
Africa	170,700	260,900	48.9	44.0	3.3	1.7	4.3
Asia	2,020,200	10,696,700	77.5	90.9	38.7	70.6	18.1
Europe	1,879,500	2,336,800	71.2	73.2	36.0	15.4	2.2
Latin America and the Caribbean	549,800	799,000	66.7	71.1	10.5	5.3	3.8
North America	468,500	866,300	73.4	63.7	9.0	5.7	6.3
Oceania	129,100	194,000	60.4	49.8	2.5	1.3	4.2
World	5,217,800	15,153,700	72.4	84.3	100.0	100.0	11.3

Note: Totals by geographical region are WIPO estimates using data covering 168 IP offices. Each region includes the following number of offices: Africa (34), Asia (48), Europe (42), Latin America and the Caribbean (37), North America (2) and Oceania (5).

Source: WIPO Statistics Database, September 2020.

B9. Trend in trademark applications for the top five offices, 1883–2019

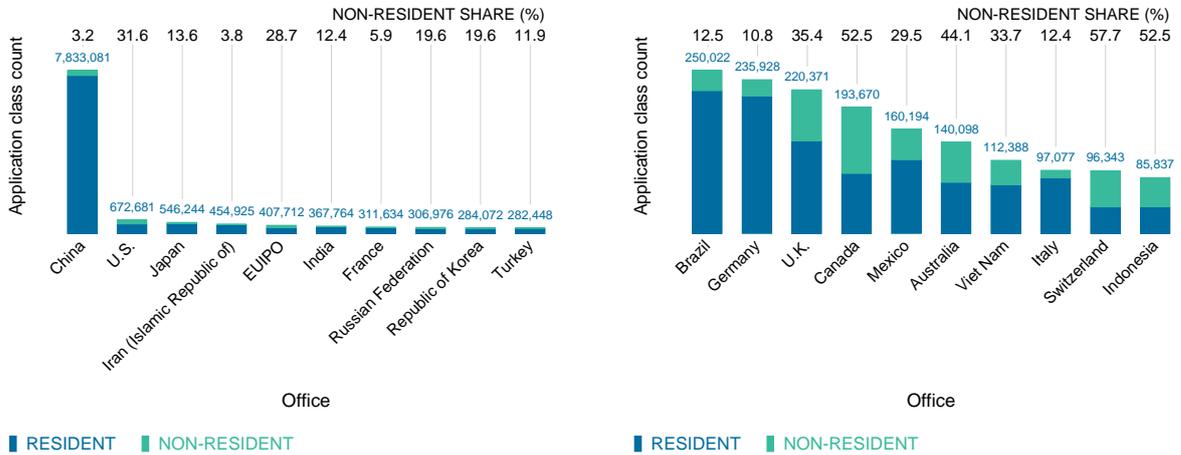


■ CHINA ■ U.S. ■ INDIA ■ BRAZIL ■ REPUBLIC OF KOREA

Note: Data are based on the numbers of applications filed; that is, differences between single-class and multi-class filing systems across IP offices are not taken into account. The top five offices were selected based on their 2019 application totals.

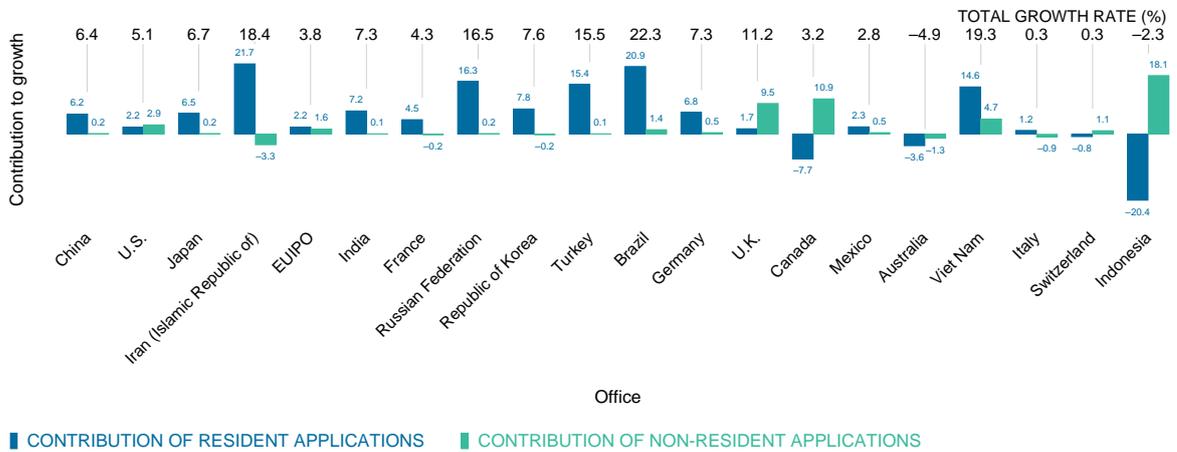
Source: WIPO Statistics Database, September 2020.

B10. Trademark application class counts for the top 20 offices, 2019



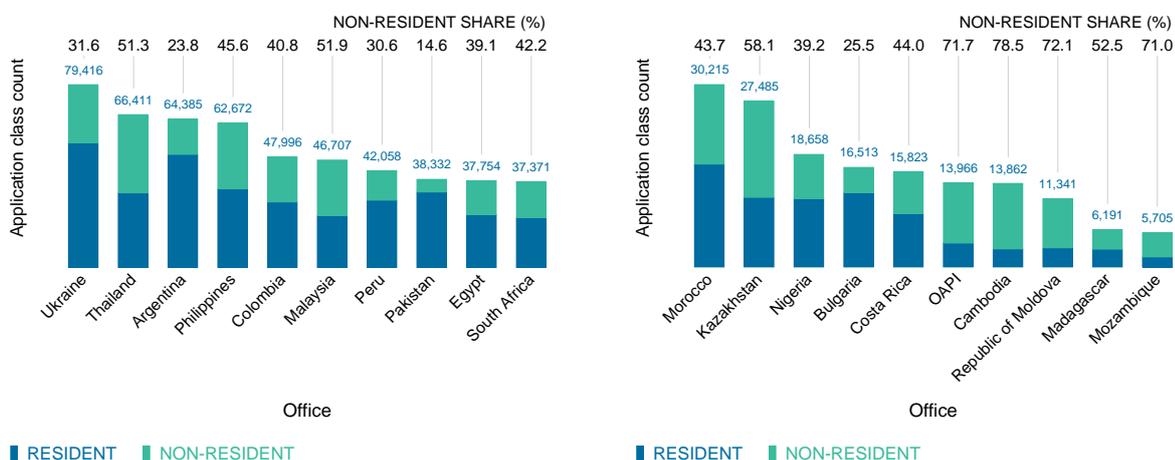
Note: EUIPO is the European Union Intellectual Property Office.
Source: WIPO Statistics Database, September 2020.

B11. Contribution of resident and non-resident application class counts to total growth for the top 20 offices, 2018–2019



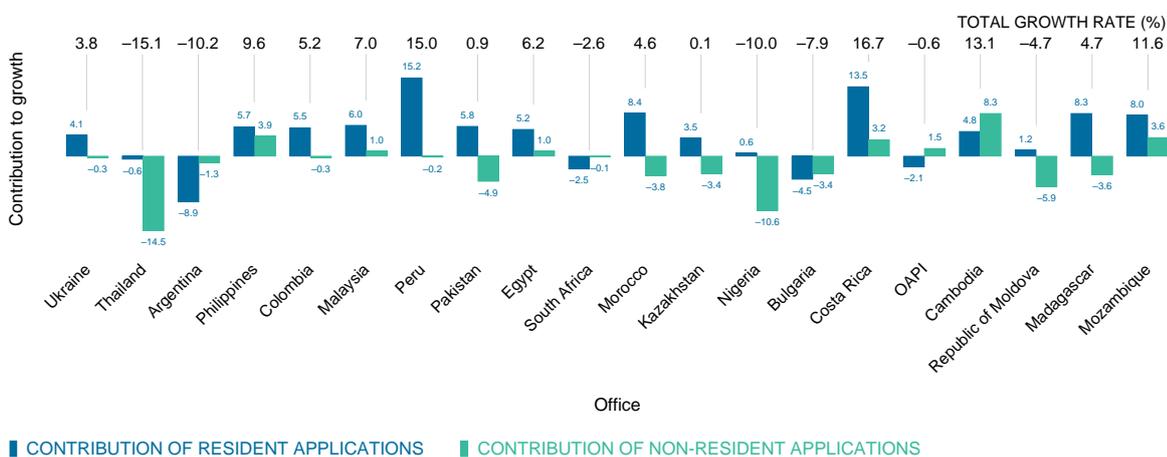
Note: EUIPO is the European Union Intellectual Property Office. This figure shows the total growth or decrease in application class counts for each office, broken down by the respective contribution made by resident and non-resident filing activity. For example, the total number of classes specified in trademark applications in Viet Nam grew by 19.3%. Growth in resident filing activity accounted for 14.6 percentage points of this increase, while the remaining 4.7 percentage points came from non-resident filing activity.
Source: WIPO Statistics Database, September 2020.

B12. Trademark application class counts for offices of selected low- and middle-income countries, 2019



Note: The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). OAPI is the African Intellectual Property Organization, which receives applications on behalf of its 17 member states. Where available, data for all offices are presented in statistical table B51 at the end of this section.
 Source: WIPO Statistics Database, September 2020.

B13. Contribution of resident and non-resident application class counts to total growth for offices of selected low- and middle-income countries, 2018–2019



Note: The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). OAPI is the African Intellectual Property Organization, which receives applications on behalf of its 17 member states. Where available, data for all offices are presented in statistical table B51 at the end of this section. This figure shows the total growth or decrease in application class counts for each office, broken down by the respective contributions of resident and non-resident applications. For example, the total number of classes specified in trademark applications at the IP office of the Philippines grew by 9.6%. Growth in resident filing activity accounted for 5.7 percentage points of this increase, while the remaining 3.9 percentage points came from non-resident filing activity.
 Source: WIPO Statistics Database, September 2020.

B14. Trademark registration class counts by income group, 2009 and 2019

Income group	Registration class count		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
High-income	2,372,800	3,167,200	64.4	61.8	53.0	26.8	2.9
Upper middle-income	1,709,000	7,785,800	70.5	90.4	38.2	65.9	16.4
<i>Upper middle-income without China</i>	<i>864,500</i>	<i>1,380,200</i>	<i>54.0</i>	<i>62.4</i>	<i>19.3</i>	<i>11.7</i>	<i>4.8</i>
Lower middle-income	342,400	781,200	45.8	57.7	7.7	6.6	8.6
Low-income	47,800	78,800	23.2	29.3	1.1	0.7	5.1
World	4,472,000	11,813,000	64.9	80.2	100.0	100.0	10.2

Note: Totals by income group are WIPO estimates using data covering 168 IP offices. Each category includes the following number of offices: high-income (64), upper middle-income (48), lower middle-income (37) and low-income (19). Data for the European Union Intellectual Property Office are allocated to the high-income group, because most EU member states are high-income countries. For the same reason, data for the African Regional Intellectual Property Organization and the African Intellectual Property Organization are allocated to the low-income group. For information on income group classification, see the data description section in Additional information.

Source: WIPO Statistics Database, September 2020.

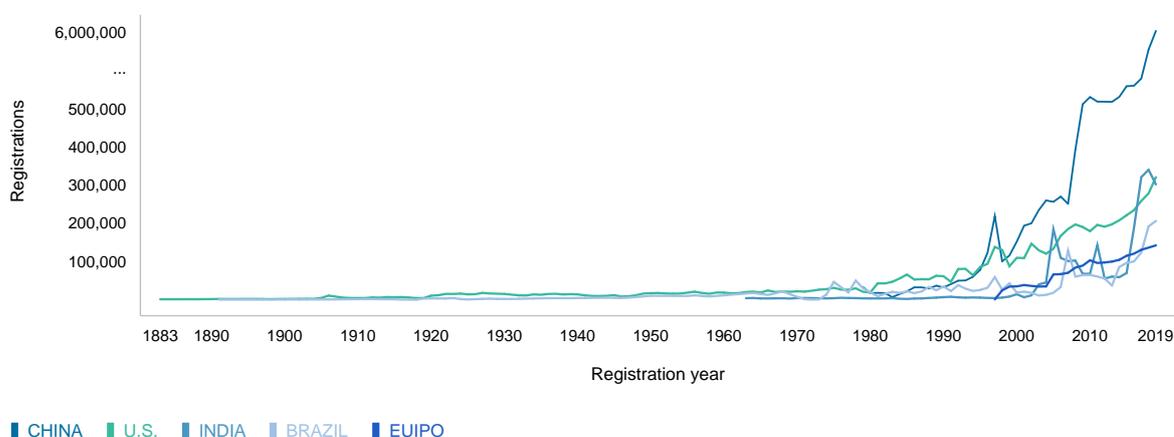
B15. Trademark registration class counts by region, 2009 and 2019

Region	Registration class count		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
Africa	133,800	223,600	32.4	31.1	3.0	1.9	5.3
Asia	1,707,100	8,153,200	70.8	88.5	38.2	68.9	16.9
Europe	1,753,400	2,020,000	64.0	68.2	39.2	17.1	1.4
Latin America and the Caribbean	451,800	647,700	60.0	63.6	10.1	5.5	3.7
North America	331,300	596,900	61.8	54.0	7.4	5.1	6.1
Oceania	94,600	171,600	53.8	42.4	2.1	1.5	6.1
World	4,472,000	11,813,000	64.9	80.2	100.0	100.0	10.2

Note: Totals by geographical region are WIPO estimates based on data covering 168 offices. Each region includes the following number of offices: Africa (34), Asia (48), Europe (42), Latin America and the Caribbean (37), North America (2) and Oceania (5).

Source: WIPO Statistics Database, September 2020.

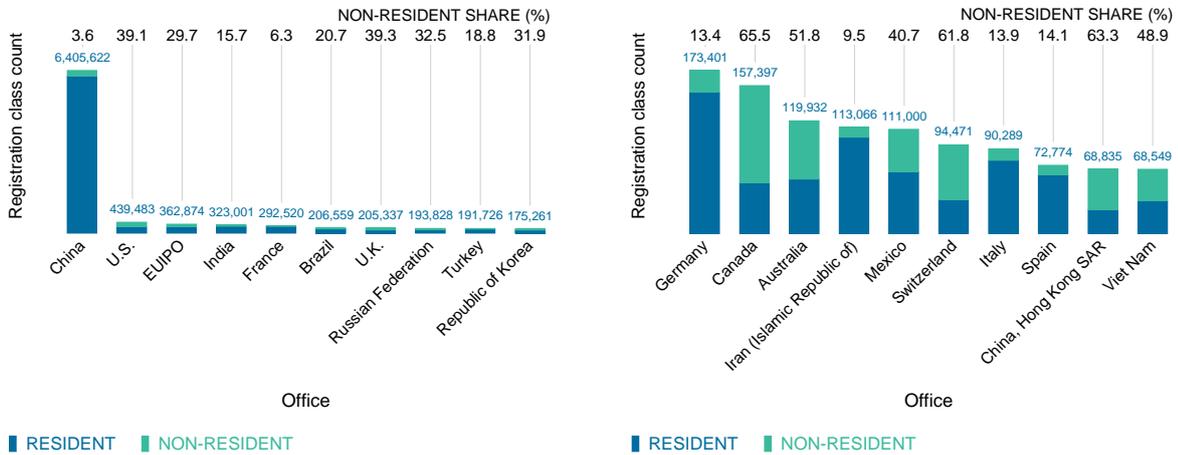
B16. Trend in trademark registrations for the top five offices, 1883–2019



Note: EUIPO is the European Union Intellectual Property Office. Data are based on the numbers of registrations recorded; that is, differences between single-class and multi-class registration systems across IP offices are not taken into account. The top five offices were selected based on their 2019 registration totals.

Source: WIPO Statistics Database, September 2020.

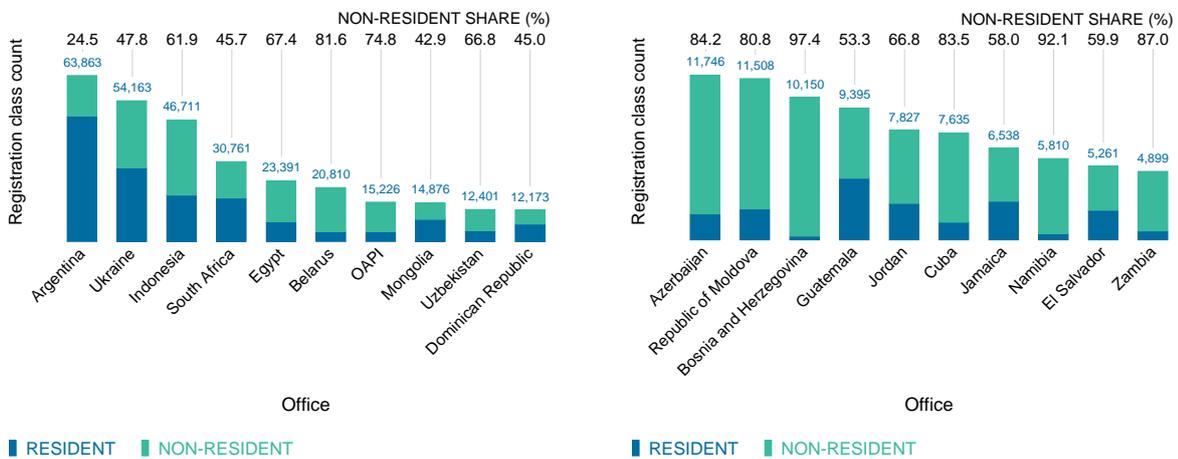
B17. Trademark registration class counts for the top 20 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. On the basis of an examination, a registration may be issued for a trademark application. The number of registrations issued may fluctuate greatly from one year to the next, in part reflecting the amount of resources that IP offices dedicate to examining trademark applications.

Source: WIPO Statistics Database, September 2020.

B18. Trademark registration class counts for offices of selected low- and middle-income countries, 2019

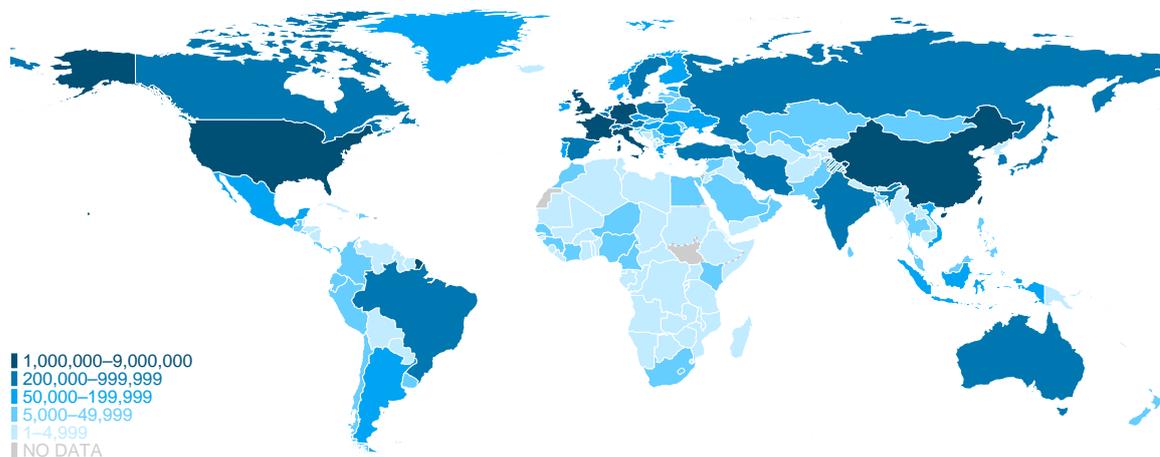


Note: The offices selected are from different world regions and income groups (low-income, lower middle-income and upper middle-income). OAPI is the African Intellectual Property Organization, which receives applications on behalf of its 17 member states. Where available, data for all offices are presented in statistical table B52 at the end of this section.

Source: WIPO Statistics Database, September 2020.

Trademark applications by origin

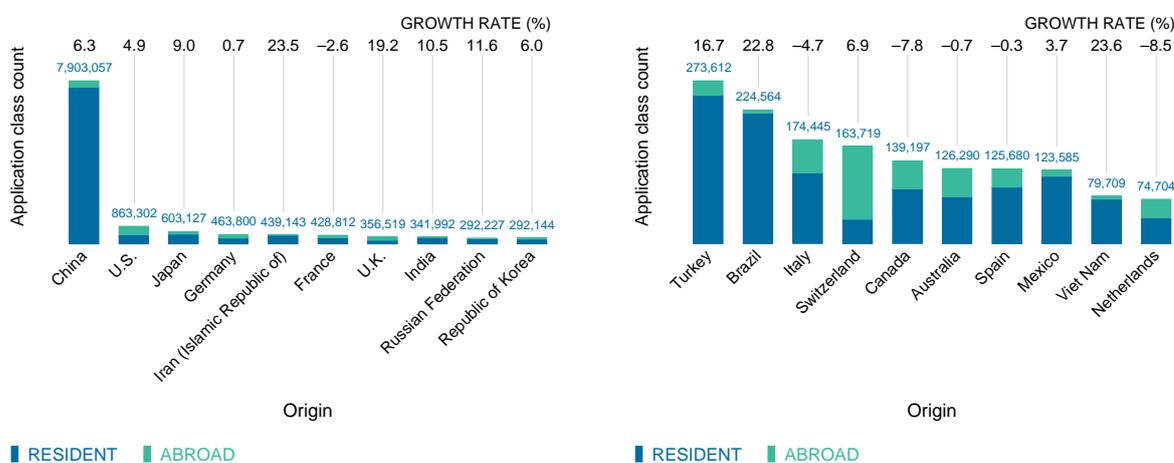
B19. Equivalent trademark application class counts by origin, 2019



Note: Trademark filing activity by origin includes the number of classes specified in resident applications and in applications filed abroad. The origin of a trademark application is determined by the residence of the applicant. Applications filed at regional offices are considered equivalent to multiple applications in the relevant member states and the classes specified in these applications are multiplied accordingly. See the glossary for the definition of equivalent application.

Source: WIPO Statistics Database, September 2020.

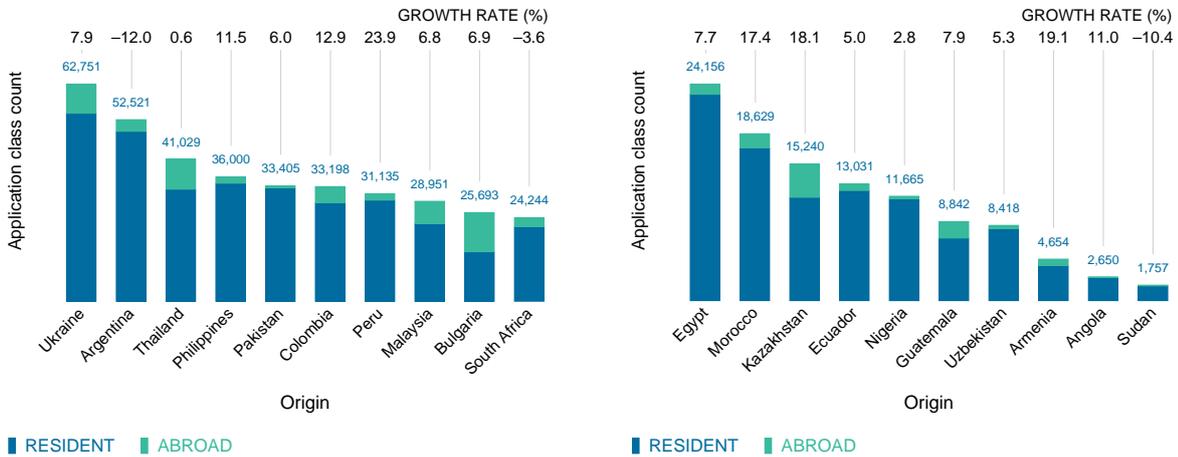
B20. Trademark application class counts for the top 20 origins, 2019



Note: In this figure, trademark application filing activity by origin includes the number of classes specified in resident applications and in applications filed abroad and is based on absolute count, not equivalent count. The origin of a trademark application is determined by the residence of the applicant. An application filed at a regional office is considered a resident filing, if the applicant is a resident of one of the relevant member states.

Source: WIPO Statistics Database, September 2020.

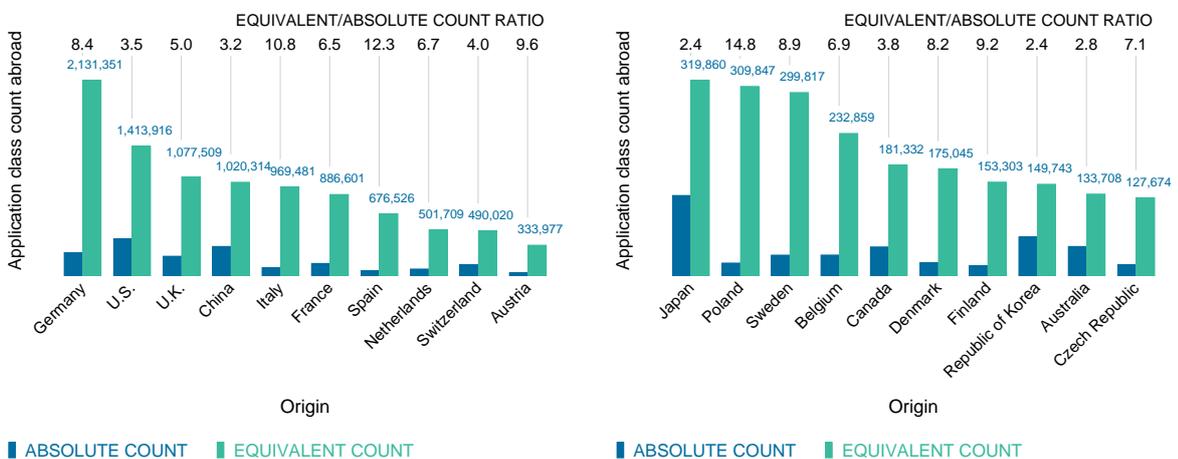
B21. Trademark application class counts for selected low- and middle-income origins, 2019



Note: In this figure, trademark application filing activity by origin includes the number of classes specified in resident applications and in applications filed abroad and is based on absolute count, not equivalent count. The origin of a trademark application is determined by the residence of the applicant. The origins selected are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all origins are presented in statistical table B51 at the end of this section.

Source: WIPO Statistics Database, September 2020.

B22. Trademark application class counts abroad for the top 20 origins, 2019



Note: This figure distinguishes between absolute counts and equivalent counts for filing activity abroad; that is, resident applications are excluded. Based on equivalent application class counts, applicants from Germany had the highest level of trademark filing activity abroad. This was due not only to their high application class counts at numerous foreign offices, but also to the frequent use of the European Union Intellectual Property Office – with its multiplier effect – to seek trademark protection within the entire EU. See the glossary for the definition of equivalent application. The origin of a trademark application is determined by the residence of the applicant.

Source: WIPO Statistics Database, September 2020.

B23. Trademark application class counts for the top 25 offices and origins, 2019

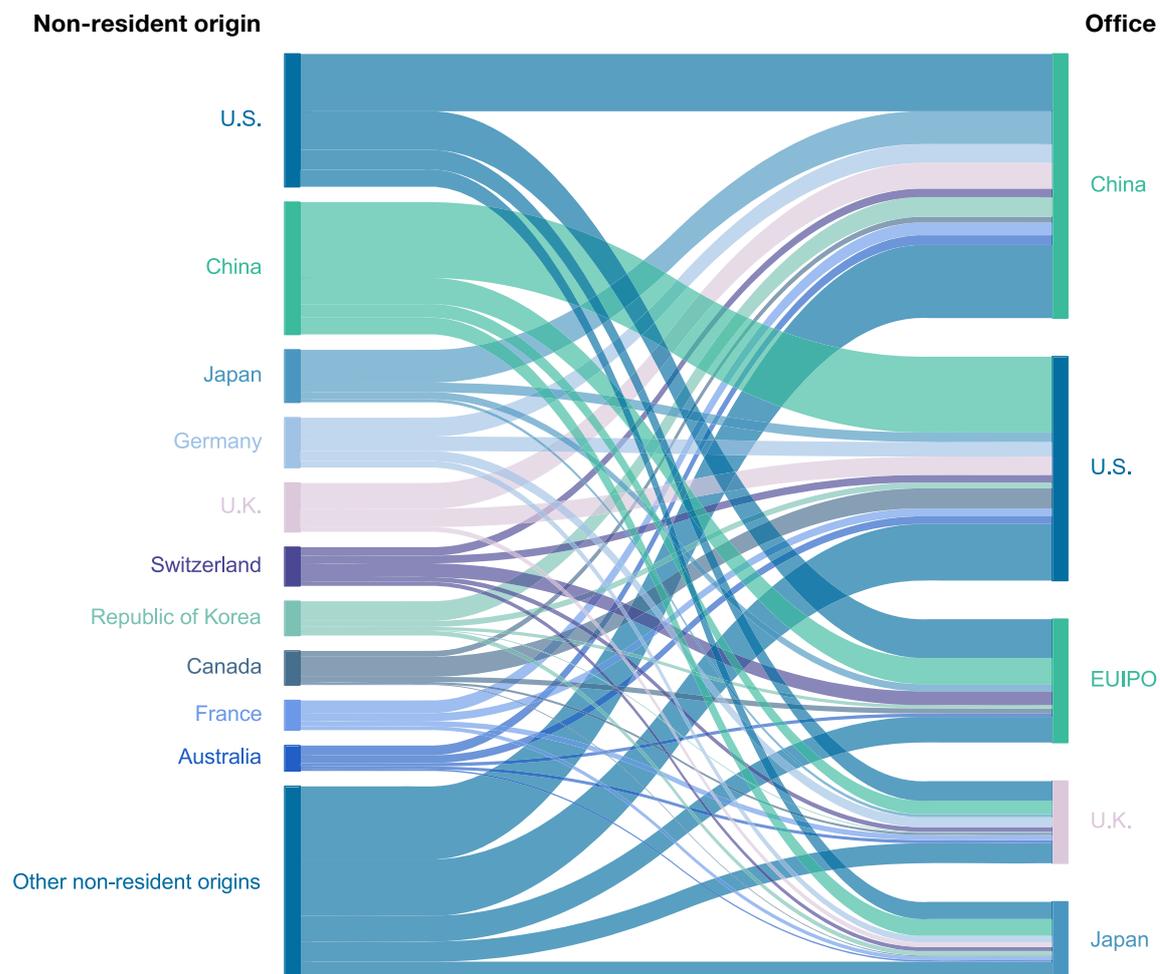
Origin	Office												
	China	U.S.	Japan	Iran (Islamic Republic of)	EUIPO	India	France	Russian Federation	Republic of Korea	Turkey	Brazil	Germany	U.K.
Argentina	245	384	16		204	10	2	19	22	5	370		29
Australia	9,273	7,354	1,393	68	3,135	957	171	498	843	213	284	195	2,918
Austria	1,626	1,730	545	182	11,476	567	212	869	492	751	275	1,566	751
Brazil	660	793	50	10	474	46	23	29	30	37	218,764	11	69
Canada	5,505	19,012	843	34	4,915	428	239	393	725	132	793	606	2,064
China	7,582,457	71,924	15,938	3,210	24,804	6,403	3,505	6,502	9,560	3,050	2,189	7,083	12,778
China, Hong Kong SAR		4,078	1,273		2,994	390	343	534	14	104	194	472	1,091
France	12,014	7,514	3,620	847	27,792	1,983	293,229	3,520	2,474	1,901	1,862	1,224	4,992
Germany	17,874	13,817	6,129	1,567	71,927	4,557	1,045	7,253	4,784	5,433	2,605	210,549	9,479
India	879	1,684	380	132	841	322,297	61	391	145	204	213	63	557
Iran (Islamic Republic of)	227	8	17	437,653	69	26	3	67	22	69	1	24	19
Italy	7,735	5,036	2,272	804	33,768	1,238	366	2,664	1,564	1,464	1,057	319	1,440
Japan	31,140	9,068	471,749	655	6,768	2,441	505	2,247	7,602	1,293	1,290	462	2,781
Mexico	611	2,411	124	6	716	71	27	89	73	29	399	50	80
Netherlands	3,934	3,111	1,042	220	15,200	746	455	998	641	756	561	764	1,236
Poland	1,185	630	101	73	11,089	117	90	745	188	226	79	154	124
Republic of Korea	18,631	5,600	4,239	279	3,106	1,027	186	1,244	228,515	469	690	213	883
Russian Federation	3,110	1,435	329	693	1,399	653	677	246,727	358	848	127	969	620
Spain	2,881	2,589	693	389	23,812	527	326	978	499	590	803	291	578
Switzerland	8,075	7,146	3,808	1,024	13,223	2,579	2,274	3,751	2,424	2,433	1,949	3,278	4,410
Turkey	893	1,378	275	902	2,331	412	549	1,313	225	248,754	91	856	773
U.K.	24,373	17,400	4,505	1,233	32,607	3,609	1,300	3,449	3,369	2,098	1,490	1,752	142,436
U.S.	54,387	460,197	16,289	1,302	36,745	9,161	1,854	8,130	12,266	5,311	9,378	1,919	18,609
Ukraine	486	684	62	27	466	54	119	967	45	213	6	206	174
Viet Nam	511	466	171	45	144	90	60	113	184	37	15	63	76
Others	44,369	27,232	10,381	3,570	77,707	7,375	4,013	13,486	7,008	6,028	4,537	2,839	11,404
Total	7,833,081	672,681	546,244	454,925	407,712	367,764	311,634	306,976	284,072	282,448	250,022	235,928	220,371

Origin	Office											
	Canada	Mexico	Australia	Viet Nam	Italy	Switzerland	Indonesia	Spain	Ukraine	China, Hong Kong SAR	Thailand	Argentina
Argentina	35	197	17	6	6	7	5	76	2	18	7	49,081
Australia	2,137	424	78,307	820	98	226	1,477	87	120	1,235	589	153
Brazil	630	380	509	187	348	2,364	368	124	463	76	206	100
Canada	130	326	44	12	17	38	57	18	14	37	32	441
China	91,910	1,408	1,743	261	110	334	160	168	63	471	162	446
China, Hong Kong SAR	7,273	3,612	6,480	7,258	2,065	2,751	8,091	1,326	1,977	13,025	7,671	1,049
France	843	107	958	324	166	220	268	28	45	29,179	596	64
Germany	3,914	2,046	2,056	1,118	1,193	5,917	1,886	1,339	1,519	1,676	1,054	888
India	5,849	3,295	4,982	1,866	905	18,609	3,346	677	2,781	1,774	1,961	1,025
Indonesia	496	284	370	348	37	181	341	37	311	79	264	151
Iran (Islamic Republic of)	11	12	24	16	10	18	22		17		21	
Italy	1,717	1,008	1,360	539	85,062	2,510	1,130	242	867	1,046	629	415
Japan	3,441	1,642	3,010	4,732	305	1,443	5,365	187	569	5,937	5,285	539
Mexico	294	112,970	77	15	29	32	11	104	27	46	39	347
Netherlands	1,248	724	867	415	145	1,432	606	227	344	455	334	272
Poland	132	85	107	95	42	179	117	52	786	71	40	10
Republic of Korea	988	800	1,106	4,036	131	345	2,258	100	291	1,689	1,802	241
Russian Federation	290	258	242	523	645	389	629	559	1,727	95	276	38
Spain	699	1,883	543	239	166	612	518	70,826	396	320	283	586
Switzerland	2,573	2,298	2,615	1,208	1,396	40,712	2,485	679	1,722	1,409	1,183	1,055
Turkey	280	165	246	144	361	328	323	278	555	38	139	47
U.K.	19,050	2,641	6,770	1,606	944	3,341	2,461	911	1,548	2,311	1,652	548
U.S.	40,891	17,574	16,967	4,677	945	6,825	5,445	915	2,756	7,561	4,602	4,420
Ukraine	77	65	40	35	100	69	81	150	54,298	5	5	
Viet Nam	124	56	152	74,516	38	22	178	40	41	66	188	
Others	8,638	5,934	10,506	7,392	1,813	7,439	48,209	1,655	6,177	8,273	37,391	2,469
Total	193,670	160,194	140,098	112,388	97,077	96,343	85,837	80,805	79,416	76,892	66,411	64,385

Note: EUIPO is the European Union Intellectual Property Office. The office and origin data shown consist of absolute application class counts rather than equivalent application class counts. For the office of China, the class count for origin China, Hong Kong SAR is included in the number for origin China.

Source: WIPO Statistics Database, September 2020.

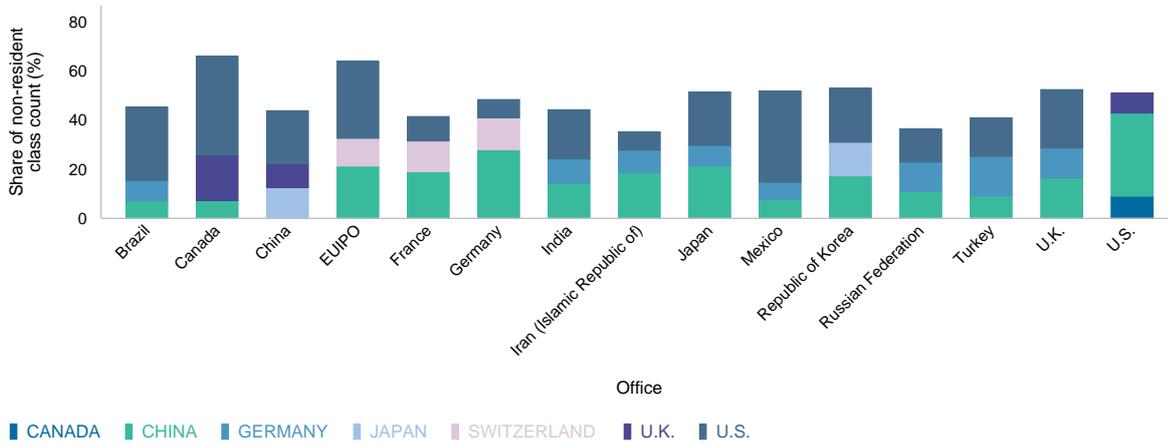
B24. Flows of non-resident trademark application class counts between selected top origins and offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. The office and non-resident origin data shown consist of absolute application class counts rather than equivalent application class counts.

Source: WIPO Statistics Database, September 2020.

B25. Distribution of trademark application class counts for the top 15 offices and selected non-resident origins, 2019



Note: EUIPO is the European Union Intellectual Property Office. The office and origin data shown consist of absolute application class counts rather than equivalent application class counts.

Source: WIPO Statistics Database, September 2020.

Trademark applications by Nice class and industry sector

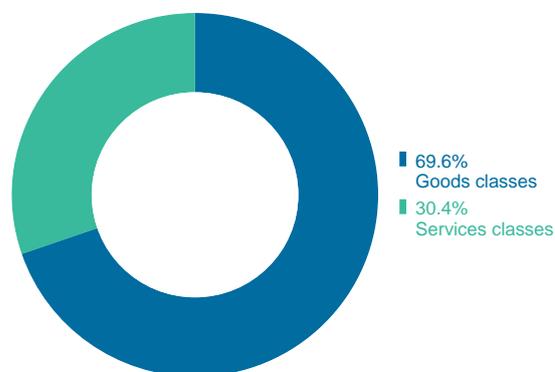
B26. Distribution of non-resident trademark applications by top Nice classes, 2019

Rank	Class	Class share (%)
1	9 Scientific, photographic, measuring instruments; recording equipment; computers and software	11.0
2	35 Advertising, business management, business administration and office functions	7.6
3	5 Pharmaceutical preparations, baby food, dietary supplements for humans and animals, disinfectants, fungicides and herbicides	5.5
4	42 Scientific and technological services, design and development of computer hardware and software	5.5
5	3 Bleaching preparations and other substances for laundry use; cleaning and abrasive preparations; soaps, perfumery and cosmetics	5.2
6	25 Clothing, footwear, headgear	4.7
7	41 Education, entertainment, and sporting activities	4.7
8	30 Coffee, tea, cocoa, rice, flour, bread, pastry and confectionery, sugar, honey, yeast, salt, mustard, vinegar, sauces (condiments) and spices	3.0
9	7 Machines and machine tools; motors and engines; agricultural implements	2.7
10	11 Apparatus for lighting, heating, steam generating, cooking, refrigerating, drying, ventilating, water supply and sanitary purposes	2.6
Remaining classes		47.5

Note: Figures based on non-resident filing data from 136 IP offices. Some classes listed are abbreviated. See www.wipo.int/classifications/nice for a complete list of classes.

Source: WIPO Statistics Database, September 2020.

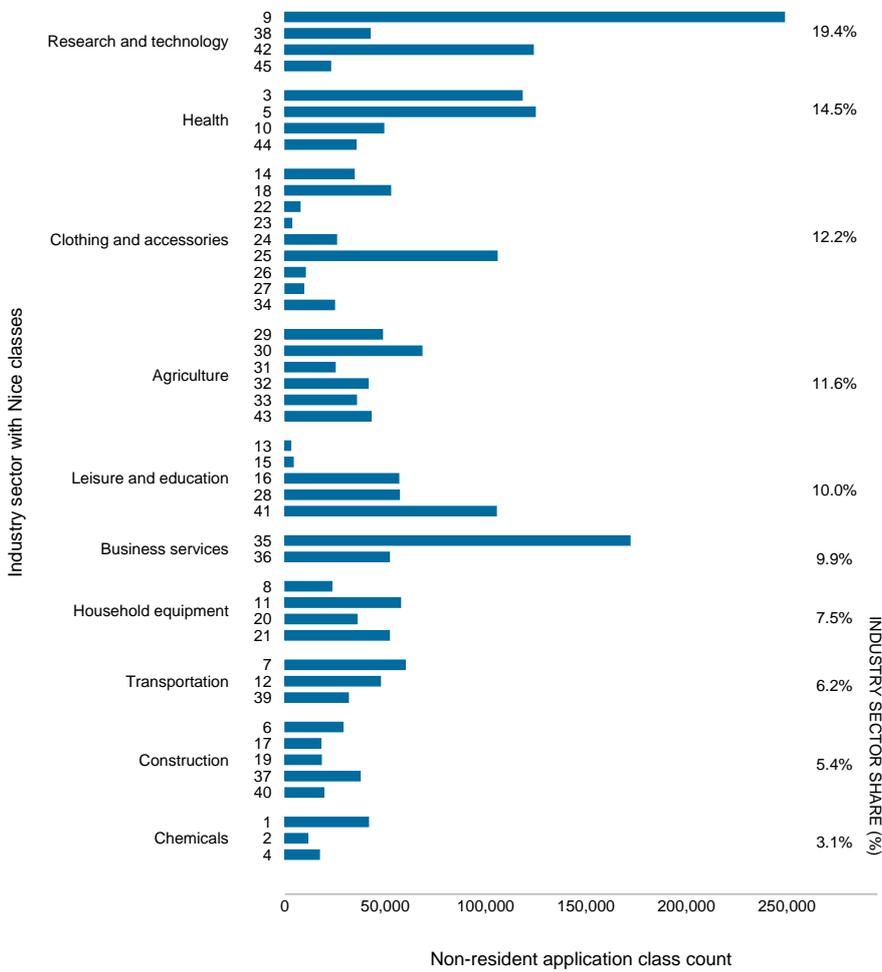
B27. Non-resident trademark applications by goods and services classes, 2019



Note: In the 45-class Nice Classification, the first 34 classes indicate goods and the remaining 11 refer to services. See www.wipo.int/classifications/nice for a complete list of classes. These figures are based on non-resident filing data from 136 IP offices.

Source: WIPO Statistics Database, September 2020.

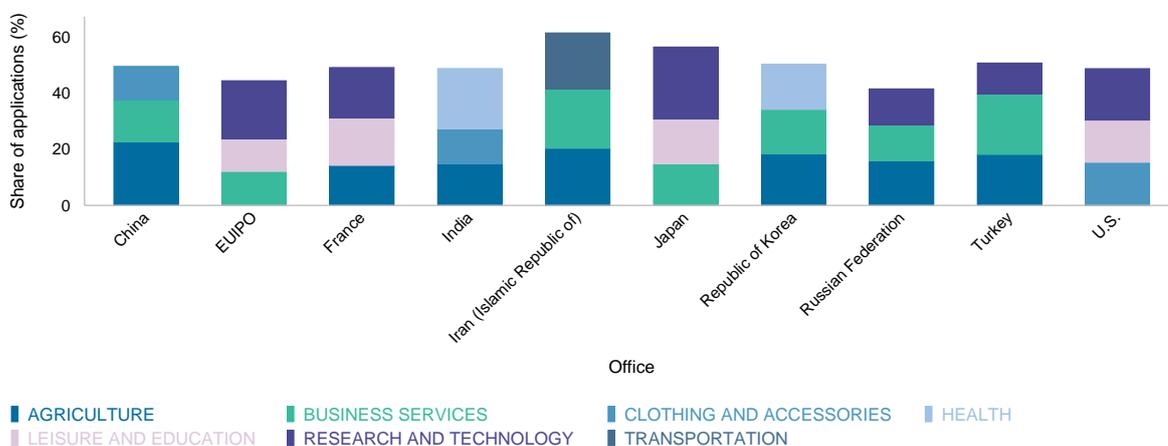
B28. Non-resident trademark applications by industry sector, 2019



Note: Industry sectors based on class groups are those defined by Edital. Some industry sectors are abbreviated. See annex B for full definitions and the composition of Nice goods and services classes. Figures based on non-resident filing data from 136 IP offices.

Source: WIPO Statistics Database, September 2020.

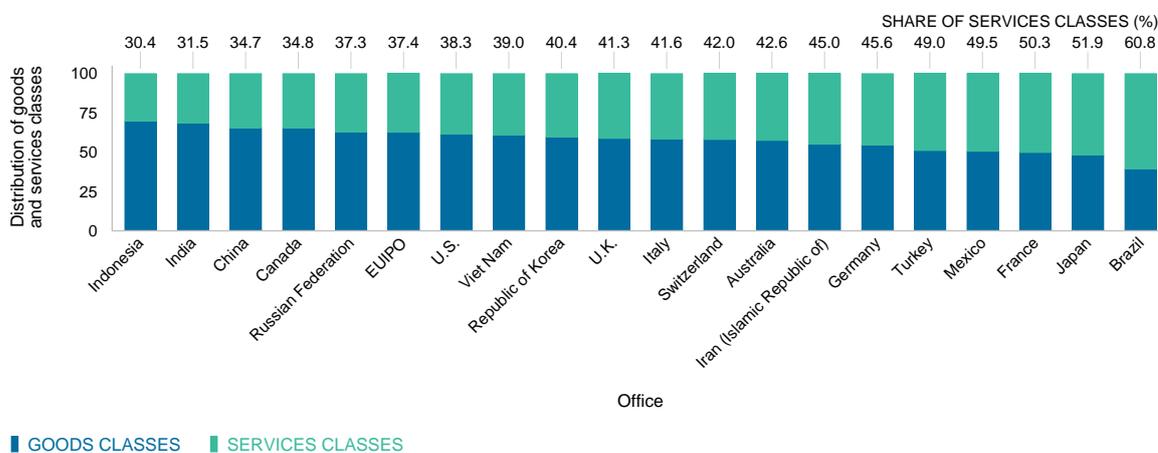
B29. Trademark applications by top three sectors at the top offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. Industry sectors based on class groups are those defined by Edital. Some industry sectors are abbreviated. See www.wipo.int/classifications/nice for a complete list of classes. The top three sectors and top offices were selected based on their 2019 totals.

Source: WIPO Statistics Database, September 2020.

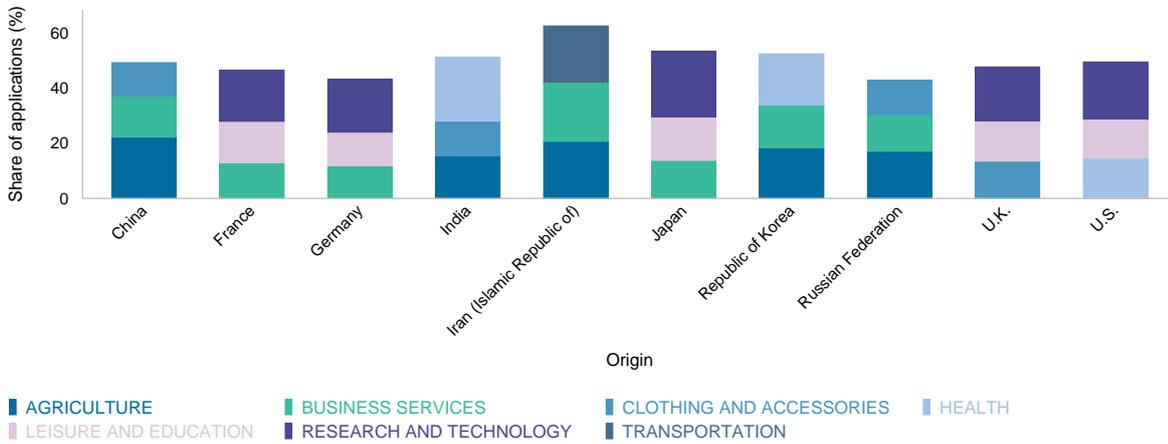
B30. Distribution of trademark applications by goods and services at the top offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.

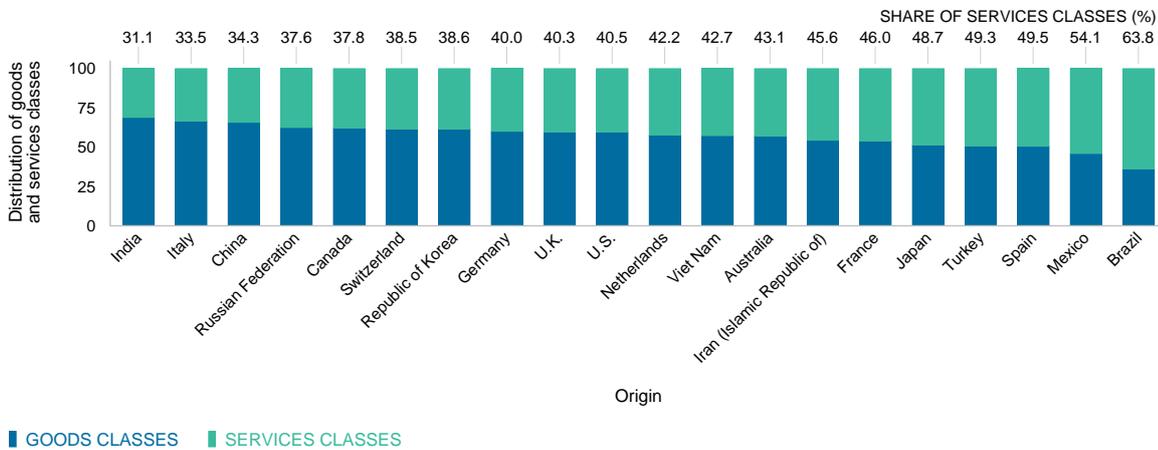
Source: WIPO Statistics Database, September 2020.

B31. Trademark applications by top three sectors for the top origins, 2019



Note: Industry sectors based on class groups are those defined by Edital. Some industry sectors are abbreviated. See annex B for full definitions. The top three sectors and top origins were selected based on their 2019 totals.
 Source: WIPO Statistics Database, September 2020.

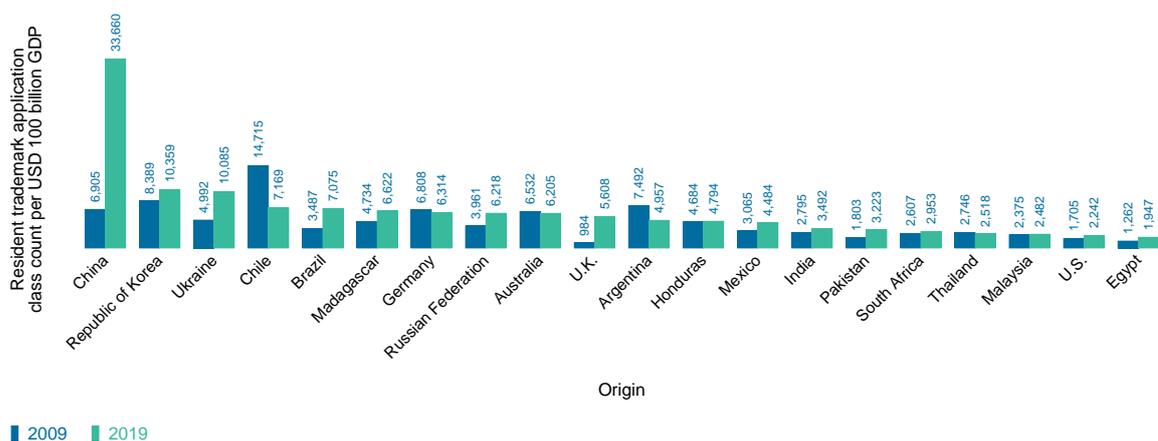
B32. Distribution of trademark applications by goods and services for the top origins, 2019



Source: WIPO Statistics Database, September 2020.

Trademark application class count in relation to GDP and population

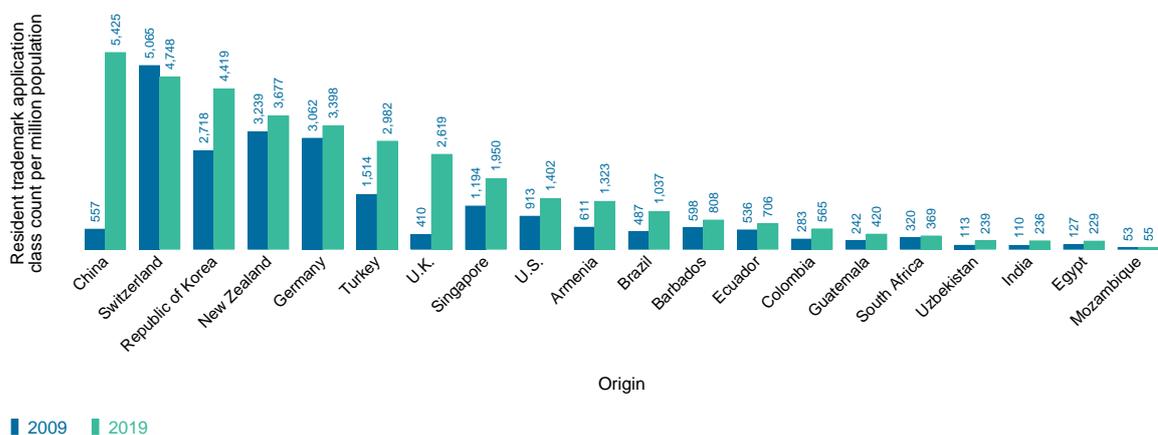
B33. Resident trademark application class count per USD 100 billion GDP for selected origins, 2009 and 2019



Note: GDP data are in constant 2017 U.S. PPP dollars. This figure does not provide an overall ranking of all origins; rather, it shows a selection across geographical regions and income groups.

Sources: WIPO Statistics Database and World Bank, September 2020.

B34. Resident trademark application class count per million population for selected origins, 2009 and 2019

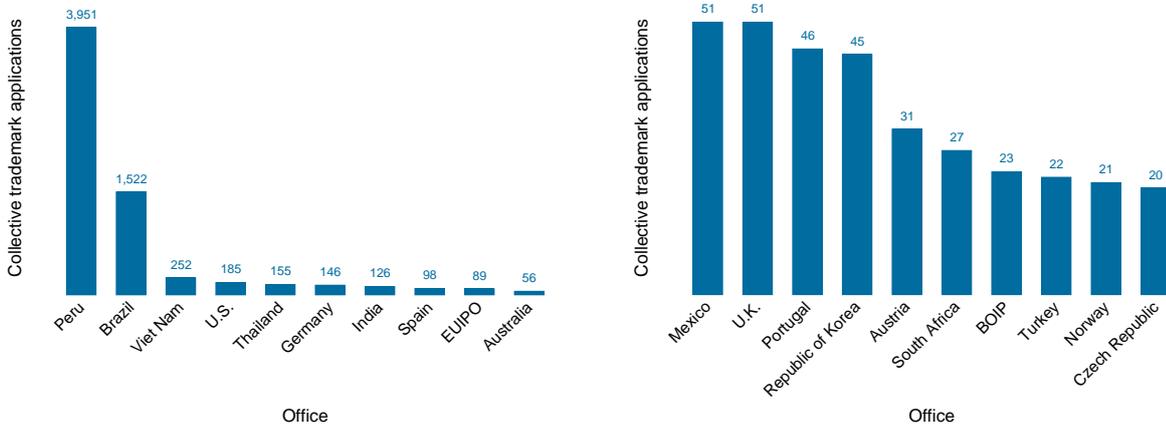


Note: This figure does not provide an overall ranking of all origins; rather, it shows a selection across geographical regions and income groups.

Sources: WIPO Statistics Database and World Bank, September 2020.

Collective and certification trademark applications by office

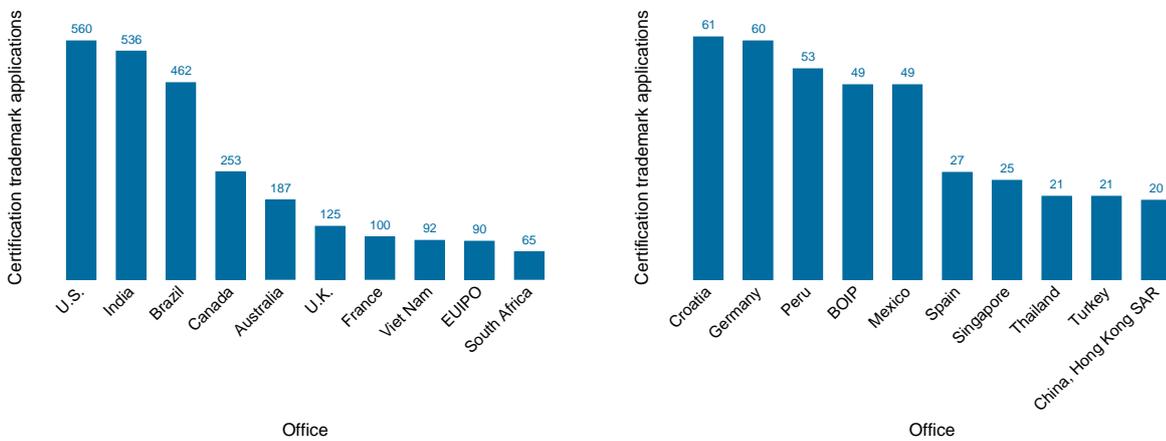
B35. Collective trademark applications for the top 20 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office and BOIP is the Benelux Office for Intellectual Property. The 2019 total for the office of China is not presented here, because the data are not available.

Source: WIPO Statistics Database, September 2020.

B36. Certification trademark applications for the top 20 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office and BOIP is the Benelux Office for Intellectual Property. The 2019 total for the office of China is not presented here, because the data are not available.

Source: WIPO Statistics Database, September 2020.

Trademark registrations in force

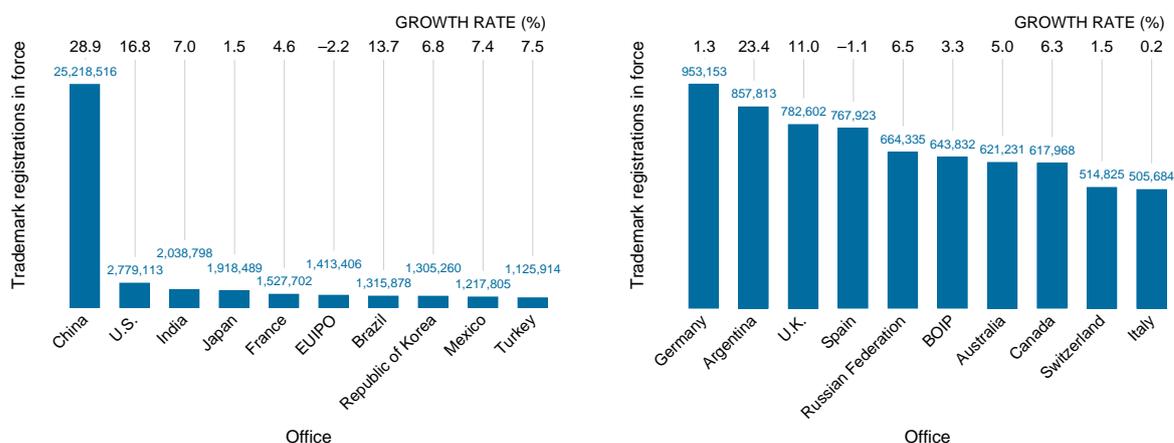
B37. Trend in trademark registrations in force worldwide, 2010–2019



■ TRADEMARK REGISTRATIONS IN FORCE ■ GROWTH RATE (%)

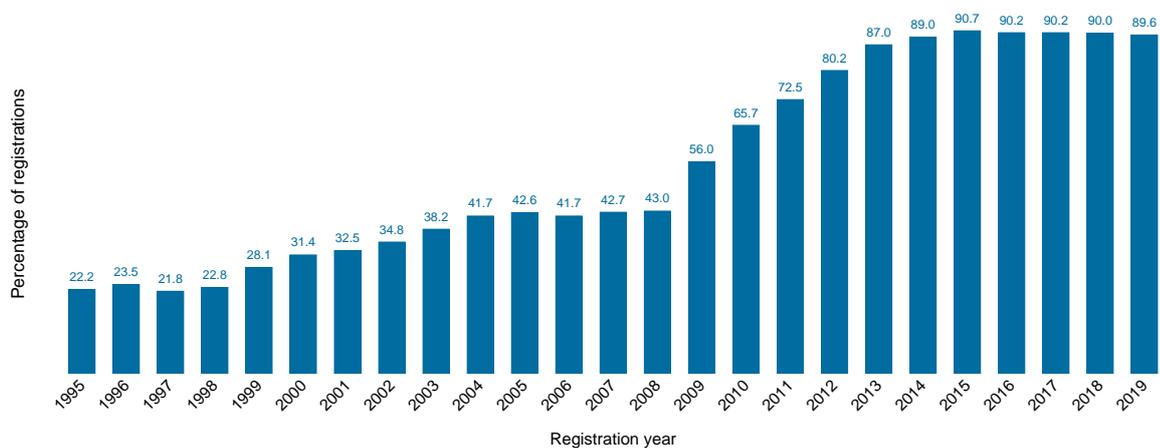
Note: World totals are WIPO estimates using data covering 146 IP offices. Data refer to the number of trademark registrations in force, not the number of classes specified in those registrations. Trademark rights can be maintained indefinitely by paying renewal fees at defined intervals. Trademarks in force provide information on the volume of trademark registrations currently active, as well as the historical trademark life cycle. Source: WIPO Statistics Database, September 2020.

B38. Trademark registrations in force for the top 20 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office and BOIP is the Benelux Office for Intellectual Property. Data refer to the number of trademark registrations in force, not the number of classes specified in those registrations. Source: WIPO Statistics Database, September 2020.

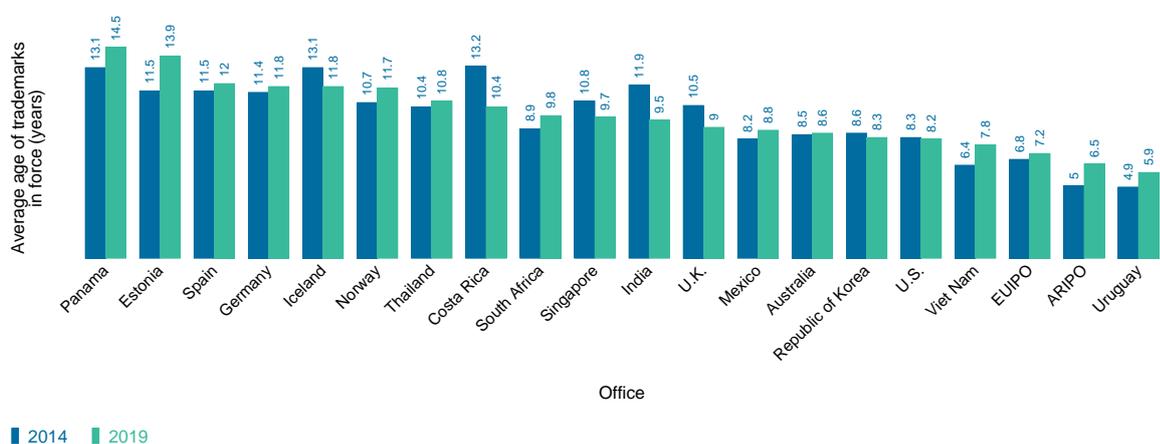
B39. Trademark registrations in force in 2019 as a percentage of total registrations recorded between 1995 and 2019



Note: Percentages are calculated as follows: the number of trademark registrations issued in year t and in force in 2019 divided by the total number of trademark registrations issued in year t . Trademark holders must pay renewal fees to maintain the validity of their marks, which in most cases can be maintained indefinitely. This figure is based on about 15.8 million active trademark registrations reported by the 77 offices that provided a breakdown by year of registration. Detailed data for several larger offices, such as those of China and Japan, are not available.

Source: WIPO Statistics Database, September 2020.

B40. Average age of trademarks in force at selected offices, 2014 and 2019

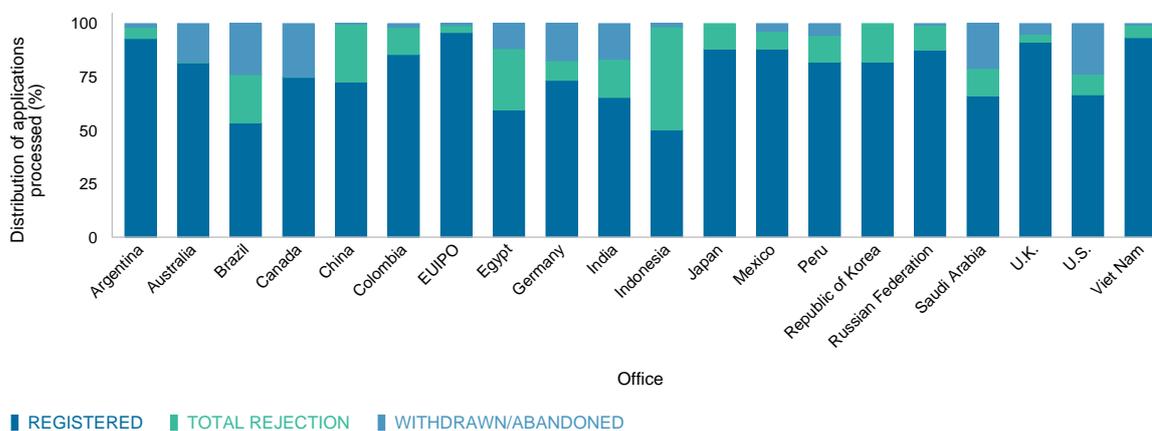


Note: ARIPO is the African Regional Intellectual Property Organization and EUIPO is the European Union Intellectual Property Office.

Source: WIPO Statistics Database, September 2020.

Trademark office procedural data

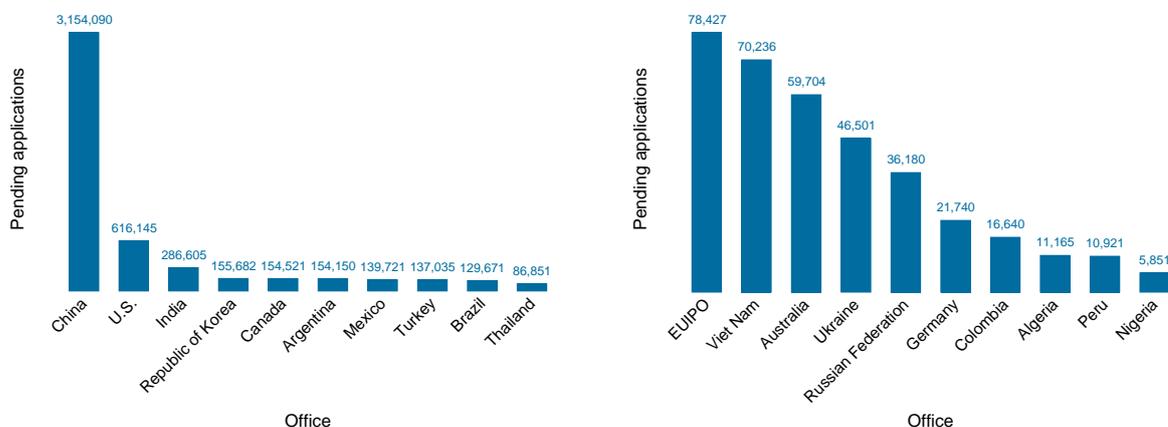
B41. Distribution of trademark examination outcomes for selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in application processing procedures between offices, data cannot be fully harmonized. Therefore caution should be exercised when making comparisons across offices.

Source: WIPO Statistics Database, September 2020.

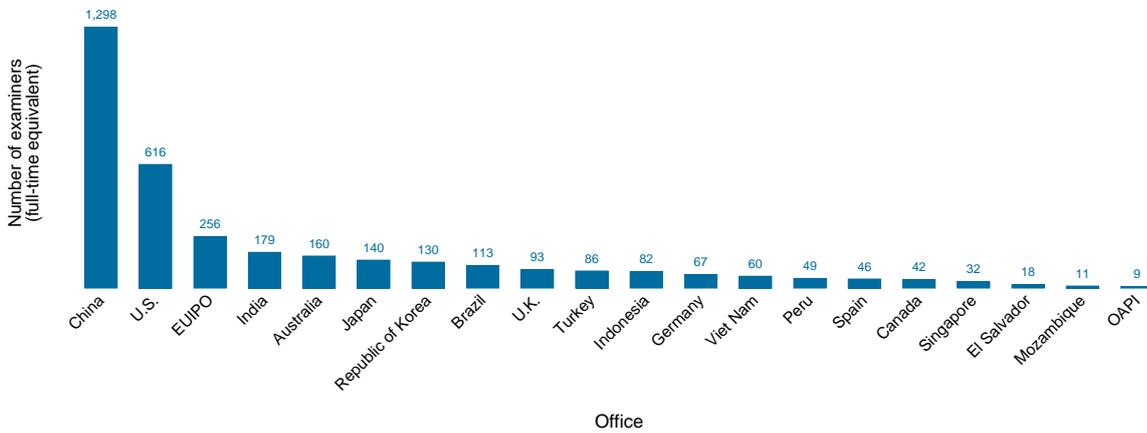
B42. Trademark applications pending for selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in application processing procedures between offices, data cannot be fully harmonized. Therefore caution should be exercised when making comparisons across offices.

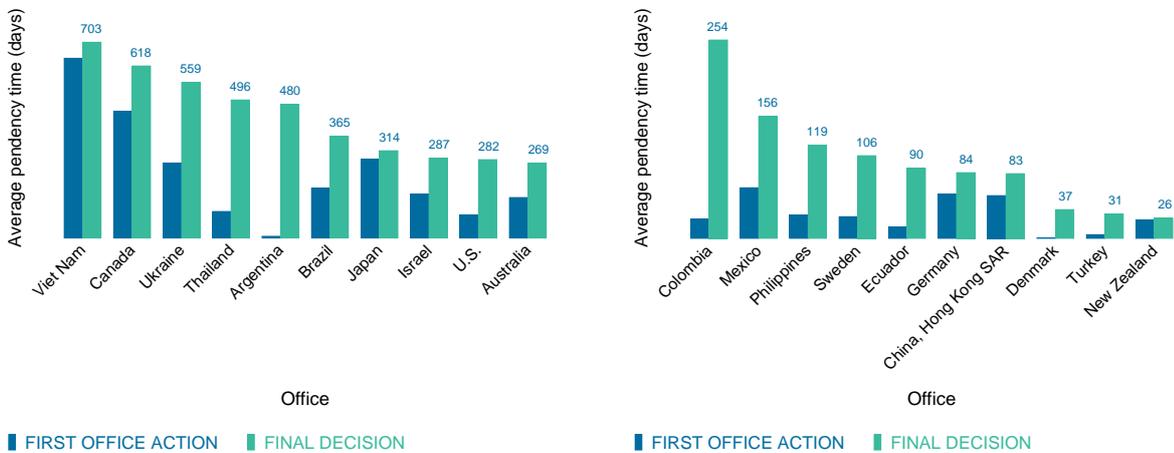
Source: WIPO Statistics Database, September 2020.

B43. Number of trademark examiners for selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office and OAPI is the African Intellectual Property Organization.
Source: WIPO Statistics Database, September 2020.

B44. Duration of trademark examination for selected offices, 2019



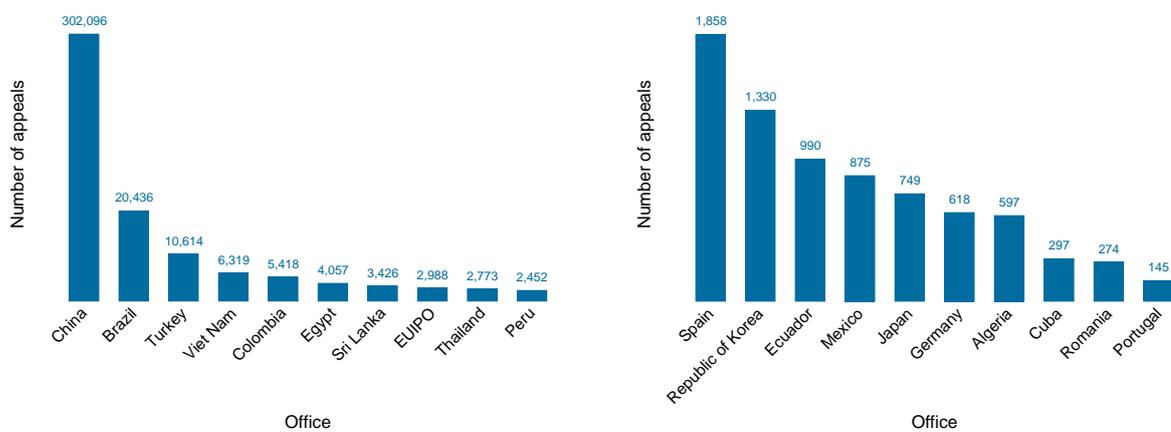
Note: WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in application processing procedures between offices, data cannot be fully harmonized. Therefore caution should be exercised when making comparisons across offices.
Source: WIPO Statistics Database, September 2020.

B45. Third-party oppositions for selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.
Source: WIPO Statistics Database, September 2020.

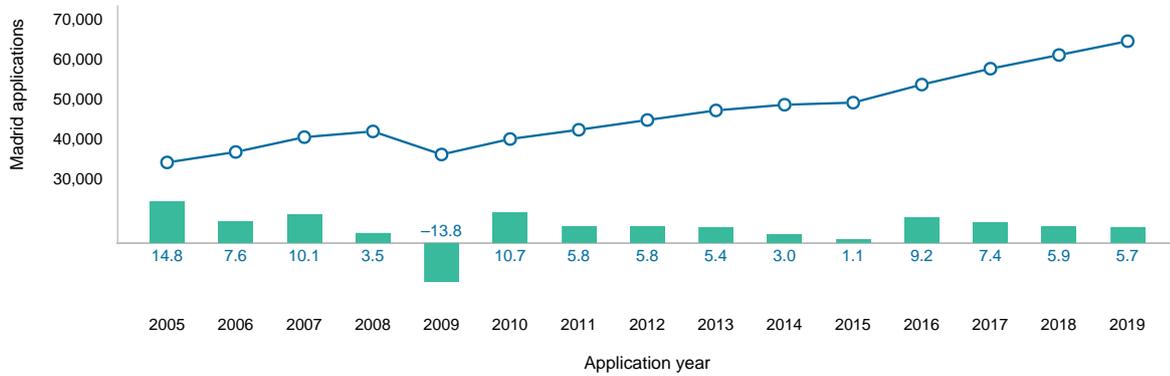
B46. Appeals against decisions by selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.
Source: WIPO Statistics Database, September 2020.

Trademark applications and registrations through the Madrid System

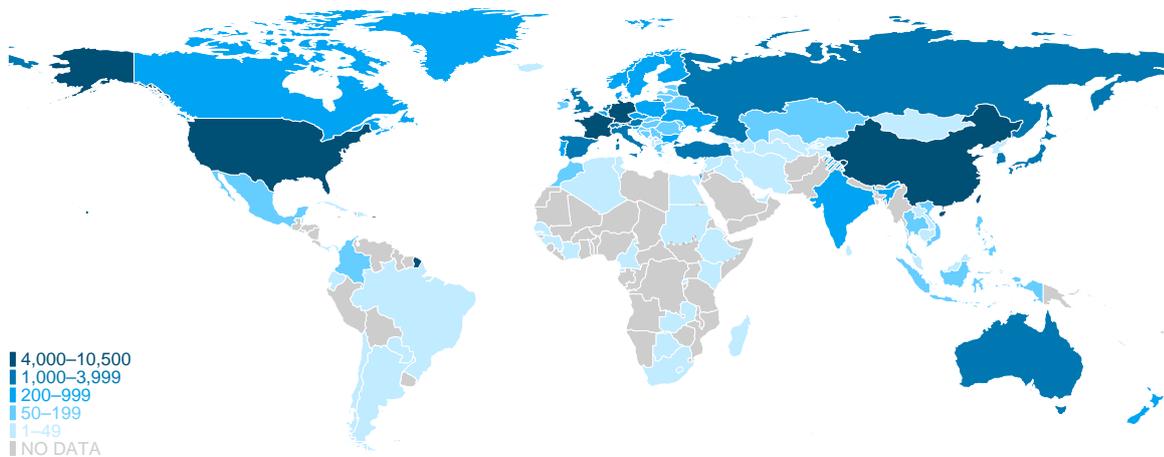
B47. Trend in Madrid international applications, 2005–2019



■ MADRID APPLICATIONS ■ GROWTH RATE (%)

Source: WIPO Statistics Database, September 2020.

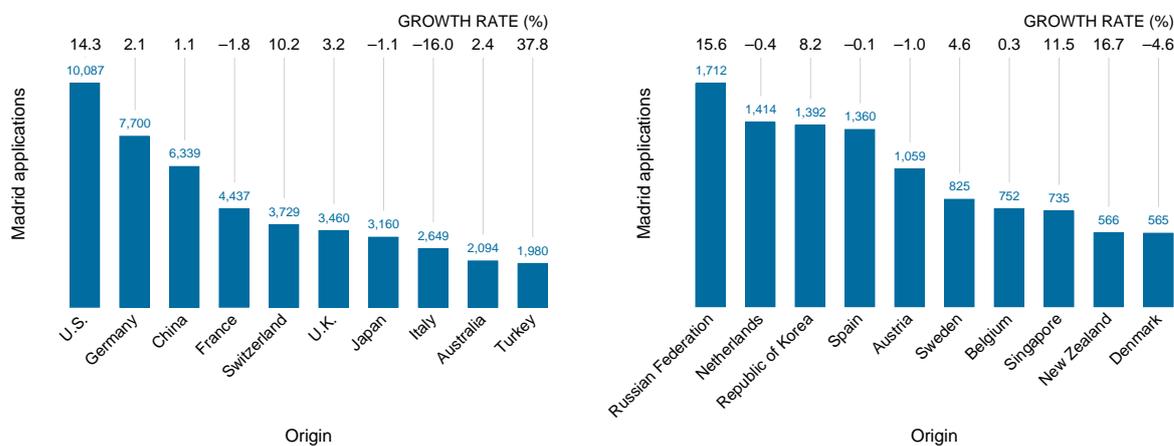
B48. Madrid international applications by origin, 2019



Note: Counts are based on the country of the applicant's address, not the office of origin.

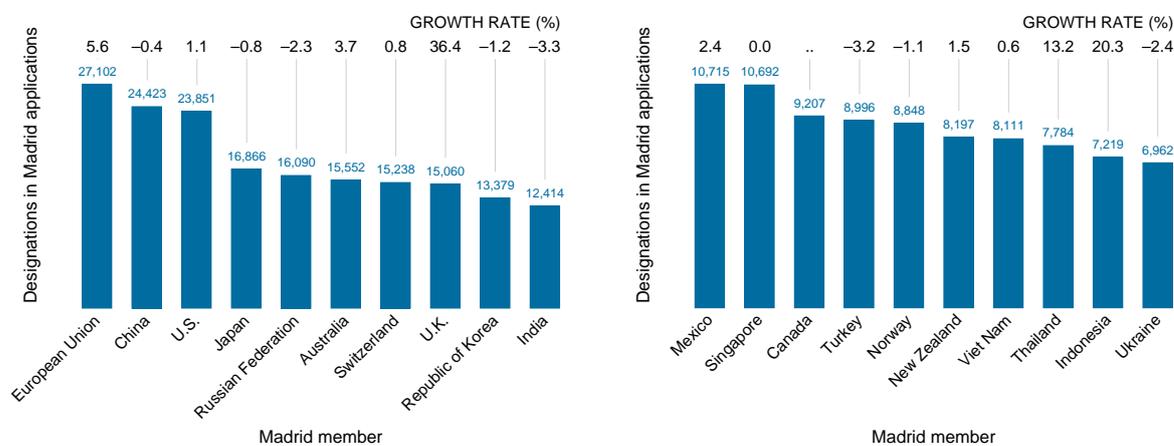
Source: WIPO Statistics Database, September 2020.

B49. Madrid applications for the top 20 origins, 2019



Note: Origin data are based on the country of the applicant's address.
Source: WIPO Statistics Database, September 2020.

B50. Designations in Madrid international applications for the top 20 designated Madrid members, 2019



Note: The numbers of designations in applications for all Madrid members are reported in statistical table B51.
.. indicates not available.
Source: WIPO Statistics Database, September 2020.

Statistical tables

B51. Trademark applications by office and origin, 2019

Name	Application class count by office			Application class count by origin	Equivalent application class count by origin		international applications	Madrid
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Designated Madrid member	
Afghanistan (b)	..	..	..	449	449	..	824
African Intellectual Property Organization	13,966	3,955	10,011	n.a.	n.a.	n.a.	2,211	
African Regional Intellectual Property Organization	725	171	554	n.a.	n.a.	n.a.	n.a.	
Albania	8,395	1,439	6,956	1,522	2,064	12	2,151	
Algeria (b)	..	..	..	235	334	6	2,631
Andorra	2,552	1,058	1,494	1,350	5,211	1	n.a.	
Angola	4,333	2,604	1,729	2,650	2,866	..	n.a.	
Antigua and Barbuda (b)	..	..	..	334	1,171	4	598
Argentina	64,385	49,081	15,304	52,521	58,149	2	n.a.	
Armenia	11,978	3,912	8,066	4,654	4,869	30	2,718	
Aruba (b)	..	..	..	2	2	..	n.a.
Australia	140,098	78,307	61,791	126,290	212,015	2,094	15,552	
Austria	26,012	16,533	9,479	51,298	361,986	1,059	2,560	
Azerbaijan	13,288	3,908	9,380	4,621	5,188	5	3,070	
Bahamas (b)	..	..	..	1,029	2,654	6	n.a.
Bahrain	12,282	347	11,935	794	1,474	..	1,832	
Bangladesh	12,435	8,043	4,392	8,178	8,491	..	n.a.	
Barbados	1,031	232	799	1,032	3,410	2	n.a.	
Belarus	19,779	4,936	14,843	8,474	11,150	194	4,795	
Belgium (c)	n.a.	n.a.	n.a.	33,980	252,868	752	n.a.	
Belize (b)	..	..	..	572	1,951	5	n.a.
Benelux Office for Intellectual Property (d)	53,757	43,729	10,028	n.a.	n.a.	n.a.	2,774	
Benin (b,h)	n.a.	n.a.	n.a.	230	3,446	..	n.a.	
Bermuda (b)	..	..	..	656	1,574	19	n.a.
Bhutan (b)	..	..	..	5	5	..	694
Bolivia (Plurinational State of) (b)	..	..	..	164	245	..	n.a.
Bonaire, Sint Eustatius and Saba (b,i)	..	..	..	..	..	..	555
Bosnia and Herzegovina	9,921	985	8,936	1,503	2,132	59	2,759	
Botswana	3,431	603	2,828	891	893	2	814	
Brazil	250,022	218,764	31,258	224,564	237,884	31	1,952	
Brunei Darussalam	4,727	267	4,460	314	314	2	1,150	
Bulgaria	16,513	12,303	4,210	25,693	82,344	223	1,262	
Burkina Faso (b,h)	n.a.	n.a.	n.a.	214	3,590	..	n.a.	
Burundi (b)	..	..	..	1	1	..	n.a.
Cabo Verde	284	91	193	117	149	1	n.a.	
Cambodia	13,862	2,980	10,882	3,091	3,199	4	2,597	
Cameroon (b,h)	n.a.	n.a.	n.a.	863	11,004	5	n.a.	
Canada	193,670	91,910	101,760	139,197	273,242	359	9,207	
Central African Republic (b,h)	n.a.	n.a.	n.a.	11	139	..	n.a.	
Chad (b,h)	n.a.	n.a.	n.a.	43	699	..	n.a.	
Chile	46,947	32,915	14,032	37,126	41,333	2	n.a.	
China	7,833,081	7,582,457	250,624	7,903,057	8,602,771	6,339	24,423	
China, Hong Kong SAR	76,892	29,179	47,713	50,207	131,971	1	n.a.	
China, Macao SAR	15,363	2,479	12,884	3,015	3,555	..	n.a.	
Colombia	47,996	28,427	19,569	33,198	38,834	55	4,274	

Name	Application class count by office			Application class count by origin	Equivalent application class count by origin		Madrid international applications
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Designated Madrid member
Comoros (b)	..	..	..	14	62	..	n.a.
Congo (b,h)	n.a.	n.a.	n.a.	56	540	..	n.a.
Cook Islands (b)	..	..	..	66	93	..	n.a.
Costa Rica	15,823	8,866	6,957	9,610	10,744	..	n.a.
Côte d'Ivoire (b,h)	n.a.	n.a.	n.a.	1,033	16,243	13	n.a.
Croatia	9,729	5,779	3,950	8,492	23,480	172	1,274
Cuba	7,958	3,641	4,317	3,930	4,486	13	1,391
Curaçao (i)	2,414	0	2,414	72	261	7	601
Cyprus (b)	..	..	..	11,767	69,215	231	811
Czech Republic	25,451	20,256	5,195	38,326	152,072	374	1,569
Democratic People's Republic of Korea (b)	..	..	..	359	467	10	1,197
Democratic Republic of the Congo (b)	..	..	..	34	402	..	n.a.
Denmark	10,460	5,893	4,567	27,272	186,819	565	1,306
Djibouti (b)	..	..	..	2	6	..	n.a.
Dominica	151	2	149	30	138	..	n.a.
Dominican Republic	13,509	7,891	5,618	8,284	9,004	1	n.a.
Ecuador	19,350	12,270	7,080	13,031	13,895	1	n.a.
Egypt	37,754	22,997	14,757	24,156	26,157	21	4,130
El Salvador	8,121	4,857	3,264	5,649	5,973	..	n.a.
Equatorial Guinea (b,h)	n.a.	n.a.	n.a.	52	480	1	n.a.
Eritrea (b)	..	..	..	1	1	..	n.a.
Estonia	5,524	2,287	3,237	6,485	55,981	103	1,159
Eswatini (b)	..	..	..	36	36	..	685
Ethiopia (b)	..	..	..	23	104	1	n.a.
European Union Intellectual Property Office (e)	407,712	290,694	117,018	n.a.	n.a.	n.a.	27,102
Fiji (b)	..	..	..	42	96	..	n.a.
Finland	9,285	5,459	3,826	22,180	163,998	465	1,160
France	311,634	293,229	18,405	428,812	1,207,622	4,437	3,483
Gabon (b,h)	n.a.	n.a.	n.a.	117	1,813	..	n.a.
Gambia	2,211	114	2,097	115	115	..	755
Georgia	11,274	2,966	8,308	3,592	4,132	30	2,702
Germany	235,928	210,549	25,379	463,800	2,413,827	7,700	4,562
Ghana (b)	..	..	..	74	496	..	1,365
Greece (b)	..	..	..	5,087	83,123	129	1,240
Grenada (b)	..	..	..	18	18	..	n.a.
Guatemala	12,621	6,977	5,644	8,842	9,004	..	n.a.
Guinea (b,h)	n.a.	n.a.	n.a.	331	5,034	3	n.a.
Guinea-Bissau (b,h)	n.a.	n.a.	n.a.	33	545	..	n.a.
Guyana (b)	..	..	..	13	13	..	n.a.
Haiti (b)	..	..	..	17	17	..	n.a.
Honduras	7,538	2,676	4,862	3,201	3,255	..	n.a.
Hungary	8,135	3,994	4,141	10,104	61,600	199	1,363
Iceland	9,080	1,302	7,778	2,037	4,845	31	2,489
India	367,764	322,297	45,467	341,992	369,905	460	12,414
Indonesia	85,837	40,758	45,079	47,651	51,150	57	7,219

Name	Application class count by office			Application class count by origin	Equivalent application class count by origin	international applications	Madrid Designated member
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	
Iran (Islamic Republic of)	454,925	437,653	17,272	439,143	441,270	24	2,777
Iraq (b)	..	..	..	1,164	1,515	2	n.a.
Ireland (g)	7,548	..	..	12,395	91,843	192	1,098
Israel	21,651	4,274	17,377	11,810	40,688	340	5,187
Italy	97,077	85,062	12,015	174,445	1,088,311	2,649	3,292
Jamaica	6,378	2,933	3,445	3,126	3,126	..	n.a.
Japan	546,244	471,749	74,495	603,127	791,609	3,160	16,866
Jordan	6,806	2,730	4,076	3,739	4,990	..	n.a.
Kazakhstan	27,485	11,517	15,968	15,240	15,673	159	5,113
Kenya	13,282	5,825	7,457	6,103	6,879	18	2,013
Kuwait (b)	..	..	..	895	2,353	..	n.a.
Kyrgyzstan	7,609	494	7,115	1,687	1,738	14	2,516
Lao People's Democratic Republic (b)	..	..	..	67	67	3	1,666
Latvia	5,736	2,068	3,668	4,883	20,233	133	1,269
Lebanon (b)	..	..	..	999	3,934	11	n.a.
Lesotho (b)	..	..	..	28	32	..	643
Liberia (b)	..	..	..	15	47	..	796
Libya (b)	..	..	..	89	278	..	n.a.
Liechtenstein	9,082	421	8,661	3,536	13,899	90	2,240
Lithuania	6,909	3,207	3,702	6,848	41,592	137	1,286
Luxembourg (c)	n.a.	n.a.	n.a.	17,067	104,342	407	n.a.
Madagascar	6,191	2,940	3,251	2,979	3,027	5	979
Malawi (b)	..	..	..	16	31	..	637
Malaysia	46,707	22,485	24,222	28,951	32,809	21	n.a.
Maldives (b)	..	..	..	37	199	..	n.a.
Mali (b,h)	n.a.	n.a.	n.a.	283	4,571	..	n.a.
Malta	731	535	196	5,746	56,923	58	n.a.
Marshall Islands (b)	..	..	..	652	2,174	6	n.a.
Mauritania (b,h)	n.a.	n.a.	n.a.	123	1,931	..	n.a.
Mauritius	4,613	2,565	2,048	4,385	10,548	10	n.a.
Mexico	160,194	112,970	47,224	123,585	143,137	113	10,715
Monaco	8,911	1,616	7,295	8,182	27,326	110	2,286
Mongolia	16,525	10,821	5,704	10,920	11,055	3	1,841
Montenegro	8,573	414	8,159	631	1,657	5	2,495
Morocco	30,215	17,025	13,190	18,629	24,103	90	3,719
Mozambique	5,705	1,655	4,050	1,681	1,681	..	1,133
Myanmar (b)	..	..	..	110	110	..	n.a.
Namibia	6,493	476	6,017	503	504	..	1,024
Nepal (b)	..	..	..	110	519	..	n.a.
Netherlands (c)	n.a.	n.a.	n.a.	74,704	545,642	1,414	n.a.
New Zealand	50,715	18,081	32,634	28,756	47,865	566	8,197
Nicaragua (b)	..	..	..	144	252	..	n.a.
Niger (b,h)	n.a.	n.a.	n.a.	364	6,140	..	n.a.
Nigeria	18,658	11,341	7,317	11,665	14,689	..	n.a.
North Macedonia (b)	..	..	..	914	1,621	35	2,447
Norway	43,147	11,782	31,365	19,785	72,519	327	8,848

Name	Application class count by office			Application class count by origin	Equivalent application class count by origin		Madrid international applications	
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Designated Madrid member	
Oman	16,024	11,064	4,960	11,387	11,565	..	2,011	
Pakistan	38,332	32,741	5,591	33,405	34,004	..	n.a.	
Palau (b)	..	..	..	17	17	..	n.a.
Panama	11,127	4,590	6,537	7,632	13,839	2	n.a.	
Papua New Guinea (b)	..	..	..	14	14	..	n.a.
Paraguay (b)	..	..	..	556	1,422	4	n.a.
Peru	42,058	29,205	12,853	31,135	32,973	..	n.a.	
Philippines	62,672	34,097	28,575	36,000	36,628	87	6,300	
Poland	38,781	30,832	7,949	51,715	351,768	512	2,297	
Portugal	36,063	30,251	5,812	39,496	146,239	223	1,619	
Qatar	8,372	1,333	7,039	2,275	4,595	..	n.a.	
Republic of Korea	284,072	228,515	55,557	292,144	378,258	1,392	13,379	
Republic of Moldova	11,341	3,164	8,177	4,257	5,356	66	2,657	
Romania	25,515	20,262	5,253	26,240	104,665	95	1,614	
Russian Federation	306,976	246,727	60,249	292,227	331,918	1,712	16,090	
Rwanda	3,140	316	2,824	483	870	3	853	
Saint Kitts and Nevis (b)	..	..	..	126	843	..	n.a.
Saint Lucia (b)	..	..	..	153	369	..	n.a.
Saint Vincent and the Grenadines	423	27	396	45	45	..	n.a.	
Samoa	1,164	40	1,124	398	1,051	..	352	
San Marino (b)	..	..	..	227	1,733	7	1,061
Sao Tome and Principe	1,767	15	1,752	15	15	..	541	
Saudi Arabia	37,669	23,411	14,258	25,887	29,442	..	n.a.	
Senegal (b,h)	n.a.	n.a.	n.a.	609	9,716	7	n.a.	
Serbia	16,267	3,194	13,073	7,274	13,613	193	3,964	
Seychelles	645	105	540	2,025	6,674	10	n.a.	
Sierra Leone	2,686	200	2,486	205	205	..	795	
Singapore	53,288	11,121	42,167	43,709	74,904	735	10,692	
Sint Maarten (Dutch Part) (b,i)	..	..	..	12	120	4	630
Slovakia	13,639	8,797	4,842	12,086	47,150	96	1,175	
Slovenia (b)	..	..	..	5,131	42,981	208	1,155
Solomon Islands (b)	..	..	..	7	7	..	n.a.
Somalia (b)	..	..	..	3	3	..	n.a.
South Africa	37,371	21,583	15,788	24,244	35,017	7	n.a.	
Spain	80,805	70,826	9,979	125,680	771,164	1,360	2,943	
Sri Lanka	10,385	6,676	3,709	7,173	7,987	1	n.a.	
Sudan	5,243	1,647	3,596	1,757	1,757	1	1,117	
Suriname (b)	..	..	..	30	152	..	n.a.
Sweden	19,646	14,851	4,795	48,704	324,877	825	1,470	
Switzerland	96,343	40,712	55,631	163,719	530,732	3,729	15,238	
Syrian Arab Republic	13,185	8,771	4,414	9,327	10,261	1	948	
Tajikistan	6,479	595	5,884	788	1,305	8	2,153	
Thailand	66,411	32,367	34,044	41,029	47,648	137	7,784	
Timor-Leste (b)	..	..	..	1	1	..	n.a.
Togo (b,h)	n.a.	n.a.	n.a.	251	3,451	..	n.a.	
Tonga (b)	..	..	..	5	5	..	n.a.

Name	Application class count by office			Application class count by origin	Equivalent application class count by origin	international applications	Madrid Designated member
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	
Trinidad and Tobago	2,532	854	1,678	975	1,180	..	n.a.
Tunisia (b)	..	..	..	439	2,221	29	2,503
Turkey	282,448	248,754	33,694	273,612	339,345	1,980	8,996
Turkmenistan (b)	..	..	..	22	22	1	1,866
Uganda (b)	..	..	..	19	29	..	n.a.
Ukraine	79,416	54,298	25,118	62,751	75,661	496	6,962
United Arab Emirates	18,686	5,507	13,179	15,092	33,743	23	n.a.
United Kingdom	220,371	142,436	77,935	356,519	1,252,552	3,460	15,060
United Republic of Tanzania (b)	..	..	..	58	75	..	n.a.
United States of America	672,681	460,197	212,484	863,302	1,874,113	10,087	23,851
Uruguay	9,369	4,090	5,279	6,321	7,434	..	n.a.
Uzbekistan	15,728	8,035	7,693	8,418	8,504	14	2,482
Vanuatu (b)	..	..	..	45	99	1	n.a.
Venezuela (Bolivarian Republic of) (b)	..	..	..	370	856	..	n.a.
Viet Nam	112,388	74,516	37,872	79,709	84,547	187	8,111
Yemen	5,690	4,331	1,359	4,604	4,684	..	n.a.
Zambia	4,843	1,083	3,760	1,118	1,118	2	1,063
Zimbabwe (g)	3,816	..	..	147	485	..	1,019
Others/Unknown	71	0	71	82,862	194,223	295	15
Total (2019 estimates)	15,153,700	12,769,200	2,384,500	15,153,700	n.a.	64,400	433,229

(a) Data on application class count by origin are incomplete, because some offices do not report detailed statistics containing the origin of application class counts.

(b) Only Madrid designation data are available therefore application class count by office and origin data may be incomplete.

(c) This country does not have a national trademark office. All applications for trademark protection are filed at the Benelux Office for Intellectual Property or the European Union Intellectual Property Office.

(d) Resident applications include those filed by residents of Belgium, Luxembourg and the Netherlands.

(e) Resident applications include those filed by residents of EU member states.

(f) Origin is defined as the country/territory of the stated residence of the applicant in an international application.

(g) Total includes an aggregate direct application class count that cannot be broken down into direct and non-resident components.

(h) The African Intellectual Property Office (OAPI) is the competent office for processing applications.

(i) The country or municipality is not a Madrid member. The Netherlands has extended the application of the Madrid Protocol to the territories of Curacao and Sint Maarten, Bonaire, Sint Eustatius and Saba.

n.a. indicates not applicable.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

B52. Trademark registrations by office and origin, and trademarks in force, 2019

Name	Registration class count by office			Registration class count by origin	Equivalent registration class count by origin	Madrid international registrations	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Total
Afghanistan (b)	..	..	..	185	185	..	..
African Intellectual Property Organization	15,226	3,833	11,393	n.a.	n.a.	n.a.	..
African Regional Intellectual Property Organization	369	71	298	n.a.	n.a.	n.a.	2,310
Albania	9,320	1,200	8,120	1,418	2,043	21	..
Algeria (b)	..	..	..	312	794	21	..
Andorra	2,566	1,070	1,496	1,454	6,800	4	20,124
Angola	3,264	970	2,294	1,022	1,189	..	57,886
Antigua and Barbuda (b)	..	..	..	182	1,019	1	..
Argentina	63,863	48,228	15,635	51,316	56,022	3	857,813
Armenia	11,287	2,346	8,941	3,122	3,509	24	21,024
Australia	119,932	57,831	62,101	102,058	191,756	2,134	621,231
Austria	23,771	13,889	9,882	53,196	326,349	1,030	98,957
Azerbaijan	11,746	1,850	9,896	2,331	2,790	5	75,293
Bahamas (b)	..	..	..	1,032	2,760	..	..
Bahrain	12,910	208	12,702	495	1,062	..	73,362
Bangladesh	2,599	802	1,797	902	1,010	..	59,714
Barbados (b)	..	..	..	901	2,901	1	10,757
Belarus	20,810	3,820	16,990	7,929	12,464	207	127,001
Belgium (c)	n.a.	n.a.	n.a.	36,149	239,172	766	n.a.
Belize (b)	..	..	..	781	2,050	6	..
Benelux Office for Intellectual Property (d)	54,589	43,524	11,065	n.a.	n.a.	n.a.	643,832
Benin (b,h)	n.a.	n.a.	n.a.	242	3,858	..	..
Bermuda (b)	..	..	..	429	672	11	..
Bhutan (b)	..	..	..	4	4	..	..
Bolivia (Plurinational State of) (b)	..	..	..	128	236	..	..
Bonaire, Sint Eustatius and Saba (b)	..	..	..	12	12	..	..
Bosnia and Herzegovina	10,150	267	9,883	733	1,280	19	82,020
Botswana	3,327	352	2,975	534	544	1	19,768
Brazil	206,559	163,838	42,721	168,702	180,544	9	1,315,878
Brunei Darussalam	4,588	110	4,478	216	216	3	19,230
Bulgaria	14,601	10,500	4,101	24,748	72,601	208	54,542
Burkina Faso (b,h)	n.a.	n.a.	n.a.	203	3,355	..	..
Cabo Verde	452	90	362	113	113	1	..
Cambodia	12,473	1,706	10,767	1,805	1,972	7	..
Cameroon (b,h)	n.a.	n.a.	n.a.	683	11,208	2	..
Canada	157,397	54,228	103,169	86,873	189,942	219	617,968
Central African Republic (b,h)	n.a.	n.a.	n.a.	14	222	..	..
Chad (b,h)	n.a.	n.a.	n.a.	14	206	..	..
Chile	35,937	22,785	13,152	26,403	29,341	2	379,605
China	6,405,622	6,177,918	227,704	6,474,788	7,150,929	7,586	25,218,516
China, Hong Kong SAR	68,835	25,256	43,579	41,812	112,966	..	442,263
China, Macao SAR	15,607	1,925	13,682	2,285	2,393	..	127,048
Colombia	39,715	19,785	19,930	23,261	26,609	26	330,808
Comoros (b)	..	..	..	13	125	..	..
Congo (b,h)	n.a.	n.a.	n.a.	42	558	..	..

Name	Registration class count by office			Registration class count by origin	Equivalent registration class count by origin	Madrid international registrations	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Total
Cook Islands (b)	..	..	..	47	101	..	..
Costa Rica	12,433	5,961	6,472	6,796	7,525	..	122,315
Côte d'Ivoire (b,h)	n.a.	n.a.	n.a.	1,164	19,054	9	..
Croatia	6,981	3,079	3,902	5,329	17,006	121	107,795
Cuba	7,635	1,259	6,376	1,626	1,863	9	40,802
Curaçao	2,427	0	2,427	195	521	11	22,126
Cyprus (b)	..	..	..	11,742	50,755	229	..
Czech Republic	28,618	22,840	5,778	40,629	137,437	358	126,033
Democratic People's Republic of Korea (b)	..	..	..	406	433	13	..
Democratic Republic of the Congo (b)	..	..	..	19	115	..	..
Denmark	8,705	4,378	4,327	26,381	154,038	589	126,094
Dominica	229	2	227	24	24	..	..
Dominican Republic	12,173	6,700	5,473	7,010	7,476	1	129,377
Ecuador	20,544	11,966	8,578	12,597	13,434	..	110,380
Egypt	23,391	7,618	15,773	8,836	10,973	30	94,982
El Salvador	5,261	2,109	3,152	2,829	3,018	..	..
Equatorial Guinea (b,h)	n.a.	n.a.	n.a.	43	391	1	..
Estonia	5,296	2,147	3,149	5,774	46,981	108	53,609
Eswatini (b)	..	..	..	21	21	..	..
Ethiopia (b)	..	..	..	12	39	1	..
European Union Intellectual Property Office (e)	362,874	255,183	107,691	n.a.	n.a.	n.a.	1,413,406
Fiji (b)	..	..	..	45	45	..	..
Finland	8,234	4,442	3,792	21,851	145,369	481	97,432
France	292,520	274,147	18,373	442,366	1,203,714	4,617	1,527,702
Gabon (b,h)	n.a.	n.a.	n.a.	102	1,686	..	..
Gambia	2,485	114	2,371	121	121	..	..
Georgia	11,481	1,869	9,612	2,460	2,786	31	62,443
Germany	173,401	150,087	23,314	440,093	2,178,382	7,586	953,153
Ghana (b)	..	..	..	44	409	..	..
Greece (b)	..	..	..	4,473	65,325	132	..
Grenada (b)	..	..	..	10	10	..	..
Guatemala	9,395	4,391	5,004	5,797	6,229	..	140,231
Guinea (b,h)	n.a.	n.a.	n.a.	319	4,891	4	..
Guinea-Bissau (b,h)	n.a.	n.a.	n.a.	21	357	..	..
Guyana (b)	..	..	..	7	7	..	..
Haiti (b)	..	..	..	10	10	..	..
Honduras	6,410	1,807	4,603	2,093	2,174	..	93,300
Hungary	7,937	3,499	4,438	10,142	48,013	224	54,371
Iceland	10,202	901	9,301	2,037	5,703	47	58,926
India	323,001	272,129	50,872	284,397	307,673	326	2,038,798
Indonesia	46,711	17,817	28,894	20,427	23,404	43	..
Iran (Islamic Republic of)	113,066	102,337	10,729	104,151	106,662	32	265,104
Iraq (b)	..	..	..	510	645	2	..
Ireland (g)	6,778	..	..	11,583	85,802	201	73,841
Israel	25,306	4,029	21,277	10,856	36,579	362	140,243

Name	Registration class count by office			Registration class count by origin	Equivalent registration class count by origin	Madrid international registrations	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Total
Italy	90,289	77,753	12,536	182,304	999,045	2,999	505,684
Jamaica	6,538	2,749	3,789	2,885	2,993	..	..
Japan (b)	..	..	..	129,145	316,248	3,493	1,918,489
Jordan	7,827	2,599	5,228	3,332	4,868	..	..
Kazakhstan	26,112	7,957	18,155	11,605	11,886	179	46,464
Kenya	12,785	4,469	8,316	4,670	5,405	8	..
Kuwait (b)	..	..	..	675	2,127	..	..
Kyrgyzstan	8,600	321	8,279	1,291	1,315	14	10,863
Lao People's Democratic Republic (b)	..	..	..	35	62	3	..
Latvia	6,439	2,776	3,663	5,077	17,132	120	25,869
Lebanon (b)	..	..	..	870	5,270	10	..
Lesotho (b)	..	..	..	4	31	..	..
Liberia (b)	..	..	..	17	17	..	..
Libya (b)	..	..	..	53	53	..	..
Liechtenstein (b)	..	..	..	3,603	12,593	95	..
Lithuania	6,449	2,741	3,708	5,858	32,394	126	37,140
Luxembourg (c)	n.a.	n.a.	n.a.	18,597	108,988	399	n.a.
Madagascar	5,830	2,162	3,668	2,213	2,501	5	26,625
Malawi (b)	..	..	..	1	2	..	..
Malaysia	19,500	7,795	11,705	12,758	17,217	10	..
Maldives (b)	..	..	..	22	22	..	..
Mali (b,h)	n.a.	n.a.	n.a.	258	4,114	..	..
Malta	537	376	161	5,240	53,539	57	22,588
Marshall Islands (b)	..	..	..	493	2,284	7	..
Mauritania (b,h)	n.a.	n.a.	n.a.	105	1,465	..	..
Mauritius	3,971	2,219	1,752	3,796	8,669	10	..
Mexico	111,000	65,820	45,180	74,733	89,670	62	1,217,805
Monaco	9,598	1,351	8,247	5,566	21,741	64	10,386
Mongolia	14,876	8,500	6,376	8,568	8,676	2	17,650
Montenegro	9,913	223	9,690	452	776	5	56,502
Morocco	28,159	13,018	15,141	14,753	20,366	100	..
Mozambique	5,911	1,513	4,398	1,515	1,515	..	28,345
Myanmar (b)	..	..	..	89	89	..	..
Namibia	5,810	458	5,352	497	497	..	4,221
Nauru (b)	..	..	..	1	1	..	..
Nepal (b)	..	..	..	80	300	..	..
Netherlands (c)	n.a.	n.a.	n.a.	78,065	473,043	1,443	n.a.
New Zealand	49,364	14,851	34,513	25,186	45,542	514	276,199
Nicaragua (b)	..	..	..	130	130	..	..
Niger (b,h)	n.a.	n.a.	n.a.	112	1,824	..	..
Nigeria	8,329	2,462	5,867	2,669	4,503	..	..
North Macedonia (b)	..	..	..	809	1,214	27	..
Norway	43,197	9,537	33,660	19,341	72,366	316	225,827
Oman	12,441	6,095	6,346	6,399	6,561	..	..
Pakistan	23,885	15,936	7,949	16,467	17,519	..	189,008
Palau (b)	..	..	..	202	202	..	..
Panama	12,718	5,002	7,716	7,772	11,923	5	206,456

Name	Registration class count by office			Registration class count by origin	Equivalent registration class count by origin	Madrid international registrations	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Total
Papua New Guinea (b)	..	..	..	131	131	..	..
Paraguay (b)	..	..	..	354	1,266	5	..
Peru	36,259	24,573	11,686	25,830	27,078	..	361,493
Philippines	51,776	21,196	30,580	22,472	22,826	63	..
Poland	32,451	24,551	7,900	47,908	292,206	508	232,361
Portugal	32,522	26,538	5,984	33,608	120,645	197	223,022
Qatar	7,561	936	6,625	1,781	3,336	..	25,174
Republic of Korea	175,261	119,267	55,994	175,311	252,443	1,404	1,305,260
Republic of Moldova	11,508	2,204	9,304	3,239	3,737	65	73,555
Romania	19,446	14,037	5,409	19,377	76,255	78	72,707
Russian Federation	193,828	130,850	62,978	176,182	214,125	1,557	664,335
Rwanda	3,407	295	3,112	466	907	3	..
Saint Kitts and Nevis (b)	..	..	..	132	892	..	..
Saint Lucia (b)	..	..	..	47	182	..	..
Saint Vincent and the Grenadines	58	14	44	30	30	..	..
Samoa	1,013	26	987	685	1,284	..	4,458
San Marino (b)	..	..	..	364	2,356	13	..
Sao Tome and Principe	1,604	4	1,600	38	38	..	..
Saudi Arabia	22,480	10,210	12,270	12,641	15,904	3	214,514
Senegal (b,h)	n.a.	n.a.	n.a.	609	9,757	2	..
Serbia	17,926	2,863	15,063	7,075	13,953	206	31,081
Seychelles	859	115	744	1,730	4,197	9	919
Sierra Leone	2,797	200	2,597	434	434	..	..
Singapore	57,341	11,193	46,148	39,040	70,522	789	326,506
Sint Maarten (Dutch Part) (b)	..	..	..	9	90	3	..
Slovakia	12,638	7,805	4,833	10,975	41,842	93	46,981
Slovenia (b)	..	..	..	5,624	35,676	197	..
Solomon Islands (b)	..	..	..	3	3	..	..
Somalia (b)	..	..	..	23	23	..	..
South Africa	30,761	16,712	14,049	20,031	28,610	7	378,575
Spain	72,774	62,506	10,268	115,972	673,521	1,448	767,923
Sri Lanka	14,989	5,252	9,737	5,647	6,829	2	48,426
Sudan	4,756	641	4,115	659	659	..	19,249
Suriname (b)	..	..	..	47	99	..	..
Sweden	17,330	12,611	4,719	47,377	285,349	807	120,884
Switzerland	94,471	36,108	58,363	164,941	531,285	3,498	514,825
Syrian Arab Republic	10,251	6,490	3,761	6,919	7,836	4	..
Tajikistan	7,157	323	6,834	348	456	2	..
Thailand	50,832	16,266	34,566	22,870	28,265	152	412,745
Timor-Leste (b)	..	..	..	5	5	..	..
Togo (b,h)	n.a.	n.a.	n.a.	246	3,558	..	..
Trinidad and Tobago	1,401	278	1,123	338	435	..	22,901
Tunisia (b)	..	..	..	349	2,350	27	..
Turkey	191,726	155,769	35,957	180,387	232,356	1,273	1,125,914
Turkmenistan (b)	..	..	..	57	57	2	..
Uganda (b)	..	..	..	28	28	..	..
Ukraine	54,163	28,276	25,887	36,366	48,097	479	191,628

Name	Registration class count by office			Registration class count by origin	Equivalent registration class count by origin	Madrid international registrations	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(f)	Total
United Arab Emirates	21,543	4,654	16,889	11,801	25,615	24	267,778
United Kingdom	205,337	124,658	80,679	267,192	1,065,776	3,249	782,602
United Republic of Tanzania (g)	3,628	..	..	47	52	..	..
United States of America	439,483	267,828	171,655	646,570	1,555,639	9,581	2,779,113
Uruguay	8,082	3,175	4,907	5,036	6,174	..	83,496
Uzbekistan	12,401	4,123	8,278	4,444	4,471	12	23,218
Vanuatu (b)	..	..	..	53	80	1	..
Venezuela (Bolivarian Republic of) (b)	..	..	..	363	714	..	..
Viet Nam	68,549	34,999	33,550	40,744	45,515	202	250,331
Yemen	3,797	3,051	746	3,233	3,314	..	..
Zambia	4,899	639	4,260	659	659	2	36,469
Zimbabwe (g)	4,199	..	..	90	145	..	67,249
Others/Unknown	..	..	..	70,852	163,035	193	..
Total (2019 estimates)	11,813,000	9,469,400	2,343,600	11,813,000	n.a.	64,118	58,156,700

(a) Data on registration class count by origin are incomplete, because some offices do not report detailed statistics containing the origin of registration class counts.

(b) Only Madrid designation data are available therefore registration class count by office and origin data may be incomplete.

(c) This country does not have a national trademark office. All trademark registrations for this country are issued by the Benelux Office for Intellectual Property or the European Union Intellectual Property Office.

(d) Resident registrations include those issued to residents of Belgium, Luxembourg and the Netherlands.

(e) Resident registrations include those issued to residents of EU member states.

(f) Origin is defined as the country/territory of the stated residence of the holder of an international registration.

(g) Total includes an aggregate direct registration class count that cannot be broken down into direct and non-resident components.

(h) The African Intellectual Property Office (OAPI) is the competent office for issuing registrations.

n.a. indicates not applicable.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

B53. Trademark office procedural data, 2019

Office	Total applications processed	Registered	Partial rejections	Total rejections	Withdrawn or abandoned	Applications pending	Number of examiners (FTE)	First office action (days)	Final office decision (days)
African Intellectual Property Organization	..	..	..	..	..	..	9.0	..	..
Albania	1,056	978	..	59	19	..	4.0	35.0	270.0
Algeria	6,321	6,174	..	142	5	11,165	10.0	425.0	600.0
Angola	..	..	..	..	..	32,964	4.0	..	..
Argentina	71,043	66,033	..	3,748	1,262	154,150	15.0	7.0	480.0
Armenia	1,045	687	..	327	31	1,136	10.0	124.0	..
Australia	71,779	58,641	..	61	13,077	59,704	160.3	146.0	269.0
Austria	6,050	5,172	..	626	252	1,669	6.1	3.0	46.2
Bahrain	10,619	6,613	..	82	3,924	2,845	..	246.0	800.0
Bangladesh	12,435	3,870	..	325	8,240	52,412	14.0	45.0	60.0
Belarus	2,829	2,550	..	..	279	..	21.0	60.0	365.0
Bosnia and Herzegovina	399	330	..	23	46	1,590	3.0	8.0	700.0
Botswana	..	..	..	..	..	..	4.0	..	..
Brazil	384,531	205,846	..	86,749	91,936	129,671	113.0	180.0	365.0
Brunei Darussalam	..	..	..	..	..	304	2.0	..	..
Bulgaria	4,308	3,467	..	106	735	..	10.0	7.0	220.0
Cabo Verde	..	..	..	..	..	239	4.0	..	..
Cambodia	..	..	..	..	..	183	11.0	..	..
Canada	74,420	55,692	..	50	18,678	154,521	42.0	455.0	618.0
China	8,272,455	6,013,150	..	2,240,254	19,051	3,154,090	1,298.0	135.0	135.0
China, Hong Kong SAR	38,681	34,150	..	3,510	1,021	26,587	52.3	54.9	83.0
China, Macao SAR	16,656	15,651	..	890	115	5,749	6.0	195.0	195.0
Colombia	30,146	25,762	..	3,881	503	16,640	92.0	24.7	254.0
Costa Rica	16,103	14,580	..	104	1,419	1,587	..	27.0	205.0
Croatia	1,078	857	..	78	143	477	8.0	14.0	38.0
Cuba	1,840	1,442	..	369	29	2,680	7.0	75.0	870.0
Curaçao	355	354	..	1	..	17	6.0	60.0	60.0
Czech Republic	7,219	6,648	..	505	66	4,338	20.0	..	288.0
Denmark	2,851	2,046	155	221	429	911	21.0	1.0	37.0
Dominica	..	..	..	..	..	8	1.0	..	..
Dominican Republic	45,683	44,709	..	..	974	3,715	..	22.0	24.0
Ecuador	20,786	20,544	..	215	27	4,742	8.0	15.0	90.0
Egypt	28,456	16,937	..	8,164	3,355	11,038	12.0	300.0	300.0
El Salvador	..	..	..	..	..	..	18.0	..	..
Estonia	1,826	1,481	..	3	342	1,237	12.0	4.0	223.0
European Union Intellectual Property Office	119,034	113,821	..	3,968	1,245	78,427	256.2	..	14.0
Gambia	..	..	..	..	..	..	2.0	..	..
Georgia	2,714	1,457	..	209	1,048	603	13.0	60.0	215.0
Germany	74,985	55,017	..	6,883	13,085	21,740	67.3	56.6	84.3
Greece	..	..	..	..	..	..	4.0	..	30.0
Hungary	3,256	2,969	..	106	181	2,448	12.0	15.0	156.0
Iceland	3,479	3,264	..	175	40	3,169	12.0	60.0	180.0
India	440,071	287,193	..	78,839	74,039	286,605	179.0	30.0	180.0
Indonesia	45,396	22,817	..	21,844	735	..	82.0	9.0	1,122.0
Israel	6,022	4,888	..	..	1,134	4,864	17.0	159.0	287.0
Japan	122,146	107,408	..	14,738	..	..	140.0	284.0	314.0
Kyrgyzstan	869	816	..	43	10	20	5.0	30.0	365.0
Latvia	1,437	1,110	..	179	148	211	5.0	1.0	89.0
Lithuania	2,197	1,877	..	148	172	14	6.0	40.0	40.0
Madagascar	1,014	987	..	25	2	115	2.0	240.0	240.0
Malta	1,120	1,005	..	35	80	..	3.0	1.0	60.0
Mauritius	..	..	..	..	..	..	9.0	1.0	20.0
Mexico	95,916	84,320	..	8,043	3,553	139,721	45.0	65.0	156.0
Monaco	555	507	..	33	15	..	2.0	6.0	48.0
Mongolia	184	70	..	98	16	1,110	3.0	180.0	210.0
Montenegro	87	87	..	..	..	436	5.0	30.0	300.0
Morocco	9,132	8,864	..	94	174	2,148	13.0	40.0	108.0

Office	Total applications processed	Registered	Partial rejections	Total rejections	Withdrawn or abandoned	Applications pending	Number of examiners (FTE)	First office action (days)	Final office decision (days)
Mozambique	..	..	..	..	..	301	11.0	..	..
Namibia	..	..	..	..	..	..	3.0	..	..
New Zealand	7,937	7,604	..	..	333	3,323	34.0	24.0	26.0
Nigeria	..	..	..	..	..	5,851	10.0	..	..
Norway	17,523	14,451	..	177	2,895	11,500	29.0	200.0	240.0
Oman	..	..	..	..	..	..	9.0	..	..
Pakistan	69,050	23,885	..	28	45,137	4,688	6.0	50.0	240.0
Panama	4,900	4,226	..	264	410	3,006	7.0	45.0	45.0
Peru	42,829	35,114	..	5,320	2,395	10,921	49.0	5.0	45.0
Philippines	19,514	19,002	..	512	..	16,019	31.0	30.0	119.1
Portugal	25,400	21,267	..	3,663	470	3,542	24.0	120.0	150.0
Qatar	1,670	1,647	..	7	16	6,590	8.0	90.0	90.0
Republic of Korea	198,719	162,899	..	35,820	..	155,682	130.0	204.0	321.0
Republic of Moldova	1,741	1,478	..	193	70	2,388	7.0	11.0	241.0
Romania	6,759	6,013	..	597	149	1,545	23.0	7.0	150.0
Russian Federation	56,873	49,826	..	6,676	371	36,180	..	..	..
Rwanda	..	..	..	..	..	47	1.0	..	..
Saint Vincent and the Grenadines	32	32	..	..	..	155	3.0	7.0	14.0
Samoa	257	253	..	4	..	35	4.0	15.0	30.0
Sao Tome and Principe	65	65	..	..	..	65	8.0	..	15.0
Saudi Arabia	30,852	20,420	..	3,935	6,497	59	10.0	..	..
Serbia	2,419	2,009	..	230	180	500	5.0	70.0	100.0
Seychelles	952	947	..	3	2	12	3.0	1.0	3.0
Sierra Leone	..	..	..	..	..	..	3.0	..	..
Singapore	..	..	..	..	..	18,723	32.0	..	..
Slovakia	2,955	2,614	..	264	77	503	9.0	..	180.0
Spain	22,244	20,379	..	1,395	470	28,449	46.0	11.0	150.0
Sri Lanka	16,751	14,989	..	27	1,735	6,713	17.0	91.0	192.0
Sudan	1,804	1,199	..	214	391	476	30.0	10.0	15.0
Sweden	9,249	6,851	81	435	1,882	1,452	25.0	28.0	106.0
Tajikistan	497	387	..	89	21	99	7.0	30.0	365.0
Thailand	77,404	..	..	48,513	28,891	86,851	19.0	96.0	496.0
Trinidad and Tobago	..	..	..	..	..	2,378	7.0	..	..
Turkey	108,583	83,409	..	6,942	18,232	137,035	86.0	5.0	31.0
Ukraine	26,655	19,311	..	2,027	5,317	46,501	86.0	270.0	559.0
United Kingdom	86,760	79,158	..	3,192	4,410	1,752	92.5	5.0	5.0
United States of America	468,659	312,105	..	45,699	110,855	616,145	616.0	84.0	282.0
Uruguay	234	..	..	234	..	..	..	181.0	..
Uzbekistan	3,706	2,542	..	194	970	2,576	9.0	160.0	210.0
Viet Nam	30,882	28,820	..	1,842	220	70,236	60.0	645.8	703.2
Zambia	..	..	..	..	..	..	4.0	..	..
Zimbabwe	..	..	..	..	..	121	6.0	..	..

Note: FTE is full time equivalent. WIPO collects data from IP offices using a common questionnaire and methodology. Every effort has been made to compile procedural data based on common definitions and concepts, but procedural differences make it extremely difficult to fully harmonize such data. Therefore caution should be exercised when making comparisons across offices. The total number of applications processed for a given office may be incomplete due to the omission of one or several elements by the office.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

Industrial designs

Highlights

Designs contained in non-resident applications grew by 11% worldwide

In 2019, about 1.04 million industrial design applications were filed worldwide. This represents an increase of 1.7% on 2018 (figure 3.1). Since 2005, industrial design applications have increased every year, except for 2014. During this period, applications filed per year have more than doubled. The increase in filing activity in China alone explains 86.1% of this growth. Together with that of 2013, the 1.7% growth rate for 2019 is the lowest yearly increase in filings since 2005.

Statistics based on the number of designs contained in industrial design applications – known as application design counts – improves comparability worldwide by harmonizing data from offices that allow more than one design in an application with those that allow only one. An estimated 1.36 million designs were contained in applications filed worldwide in 2019 (figure 3.2). Compared to 2018, the number of designs in applications grew by 1.3%. This increase is entirely driven by designs contained in non-resident applications, which grew by 11.3%. Those contained in resident applications decreased slightly by 0.5%.

The top 20 offices accounted for 93.5% of all designs in applications in 2019

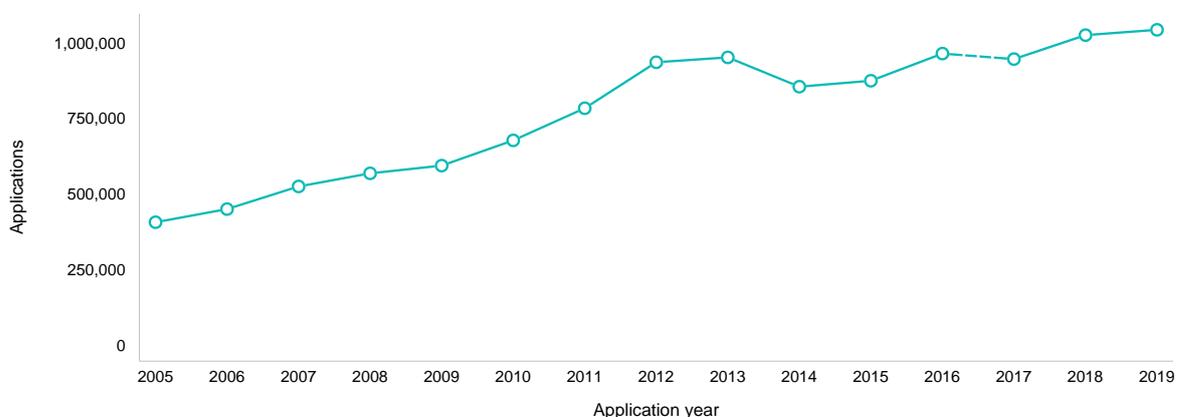
The office of China accounted for 52.3% of designs in applications filed worldwide in 2019, representing 711,617 designs. It was followed by the European Union Intellectual Property Office (EUIPO) (113,319), the Republic of Korea (69,360), the United States of America (U.S.) (49,848) and Turkey (46,202) (figure 3.3). Compared to 2018, the office of Germany (44,097) moved down to the sixth position and the office of Turkey moved up two places to rank fifth.

Combined, the top 20 offices accounted for 93.5% of all designs in applications. Of the top 20 offices, 14 saw an increase in their application design count (figure C11). The three offices to experience double-digit growth were those of the Russian Federation (+22%), the Islamic Republic of Iran (+19.3%) and Australia (+10.3%). In contrast, the three offices with double-digit decreases were the offices of Spain (-14.2%), Italy (-13.6%) and France (-12%).

In 2019, 15 of the top 20 offices recorded an increase in the number of designs contained in non-resident applications; for six of them, the number of designs in resident filings grew also. Growth in non-resident design was particularly strong at the offices of Australia, Canada, the Russian Federation, Switzerland and the United Kingdom (U.K.). An increase in resident design counts was the main or sole driver of growth at five offices, namely, the offices of Brazil, China, the Islamic Republic of Iran, the Republic of Korea and Turkey.

An estimated 1.04 million industrial design applications were filed worldwide

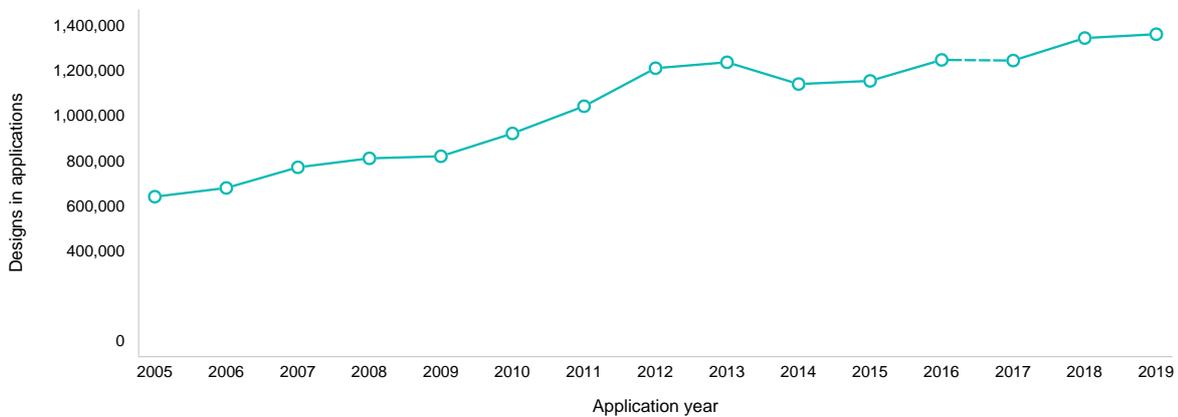
3.1. Industrial design applications worldwide, 2005–2019



Source: Figure C1.

Designs contained in applications totaled 1.36 million

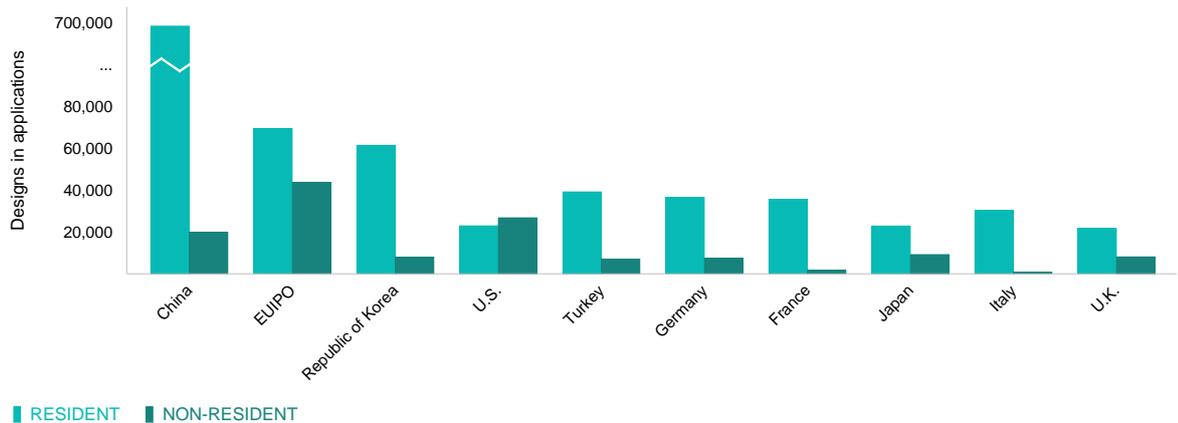
3.2. Number of designs in industrial design applications worldwide, 2005–2019



Source: Figure C2.

China received 52% of all designs contained in applications filed worldwide

3.3. Application design counts for the top 10 offices, 2019



Source: Figure C10.

Among offices located in low- and middle-income countries, annual growth in 2019 was especially high for Azerbaijan (+63.2%) the African Intellectual Property Organization (OAPI) (+42.2%), Viet Nam (+30.3%) and Argentina (+27.5%). The Republic of Moldova (+19.7%) and Algeria (+18.6%) likewise witnessed double-digit growth. Conversely, albeit from a low base, the African Regional Intellectual Property Organization (ARIPO) (-31.5%), Indonesia (-29.8%) and Bangladesh (-20.7%) all saw sharp declines (figure C13).

Designs contained in resident applications amounted to 83.6% of the world total design count in 2019. The particularly high resident design share in China (97.2%) mostly accounts for the large proportion of resident designs at world level. However, resident design counts also accounted for a majority of filing activity in 15 of the top 20 offices (figure C10). The exceptions were Canada (9.7%), Switzerland (26.4%), Australia (35.5%), the Russian Federation (40.4%) and the U.S. (46.1%).

Design count

Some offices allow industrial design applications to contain more than one design for the same good or in the same class; others allow only one design per application. To capture the differences in application filing systems across offices, one needs to compare their respective application and registration design counts.

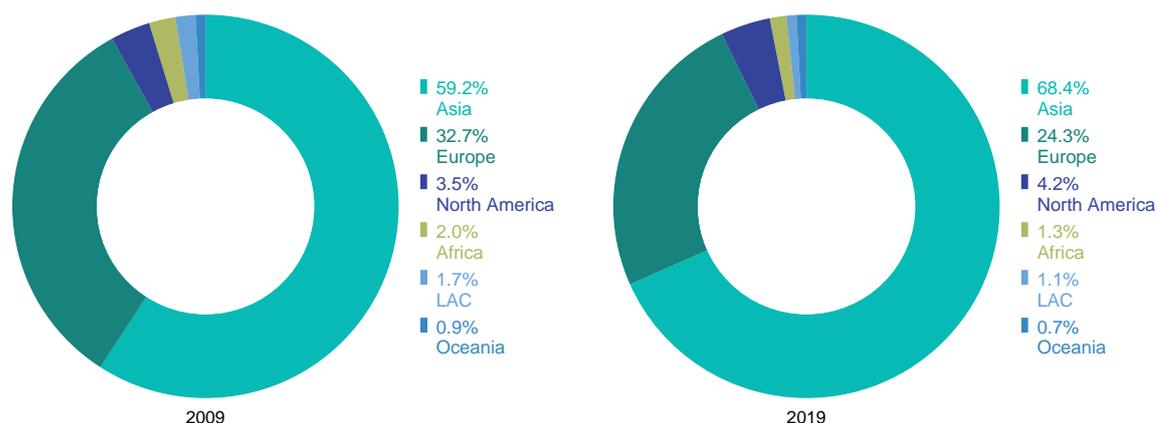
Equivalent design count

Designs in applications filed at regional offices are equivalent to multiple designs in applications filed in the respective member states of those offices. To calculate the number of equivalent designs for the OAPI, which has 17 member states, the Benelux Office for Intellectual Property (BOIP), which has three, and EUIPO (28), each design is multiplied by the corresponding number of member states. However, ARIPO does not register industrial designs with automatic region-wide applicability. Therefore, for this office, each application is counted as one application abroad, if the applicant does not reside in a member state, or as one resident application and one application abroad, if the applicant resides in a member state.

Combined, the offices of upper middle-income countries received 60.4% of all designs contained in applications filed in 2019 (table C7). China accounted for the vast majority of this share, with the other upper middle-income countries receiving 8.1% of the world total. The combined share of the high-income countries stood at 36%. Offices of lower middle-income countries received 3.4% of the total, and those of low-income countries only 0.2%. Between 2009 and 2019, average annual growth in design counts was 6.8% for upper middle-income, 4% for lower middle-income and 1.9% for high-income countries.

Offices located in Asia and Europe accounted for almost 93% of total filing activity

3.4. Application design counts by region, 2009 and 2019

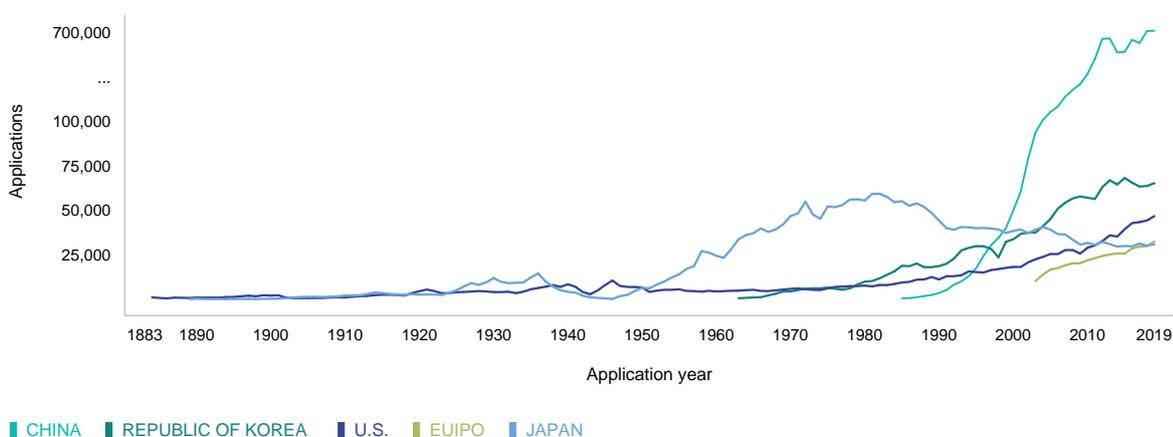


Note: LAC is Latin America and the Caribbean.
Source: Table C8.

Industrial design applications filed since 1883

Between 1883 and the early 1950s, the offices of Japan and the U.S. averaged similar numbers of applications, rarely exceeding 10,000. The office of Japan received the highest number of applications per year from the 1950s to the late 1990s, reaching approximately 50,000 annual filings at its peak. The office of China began receiving applications in 1985 and has seen unprecedented growth: from 640 in 1985 to 660,000 in 2013. The office of the Republic of Korea surpassed the office of Japan in 2004 and has remained in second position ever since. In 2012, the office of the U.S. moved ahead of the office of Japan to become the third largest. The EUIPO began receiving applications in 2003 and moved-up to fourth position in 2019. Among these top five offices, the EUIPO is the only one to have a multiple design system. Applications filed at the EUIPO contained 113,319 designs in 2019.

Trend in industrial design applications for the top five offices, 1883–2019



Source: Figure C9.

Asia accounted for 68.4% of all designs in applications filed worldwide in 2019 (figure 3.4). Asia was followed by Europe (24.3%) and North America (4.2%). All six geographical regions experienced growth between 2009 and 2019, with North America (+6.7%) and Asia (+6.1%) seeing the largest average increases. They were followed by Oceania (+3%) and Europe (+1.6%).

Applicants from China moved up to second position in terms of equivalent designs in applications filed abroad

Applications received by offices from resident and non-resident applicants are referred to as office data, whereas applications filed by applicants at their home office (resident applications) or at foreign offices (applications abroad) are referred to as origin data. When the equivalent count concept is used, applications filed by applicants at some regional offices are considered equivalent to multiple applications in the member states of those offices. Here, industrial design statistics based on the origin of residence of the first named applicant are reported in order to complement the picture of industrial design activity worldwide.

Applicants from China had the highest equivalent application design count in 2019, with 1.12 million (map 3.5). They were followed by applicants residing in Germany (605,010), the U.S. (398,093), Italy (384,594) and France (222,736).

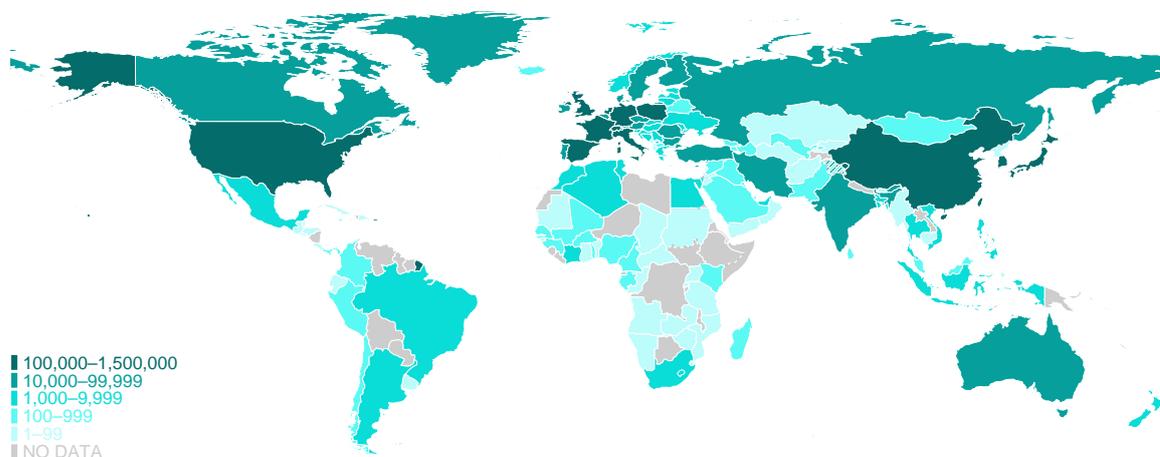
Equivalent designs in applications filed abroad accounted for between 81% and 98% of the total for applicants from all of the top 20 origins, except for the Republic of Korea (61.5%), China (38.2%) and Turkey (29.4%)

Among the top 10 origins, the largest increases in equivalent design counts were for the Republic of Korea (+39.1%), the Netherlands (+24.3%) and China (+16.8%). In contrast, applicants from France (-11.3%), Japan (-10.6%) and Germany (-6.1%) saw the sharpest decreases in equivalent design counts compared to 2018 (figure C17).

European countries dominate the top 20 origins with a total of 14, followed by five located in Asia and one in North America. In terms of income categories, 17 of the top 20 origins belong to the high-income group, while three upper middle-income countries – Bulgaria, China and Turkey – also feature.

Applicants from China had by far the highest equivalent design count

3.5. Equivalent application design counts by origin, 2019



Source: Map C16.

Applicants from Germany (548,851) had the highest number of equivalent designs in applications filed abroad in 2019. They were followed by applicants from China (426,792), which moved up two places in the ranking due to an increase of 158,590 in equivalent designs compared to 2018. The next three origins were the U.S. (375,105), Italy (342,455) and France (180,810).

Of the top 10 origins of equivalent designs in applications filed abroad, only applicants from China (+59.1%), the Netherlands (+24.4%), Poland (+10.9%) and Italy (+8.4%) recorded increases. In contrast, applicants from Japan (–12.3%) and France (–10.9%) experienced the most pronounced drops in numbers.

The Republic of Korea tops the ranking when adjusting for population

Adjusting resident filing activity for GDP and population helps when comparing the intensity of industrial design filing activity by residents across origins.

China (3,071) and the Republic of Korea (2,782) had the highest resident design counts per 100 billion U.S. dollars (USD) of gross domestic product (GDP) in 2019 (figure 3.6). They were followed by Turkey (1,670) and Italy (1,648). In contrast, India (102), the Russian Federation (111) and the U.S. (112) had far lower ratios. The 2019 ratios decreased for 10 of the top 20 origins compared to 2009. The biggest decreases in ratios were in the Republic of Korea (–748), Turkey (–304) and Germany (–252).

The Republic of Korea (1,187) had by far the highest resident design count per million population in 2019 (figure C26). It was followed by Italy (699) and Germany (676). Compared to the 2009 ratios, those for 2019 increased sharply for the U.K. (+348), France (+257) and China (+240). In contrast, the ratios for Switzerland (–89) and Japan (–34) decreased during this 10-year period.

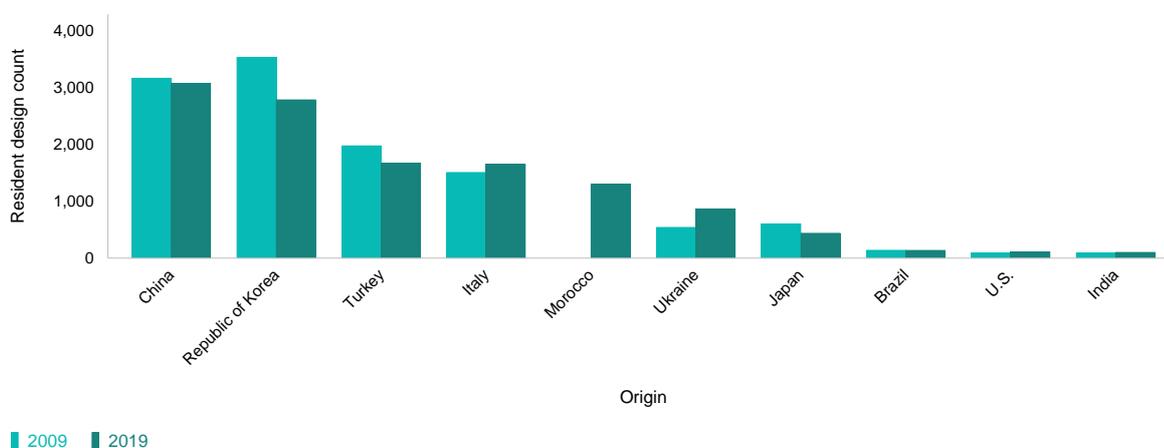
Furnishing and clothing remained the most recorded classes

The Locarno classification includes 32 classes of industrial designs. In 2019, the classes with the largest shares of the world total remained furnishings (9.4%), clothing (8.1%), and packages and containers (7.3%). Combined, these three classes accounted for almost one-quarter of all designs in applications (figure C22).

Grouping the Locarno classes into 12 industry sectors serves to highlight the most important sectors for designs contained in industrial design applications filed in each country. For all of the top 10 offices for which data were available, at least one-third of the total design counts were concentrated in just three sectors, although the top three sectors varied between offices (figure 3.7). Furniture and household goods, textiles and accessories, and tools and machines accounted for 38.3% of the total design count at the office of Australia and 44.4% at the office of India. Advertising, furniture and household goods, and textiles and accessories were the top three sectors at the office of Turkey

China had the highest number of designs per unit of GDP in 2019

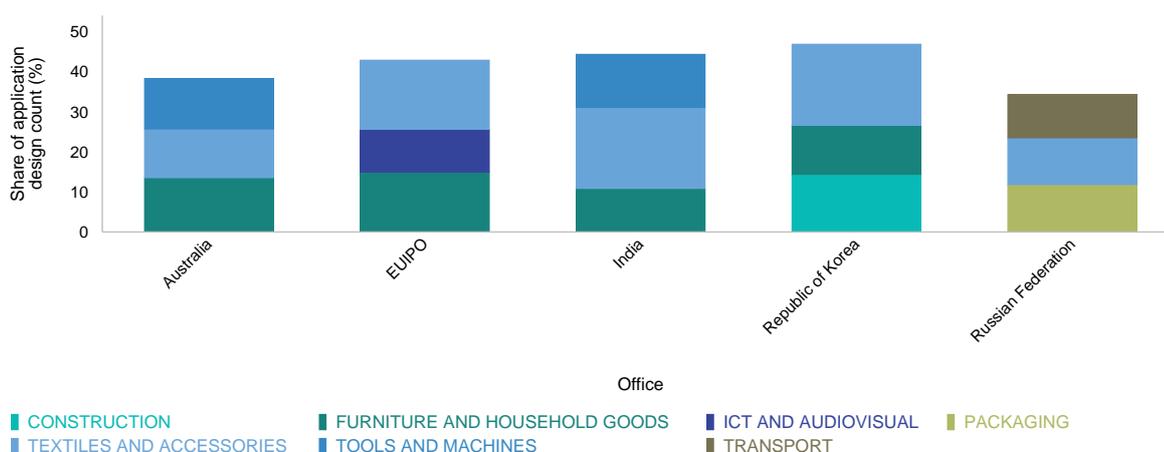
3.6. Resident application design count per USD 100 billion GDP for selected origins, 2009 and 2019



Source: Figure C25.

The top three sectors accounted for nearly half of designs in applications in the Republic of Korea

3.7. Distribution of application design counts by the top three sectors for selected offices, 2019



Source: Figure C23.

(54.2%) and of the U.K. (50.6%). At the EUIPO, ICT and audiovisual, furniture and household goods, and textiles and accessories accounted for 42.9% of the total design count (figure C23).

All of the top 10 origins had more than 43% of designs in applications filed among their top three sectors, with applicants residing in Switzerland (72.6%) and Italy (65.3%) recording the highest degree of concentration among their top three sectors (figure C24). The textiles and accessories, and furniture and household

sectors were each a top three sector for eight of the top 10 origins.

The number of designs in applications registered at the office of India grew by 67%

An estimated 847,000 industrial design applications were registered worldwide in 2019. This represents an increase of 4.2% on 2018 (figure C4). Growth was mainly due to a considerable rise in registrations issued

by the offices of China (+20,278), India (+5,512) and the U.S. (+4,197) compared to 2018.

Nearly 1.11 million designs were contained in applications registered in 2019, up 2.6% on the year. This represents 28,100 more designs in applications registered compared to 2018 (figure C5). The office of China accounted for half of all designs in applications registered worldwide, and the top 20 offices, combined, comprised 93.3% of the total. Among these offices, 14 saw annual growth, including India (+67.2%), Canada (+35%), the U.K. (+13.8%), the U.S. (+11%) and Ukraine (+10.2%). In contrast, the offices of Brazil (-33%), Spain (-14.3%), Turkey (-13.2%), Germany (-13.1%) and France (-10.9%) saw sharp declines in designs registered (figure C14).

For the first time, registrations in force worldwide exceeded 4 million

Industrial design rights generally last for up to 15 years from the date an application is filed. In 2019, there were an estimated 4.07 million active industrial design registrations at 122 offices worldwide. This represents an increase of 7.3% on 2018 (figure C27). Registrations in force in China increased by 11.1% to reach 1.79 million, representing 44% of the world total in 2019 (figure C28). China was followed by the Republic of Korea (358,803), the U.S. (357,959), Japan (261,669) and the EUIPO (236,935). Combined, the top 20 offices represented 93.6% of active industrial design registrations globally.

About 3.68 million of the active industrial design registrations in force at 87 offices in 2019 can be distributed according to the year in which they were first registered (figure C29). Almost one-quarter of the industrial design applications registered in 2005 were still in force in 2019. Half of those registered in 2010 remained in force in 2019, as well as above two-thirds of those registered in 2014.

The average age of active industrial design registrations varied across offices. For example, in 2019, the average age of all industrial design registrations in force in France was 11.1 years, and 2.9 years in China. Brazil, France, Germany, Spain, Turkey and the U.S. all have industrial designs in force dating back an average of seven to 11.1 years (figure C30).

The Republic of Korea has become the second biggest user of the Hague System

The Hague System offers applicants an advantageous way of seeking industrial design protection internationally as an alternative to using the Paris Convention for the Protection of Industrial Property. For further information and statistics on the System, see WIPO's *Hague Yearly Review 2020*.

Hague international applications grew by 8.1% in 2019, to reach 5,894 applications. At the same time, the number of designs contained in Hague applications increased by 10.6% to 21,857, representing a 13th year of uninterrupted growth (figure C35). A considerable rise in the number of designs originating from Germany, Italy and the Republic of Korea accounts for a large proportion of the overall increase in 2019.

Germany remained the top user of the Hague System in 2019, with the 775 international applications filed containing 4,509 designs (figure C37). The Republic of Korea (2,735 designs) overtook Switzerland (2,180) to rank second in 2019. Switzerland, which has remained second for 13 consecutive years, recorded double-digit drops in both 2018 and 2019.

Of the top 10 origins, China was the one to see the fastest growth in 2019. Designs originating from China grew by 113.7%, albeit from a low base, up from 315 designs in 2018 to 673 designs in 2019. China was followed by the Republic of Korea (+77%), Italy (+58.2%) and the U.K. (+47.8%). In contrast, the U.S. (-18.8%), Switzerland (-11.1%), France (-9.9%) and Japan (-8.6%) all saw declines.

The European Union (EU) remained the most designated Hague member in international applications since 2010, with 4,043 designations containing 16,369 designs in 2019 (figure C38). It was followed by Switzerland (9,568 designs), Turkey (5,885), the U.S. (5,561) and the U.K. (4,351). Of the top 10 designated members, Norway (+20.5%), Singapore (+20.1%), Japan (+13.7%) and the U.S. (+10.4%) saw double-digit increases in designs in designations.

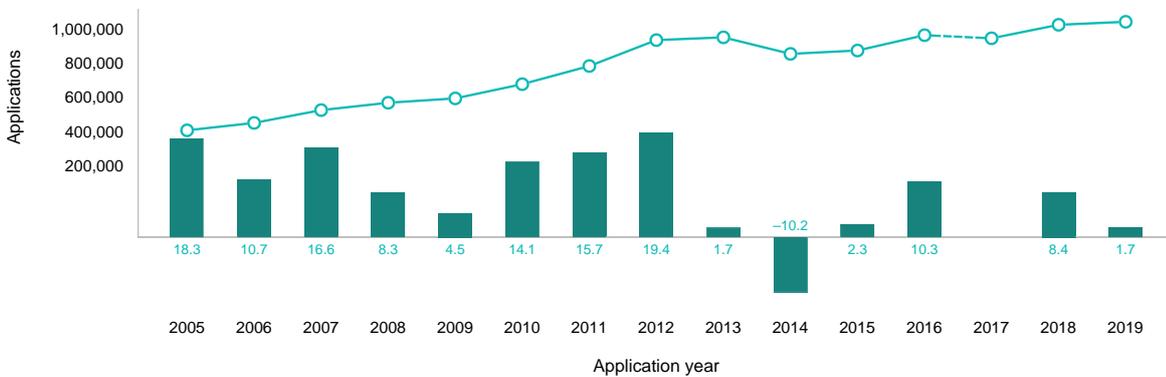
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Industrial design applications and registrations worldwide

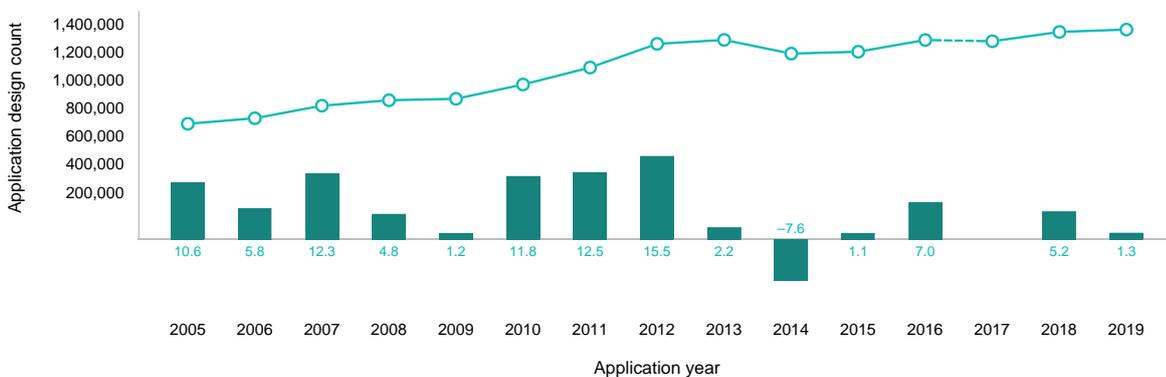
C1. Trend in industrial design applications worldwide, 2005–2019



■ APPLICATIONS ■ GROWTH RATE (%)

Note: China's 2017 data are not comparable with its previous year's data due to the new way in which the IP office of China counts its applications data. Prior to 2017, it included all applications received; however, starting from 2017, China's application count data include only those applications for which the office has received the necessary application fees. As China accounts for the bulk of the global total, it is not possible to report the 2017 worldwide application growth rate. World totals are WIPO estimates using data covering 153 IP offices. These totals include applications filed directly with national and regional offices (known as the Paris route), as well as the designations received via the Hague System (where applicable).
Source: WIPO Statistics Database, September 2020.

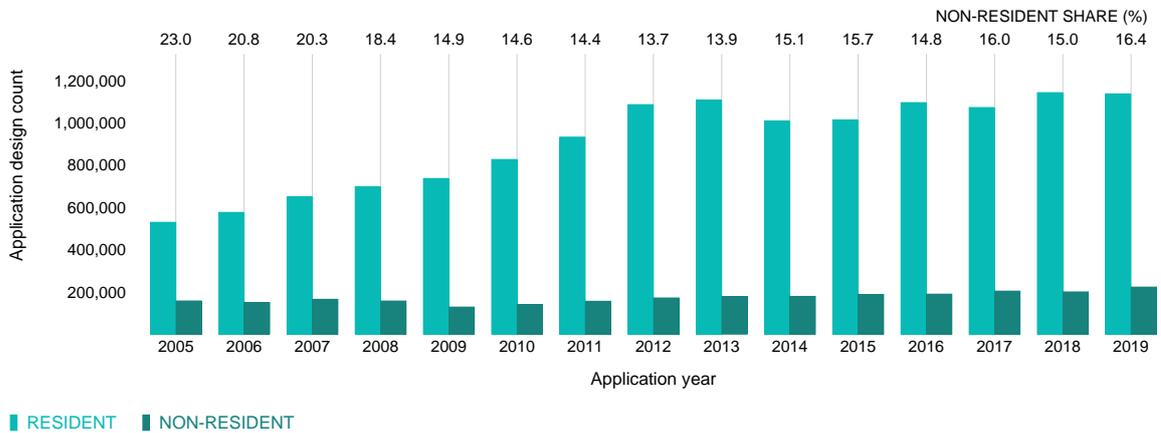
C2. Trend in application design counts worldwide, 2005–2019



■ APPLICATION DESIGN COUNT ■ GROWTH RATE (%)

Note: China's 2017 data are not comparable with its previous year's data due to the new way in which the IP office of China counts its applications data. Prior to 2017, it included all applications received; however, starting from 2017, China's application count data include only those applications for which the office has received the necessary application fees. As China accounts for the bulk of the global total, it is not possible to report the 2017 worldwide application growth rate. World totals are WIPO estimates using data covering 153 IP offices. These totals include design counts in applications filed directly with national and regional offices (known as the Paris route), as well as design counts in designations received via the Hague System (where applicable). See the glossary for the definition of design count.
Source: WIPO Statistics Database, September 2020.

C3. Resident and non-resident application design counts worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 153 IP offices. These totals include design counts in applications filed directly with national and regional offices (known as the Paris route), as well as design counts in designations received via the Hague System (where applicable). See the glossary for the definition of design count.
Source: WIPO Statistics Database, September 2020.

C4. Trend in industrial design registrations worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 154 IP offices. These totals include the registrations issued by national and regional offices for applications filed directly with offices (known as the Paris route), as well as for designations received via the Hague System (where applicable).
Source: WIPO Statistics Database, September 2020.

C5. Trend in registration design counts worldwide, 2005–2019

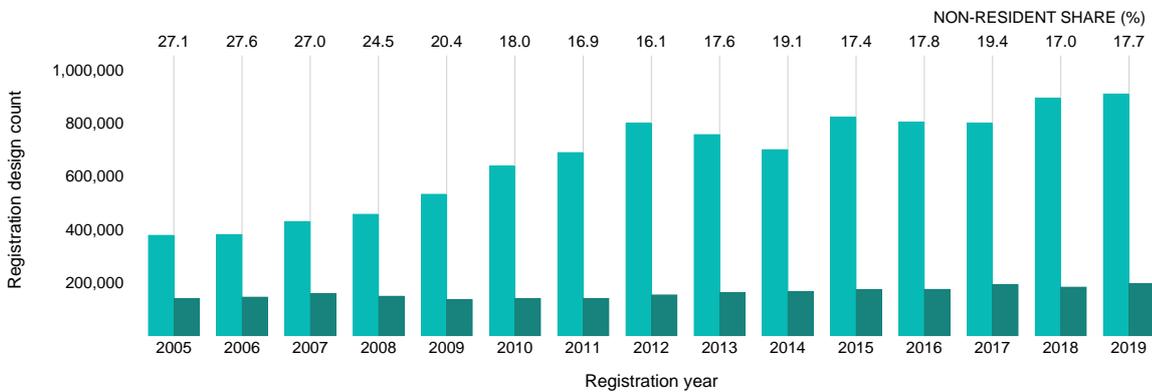


■ REGISTRATION DESIGN COUNT ■ GROWTH RATE (%)

Note: World totals are WIPO estimates using data covering 154 IP offices. These totals include design counts in registrations issued by national and regional offices for applications filed directly with offices (known as the Paris route), as well as for designations received via the Hague System (where applicable). See the glossary for the definition of design count.

Source: WIPO Statistics Database, September 2020.

C6. Resident and non-resident registration design counts worldwide, 2005–2019



■ RESIDENT ■ NON-RESIDENT

Note: World totals are WIPO estimates using data covering 154 IP offices. These totals include design counts in registrations issued by national and regional offices for applications filed directly with offices (known as the Paris route), as well as for designations received via the Hague System (where applicable). See the glossary for the definition of design count.

Source: WIPO Statistics Database, September 2020.

Industrial design applications and registrations by office

C7. Application design counts by income group, 2009 and 2019

Income group	Number of designs in applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
High-income	407,400	490,000	79.0	68.9	47.0	36.0	1.9
Upper middle-income	424,600	821,500	92.4	93.8	49.0	60.4	6.8
<i>Upper middle-income without China</i>	<i>73,258</i>	<i>109,883</i>	<i>69.3</i>	<i>71.4</i>	<i>8.5</i>	<i>8.1</i>	<i>4.1</i>
Lower middle-income	31,600	46,900	62.4	66.1	3.6	3.4	4.0
Low-income	2,800	2,500	48.5	40.2	0.3	0.2	-1.1
World	866,400	1,360,900	85.1	83.6	100.0	100.0	4.6

Note: Totals by income group are WIPO estimates using data covering 153 IP offices. Each category includes the following number of offices: high-income countries/economies (57), upper middle-income (45), lower middle-income (35) and low-income (16). Data for the European Union Intellectual Property Office are allocated to the high-income group, because most EU member states are high-income countries. For the same reason, data for the African Regional Intellectual Property Organization and the African Intellectual Property Organization are allocated to the low-income group. For information on income group classification, see the Data description section.

Source: WIPO Statistics Database, September 2020.

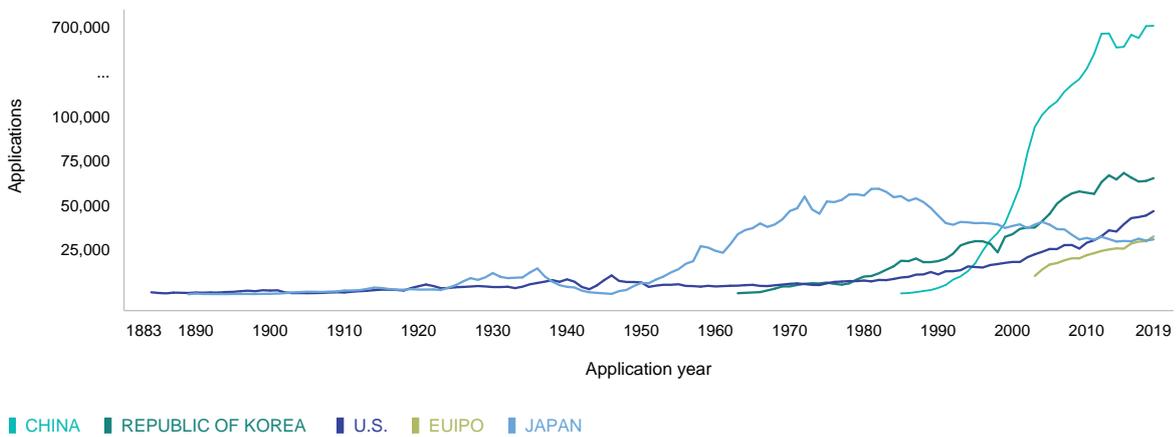
C8. Application design counts by region, 2009 and 2019

Region	Number of designs in applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
Africa	17,000	17,500	54.7	63.1	2.0	1.3	0.3
Asia	514,000	928,900	92.6	92.6	59.2	68.4	6.1
Europe	283,300	331,300	78.1	70.6	32.7	24.3	1.6
Latin America and the Caribbean	14,400	15,600	57.1	50.3	1.7	1.1	0.8
North America	30,100	57,400	51.9	41.3	3.5	4.2	6.7
Oceania	7,600	10,200	49.6	34.5	0.9	0.7	3.0
Total	866,400	1,360,900	85.1	83.6	100.0	100.0	4.6

Note: Totals by geographical region are WIPO estimates using data covering 153 IP offices. Each region includes the following number of offices: Africa (36), Asia (41), Europe (41), Latin America and the Caribbean (29), North America (2) and Oceania (4). For information on geographical region classification, see the Data description section.

Source: WIPO Statistics Database, September 2020.

C9. Trend in industrial design applications for the top five offices, 1883–2019



Note: The decrease in applications at the IP office of China in 2017 is most likely explained by the new way in which that office counts its applications data. Prior to 2017, it included all applications received; however, starting from 2017, China's application count data include only those applications for which the office has received the necessary application fees. EUIPO is the European Union Intellectual Property Office. Data are based on the numbers of applications filed; that is, differences between single-design and multiple-design filing systems across IP offices are not taken into account. The top five offices were selected based on their 2019 totals.

Source: WIPO Statistics Database, September 2020.

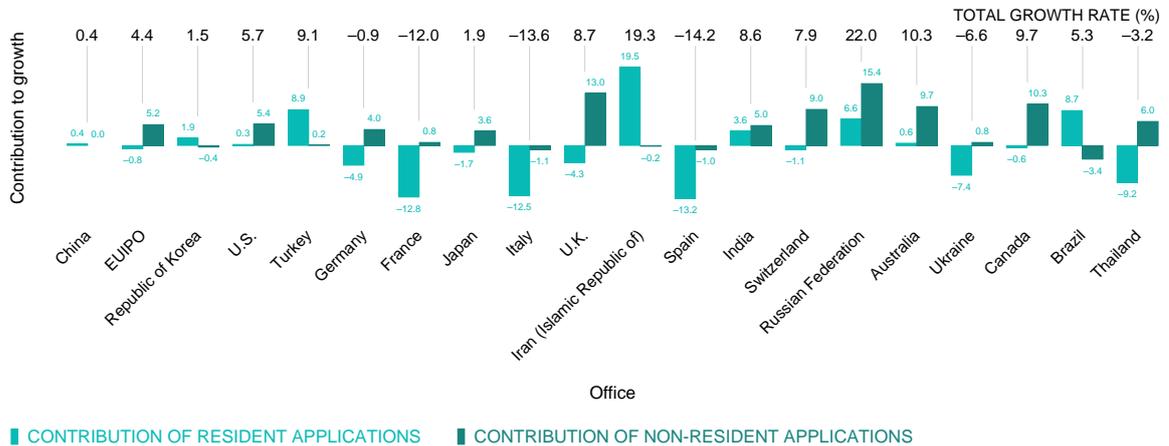
C10. Application design counts for the top 20 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.

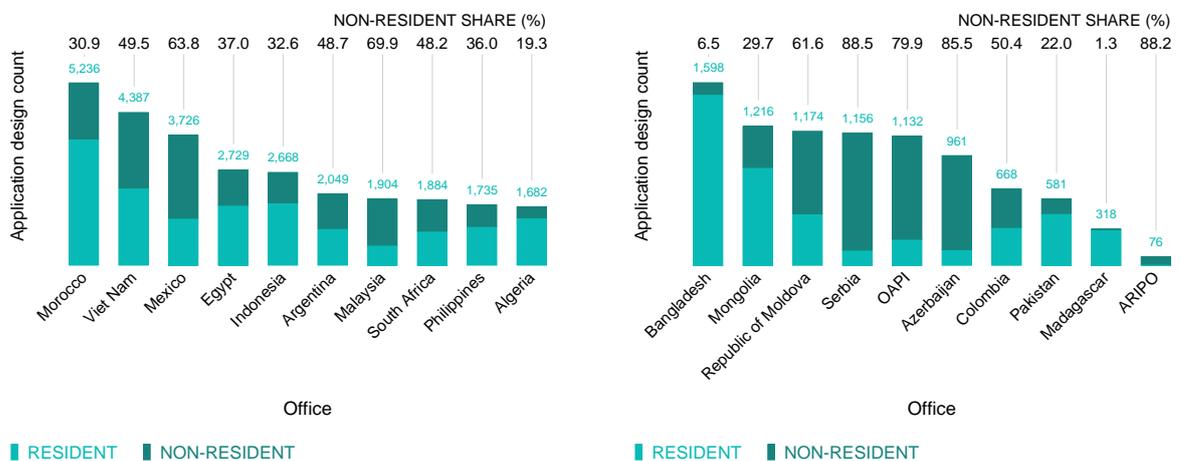
Source: WIPO Statistics Database, September 2020.

C11. Contribution of resident and non-resident application design counts to total growth for the top 20 offices, 2018–2019



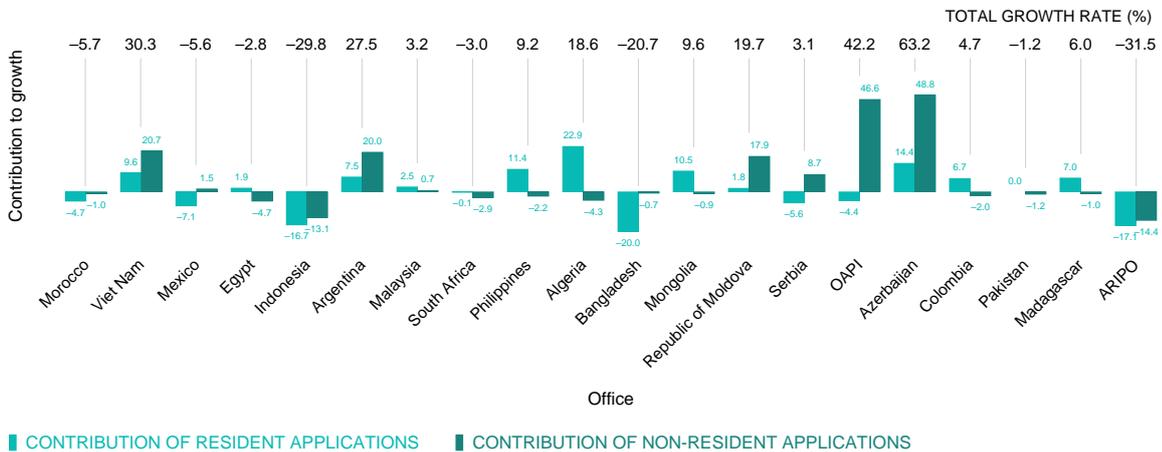
Note: EUIPO is the European Union Intellectual Property Office. This figure shows total growth in application design counts, broken down by the respective contributions of resident and non-resident filings. For example, total design counts in the U.S. grew by 5.7%, with resident applicants contributing 0.3 percentage points to overall growth.
Source: WIPO Statistics Database, September 2020.

C12. Application design counts for offices of selected low- and middle-income countries, 2019



Note: ARIPO is the African Regional Intellectual Property Organization and OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all offices are presented in the statistical table at the end of this section.
Source: WIPO Statistics Database, September 2020.

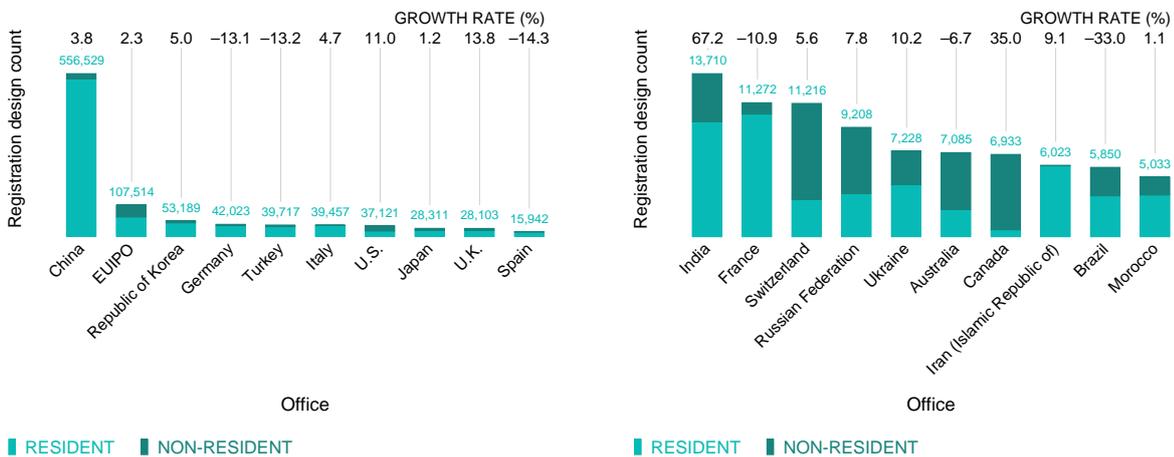
C13. Contribution of resident and non-resident application design counts to total growth for offices of selected low- and middle-income countries, 2018–2019



Note: ARIPO is the African Regional Intellectual Property Organization and OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all offices are in the statistical table at the end of this section. This figure shows total growth in design counts, broken down by the respective contributions made by resident and non-resident filings. For example, the total design count in Viet Nam grew by 30.3%, with non-resident applicants contributing 20.7 percentage points to overall growth.

Source: WIPO Statistics Database, September 2020.

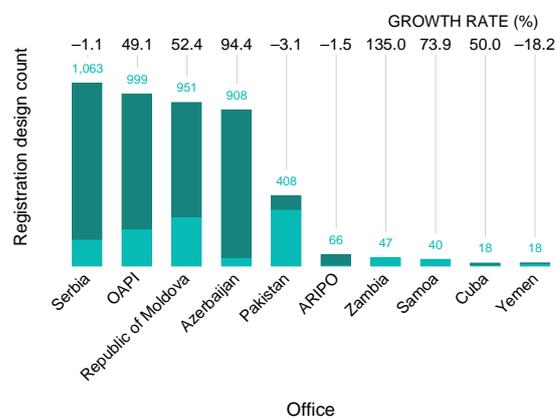
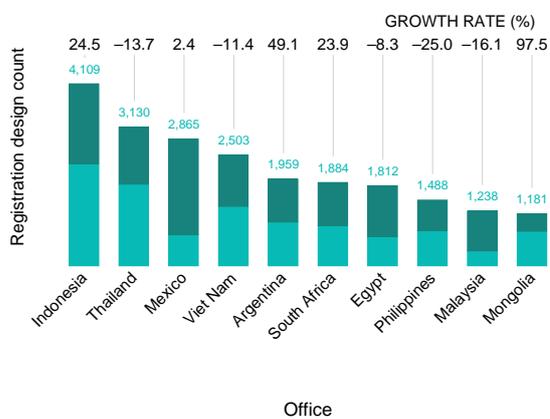
C14. Registration design counts for the top 20 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office.

Source: WIPO Statistics Database, September 2020.

C15. Registration design counts for offices of selected low- and middle-income countries, 2019



RESIDENT NON-RESIDENT

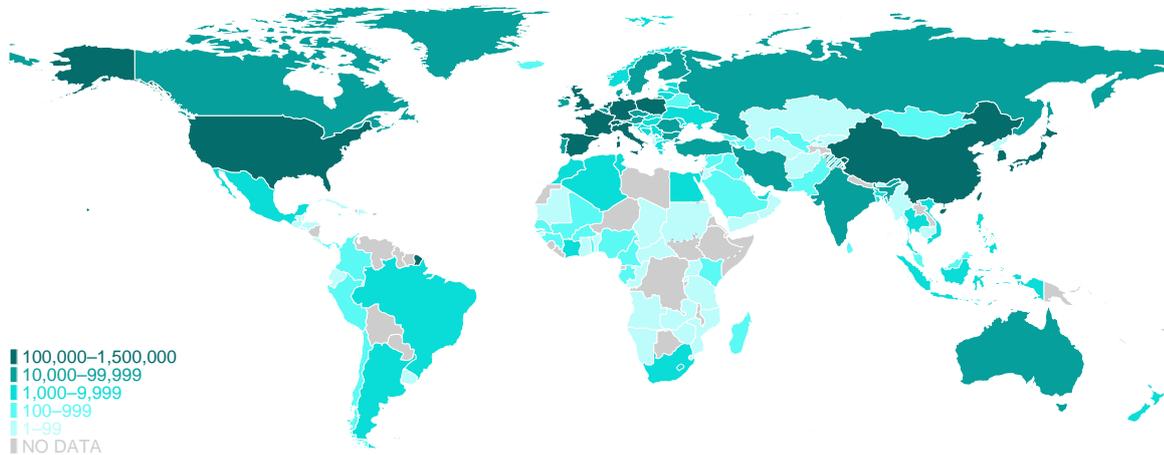
RESIDENT NON-RESIDENT

Note: ARIPO is the African Regional Intellectual Property Organization and OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all offices are presented in the statistical table at the end of this section.

Source: WIPO Statistics Database, September 2020.

Application design counts by origin

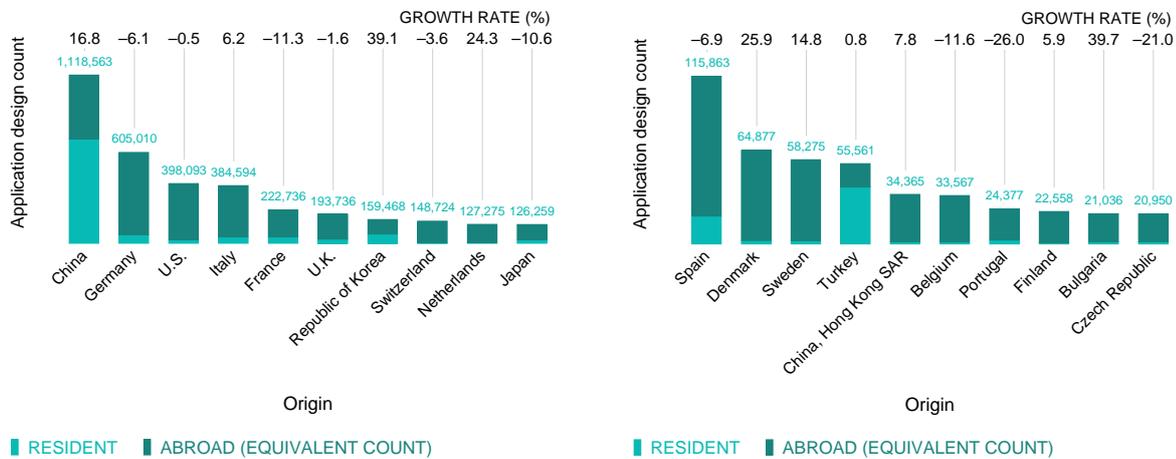
C16. Equivalent application design counts by origin, 2019



Note: Equivalent application design count includes resident applications and applications filed abroad. The origin of an industrial design application is determined by the residence of the first named applicant. Applications filed at some regional offices are considered equivalent to multiple applications in the member states of those offices. See the glossary for the full definition of equivalent application and design count.

Source: WIPO Statistics Database, September 2020.

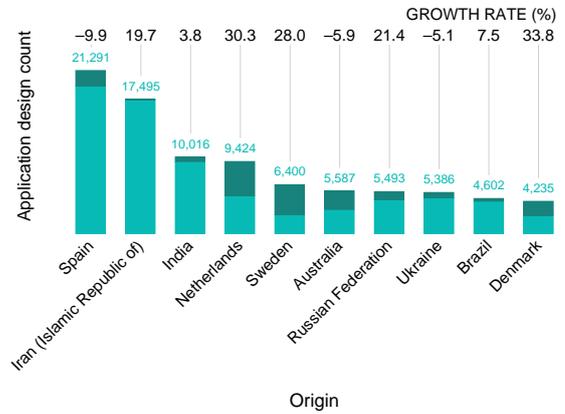
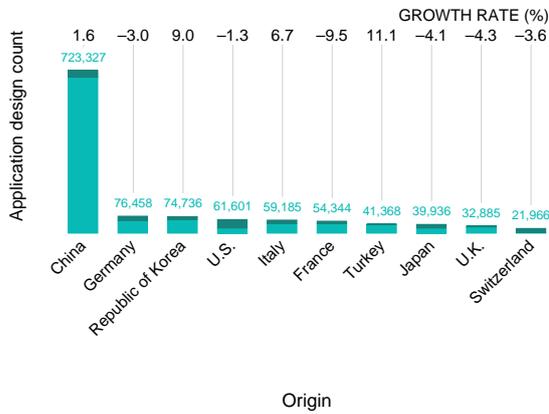
C17. Equivalent application design counts for the top 20 origins, 2019



Note: The origin of an industrial design application is determined by the residence of the first named applicant. An application filed at a regional office is considered to be a resident filing, if the applicant is a resident of one of that office's member states. Applications filed at some regional offices are considered equivalent to multiple applications in the member states of those offices. See the glossary for the definition of equivalent application and design count.

Source: WIPO Statistics Database, September 2020.

C18. Application design counts for the top 20 origins, 2019



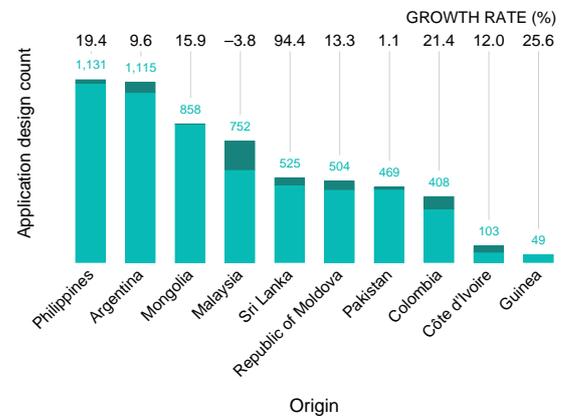
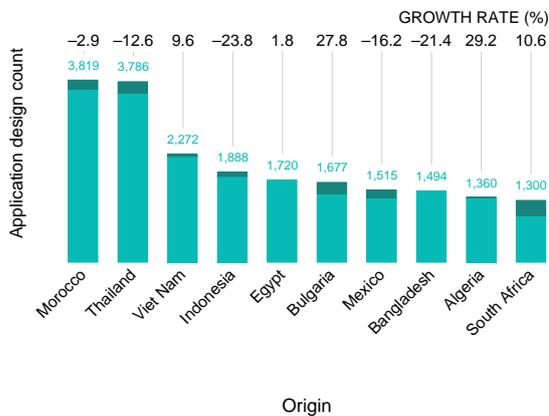
RESIDENT ABROAD (ABSOLUTE COUNT)

RESIDENT ABROAD (ABSOLUTE COUNT)

Note: Data are based on absolute count, not equivalent count. The origin of an industrial design application is determined by the residence of the first named applicant. An application filed at a regional office is considered to be a resident filing, if the applicant is a resident of one of that office's member states.

Source: WIPO Statistics Database, September 2020.

C19. Application design counts for selected low- and middle-income origins, 2019



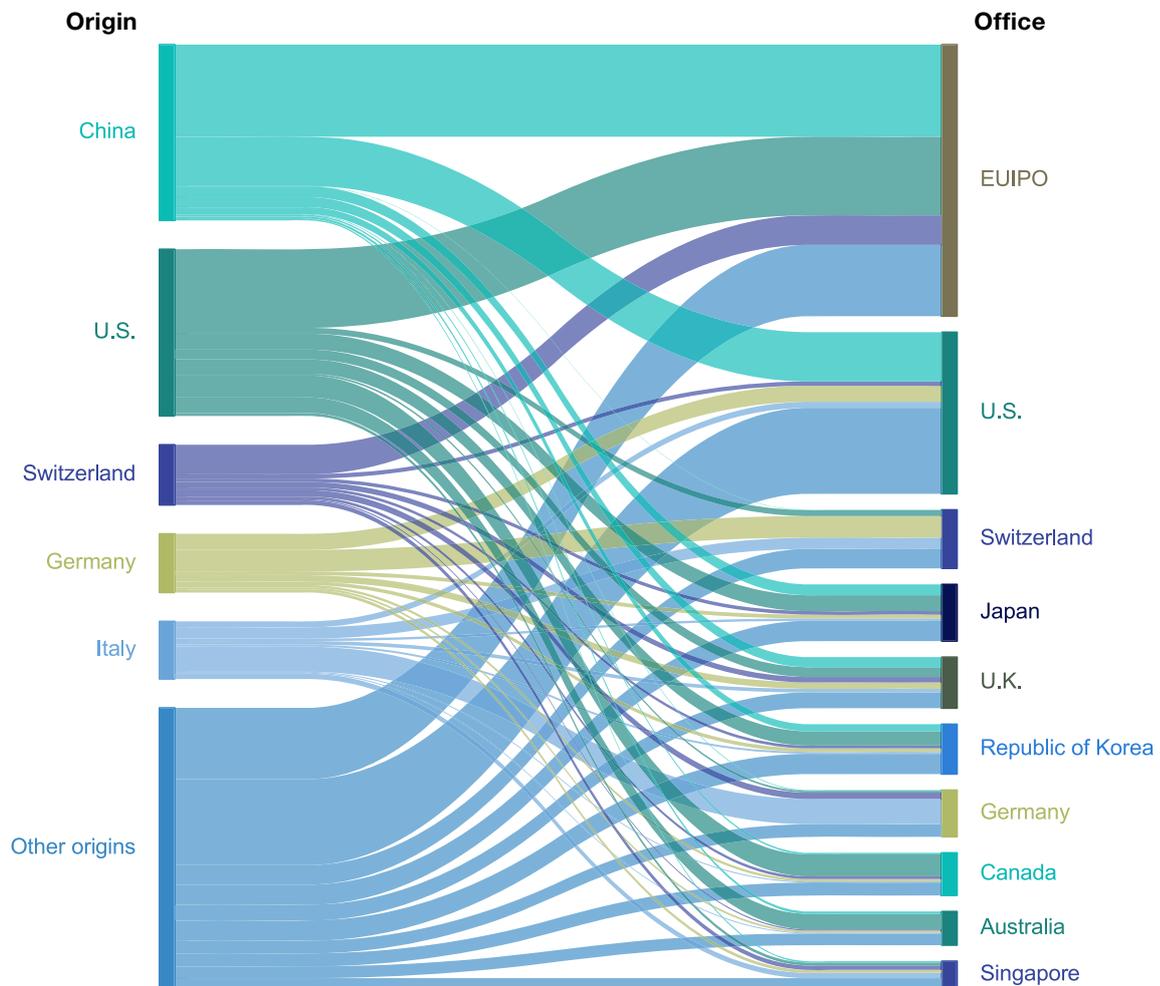
RESIDENT ABROAD (ABSOLUTE COUNT)

RESIDENT ABROAD (ABSOLUTE COUNT)

Note: Data are based on absolute count, not equivalent count. The selected origins are from different world regions and income groups (low-income, lower middle-income and upper middle-income). Where available, data for all origins are presented in the statistical table at the end of this section. The origin of an industrial design application is determined by the residence of the first named applicant.

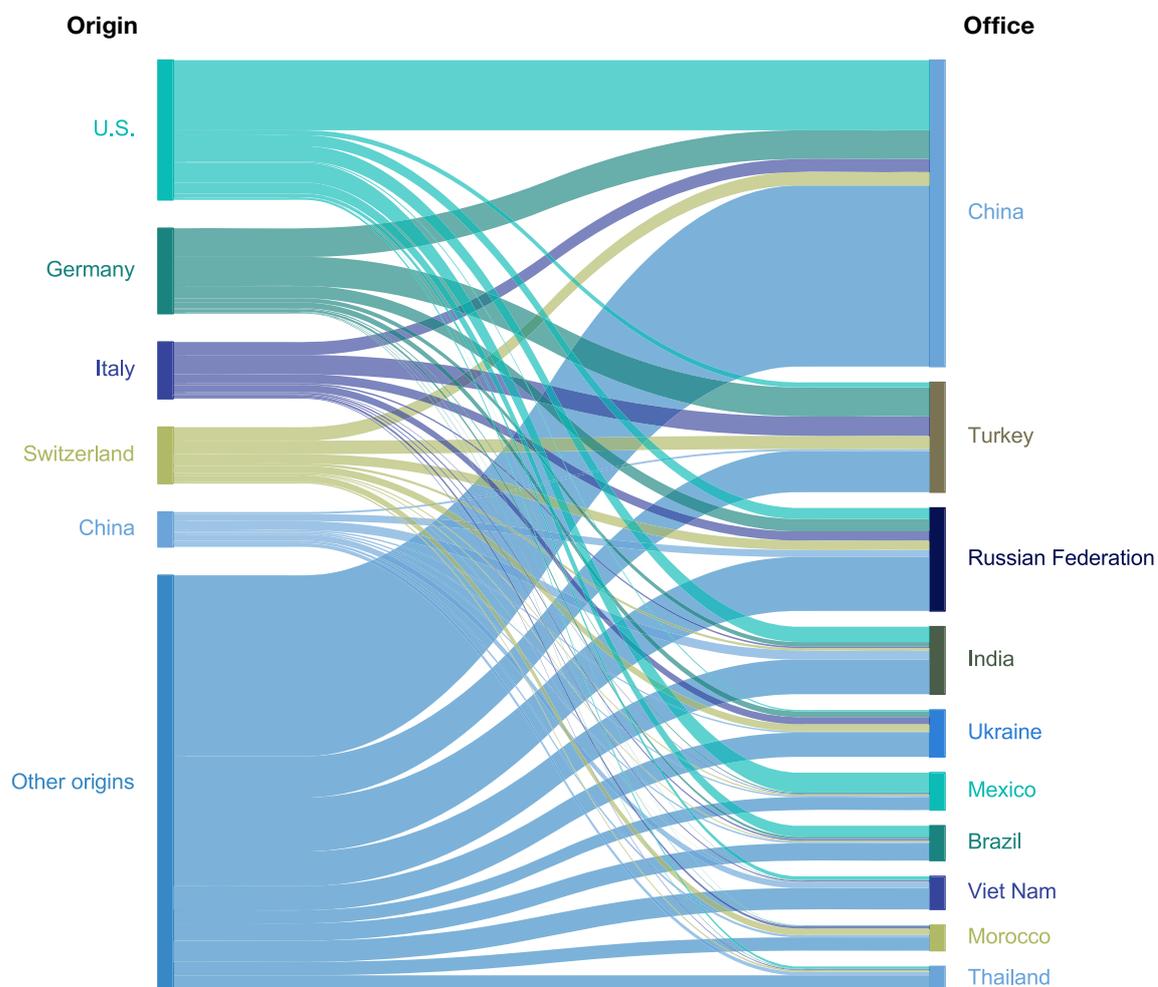
Source: WIPO Statistics Database, September 2020.

C20. Flows of non-resident application design counts for the top five origins and the top 10 offices of high-income economies, 2019



Note: EUIPO is the European Union Intellectual Property Office.
 Source: WIPO Statistics Database, September 2020.

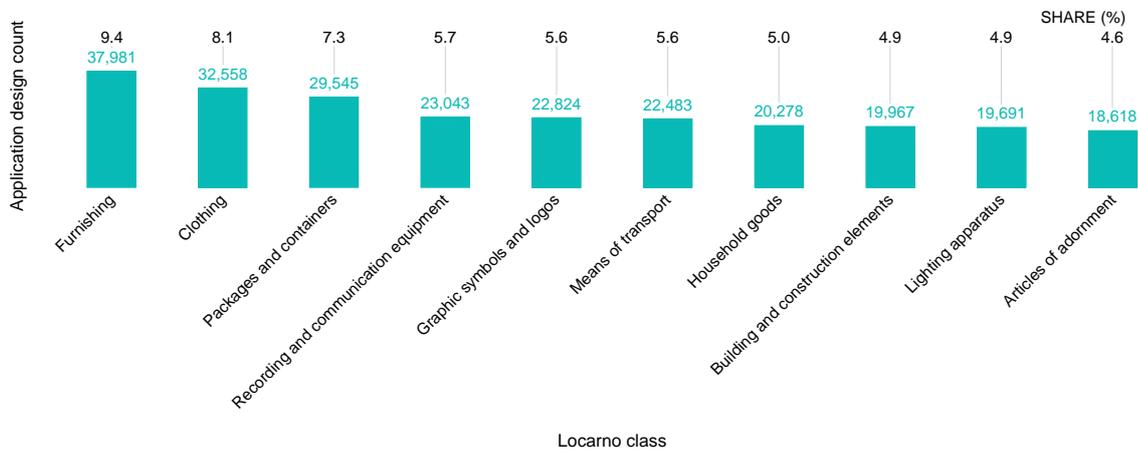
C21. Flows of non-resident application design counts for the top five origins and the top 10 offices of low- and middle-income economies, 2019



Source: WIPO Statistics Database, September 2020.

Application design counts by Locarno class and industry sector

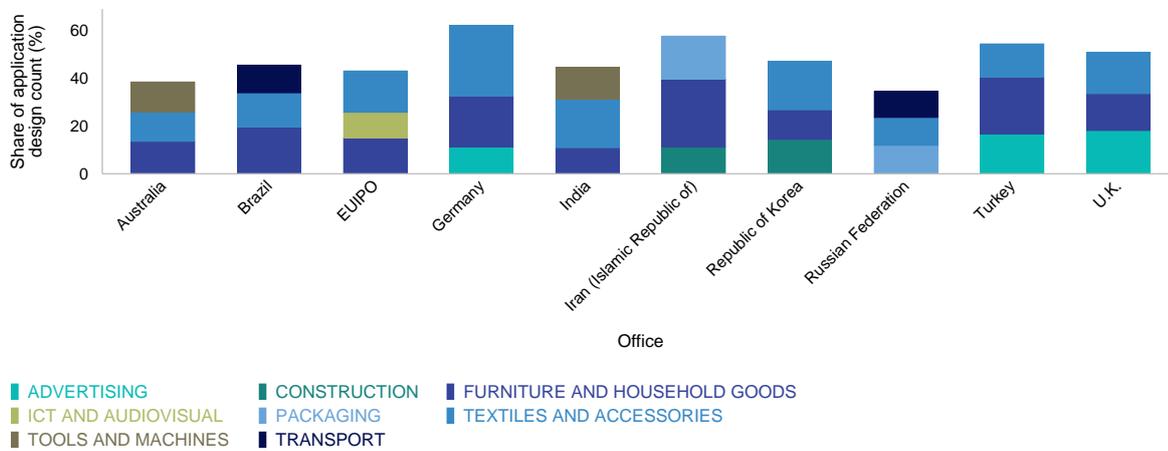
C22. Application design counts by Locarno class, 2019



Note: See annex C for class numbers. These figures are based on data from 112 IP offices. Data for several large offices are either not available or incomplete, including for the offices of China, Japan and the U.S.

Source: WIPO Statistics Database, September 2020.

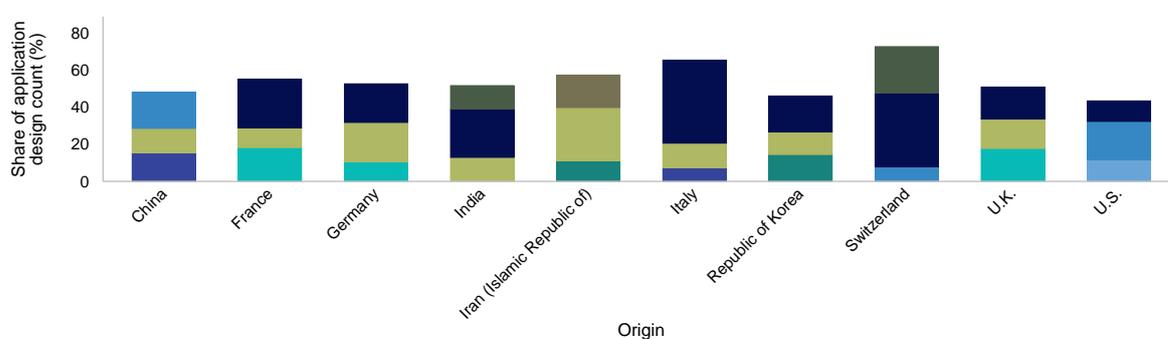
C23. Distribution of application design counts by the top three sectors for the top 10 offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. A concordance table produced by the Organisation for Economic Co-operation and Development (OECD) was used to convert the 32 classes into 12 industry sectors (see annex C for definitions). The top three sectors and top 10 offices were selected based on their 2019 totals.

Source: WIPO Statistics Database, September 2020.

C24. Distribution of application design counts by the top three sectors for the top 10 origins, 2019



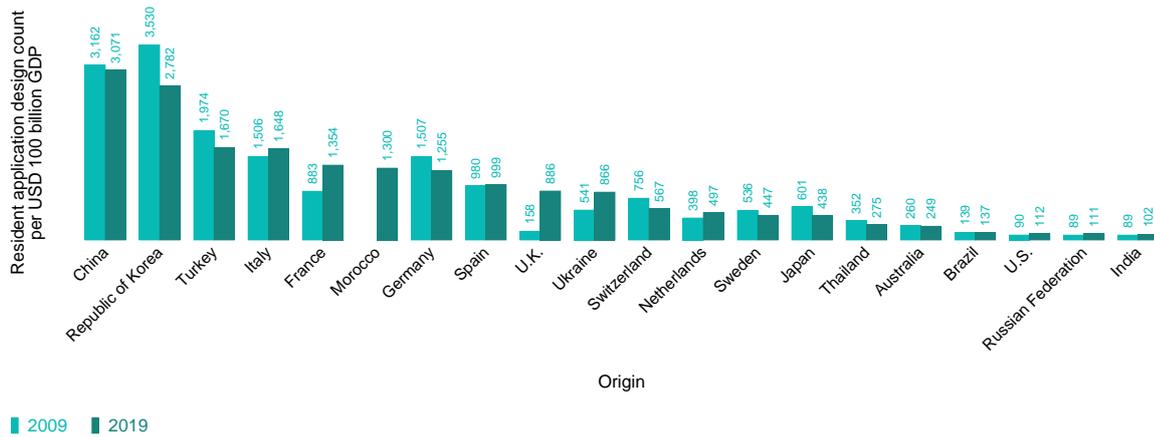
- ADVERTISING
- FURNITURE AND HOUSEHOLD GOODS
- PACKAGING
- CONSTRUCTION
- HEALTH, PHARMA AND COSMETICS
- TEXTILES AND ACCESSORIES
- ELECTRICITY AND LIGHTING
- ICT AND AUDIOVISUAL
- TOOLS AND MACHINES

Note: A concordance table produced by the Organisation for Economic Co-operation and Development (OECD) was used to convert the 32 classes into 12 industry sectors (see annex C for definitions). These figures are based on data from 112 IP offices. Data for several large offices are either not available or incomplete, including for the offices of China, Japan and the U.S.

Source: WIPO Statistics Database, September 2020.

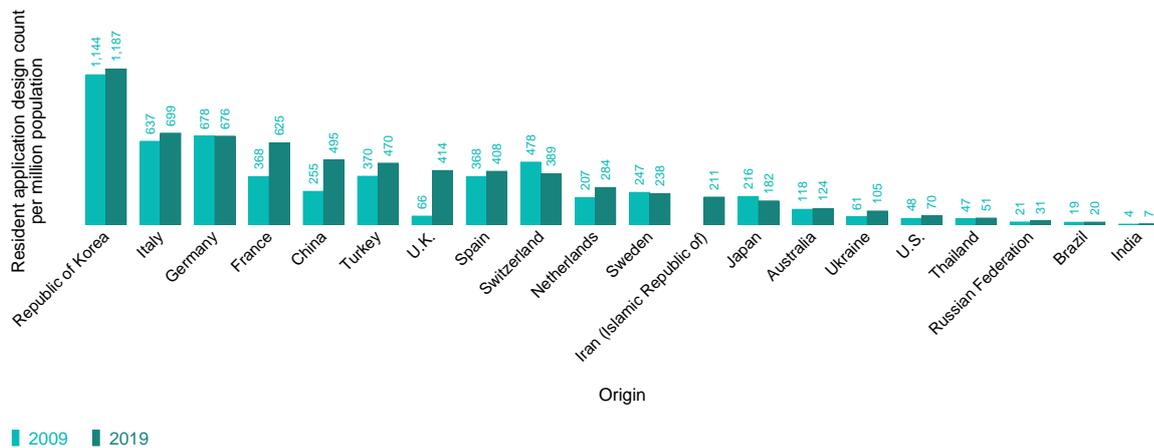
Application design count in relation to GDP and population

C25. Resident application design count per USD 100 billion of GDP for the top 20 origins, 2009 and 2019



Note: GDP data are in constant 2017 US PPP dollars. Origins were selected based on the top origins list in terms of application design count and on GDP data availability.
Sources: WIPO Statistics Database and World Bank, September 2020.

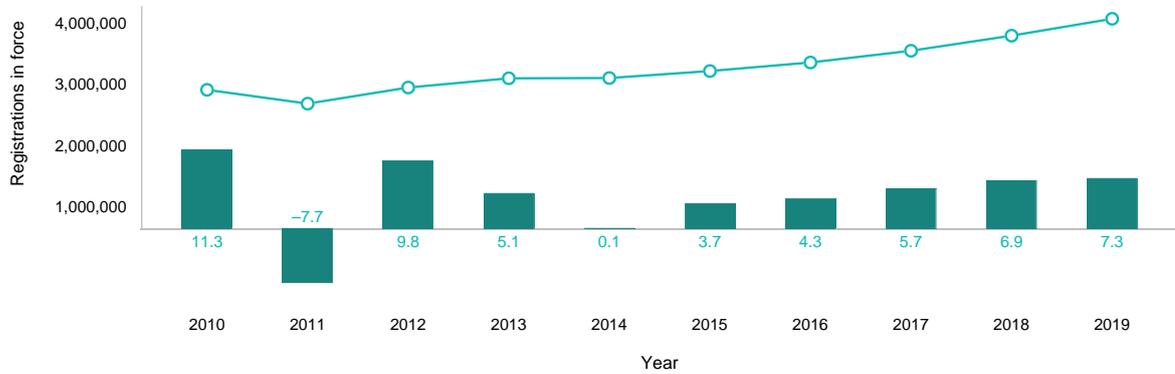
C26. Resident application design count per million population for the top 20 origins, 2009 and 2019



Note: Origins were selected based on the top origins list in terms of application design count and on population data availability.
Sources: WIPO Statistics Database and World Bank, September 2020.

Industrial design registrations in force

C27. Trend in industrial design registrations in force worldwide, 2010–2019

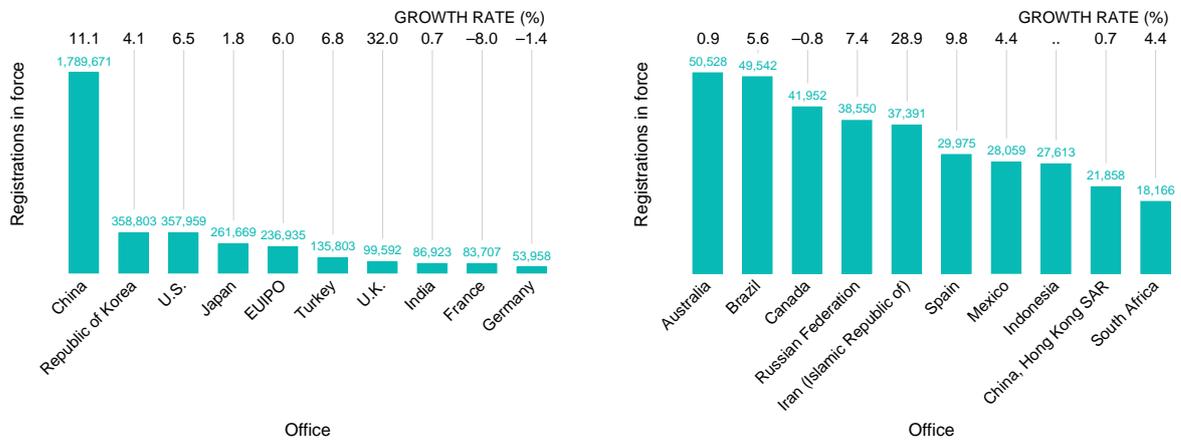


■ REGISTRATIONS IN FORCE ■ GROWTH RATE (%)

Note: WIPO estimates cover 122 IP offices and include direct national and regional applications, as well as designations received via the Hague System. Data refer to the number of industrial design registrations in force and not the number of designs contained in registrations in force.

Source: WIPO Statistics Database, September 2020.

C28. Industrial design registrations in force for the top 20 offices, 2019

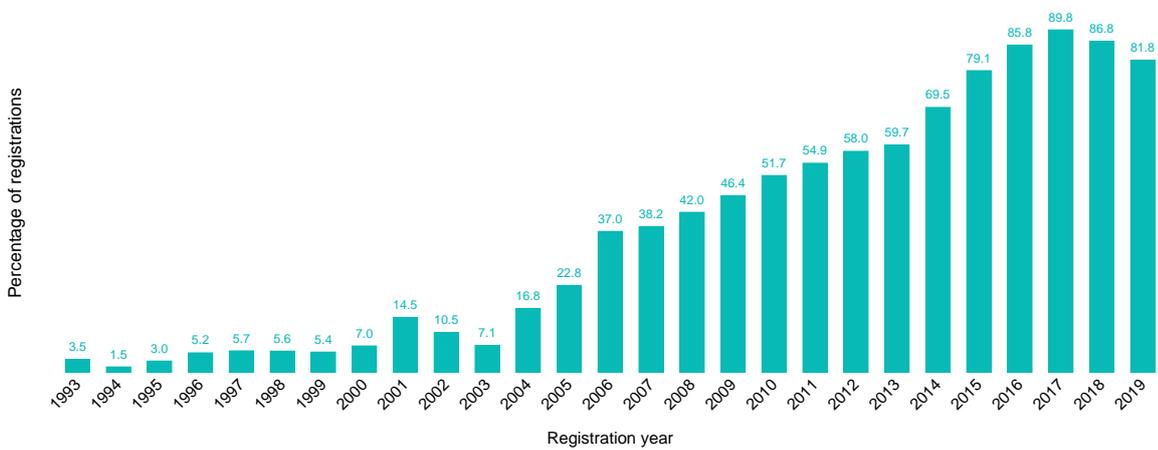


Note: EUIPO is the European Union Intellectual Property Office. Data refer to the number of industrial design registrations in force and not the number of designs contained in registrations in force.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

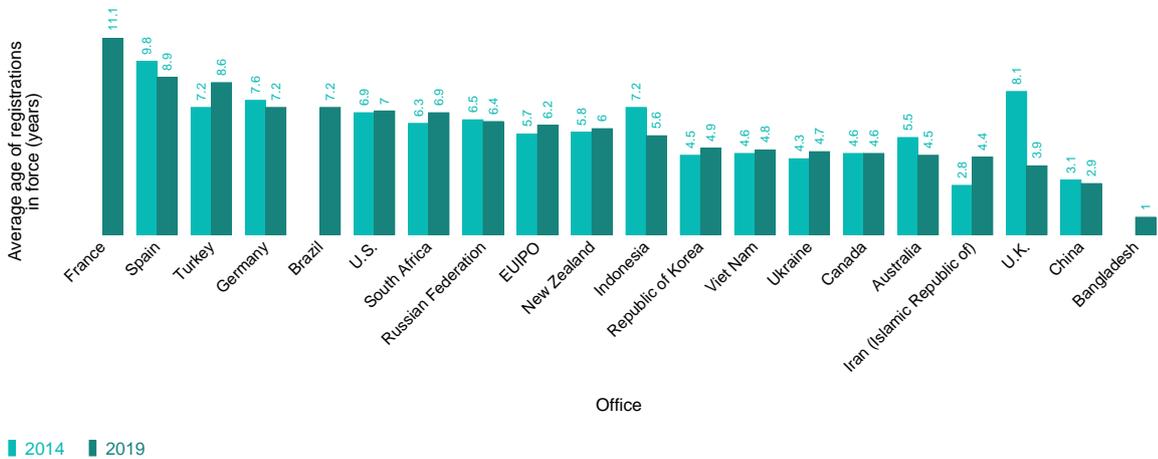
C29. Industrial design registrations in force in 2019 as a percentage of total registrations



Note: Percentages are calculated using the number of industrial designs registered in year *t* and in force in 2019 divided by the total number of industrial designs registered in year *t*. The graph is based on data from the 87 offices (including most large offices, with the exception of Japan) for which a breakdown of industrial design registrations in force by year of registration was available.

Source: WIPO Statistics Database, September 2020.

C30. Average age of industrial design registrations in force at selected offices, 2014 and 2019

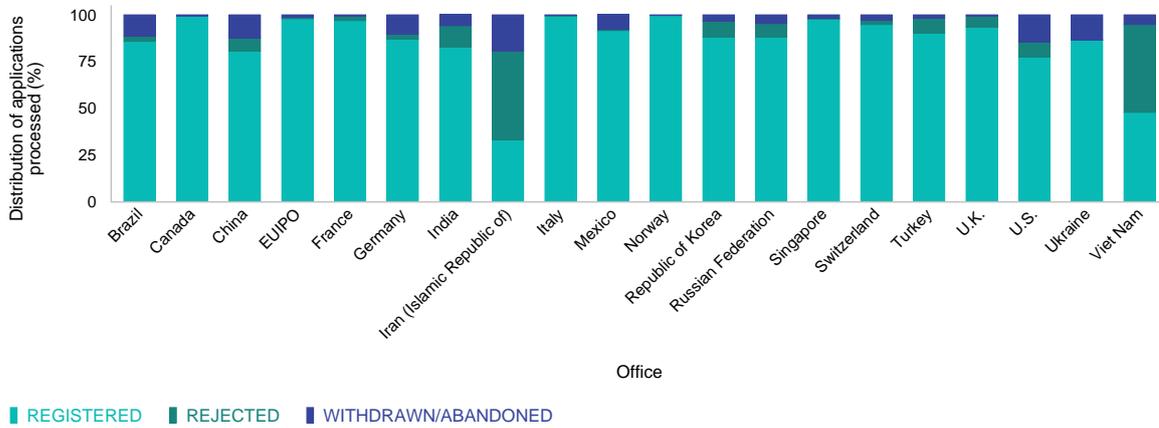


Note: EUIPO is the European Union Intellectual Property Office.

Source: WIPO Statistics Database, September 2020.

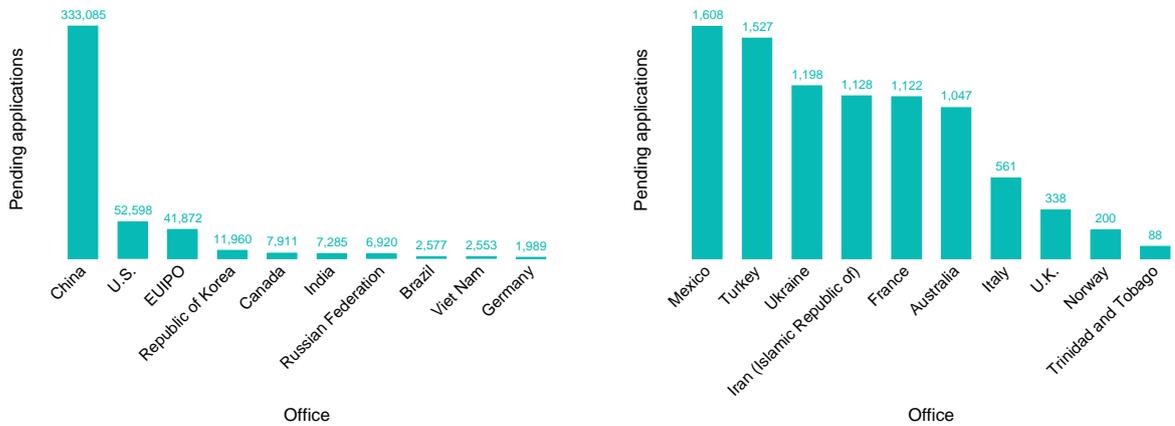
Industrial design office procedural data

C31. Distribution of industrial design examination outcomes for selected offices, 2019



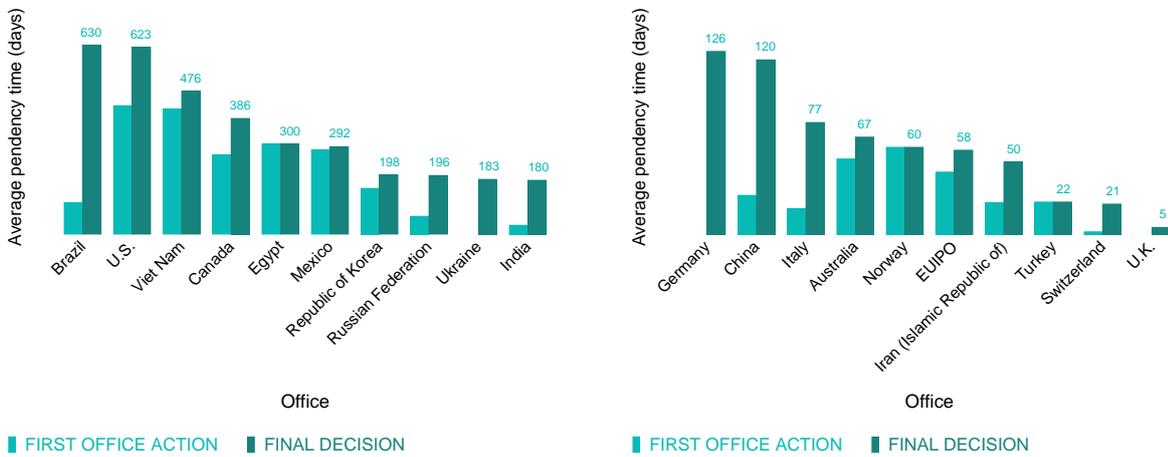
Note: EIUIPO is the European Union Intellectual Property Office. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in industrial design procedures between offices, data cannot be fully harmonized. Therefore caution should be exercised when making comparisons across offices.
Source: WIPO Statistics Database, September 2020.

C32. Potentially pending applications for selected offices, 2019



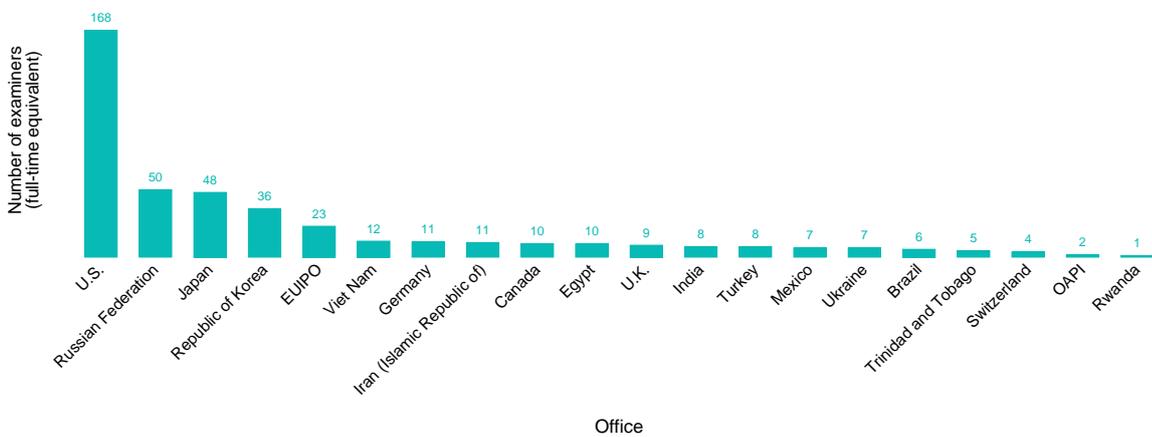
Note: EIUIPO is the European Union Intellectual Property Office. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in industrial design procedures between offices, data cannot be fully harmonized. Therefore caution should be exercised when making comparisons across offices.
Source: WIPO Statistics Database, September 2020.

C33. Average pendency times from filing date to first office action and to final decision at selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office. WIPO collects data from IP offices using a common questionnaire and methodology. However, due to differences in industrial design procedures between offices, data cannot be fully harmonized. Therefore caution should be exercised when making comparisons across offices.
 Source: WIPO Statistics Database, September 2020.

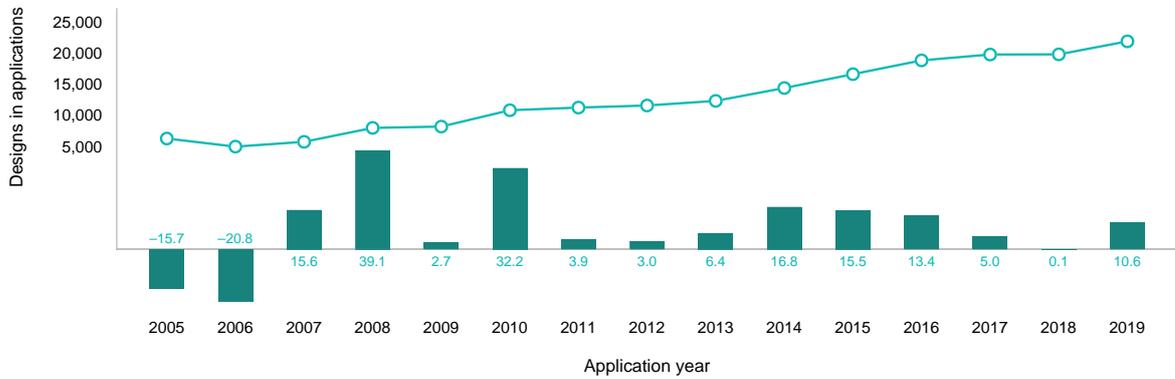
C34. Number of industrial design examiners for selected offices, 2019



Note: EUIPO is the European Union Intellectual Property Office and OAPI is the African Intellectual Property Organization.
 Source: WIPO Statistics Database, September 2020.

Industrial design applications through the Hague System

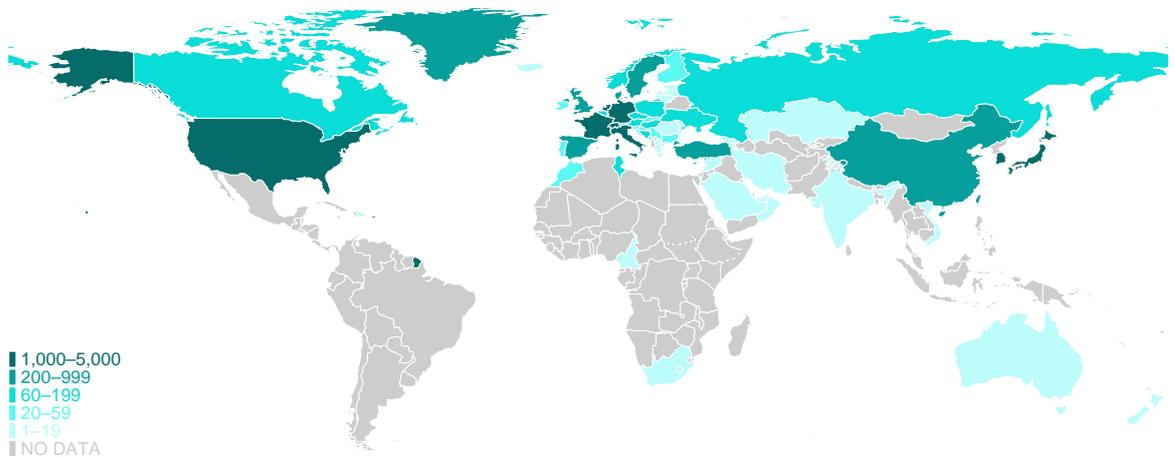
C35. Trend in designs contained in Hague international applications, 2005–2019



DESIGNS IN APPLICATIONS | GROWTH RATE (%)

Source: WIPO Statistics Database, September 2020.

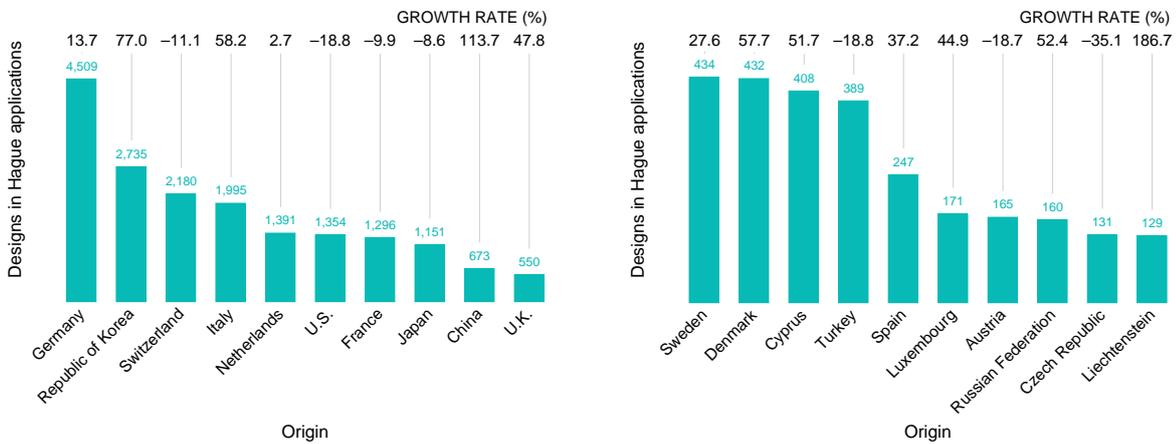
C36. Designs contained in Hague international applications by origin, 2019



Note: Applicants residing in a non-member country can file applications for international registrations, if they have a real and effective industrial or commercial establishment within the jurisdiction of a Hague member.

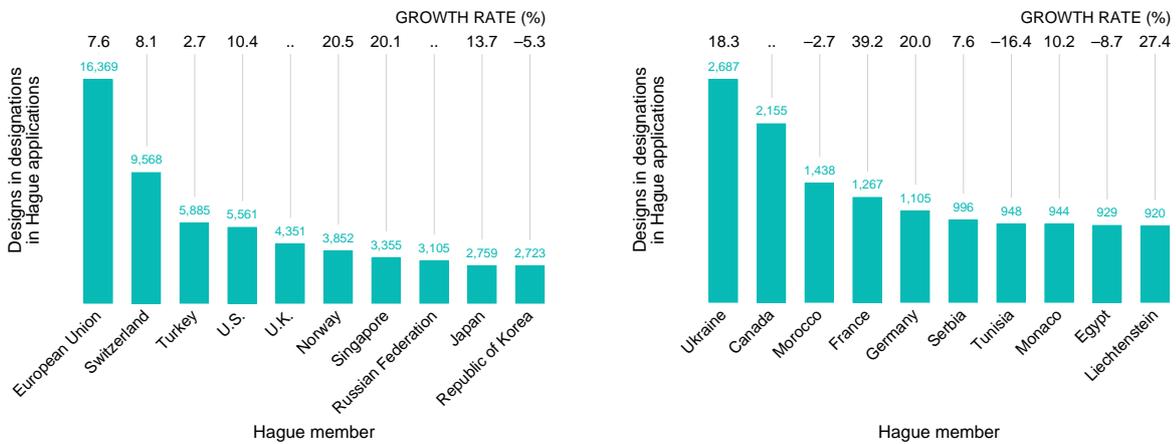
Source: WIPO Statistics Database, September 2020.

C37. Designs contained in Hague international applications for the top 20 origins, 2019



Source: WIPO Statistics Database, September 2020.

C38. Designs contained in designations in Hague international applications for the top 20 designated Hague members, 2019



.. indicates not available.

Source: WIPO Statistics Database, September 2020.

Statistical tables

C39. Industrial design applications by office and origin, 2019

Name	Application design count by office			Application design count by origin	Equivalent application design count by origin	Hague international application design count	
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(e)	Designated Hague member
Afghanistan (b)	..	..	..	12	44	..	n.a.
African Intellectual Property Organization	1,132	228	904	n.a.	n.a.	n.a.	869
African Regional Intellectual Property Organization	76	9	67	n.a.	n.a.	n.a.	n.a.
Albania (b)	..	..	..	1	28	..	499
Algeria	1,682	1,358	324	1,360	1,376	..	n.a.
Andorra (b)	..	..	..	9	117	..	n.a.
Angola (b)	..	..	..	2	2	..	n.a.
Argentina	2,049	1,052	997	1,115	1,709	..	n.a.
Armenia	491	39	452	57	246	7	450
Australia	8,857	3,147	5,710	5,587	15,766	6	n.a.
Austria (b)	..	..	..	3,569	64,857	165	n.a.
Azerbaijan	961	139	822	139	139	..	808
Bahamas (b)	..	..	..	23	23	..	n.a.
Bahrain	62	7	55	9	9	..	n.a.
Bangladesh	1,598	1,494	104	1,494	1,494	..	n.a.
Barbados (b)	..	..	..	116	1,277	..	n.a.
Belarus	709	317	392	402	429	..	n.a.
Belgium	n.a.	n.a.	n.a.	2,330	33,567	107	n.a.
Belize	262	5	257	10	37	..	257
Benelux Office for Intellectual Property	1,470	847	623	n.a.	n.a.	n.a.	619
Benin (b,d)	n.a.	n.a.	n.a.	1	17	..	39
Bermuda (b)	..	..	..	3	3	..	n.a.
Bhutan (b)	..	..	..	1	1	..	n.a.
Bosnia and Herzegovina	734	84	650	268	2,266	75	649
Botswana (b)	..	..	..	..	..	..	85
Brazil	6,432	4,226	2,206	4,602	8,976	..	n.a.
Brunei Darussalam	116	0	116	..	..	..	109
Bulgaria	842	718	124	1,677	21,036	45	120
Burkina Faso (b,d)	n.a.	n.a.	n.a.	12	204	..	n.a.
Cambodia (b)	..	..	..	1	1	..	153
Cameroon (b,d)	n.a.	n.a.	n.a.	37	597	2	n.a.
Canada	7,538	734	6,804	3,057	19,552	83	2,155
Central African Republic (b,d)	n.a.	n.a.	n.a.	1	17	..	n.a.
Chad (b,d)	n.a.	n.a.	n.a.	5	85	..	n.a.
Chile	528	51	477	175	202	..	n.a.
China	711,617	691,771	19,846	723,327	1,118,563	673	n.a.
China, Hong Kong SAR	4,974	1,481	3,493	3,688	34,365	..	n.a.
China, Macao SAR	234	18	216	309	1,551	..	n.a.
Colombia	668	331	337	408	408	..	n.a.
Congo (b,d)	n.a.	n.a.	n.a.	1	17	..	n.a.
Costa Rica	73	11	62	13	13	..	n.a.
Côte d'Ivoire (b,d)	n.a.	n.a.	n.a.	103	2,180	..	41
Croatia	1,083	316	767	648	3,213	51	762
Cuba	24	21	3	22	49	..	n.a.
Cyprus	85	85	0	2,821	15,608	408	n.a.

Name	Application design count by office			Application design count by origin	Equivalent application design count by origin	Hague international application design count	
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(e)	Designated Hague member
Czech Republic	1,074	837	237	2,671	20,950	131	n.a.
Democratic People's Republic of Korea (b)	..	..	..	4	58	..	188
Denmark	352	113	239	4,235	64,877	432	220
Dominican Republic	40	5	35	8	35	1	n.a.
Ecuador	154	79	75	81	81	..	n.a.
Egypt	2,729	1,720	1,009	1,720	1,720	..	929
El Salvador	41	7	34	7	7	..	n.a.
Estonia	104	37	67	249	4,110	6	67
Eswatini (b)	..	..	..	2	2	..	n.a.
European Union Intellectual Property Office	113,319	69,485	43,834	n.a.	n.a.	n.a.	16,369
Finland	344	166	178	1,606	22,558	46	86
France	37,404	35,732	1,672	54,344	222,736	1,296	1,267
Gabon (b,d)	n.a.	n.a.	n.a.	13	221	..	24
Georgia	690	186	504	201	228	1	481
Germany	44,097	36,617	7,480	76,458	605,010	4,509	1,105
Ghana (b)	..	..	..	3	6	..	70
Greece	1,205	783	422	1,032	5,082	9	420
Guatemala	205	5	200	7	7	..	n.a.
Guinea (b,d)	n.a.	n.a.	n.a.	49	833	..	n.a.
Guinea-Bissau (b,d)	n.a.	n.a.	n.a.	4	68	..	n.a.
Honduras (b)	..	..	..	1	1	..	n.a.
Hungary	504	433	71	968	8,177	70	51
Iceland	417	16	401	63	311	4	398
India	13,723	9,381	4,342	10,016	12,753	3	n.a.
Indonesia	2,668	1,798	870	1,888	2,077	..	n.a.
Iran (Islamic Republic of)	17,622	17,489	133	17,495	17,495	2	n.a.
Iraq (b)	..	..	..	21	102	..	n.a.
Ireland	182	105	77	790	12,713	21	n.a.
Israel	1,483	819	664	1,958	9,842	4	n.a.
Italy	31,111	30,302	809	59,185	384,594	1,995	357
Jamaica	207	204	3	205	205	..	n.a.
Japan	32,176	22,920	9,256	39,936	126,259	1,151	2,759
Jordan	118	71	47	89	89	..	n.a.
Kazakhstan (b)	..	..	..	10	37	1	n.a.
Kenya	165	154	11	158	160	..	n.a.
Kuwait (b)	..	..	..	11	254	..	n.a.
Kyrgyzstan (b)	..	..	..	1	28	..	361
Latvia	173	124	49	209	1,802	3	47
Lebanon (b)	..	..	..	8	89	1	n.a.
Liechtenstein	992	120	872	1,010	9,004	129	920
Lithuania	634	177	457	345	2,667	16	457
Luxembourg	n.a.	n.a.	n.a.	1,712	14,925	171	n.a.
Madagascar	318	314	4	314	314	..	n.a.
Malaysia	1,904	574	1,330	752	914	..	n.a.
Maldives (b)	..	..	..	1	1	1	n.a.

Name	Application design count by office			Application design count by origin	Equivalent application design count by origin	Hague international application design count	
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(e)	Designated Hague member
Mali (b,d)	n.a.	n.a.	n.a.	17	273	..	4
Malta	11	11	0	112	2,596	..	n.a.
Marshall Islands (b)	..	..	..	12	201	..	n.a.
Mauritania (b,d)	n.a.	n.a.	n.a.	2	18	..	n.a.
Mauritius	126	115	11	126	207	..	n.a.
Mexico	3,726	1,348	2,378	1,515	2,919	..	n.a.
Monaco	972	30	942	107	674	8	944
Mongolia	1,216	855	361	858	858	..	359
Montenegro	872	1	871	1	1	..	869
Morocco	5,236	3,620	1,616	3,819	4,269	39	1,438
Mozambique	77	40	37	41	41	..	n.a.
Myanmar (b)	..	..	..	2	2	..	n.a.
Namibia	193	79	114	80	80	..	108
Netherlands	n.a.	n.a.	n.a.	9,424	127,275	1,391	n.a.
New Zealand	1,281	321	960	1,073	4,340	2	n.a.
Niger (b,d)	n.a.	n.a.	n.a.	..	..	..	2
Nigeria (b)	..	..	..	23	104	..	n.a.
North Macedonia	735	73	662	102	210	7	659
Norway	4,641	464	4,177	1,155	9,174	119	3,852
Oman	559	8	551	17	17	1	537
Pakistan	581	453	128	469	523	..	n.a.
Palau (b)	..	..	..	13	13	..	n.a.
Panama	92	0	92	16	340	..	n.a.
Peru	382	133	249	147	147	..	n.a.
Philippines	1,735	1,110	625	1,131	1,295	..	n.a.
Poland (b)	..	..	..	5,433	130,625	106	196
Portugal	2,058	1,920	138	2,885	24,377	55	n.a.
Qatar (b)	..	..	..	68	230	..	n.a.
Republic of Korea	69,360	61,364	7,996	74,736	159,468	2,735	2,723
Republic of Moldova	1,174	451	723	504	1,098	18	708
Romania	1,061	542	519	1,011	12,178	8	509
Russian Federation	10,928	4,412	6,516	5,493	10,063	160	3,105
Rwanda	71	4	67	6	6	..	67
Saint Lucia (b)	..	..	..	10	10	..	n.a.
Samoa	40	40	0	43	43	..	n.a.
San Marino	108	5	103	211	1,210	..	84
Sao Tome and Principe (b)	..	..	..	..	..	..	60
Saudi Arabia	804	348	456	408	624	1	n.a.
Senegal (b,d)	n.a.	n.a.	n.a.	19	323	..	42
Serbia	1,156	133	1,023	398	2,439	39	996
Seychelles	5	0	5	37	145	..	n.a.
Singapore	4,769	392	4,377	1,394	5,152	34	3,355
Slovakia	410	180	230	425	5,042	43	n.a.
Slovenia (b)	..	..	..	464	4,565	51	682
South Africa	1,884	976	908	1,300	3,436	13	n.a.
Spain	16,175	15,728	447	21,291	115,863	247	401

Name	Application design count by office			Application design count by origin	Equivalent application design count by origin	Hague international application design count	
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(e)	Designated Hague member
Sri Lanka	546	480	66	525	606	..	n.a.
Sudan (b)	..	..	..	14	14	..	n.a.
Suriname (b)	..	..	..	..	..	..	38
Sweden	658	529	129	6,400	58,275	434	n.a.
Switzerland	12,621	3,334	9,287	21,966	148,724	2,180	9,568
Syrian Arab Republic	240	148	92	156	183	1	87
Tajikistan (b)	..	..	..	..	..	..	166
Thailand	5,293	3,541	1,752	3,786	4,758	..	n.a.
Togo (b,d)	n.a.	n.a.	n.a.	7	119	..	n.a.
Trinidad and Tobago	24	20	4	24	24	..	n.a.
Tunisia (b)	..	..	..	368	2,009	88	948
Turkey	46,202	39,239	6,963	41,368	55,561	389	5,885
Turkmenistan (b)	..	..	..	1	1	..	185
Uganda (b)	..	..	..	1	2	..	n.a.
Ukraine	7,624	4,660	2,964	5,386	7,659	128	2,687
United Arab Emirates	916	58	858	224	1,158	15	n.a.
United Kingdom	29,896	21,730	8,166	32,885	193,736	550	4,351
United Republic of Tanzania (b)	..	..	..	1	2	..	n.a.
United States of America	49,848	22,988	26,860	61,601	398,093	1,354	5,561
Uruguay (b)	..	..	..	1	1	..	n.a.
Uzbekistan	266	249	17	250	250	..	n.a.
Viet Nam	4,387	2,214	2,173	2,272	2,569	10	n.a.
Yemen	51	47	4	47	47	..	n.a.
Zambia	58	58	0	59	59	..	n.a.
Zimbabwe (b)	..	..	..	3	5	..	n.a.
Others/Unknown	..	..	..	4,310	26,207	6	n.a.
Total (2019 estimates)	1,360,900	1,137,300	223,600	1,360,900	n.a.	21,857	85,367

(a) Design count by origin data are incomplete, because some offices do not report the origin of applications.

(b) Only Hague designation data are available and/or the office has not reported the origin of applications therefore design count by office and origin data may be incomplete.

(c) Origin is defined as the country of the stated address of residence of the first named applicant in an international application.

(d) The African Intellectual Property Organization (OAPI) is the competent office for processing applications.

(e) Origin is defined as the country/territory of the stated residence of the applicant in an international application.

n.a. indicates not applicable.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

C40. Industrial design registrations by office and origin, and registrations in force, 2019

Name	Registration design count by office			Registration design count by origin	Equivalent registration design count by origin	Hague international registration design count	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(c)	Total
Afghanistan (b)	..	..	..	2	2	..	..
African Intellectual Property Organization	999	216	783	n.a.	n.a.	n.a.	..
African Regional Intellectual Property Organization	66	6	60	n.a.	n.a.	n.a.	610
Albania (b)	..	..	..	2	2	..	64
Algeria (b)	..	..	..	1	1	..	1,424
Andorra (b)	..	..	..	6	33	..	..
Antigua and Barbuda (b)	..	..	..	1	1	..	..
Argentina	1,959	988	971	1,043	1,556	..	..
Armenia	476	23	453	53	80	1	156
Australia	7,085	2,298	4,787	4,434	15,261	3	50,528
Austria (b)	..	..	..	3,651	65,265	164	8,470
Azerbaijan	908	49	859	49	49	..	1,548
Bahamas (b)	..	..	..	17	17	..	..
Bahrain	95	6	89	7	7	..	539
Bangladesh	574	496	78	497	497	..	7,430
Barbados (b)	..	..	..	202	1,336	..	..
Belarus	680	269	411	350	377	..	1,463
Belgium	n.a.	n.a.	n.a.	2,499	33,936	128	n.a.
Belize	289	3	286	9	36	..	..
Benelux Office for Intellectual Property	1,094	745	349	n.a.	n.a.	n.a.	3,249
Benin (b,d)	n.a.	n.a.	n.a.	1	17	..	..
Bermuda (b)	..	..	..	4	4	..	..
Bosnia and Herzegovina	871	107	764	223	763	26	460
Botswana (b)	..	..	..	..	..	..	419
Brazil	5,850	3,433	2,417	3,815	8,135	..	49,542
Brunei Darussalam	94	0	94	..	..	..	49
Bulgaria	678	601	77	1,480	20,407	38	2,101
Burkina Faso (b,d)	n.a.	n.a.	n.a.	12	204	..	..
Cabo Verde (b)	..	..	..	..	..	..	1
Cambodia (b)	..	..	..	..	..	..	..
Cameroon (b,d)	n.a.	n.a.	n.a.	37	629	..	..
Canada	6,933	584	6,349	2,478	19,747	37	41,952
Central African Republic (b,d)	n.a.	n.a.	n.a.	1	1	..	..
Chile	368	34	334	83	110	..	3,199
China	556,529	539,282	17,247	563,339	921,033	482	1,789,671
China, Hong Kong SAR	4,579	1,313	3,266	3,248	30,318	..	21,858
China, Macao SAR	162	32	130	303	1,518	..	1,263
Colombia	510	204	306	241	241	..	4,608
Congo (b,d)	n.a.	n.a.	n.a.	1	17	..	..
Cook Islands (b)	..	..	..	3	3	..	..
Costa Rica	42	3	39	22	22	..	676
Côte d'Ivoire (b,d)	n.a.	n.a.	n.a.	97	2,078	..	..
Croatia	808	259	549	569	2,891	45	3,788
Cuba	18	7	11	8	35	..	60
Cyprus	26	26	0	2,191	13,142	320	29

Name	Registration design count by office			Registration design count by origin	Equivalent registration design count by origin	Hague international registration design count	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(b)	Total
Czech Republic	620	530	90	1,958	19,670	112	2,645
Democratic People's Republic of Korea (b)	..	..	..	2,372	2,642	..	..
Denmark	302	88	214	3,469	56,794	299	1,832
Dominican Republic	29	5	24	6	6	..	278
Ecuador	268	87	181	88	88	..	696
Egypt	1,812	661	1,151	671	687	1	5,558
El Salvador	52	7	45	7	7	..	..
Estonia	116	34	82	219	3,864	7	1,526
Eswatini (b)	..	..	..	2	2	..	..
European Union Intellectual Property Office	107,514	66,105	41,409	n.a.	n.a.	n.a.	236,935
Fiji (b)	..	..	..	92	92	..	..
Finland	234	130	104	2,172	21,936	27	1,975
France	11,272	10,292	980	25,642	185,598	1,067	83,707
Gabon (b,d)	n.a.	n.a.	n.a.	13	205	..	..
Gambia (b)	..	..	..	3	3	..	..
Georgia	685	172	513	1,742	1,742	4	2,607
Germany	42,023	36,488	5,535	70,408	562,040	3,468	53,958
Ghana (b)	..	..	..	2	2	..	..
Greece	1,027	643	384	1,015	4,826	14	1,391
Guatemala	211	93	118	93	93	..	336
Guinea (b,d)	n.a.	n.a.	n.a.	49	833	..	..
Guinea-Bissau (b,d)	n.a.	n.a.	n.a.	4	68	..	..
Hungary	436	393	43	818	7,352	26	3,396
Iceland	266	13	253	83	288	3	1,010
India	13,710	9,652	4,058	10,122	12,330	3	86,923
Indonesia	4,109	2,305	1,804	2,336	2,525	..	27,613
Iran (Islamic Republic of)	6,023	5,947	76	5,950	5,950	..	37,391
Iraq (b)	..	..	..	32	86	..	..
Ireland	152	83	69	765	12,213	14	1,545
Israel	1,021	535	486	2,032	9,322	4	..
Italy	39,457	38,015	1,442	63,164	381,632	1,871	9,191
Jamaica	120	117	3	3,677	3,677	..	..
Japan	28,311	20,875	7,436	33,964	119,308	1,166	261,669
Jordan	38	15	23	23	23	..	2,099
Kazakhstan	229	55	174	66	66	..	1,083
Kenya	76	74	2	76	77	..	..
Kuwait (b)	..	..	..	12	255	..	..
Kyrgyzstan	380	9	371	13	13	..	84
Lao People's Democratic Republic (b)	..	..	..	2	2	..	..
Latvia	152	119	33	271	2,269	17	370
Lebanon (b)	..	..	..	8	89	1	..
Libya (b)	..	..	..	28	28	..	..
Liechtenstein (b)	..	..	..	709	6,813	91	..
Lithuania	601	223	378	392	1,958	15	312
Luxembourg	n.a.	n.a.	n.a.	1,190	13,332	132	n.a.

Name	Registration design count by office			Registration design count by origin	Equivalent registration design count by origin	Hague international registration design count	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(c)	Total
Madagascar	356	348	8	348	348	..	1,318
Malaysia	1,238	337	901	507	615	1	14,931
Mali (b,d)	n.a.	n.a.	n.a.	16	272	..	..
Malta	11	11	0	180	4,149	..	122
Marshall Islands (b)	..	..	..	7	196	..	..
Mauritania (b,d)	n.a.	n.a.	n.a.	1	17	..	..
Mauritius	106	86	20	103	184	..	155
Mexico	2,865	699	2,166	863	2,240	..	28,059
Monaco	984	15	969	64	604	9	260
Mongolia	1,181	780	401	781	781	..	649
Montenegro	883	2	881	2	2	..	86
Morocco	5,033	3,502	1,531	3,516	3,872	..	..
Mozambique	68	31	37	32	32	..	1,410
Myanmar (b)	..	..	..	6	6	..	..
Namibia	157	76	81	76	76	..	..
Netherlands	n.a.	n.a.	n.a.	8,427	122,579	1,354	n.a.
New Zealand	1,332	341	991	1,085	4,595	1	11,558
Nigeria (b)	..	..	..	11	92	..	..
North Macedonia	850	87	763	124	151	3	2,350
Norway	4,181	435	3,746	1,004	8,861	111	10,811
Oman	614	8	606	18	18	1	..
Pakistan	408	329	79	339	339	..	7,289
Panama	53	6	47	49	832	..	664
Peru	293	94	199	100	100	..	3,043
Philippines	1,488	796	692	844	1,008	..	..
Poland (b)	..	..	..	5,013	118,379	130	8,368
Portugal	2,022	1,912	110	2,952	26,442	54	3,891
Qatar (b)	..	..	..	68	203	..	..
Republic of Korea	53,189	46,117	7,072	53,452	123,273	2,219	358,803
Republic of Moldova	951	287	664	322	673	12	2,962
Romania	750	355	395	883	11,278	17	3,205
Russian Federation	9,208	3,656	5,552	4,230	8,826	108	38,550
Rwanda (b)	..	..	..	..	..	..	74
Saint Lucia (b)	..	..	..	1	1	..	..
Saint Vincent and the Grenadines (b)	..	..	..	..	..	..	2
Samoa	40	40	0	40	40	..	83
San Marino	95	6	89	777	885	..	..
Sao Tome and Principe (b)	..	..	..	14	14	..	532
Saudi Arabia	564	195	369	209	425	..	4,736
Senegal (b,d)	n.a.	n.a.	n.a.	21	309	..	..
Serbia	1,063	155	908	406	2,379	36	6,621
Seychelles	5	0	5	16	124	..	4
Sierra Leone (b)	..	..	..	149	149	..	..
Singapore	4,295	361	3,934	1,027	5,170	24	14,245
Slovakia	322	198	124	468	5,166	48	911
Slovenia (b)	..	..	..	437	4,062	36	..

Name	Registration design count by office			Registration design count by origin	Equivalent registration design count by origin	Hague international registration design count	In force by office
	Total	Resident	Non-resident	Total ^(a)	Total ^(a)	Origin ^(b)	Total
Somalia (b)	..	..	..	9	9	..	..
South Africa	1,884	908	976	1,243	3,169	1	18,166
Spain	15,942	15,540	402	20,466	114,162	188	29,975
Sri Lanka	258	201	57	229	310	..	2,503
Sudan (b)	..	..	..	1	1	..	..
Suriname (b)	..	..	..	..	..	..	..
Sweden	485	352	133	5,227	52,247	308	3,790
Switzerland	11,216	3,154	8,062	21,848	143,933	2,090	9,433
Syrian Arab Republic	324	235	89	237	264	1	320
Tajikistan (b)	..	..	..	..	..	..	8
Thailand	3,130	1,841	1,289	2,112	2,976	..	17,325
Togo (b,d)	n.a.	n.a.	n.a.	7	119	..	..
Trinidad and Tobago	23	13	10	14	14	..	57
Tunisia (b)	..	..	..	6	54	..	..
Turkey	39,717	33,161	6,556	35,144	48,106	322	135,803
Turkmenistan (b)	..	..	..	16	16	1	..
Uganda (b)	..	..	..	3	6	..	..
Ukraine	7,228	4,366	2,862	4,759	6,163	73	14,873
United Arab Emirates	685	32	653	172	890	8	3,577
United Kingdom	28,103	20,954	7,149	31,265	185,205	391	99,592
United Republic of Tanzania (b)	..	..	..	4	6	..	..
United States of America	37,121	18,236	18,885	56,458	394,924	1,392	357,959
Uruguay (b)	..	..	..	1	1	..	..
Uzbekistan	209	186	23	188	188	..	570
Venezuela (Bolivarian Republic of) (b)	..	..	..	2	2	..	..
Viet Nam	2,503	1,341	1,162	1,478	1,667	6	13,133
Yemen	18	15	3	15	15	..	101
Zambia	47	47	0	47	47	..	471
Zimbabwe (b)	..	..	..	6	6	..	..
Others/Unknown	..	..	..	3,776	26,672	4	..
Total (2019 estimates)	1,105,200	909,400	195,800	1,105,200	n.a.	18,535	4,070,020

(a) Design count by origin data are incomplete, because some offices do not report the origin of registrations.

(b) Only Hague designation data are available and/or the office has not reported the origin of registrations therefore design count by office and origin data may be incomplete.

(c) Origin is defined as the country of the stated address of residence of the holder in an international registration.

(d) The African Intellectual Property Organization (OAPI) is the competent office for registering applications.

(e) Origin is defined as the country/territory of the stated residence of the holder of an international registration.

n.a. indicates not applicable.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

C41. Industrial design office procedural data, 2019

Office	Total applications processed	Registered	Rejected	Withdrawn or abandoned	Applications pending	Number of examiners (FTE)	First office action from filing date (days)	Final office decision from filing date (days)
African Intellectual Property Organization	..	..	..	..	..	2	..	..
Australia (a)	10,389	9,752	..	637	1,047	9	52	67
Botswana	..	..	..	..	..	4	..	..
Brazil	6,830	5,850	185	795	2,577	6	105	630
Cabo Verde	..	..	..	..	1	4	..	..
Canada	5,316	5,285	..	31	7,911	10	265	386
China	691,594	556,529	49,396	85,669	333,085	..	27	120
Egypt	..	..	..	..	27	10	300	300
El Salvador	..	..	..	..	..	1	..	..
European Union Intellectual Property Office	95,245	93,161	669	1,415	41,872	23	43	58
France	4,538	4,394	103	41	1,122	7	..	..
Germany	6,424	5,591	179	654	1,989	11	..	126
India	16,571	13,710	1,877	984	7,285	8	30	180
Iran (Islamic Republic of)	17,488	5,803	8,310	3,375	1,128	11	22	50
Italy	1,295	1,283	7	5	561	1	18	77
Japan	27,556	27,556	..	..	..	48	..	..
Mexico	3,788	3,466	20	302	1,608	7	282	292
Mozambique	..	..	..	..	9	4	..	..
Namibia	..	..	..	..	..	1	..	..
Norway	408	406	..	2	200	2	60	60
Republic of Korea	51,045	44,929	4,258	1,858	11,960	36	153	198
Russian Federation	6,903	6,087	488	328	6,920	50	60	196
Rwanda	..	..	..	..	4	1	..	..
Singapore	1,548	1,509	9	30	75	..	..	..
Switzerland	744	705	16	23	35	4	2	21
Trinidad and Tobago	..	..	..	..	88	5	..	..
Turkey	10,314	9,314	824	176	1,527	8	22	22
Ukraine	2,765	2,393	2	370	1,198	7	..	183
United Kingdom	26,129	24,426	1,551	152	338	9	..	5
United States of America	45,053	34,808	3,656	6,589	52,598	168	429	623
Viet Nam	4,545	2,172	2,133	240	2,553	12	417	476
Zambia	..	..	..	..	..	2	..	..

Note: FTE is full time equivalent. WIPO collects data from IP offices using a common questionnaire and methodology. Every effort has been made to compile procedural data based on common definitions and concepts, but procedural differences make it extremely difficult to fully harmonize such data. Therefore caution should be exercised when making comparisons across offices. The total number of applications processed for a given office may be incomplete due to the omission of one or several elements by the office.

(a) data are for formalities examination only.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

Plant varieties

Highlights

Plant variety applications sustain strong growth

Around 21,430 plant variety applications were filed worldwide in 2019, up 7.8% on 2018 – a fourth consecutive year of growth (figure 4.1). The China office contributed the majority of global growth, followed by the offices of Argentina, Israel and Turkey.

China received 36.6% of all plant variety applications filed worldwide

China remained the top filing office in 2019, receiving 7,834 applications. The China office now accounts for over one-third of the plant varieties filed worldwide. The Community Plant Variety Office of the European Union (CPVO) received 3,525 applications, accounting for 16.4% of global filings. Following the CPVO are the national offices of the United States of America (U.S.) (1,590), Ukraine (1,238) and Japan (822) (figure 4.2). Filings in China represent a 36% on-year growth, driven almost entirely by resident filings. Among the other top five offices, only Ukraine experienced growth (+1.1%), while the CPVO (-0.8%), the U.S. (-1.2%) and Japan (-6.6%) saw a decline in applications. Similarly to China, resident filings drove growth in Ukraine, whereas decreases in non-resident filings were responsible for the overall declines experienced by the CPVO, Japan and the U.S.

The combined share of applications received at the top five offices worldwide increased from 65.5% in 2018 to 70% in 2019 due to the pronounced growth experienced by China.

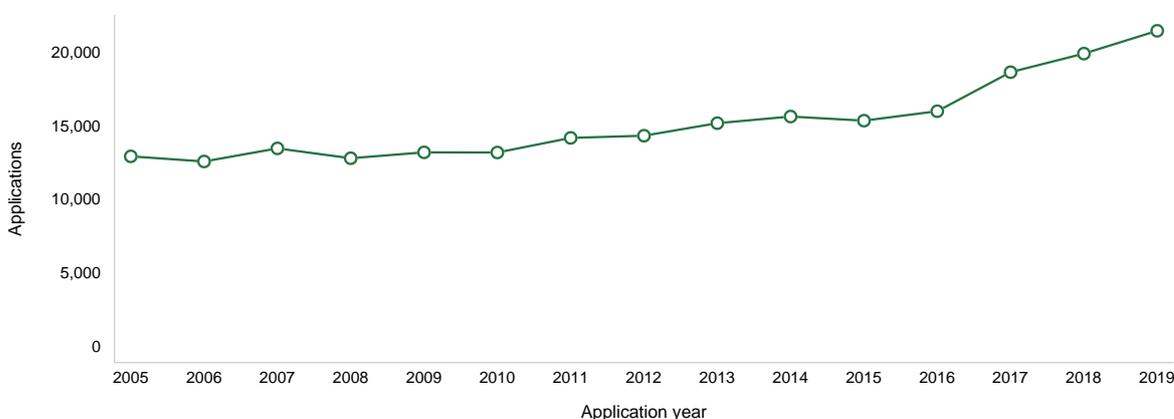
Seven of the top 10 offices received more applications from residents than from non-residents. China's resident share (93.5%) was the highest among these offices. In contrast, Argentina, Canada and Ukraine received the majority of their filings from non-resident applicants.

For the first time, offices of upper middle-income economies accounted for the largest proportion (48.8%) of plant variety applications received in 2019. This figure is up markedly from 22.9% a decade earlier in 2009 (figure 4.3) and represents an average annual growth rate of 13.2% for the time period. Conversely, offices in the high-income group now account for only the second largest share of plant variety applications (43.1%). High-income and lower middle-income economies both recorded effectively flat growth between 2009 and 2019.

Offices in Asia received the most filings, representing 46.7% of all plant variety applications in 2019. Filings at Asian offices more than doubled as compared to 2009, when their share was 22.5% (figure 4.4). Europe represented the second largest region by total plant filings, filing roughly 34.1% of the world total in 2019. However, due to the large growth of filings in Asia, Europe's overall share is down from the 49.4% of total filings in 2009. In addition to Asia's high growth, Africa (+3.1%), Latin America and the Caribbean (LAC) (+2.1%), Europe (+1.2%) and North America (+1.0%) all experienced positive average annual growth over the

Applications grew by 7.8% in 2019

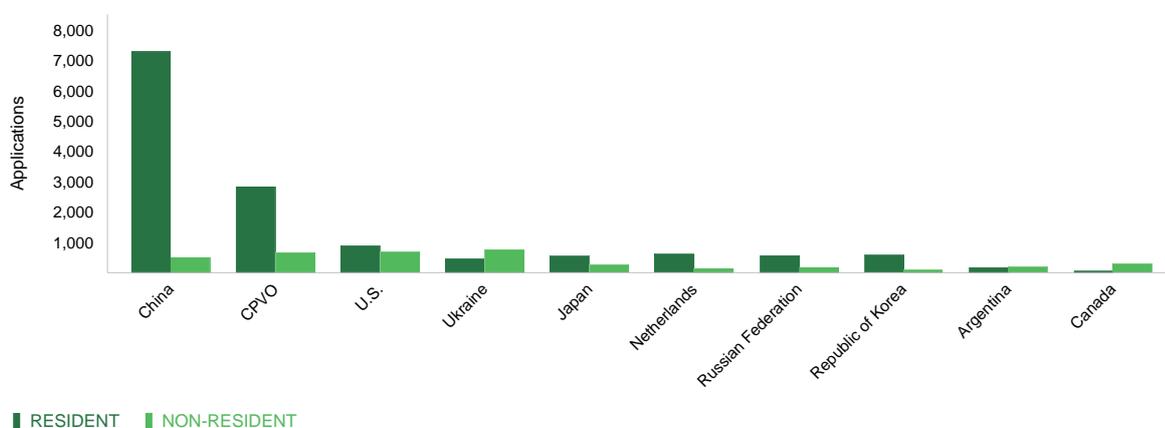
4.1. Plant variety applications worldwide, 2005–2019



Source: Figure D1.

China is the top destination for plant variety applications

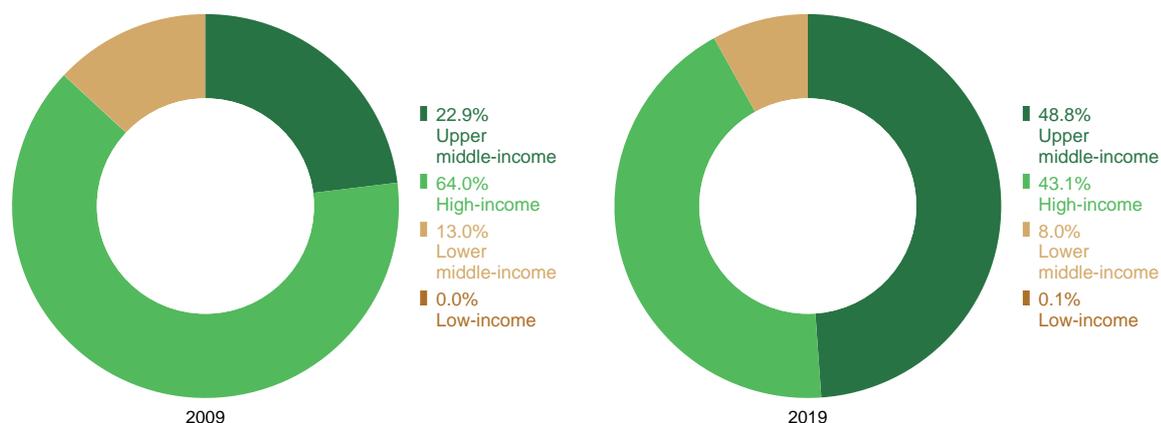
4.2. Plant variety applications for the top 10 offices, 2019



Source: Figure D5.

Offices of upper middle-income economies received 48.8% of applications filed worldwide

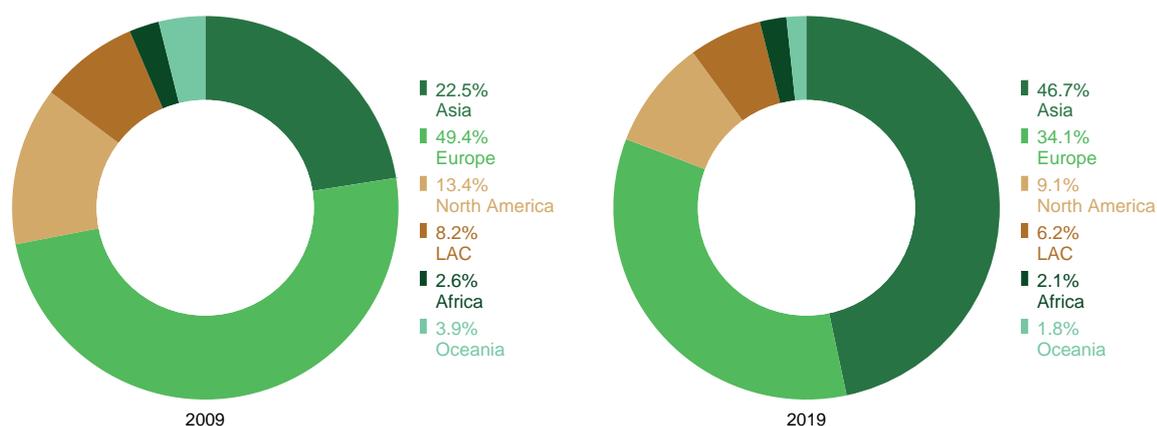
4.3. Plant variety applications by income group, 2009 and 2019



Source: Figure D3.

Asia is the top region, with 46.7% of all applications

4.4. Plant variety applications by region 2009 and 2019



Source: Figure D4.

Plant varieties

past ten years. Oceania is the only region to have seen an average annual decline between 2009 and 2019, with filings dropping roughly 3% a year during the period.

Applicants from China were the most active filers worldwide

Applications received by offices from resident and non-resident applicants are referred to as office data, whereas applications filed by applicants at a national/regional office (resident applications) or at a foreign office (applications abroad) are referred to as origin data. Here, plant variety statistics based on the origin of residence are reported in order to complement the global picture. Note that for applicants domiciled in European Union (EU) member states, filing at the CPVO regional office is regarded as a resident filing.

Applicants from China were the most active applicants in the world in 2019, filing 7,363 plant variety applications (figure D10). This represents a 40.1% growth on the previous year – the fastest recorded among the top 10 origins and driven by resident filings. China-based applicants were followed by applicants from the Netherlands, who filed 3,207 applications. The U.S. (2,314), France (1,035) and Germany (986) were the next three largest origins. Unlike China, France (+0.5%) and the U.S. (+0.3%) experienced only moderate growth. U.S. applicants had moderate to flat growth in both resident and non-resident filings. On the other hand, resident filings by applicants from France increased, but their non-resident filings declined. Contrary to the other top five origins, applicants from the Netherlands (–9.0%)

and Germany (–2.6%) both filed fewer applications in 2019 than in 2018. In the case of German applicants, resident filings increased, but not by enough to off-set the decline in their non-resident filings, resulting in an overall year-on-year drop in filings.

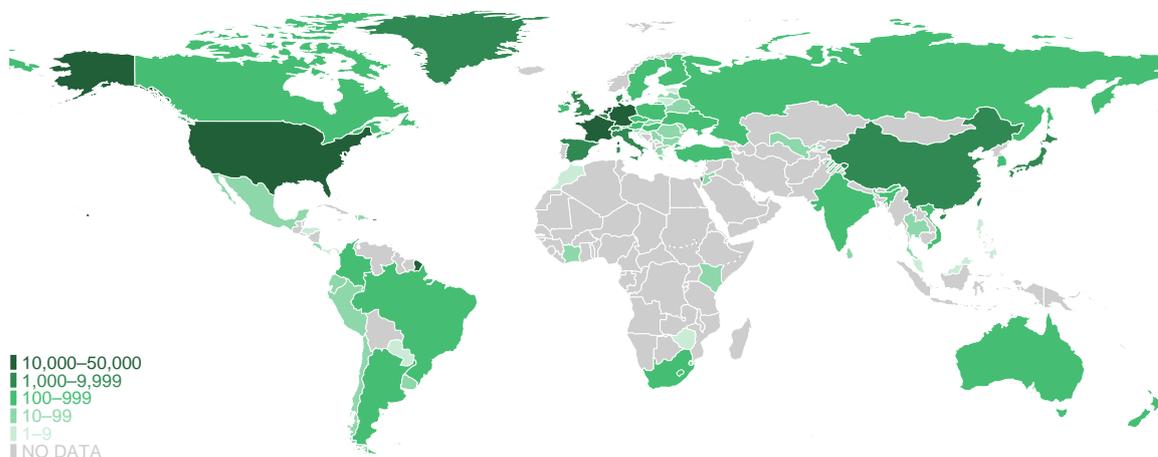
Whereas applicants from four of the top five origins filed most of their applications either abroad or at the regional office, applicants from China were the only ones to file almost exclusively at home. Like with China, applicants from Japan, the Republic of Korea, the Russian Federation and Ukraine also filed predominantly at their home offices.

Equivalent count

Origin data are compiled using two different counting methods – absolute counts and equivalent counts. The difference between the two lies in the treatment of regional offices data (the CPVO and the African Intellectual Property Organization (OAPI)). For absolute counts, an application received by a regional office is counted only once. For the equivalent count, a single application filed at a regional office is equivalent to multiple applications. To calculate the number of equivalent applications at a regional office in 2019, each application has been multiplied by the corresponding number of member states for the regional office concerned. For CPVO applications, if the applicant resided in one of the 28 EU member states, the application was counted as one resident filing and 27 filings abroad. If the applicant did not reside in an EU member state, the application was counted as 28 filings abroad. The same methodology was applied to OAPI member states.

Applicants from the Netherlands were first by equivalent count

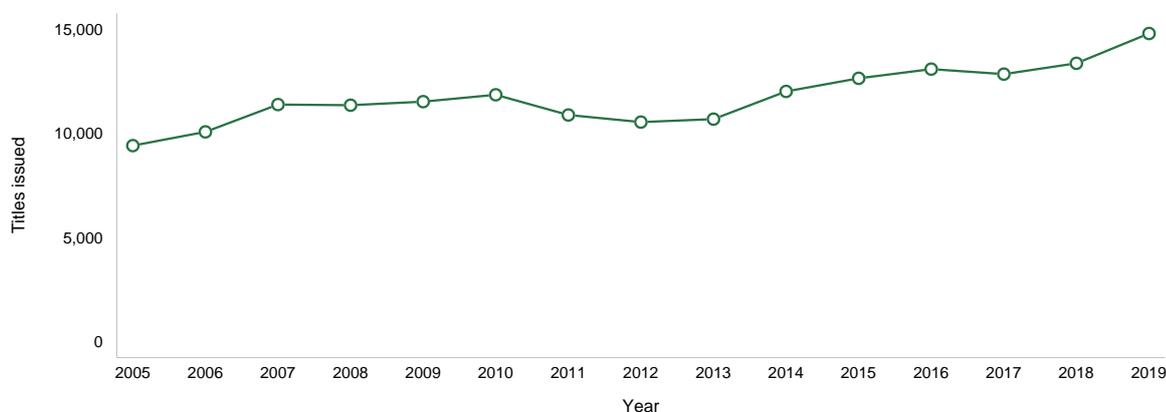
4.5. Equivalent plant variety applications by origin, 2019



Source: Figure D9.

Plant variety titles issued increased by 10.7% in 2019

4.6. Plant variety titles issued worldwide, 2005–2019



Source: Figure D2.

Equivalent counts take multiple members of the regional office into account. One would expect to see those country origins whose applicants filed intensively at the CPVO move up the ranking when this counting method is applied (map 4.5). Not surprisingly, therefore, European countries and the U.S. topped the list of origins based on equivalent counts. Applicants from the Netherlands once again ranked first, with 36,012 equivalent applications filed worldwide. They were followed by applicants from Germany (14,675), France (13,887) and the U.S. (11,918). Rounding out the top five origins by equivalent count was China, with 7,643 applications.

China was the only non-European country to be found among the top 10 origins, despite only 1.7% of its applicants' filings being equivalent filings abroad. This is in marked contrast to the Netherlands, for which the abroad share was 95%.

The number of titles issued shows continued growth

The total number of plant variety titles issued increased by 10.7% in 2019, the fastest growth in titles issued since 2014. The 14,790 plant variety titles issued in

2019 is the highest number ever recorded (figure 4.6). The CPVO, the primary driver of global growth, issued the most titles with 3,188, a year-on-year increase of 15.6%. China issued 2,727 titles, up 13.9% from a year earlier. The CPVO and the China office were followed by the offices of the U.S. (1,785), Ukraine (1,188) and the Russian Federation (796), all three of which had double digit growth compared to the previous year (Russian Federation +46.3%, U.S. +25.4%, Ukraine +16.4).

The grant or registration process takes time, so fluctuations in the volumes of plant variety titles granted may reflect changes in processing capacities or procedural delays.

Steady growth in plant varieties in force

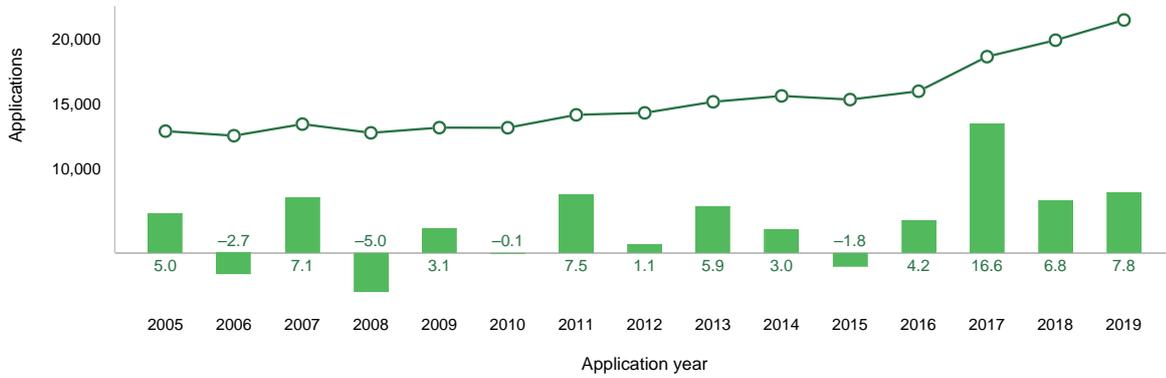
Around 140,980 plant variety titles were in force at the end of 2019, up 7.1% on 2018. The CPVO (28,230) and the U.S. (26,441) were the two offices with the highest number of active titles (figure D15). Other offices maintaining at least 5,000 active titles included China (12,917), Ukraine (10,212), the Netherlands (8,916), Japan (8,730), the Russian Federation (5,885) and the Republic of Korea (5,694).

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Plant variety applications and titles issued worldwide

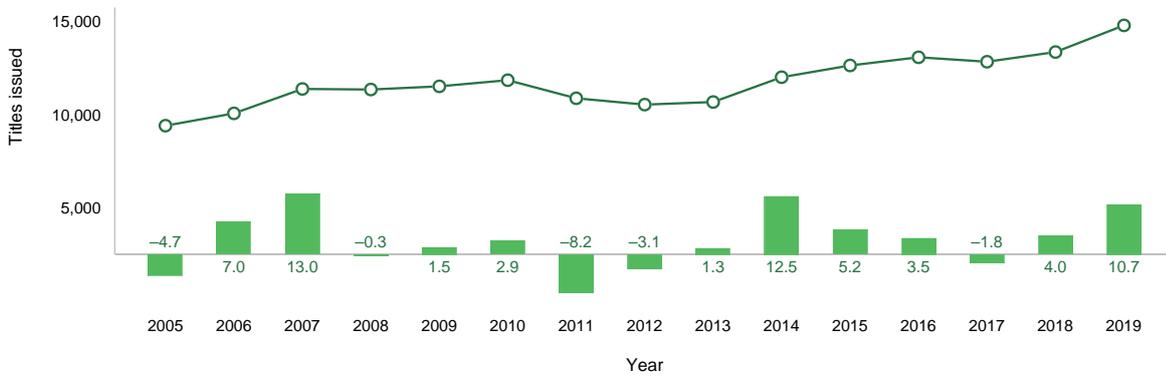
D1. Trend in plant variety applications worldwide, 2005–2019



■ APPLICATIONS ■ GROWTH RATE (%)

Note: World totals are WIPO estimates using data covering 70 offices.
Source: WIPO Statistics Database, September 2020.

D2. Trend in plant variety titles issued worldwide, 2005–2019



■ TITLES ISSUED ■ GROWTH RATE (%)

Note: World totals are WIPO estimates using data covering 70 offices.
Source: WIPO Statistics Database, September 2020.

Plant variety applications and titles issued by office

D3. Plant variety applications by income group, 2009 and 2019

Income group	Number of applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
High-income	8,440	9,247	69.5	69.0	64.0	43.1	0.9
Upper middle-income	3,020	10,453	70.3	82.4	22.9	48.8	13.2
Lower middle-income	1,716	1,718	49.0	42.0	13.0	8.0	0.0
Low-income	4	12	0.0	16.7	0.0	0.1	11.6
World	13,180	21,430	67.0	73.3	100.0	100.0	5.0

Note: Totals by income group are WIPO estimates using data covering 70 offices. Each category includes the following number of offices: high-income countries/economies (38), upper middle-income (20), lower middle-income (11) and low-income (1). The EU's Community Plant Variety Office (CPVO) data are allocated to the high-income group, because a majority of EU member states are high-income countries. For information on income group classification, see the data description section.

Source: WIPO Statistics Database, September 2020.

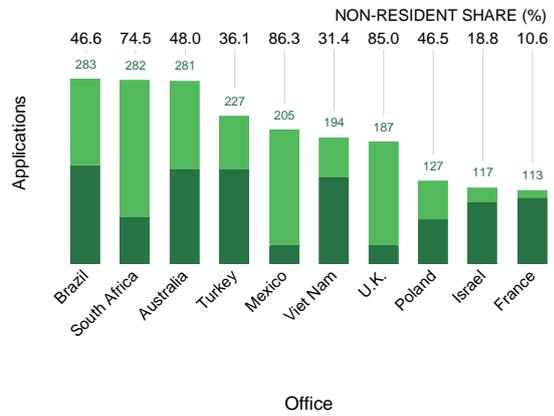
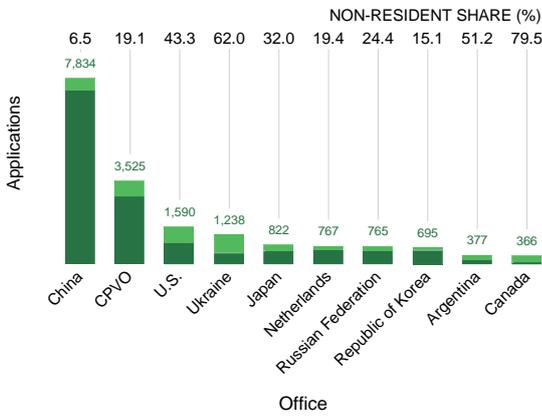
D4. Plant variety applications by region, 2009 and 2019

Region	Number of applications		Resident share (%)		Share of world total (%)		Average growth (%)
	2009	2019	2009	2019	2009	2019	2009–2019
Africa	339	459	28.0	20.3	2.6	2.1	3.1
Asia	2,962	10,004	81.8	89.4	22.5	46.7	12.9
Europe	6,509	7,302	71.1	69.2	49.4	34.1	1.2
Latin America and the Caribbean	1,078	1,327	52.7	35.7	8.2	6.2	2.1
North America	1,772	1,956	48.3	49.9	13.4	9.1	1.0
Oceania	520	382	49.0	47.6	3.9	1.8	-3.0
World	13,180	21,430	67.0	73.3	100.0	100.0	5.0

Note: Totals by geographical region are WIPO estimates using data covering 70 offices. Each region includes the following number of offices: Africa (6), Asia (12), Europe (33), Latin America and the Caribbean (14), North America (3) and Oceania (2).

Source: WIPO Statistics Database, September 2020.

D5. Plant variety applications for the top 20 offices, 2019



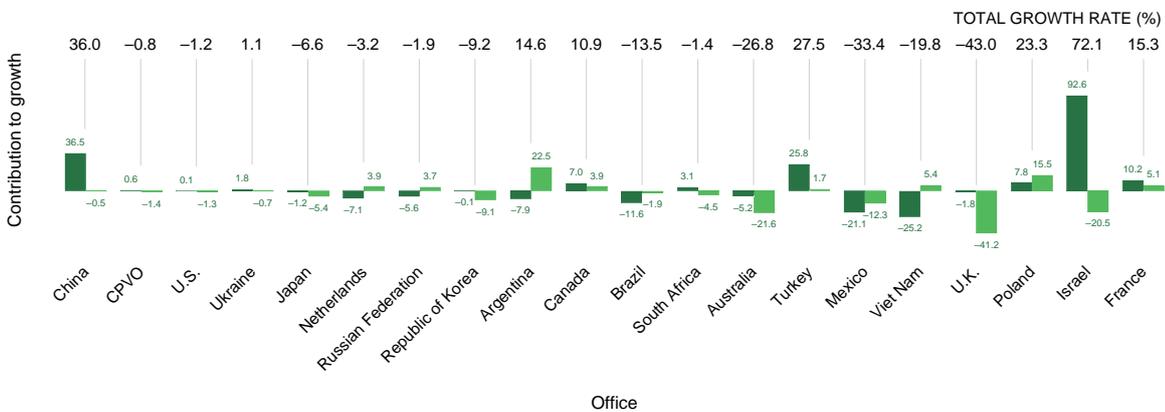
■ RESIDENT ■ NON-RESIDENT

■ RESIDENT ■ NON-RESIDENT

Note: CPVO is the Community Plant Variety Office. In general, national offices of CPVO member states receive lower volumes of applications, because applicants may apply via the CPVO to seek protection within any CPVO member state.

Source: WIPO Statistics Database, September 2020.

D6. Contribution of resident and non-resident applications to total growth for the top 20 offices, 2018–2019

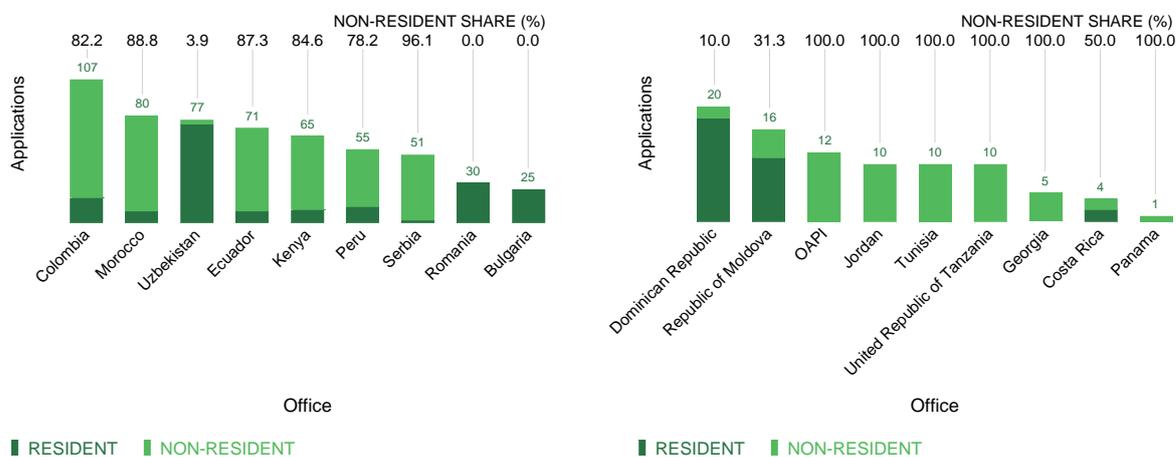


■ CONTRIBUTION OF RESIDENT APPLICATIONS ■ CONTRIBUTION OF NON-RESIDENT APPLICATIONS

Note: CPVO is the Community Plant Variety Office. This figure shows total growth in plant variety applications broken down by the respective contributions of resident and non-resident filings. For example, applications in Poland grew by 23.3%, and resident applications contributed 7.8 percentage points to this total growth, while non-resident applications accounted for the other 15.5 percentage points.

Source: WIPO Statistics Database, September 2020.

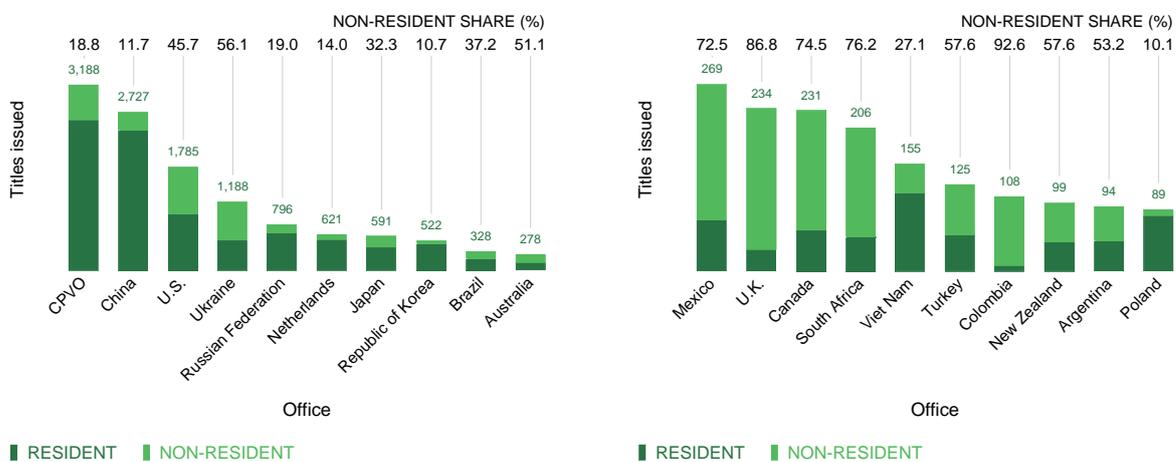
D7. Plant variety applications for offices of selected low- and middle-income countries, 2019



Note: OAPI is the African Intellectual Property Organization. The selected offices are from different world regions and income groups. Where available, data for all offices can be found in the statistical table at the end of this section.

Source: WIPO Statistics Database, September 2020.

D8. Plant variety titles issued by the top 20 offices, 2019

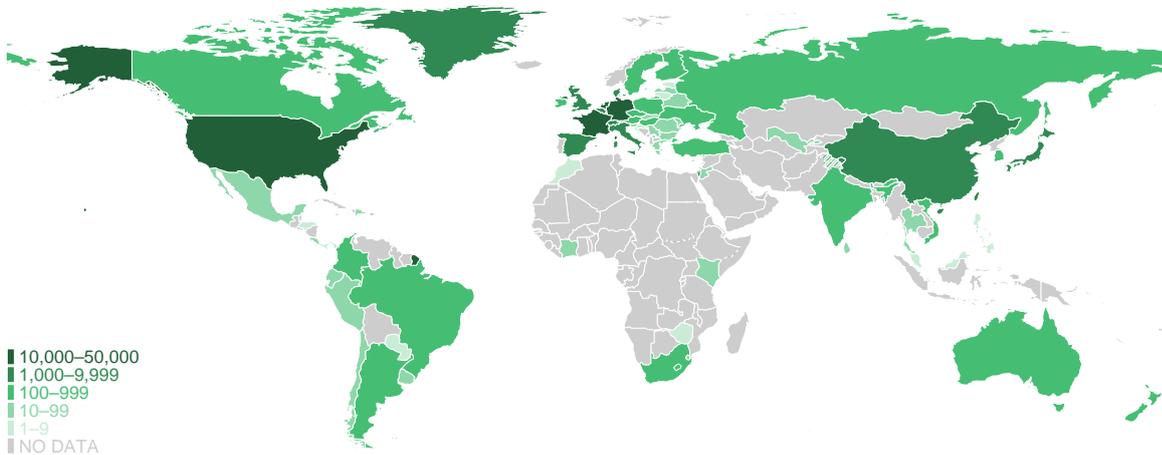


Note: CPVO is the Community Plant Variety Office. The procedure for issuing titles varies across offices, and factors such as examination capacity and procedural delays, mean that there are differences in the time lag between application and title issue dates. For this reason, data on applications for a given year should not be compared with data on titles issued for the same year.

Source: WIPO Statistics Database, September 2020.

Plant variety applications and titles issued by origin

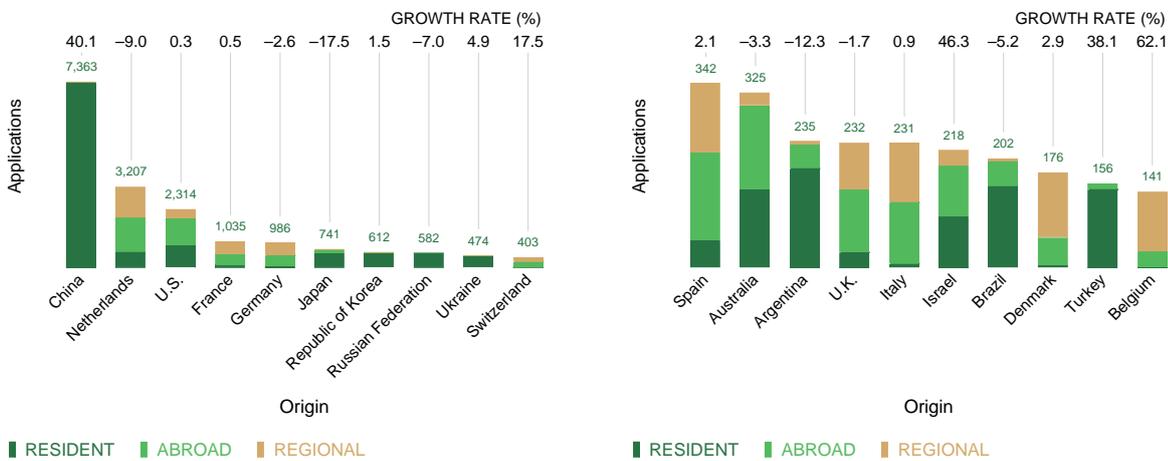
D9. Equivalent plant variety applications by origin, 2019



Note: Equivalent plant variety applications by origin include resident applications and applications filed abroad. The origin of an application is determined by the residence of the applicant. Applications filed at regional offices are considered equivalent to multiple applications in the relevant member states. See the glossary for the definition of equivalent application.

Source: WIPO Statistics Database, September 2020.

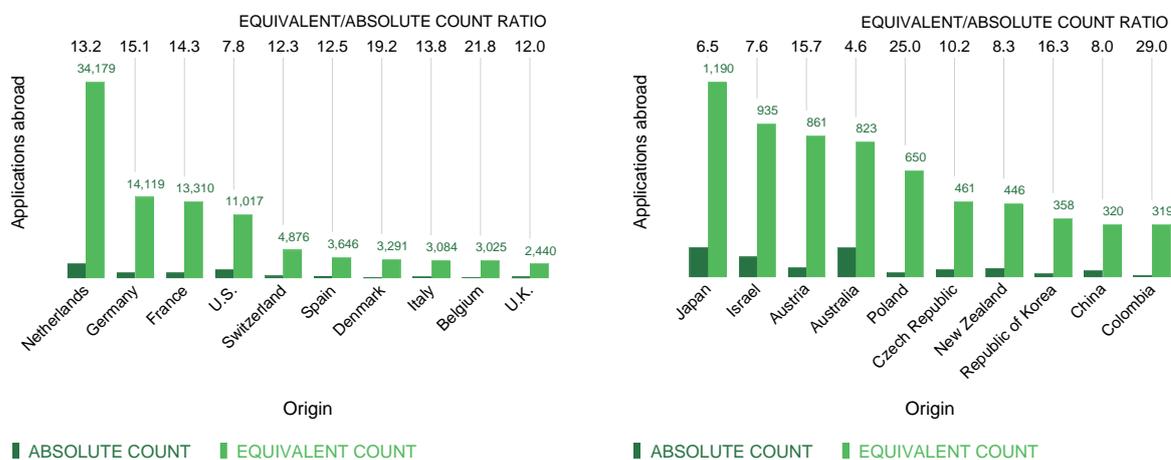
D10. Plant variety applications for the top 20 origins, 2019



Note: Data are based on absolute count, not equivalent count. Applications by origin include resident applications and applications filed abroad. The origin of an application is determined by the residence of the applicant. Regional refers to applications filed at the EU's Community Plant Variety Office.

Source: WIPO Statistics Database, September 2020.

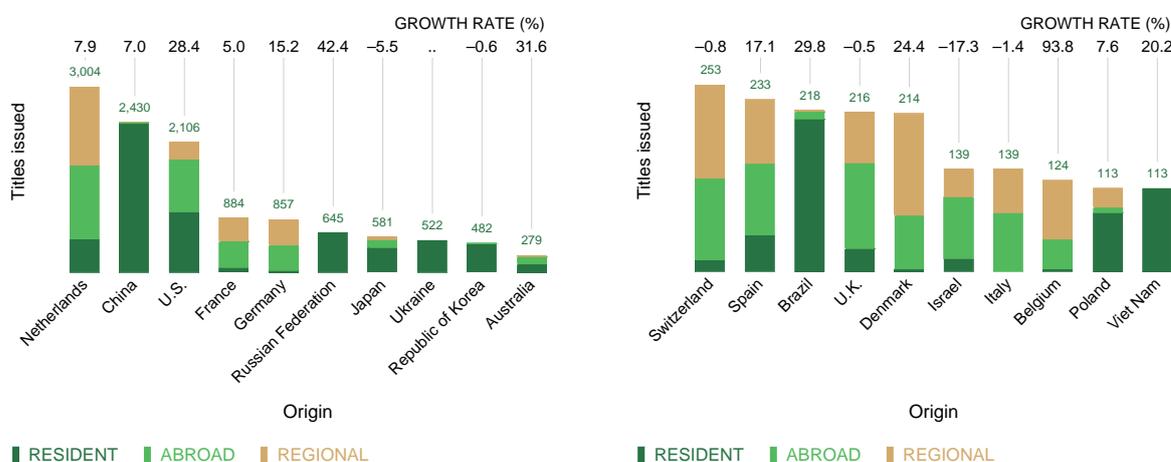
D11. Plant variety applications abroad for the top 20 origins, 2019



Note: The origin of an application is determined by the residence of the applicant. Applications filed at regional offices are considered equivalent to multiple applications in the relevant member states. See the glossary for the definition of equivalent applications.

Source: WIPO Statistics Database, September 2020.

D12. Plant variety titles issued for the top 20 origins, 2019

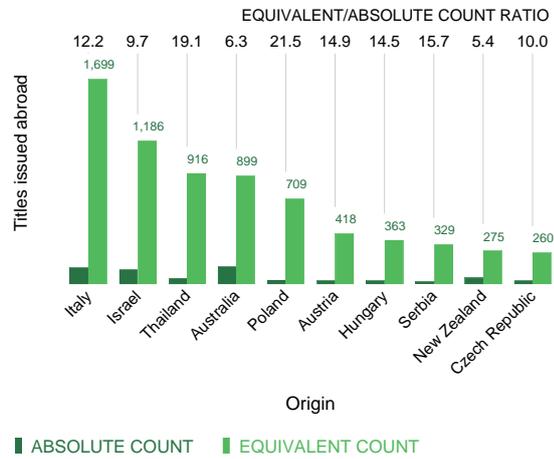
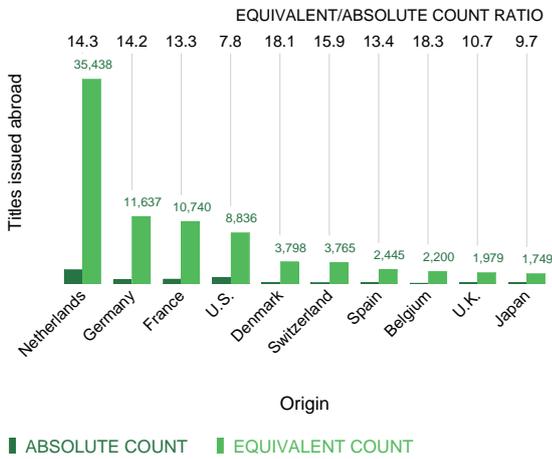


Note: Data are based on absolute count, not equivalent count. The origin of titles issued is determined by the residence of the applicant. Regional refers to titles issued by the EU's Community Plant Variety Office.

.. indicates not available.

Source: WIPO Statistics Database, September 2020.

D13. Plant variety titles issued abroad for the top 20 origins, 2019



Note: The origin of titles issued is determined by the residence of the applicant. Titles issued by regional offices are considered equivalent to multiple titles in the relevant member states. See the glossary for the definition of equivalent count.

Source: WIPO Statistics Database, September 2020.

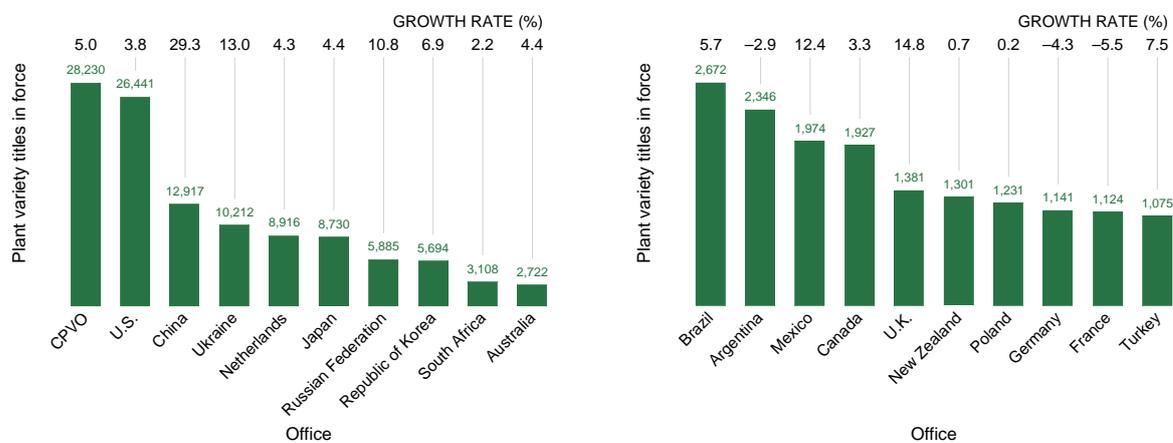
Plant varieties in force

D14. Trend in plant varieties in force worldwide, 2005–2019



Note: World totals are WIPO estimates using data covering 70 offices.
Source: WIPO Statistics Database, September 2020.

D15. Plant varieties in force at selected offices, 2019



Note: CPVO is the Community Plant Variety Office.
Source: WIPO Statistics Database, September 2020.

Statistical table

D16. Plant variety applications and titles issued by office and origin, and plant variety titles in force by office, 2019

Name	Applications by office			Applications by origin	Equivalent applications by origin	Grants by office			Plant varieties in force
	Total	Resident	Non-resident	Total	Total	Total	Resident	Non-resident	Office
African Intellectual Property Organization	12	2	10	..	..	1	0	1	23
Argentina	377	184	193	235	403	94	44	50	2,346
Australia	281	146	135	325	969	278	136	142	2,722
Austria (a)	..	..	..	55	892	..	..	..	17
Belarus (a)	..	..	..	1	29	..	..	..	..
Belgium	2	2	0	141	3,138	4	4	0	44
Bonaire, Sint Eustatius and Saba (b)	..	..	..	1	1	..	..	..	..
Brazil	283	151	132	202	342	328	206	122	2,672
Bulgaria	25	25	0	34	34	30	30	0	384
Canada	366	75	291	134	190	231	59	172	1,927
Chile	82	9	73	21	49	78	7	71	879
China	7,834	7,323	511	7,363	7,643	2,727	2,409	318	12,917
Colombia	107	19	88	30	338	108	8	100	641
Community Plant Variety Office	3,525	2,853	672	n.a.	..	3,188	2,588	600	28,230
Costa Rica	4	2	2	10	66	6	3	3	20
Côte d'Ivoire (b)	..	..	..	2	34	..	..	..	..
Croatia	2	2	0	7	7	5	5	0	67
Czech Republic	59	52	7	97	529	79	76	3	789
Denmark	11	5	6	176	3,416	4	4	0	66
Dominican Republic	20	18	2	18	18	..	..	..	..
Ecuador	71	9	62	12	12	75	7	68	345
Estonia	6	1	5	1	1	5	3	2	102
Eswatini (b)	..	..	..	11	11	..	..	..	..
Finland	8	7	1	13	148	8	8	0	198
France	113	101	12	1,035	13,887	85	76	9	1,124
Georgia	5	0	5	..	..	1	0	1	201
Germany	58	49	9	986	14,675	42	36	6	1,141
Greece (b)	..	..	..	1	28	..	..	..	..
Honduras (b)	..	..	..	1	1	..	..	..	..
Hungary	38	36	2	46	154	28	28	0	167
India (b)	..	..	..	8	148	..	..	..	..
Ireland	5	1	4	9	117	4	1	3	63
Israel	117	95	22	218	1,030	58	17	41	795
Italy	8	7	1	231	3,201	..	..	..	52
Japan	822	559	263	741	1,749	591	400	191	8,730
Jordan	10	0	10	27	27	4	0	4	42
Kenya	65	10	55	10	10	29	2	27	459
Kyrgyzstan (a)	..	..	..	..	..	..	..	..	5
Latvia	3	3	0	9	63	2	2	0	182
Lithuania	10	7	3	7	7	10	7	3	109
Luxembourg (b)	..	..	..	9	9	..	..	..	..
Malaysia (b)	..	..	..	1	1	..	..	..	..
Mexico	205	28	177	37	37	269	74	195	1,974
Morocco	80	9	71	9	9	62	2	60	462

Name	Applications by office			Applications by origin	Equivalent applications by origin	Grants by office			Plant varieties in force
	Total	Resident	Non-resident	Total	Total	Total	Resident	Non-resident	Office
Netherlands	767	618	149	3,207	36,012	621	534	87	8,916
New Zealand	101	36	65	90	482	99	42	57	1,301
Nicaragua (a)	..	..	..	..	..	..	..	..	16
Norway	18	0	18	..	..	22	3	19	219
Panama	1	0	1	3	3	..	..	..	19
Paraguay (a)	..	..	..	2	2	..	..	..	..
Peru	55	12	43	14	14	62	6	56	276
Philippines (b)	..	..	..	1	1	..	..	..	..
Poland	127	68	59	94	742	89	80	9	1,231
Portugal	1	0	1	..	..	..	..	..	10
Republic of Korea	695	590	105	612	948	522	466	56	5,694
Republic of Moldova	16	11	5	11	11	29	23	6	232
Romania	30	30	0	45	99	20	20	0	421
Russian Federation	765	578	187	582	582	796	645	151	5,885
Serbia	51	2	49	24	24	42	4	38	383
Singapore	3	1	2	1	1	1	1	0	6
Slovakia	13	13	0	15	42	13	13	0	370
Slovenia (a)	..	..	..	2	56	..	..	..	18
South Africa	282	72	210	104	384	206	49	157	3,108
Spain	69	50	19	342	3,825	59	50	9	363
Sri Lanka (b)	..	..	..	2	30	..	..	..	..
Sweden	2	0	2	8	197	2	1	1	98
Switzerland	54	7	47	403	4,883	70	16	54	713
Thailand (b)	..	..	..	13	13	..	..	..	..
Tunisia	10	0	10	..	..	12	0	12	183
Turkey	227	145	82	156	156	125	53	72	1,075
Ukraine	1,238	471	767	474	502	1,188	522	666	10,212
United Kingdom	187	28	159	232	2,554	234	31	203	1,381
United Republic of Tanzania	10	0	10	..	..	..	..	..	115
United States of America (PPA) (c)	1,134	515	619	n.a.	..	1,275	525	750	18,917
United States of America (PVPA)	456	386	70	2,314	11,918	510	445	65	7,524
Uruguay	68	21	47	27	27	66	15	51	619
Uzbekistan	77	74	3	74	74	36	36	0	156
Viet Nam	194	133	61	134	134	155	113	42	612
Zimbabwe (b)	..	..	..	2	2	..	..	..	..
Others/Unknown	..	..	..	3	3	..	..	..	..
Total (2019 estimates)	21,430	15,800	5,630	21,430	n.a.	14,790	8,800	3,210	140,980

(a) This office did not report data; therefore, applications by origin data may be incomplete.

(b) Is not a member of the International Union for the Protection of New Varieties of Plants (UPOV).

(c) Applications by origin are reported under United States of America (PVPA).

n.a. indicates not applicable.

.. indicates not available.

Sources: WIPO Statistics Database, September 2020.

Geographical indications

Introduction

A geographical indication (GI) is a sign identifying a good as originating from a specific geographical area and possessing a given quality, reputation or other characteristic that is essentially attributable to that geographical origin. Thus, the main function of a GI is to indicate a connection between the quality, reputation or other characteristics of a good and its territory of origin.

GIs can be protected through a variety of legal means (e.g., *sui generis* systems, trademark laws, regional system, international agreements, other national legal means, etc.). In addition, the protection of GIs at a national level is often shared among several agencies. WIPO has made major efforts to gather data from all sources, but in many instances it has not been possible to obtain data from every source. Nonetheless, these statistics offer valuable insight into how this form of IP is used in different parts of the world.

How many GIs are in force worldwide?

Data received from the 117 national/regional authorities that shared their 2019 data with WIPO reveals that an estimated 55,800 protected GIs are in existence.¹ To minimize double counting, GIs in force through the European Union (4,794 GIs in force) regional system, the African Intellectual Property Organization (6) and the Lisbon System (1,011) are counted once only,

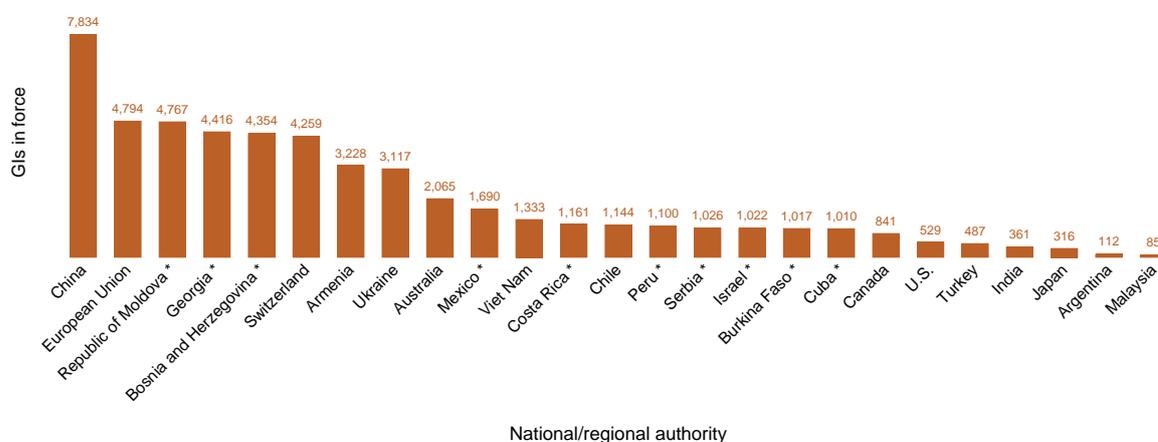
rather than multiplied by the number of member states. However, this total (around 55,800) does include some double counting as GIs in force through bilateral, plurilateral or multilateral agreements could be included multiple times.

The offices of high-income countries accounted for 45.7% of the total GIs in force in 2019, followed by the offices of the upper middle-income countries (38%) and lower middle-income countries (16.3%). In terms of regional distribution, Europe had the highest number of GIs in force across all regions, amounting to 55.9%, followed by Asia (32%), Latin America and the Caribbean (5.6%), Oceania (3.8%), North America (2.5%) and Africa (0.3%).

Figure 5.1 shows the total number of GIs in force for each selected national/regional authority, while figure 5.2 reports data on GIs in force for the EU member states. Germany had the most GIs in force (14,289) in 2019, followed by China (7,834), Hungary (6,494), the Czech Republic (6,071), Italy (5,840) and Slovakia (5,829). The high ranking achieved by EU countries is explained by the fact there are 4,794 GIs in force through the EU regional system that are in force in all EU member states. In addition, some EU member states are party to the Lisbon System – e.g., Italy – therefore GIs in force via the Lisbon System (1,011 appellations of origin, excluding refusals) are included in their total. There are several middle-income countries with a high number of GIs in force within their jurisdictions; for example, in 2019, 4,767 GIs were in force in the Republic of

China had more than 7,800 GIs in force in 2019

5.1. Geographical indications in force for selected national/regional authorities, 2019



Note: There is no registration requirement for *sui generis* protection of GIs in Switzerland. Only those denominations that are subject to registration or recognition on the basis of the instruments provided for in the Law on Agriculture and the Law on the Protection of Trademarks and Indications of Source, or of a court decision or special legislation, are counted under the national systems of protection.

* includes Lisbon data.

Source: WIPO Statistics Database, September 2020.

Moldova, 4,416 in Georgia and 4,354 in Bosnia and Herzegovina. In contrast, India (361), Malaysia (85) and Brazil (74) had considerably fewer GIs in force. This could be explained by the fact those three countries reported GIs protected via the *sui generis* system, but did not report any GIs protected through international agreements (see table 5.5).

Figure 5.3 shows the total number of GIs in force broken down by legal means of protection for selected national/regional authorities. For example, all the GIs in force in Brazil and China are protected through national systems, whereas the bulk of GIs in force in Australia (90.7%), Israel (99.9%) and Ukraine (99.2%) are protected through international agreements.

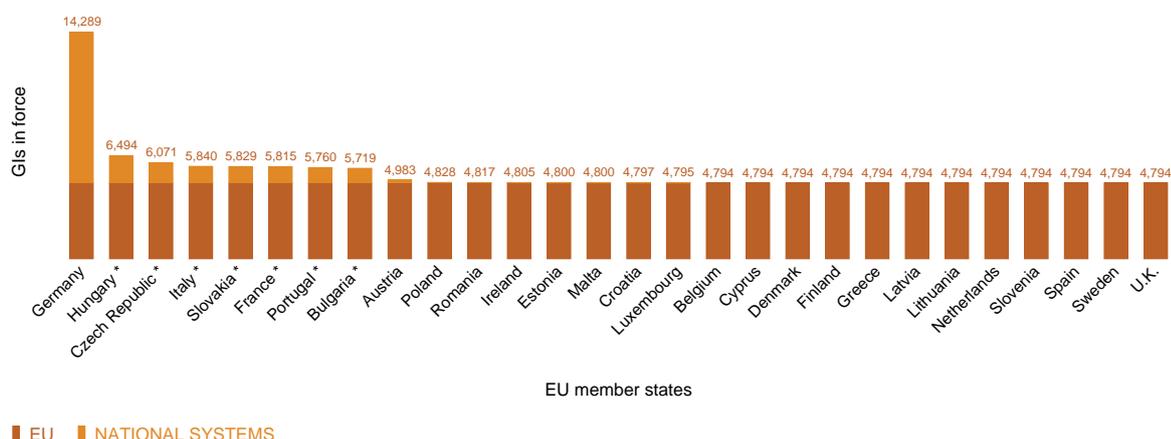
GIs in force relating to wines and spirits accounted for 56.6% of the 2019 global total, followed by agricultural products and foodstuffs (34.2%) (figure 5.4). Handicrafts accounted for 3.5% of the total. In terms of absolute numbers, China (6,834) had the highest number of GIs for agricultural products in force within its jurisdictions, followed by Hungary (2,029), Germany (1,926) and Portugal (1,807). As for the wines and spirits

category, Germany had the highest (12,274), followed by Hungary (4,088), Portugal (3,805) and Bulgaria (3,773). Hungary (374), China (288), India (209) and Viet Nam (112) had a considerable number of GIs for handicrafts in force in 2019. Data for EU member states include GIs in force through the EU regional system.

The GIs in force data reported here are partial and incomplete and therefore ought to be interpreted with caution. The questionnaire underlying the data collection asked for information regarding GIs protected through *sui generis* systems, trademark systems, other national legal means, regional systems and international agreements (including GIs in force under the Lisbon System and the Madrid System). As can be seen from table 5.5, many countries did not provide statistics on the number of GIs protected through trademark systems. This might reflect the fact that these countries do not use the trademark system to protect GIs or that those countries that do use it might have difficulty identifying GIs from among all trademarks (most commonly, collective and certification trademarks). In addition, several countries could not provide data on the number of GIs protected through international agreements.

The EU regional system accounted for the bulk of GIs in force in all EU member states, except for Germany

5.2. Geographical indications in force for EU member states, 2019



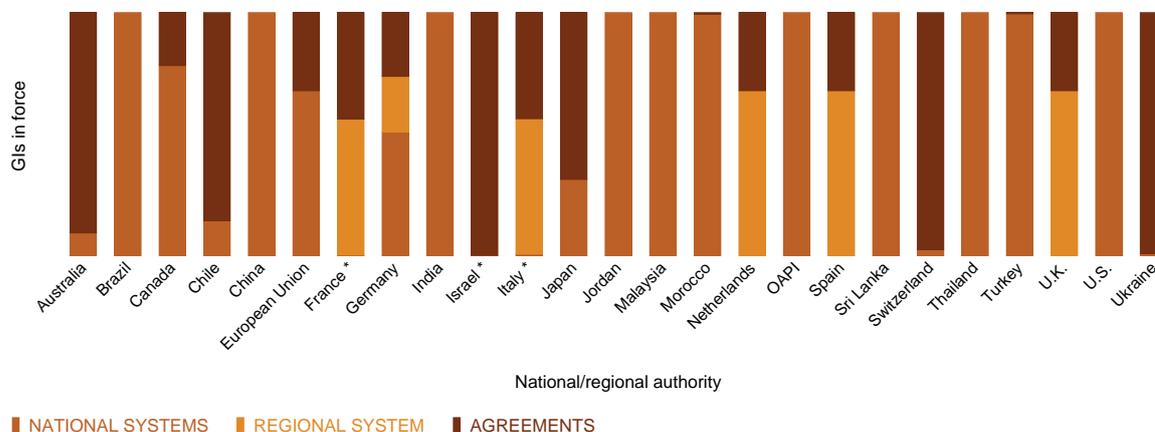
Note: This figure shows the total number of geographical indications (GIs) in force in the EU member states, broken down by GIs in force based on the EU regional systems and agreements and on national systems. The EU has regional systems for the protection of GIs covering agricultural and foodstuff products, wines and spirits.

* includes Lisbon data.

Source: WIPO Statistics Database, September 2020.

The bulk of GIs in force in Australia, Chile, Israel, Switzerland and Ukraine are protected via international agreements

5.3 Distribution of geographical indications in force by legal means of protection for selected national/regional authorities, 2019



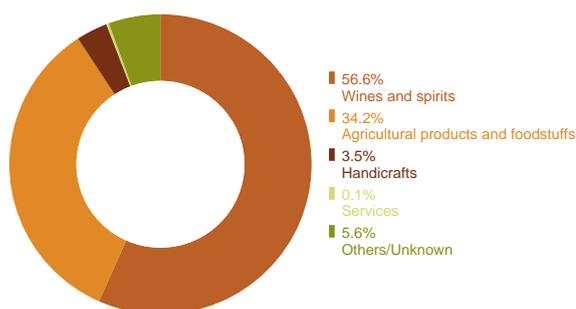
Note: OAPI is the African Intellectual Property Organization. There is no registration requirement for *sui generis* protection of GIs in Switzerland. Only those denominations that are subject to registration or recognition on the basis of the instruments provided for in the Law on Agriculture and the Law on the Protection of Trademarks and Indications of Source, or of a court decision or special legislation, are counted under the national systems of protection.

* includes Lisbon data.

Source: WIPO Statistics Database, September 2020.

Wines and spirits accounted for 56.6% of GIs in force globally

5.4. Geographical indications in force by product category, 2019



Note: GIs in force through the regional systems – African Intellectual Property Organization and the EU – are counted once, rather than multiple times, as they are in force in all of their respective member states. This is done to minimize double counting. The distribution is based on data from the 80 jurisdictions for which 2019 data by product category are available. Data for the Czech Republic, France and Italy, as well as Lisbon System data, are not available by product category, therefore not included in the graph.

Source: WIPO Statistics Database, September 2020.

France remains the biggest user of the Lisbon System

As of 2019, the Lisbon System consists of 29 member countries, seven of whom are EU members. Furthermore, on February 26, 2020, the Geneva Act of the Lisbon Agreement entered into force.

In 2019, there were 1,011 appellations of origin (AO) in force via the Lisbon System (figure 5.6). This is similar to the previous year's total. France remains the biggest user of the Lisbon System. It accounted for over a half (50.3%) of the 2019 total, followed by Italy (17.3%), the Czech Republic (7.4%), the Islamic Republic of Iran (6.3%) and Bulgaria (3.3%). The 2019 shares for each of these origins are similar to what they were in 2018.

5.5. Geographical indications in force in 2019

National/regional authority	Total	<i>Sui generis</i>	Trademarks	Other national legal means	Regional system	Agreements	Unknown
African Intellectual Property Organization	6	6	..	..	..	..	..
Albania (a)	13	..	..	13	..	..	..
Andorra	7	4	2	..	..	1	..
Argentina	112	..	..	..	..	..	..
Armenia	3,228	8	..	..	..	3,220	..
Australia	2,065	116	77	..	..	1,872	..
Austria	4,983	..	..	..	3,250	1,733	35
Azerbaijan	41	..	41	..	..	..	..
Bangladesh	3	3	..	..	..	..	..
Belarus	37	35	2	..	..	..	..
Belgium	4,794	..	..	..	3,250	1,544	..
Bolivia (Plurinational State of)	37	9	28	..	..	..	..
Bosnia and Herzegovina (b)	4,354	13	..	..	..	4,341	..
Botswana (a)	1	..	..	1	..	..	..
Brazil	74	74	..	..	..	..	..
Bulgaria (b)	5,719	42	..	..	3,250	2,427	..
Burkina Faso (b)	1,017	..	..	..	6	1,011	..
Burundi	6	..	..	..	6	..	..
Cambodia	3	3	..	..	..	..	..
Cameroon	6	..	..	..	6	..	..
Canada	841	657	..	..	..	184	..
Central African Republic	6	..	..	..	6	..	..
Chad	6	..	..	..	6	..	..
Chile	1144	42	..	123	..	979	..
China	7,834	2,385	5,449	..	..	..	..
China, Hong Kong SAR	50	..	50	..	..	..	..
China, Macao SAR	19	2	17	..	..	..	..
Colombia	153	153	..	..	..	..	..
Comoros	6	..	..	..	6	..	..
Congo (b)	1,017	..	..	..	6	1,011	..
Costa Rica (b)	1,161	5	..	..	..	1,156	..
Côte d'Ivoire	6	..	..	..	6	..	..
Croatia	4,797	3	..	..	3,250	1,544	..
Cuba (b)	1,010	25	..	..	..	985	..
Cyprus	4,794	..	..	..	3,250	1,544	..
Czech Republic (b)	6,071	62	..	..	3,250	2,759	..
Denmark	4,794	..	..	..	3,250	1,544	..
Dominican Republic	25	..	25	..	..	..	..
Ecuador	54	6	..	..	..	48	..
El Salvador (a)	139	96	30	..	..	13	..
Equatorial Guinea	6	..	..	..	6	..	..
Estonia	4,800	6	..	..	3,250	1,544	..
European Union	4,794	3,250	..	..	..	1,544	..
Finland	4,794	..	..	..	3,250	1,544	..
France (b)	5,815	9	..	4	3,250	2,552	..
Gabon (b)	1,017	..	..	..	6	1,011	..
Georgia (b)	4,416	48	..	..	..	4,368	..
Germany	14,289	7,276	1	..	3,250	3,762	..
Greece	4,794	..	..	..	3,250	1,544	..
Guatemala (a)	116	3	..	..	..	113	..
Guinea	6	..	..	..	6	..	..
Guinea-Bissau	6	..	..	..	6	..	..
Honduras	45	..	45	..	..	..	..
Hungary (b)	6,494	10	..	..	3,250	3,234	..
Iceland	1	1	..	..	..	..	..
India	361	361	..	..	..	..	..
Indonesia	93	93	..	..	..	..	..
Iran (Islamic Republic of) (b)	427	23	..	..	..	404	..
Ireland	4,805	11	..	..	3,250	1,544	2
Israel (b)	1,022	1	..	..	..	1,021	..
Italy (b)	5,840	36	..	..	3,250	2,554	..
Jamaica	4	3	1	..	..	..	..

National/regional authority	Total	<i>Sui generis</i>	Trademarks	Other national legal means	Regional system	Agreements	Unknown
Japan	316	99	..	..	..	217	..
Jordan	5	..	5	..	..	..	..
Kazakhstan (a)	47	47	..	..	..	..	..
Lao People's Democratic Republic (a)	2	..	..	..	..	..	..
Latvia	4,794	..	..	..	3,250	1,544	..
Liechtenstein	2	2	..	..	..	..	..
Lithuania	4,794	..	..	..	3,250	1,544	..
Luxembourg	4,795	1	..	..	3,250	1,544	..
Malaysia	85	85	..	..	..	..	..
Mali	7	..	..	1	6	..	..
Malta	4,800	3	..	3	3,250	1,544	..
Mauritania	6	..	..	..	6	..	..
Mexico (b)	1,690	17	..	..	..	1,673	..
Montenegro (b)	1,012	7	..	..	..	1,005	..
Morocco	129	74	54	..	..	1	..
Mozambique	3	..	..	3	..	..	..
Netherlands	4,794	..	..	..	3,250	1,544	..
New Zealand	21	21	..	..	..	..	..
Niger	6	..	..	..	6	..	..
Norway	32	32	..	..	..	..	..
Panama	122	122	..	..	..	..	..
Peru (b)	1,100	10	..	..	..	1,090	..
Poland	4,828	34	..	..	3,250	1,544	..
Portugal (b)	5,760	22	..	..	3,250	2,488	..
Republic of Moldova (b)	4,767	22	..	..	..	4,745	..
Romania	4,817	23	..	..	3,250	1,544	..
Russian Federation	329	228	..	..	..	101	..
Senegal	6	..	..	..	6	..	..
Serbia (b)	1,026	84	3	..	..	939	..
Slovakia (b)	5,829	22	..	..	3,250	2,557	..
Slovenia	4,794	..	..	..	3,250	1,544	..
Spain	4,794	..	..	..	3,250	1,544	..
Sri Lanka	4	..	4	..	..	..	..
Sweden	4,794	..	..	..	3,250	1,544	..
Switzerland	4,259	104	..	2	..	4,153	..
Thailand	133	133	..	..	..	..	..
Togo (b)	1,017	..	..	..	6	1,011	..
Trinidad and Tobago	1	1	..	..	..	..	..
Turkey	487	484	..	..	..	3	..
U.K.	4,794	..	..	..	3,250	1,544	..
U.S.	529	..	529	..	..	..	..
Ukraine	3,117	26	..	..	..	3,091	..
Viet Nam	1,333	79	1,254	..	..	..	..
Zimbabwe	2	..	2	..	..	..	..

(a) 2018 data.

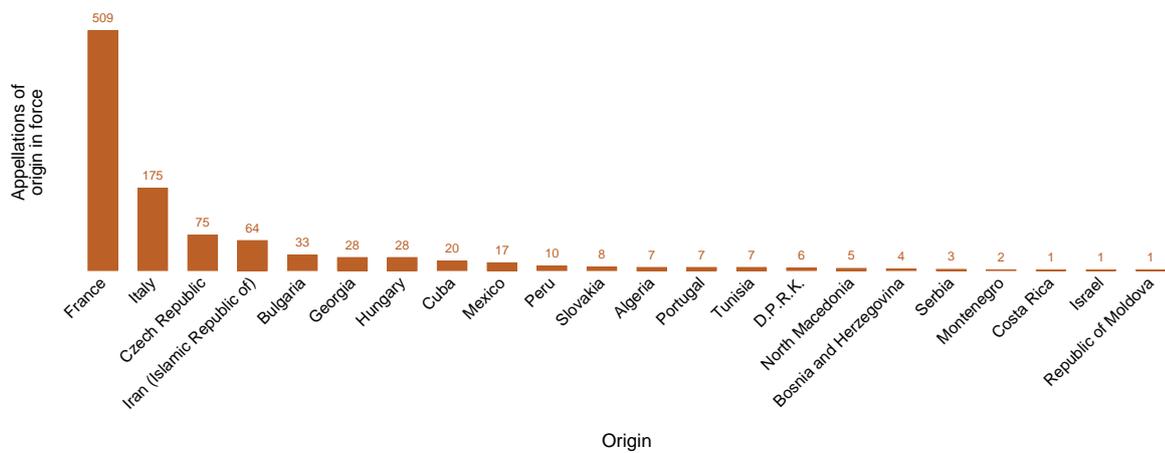
(b) Includes Lisbon data.

.. indicates zero/not available.

Note: There is no registration requirement for *sui generis* protection of GIs in Switzerland. Only those denominations that are subject to registration or recognition on the basis of the instruments provided for in the Law on Agriculture and the Law on the Protection of Trademarks and Indications of Source, or of a court decision or special legislation, are counted under the national systems of protection.

Source: WIPO Statistics Database, September 2020.

5.6. Appellations of origin in force by origin, 2019



Note: D.P.R.K. is the Democratic People's Republic of Korea.

Source: WIPO Statistics Database, September 2020.

1 Of the 117 responses, 17 authorities replied that they have no GIs in force within their jurisdictions in 2019.

Creative economy

Highlights

Introduction

This section presents creative industry data based on surveys carried out by the World Intellectual Property Organization (WIPO) in cooperation with Centro Regional para al Fomento del Libro en América Latina y el Caribe (CERLALC), the Federation of European Publishers (FEP), the International ISBN Agency and the International Publishers Association (IPA). Publishing industry data are not unified under a single authority. For this reason, data are drawn from a variety of sources so as to provide a broad perspective on the publishing industry in any particular country. This section first presents data from a publishing industry survey, followed by data from a legal deposits survey and ISBN data.

Publishing survey data

This first subsection presents data for the publishing industry provided by the 54 countries that completed the global publishing industry survey in 2020. In total, 45 national publishers' associations and copyright authorities shared their 2019 data, while a further nine associations/authorities shared their 2018 data. Data for the following three indicators is presented below: sales and licensing revenue data; titles published; and copies sold.

Sales and licensing revenue data

U.S. publishing industry revenue reached over USD 23.5 billion in 2019

The 2019 total sales and licensing revenue for the trade and the educational sectors is available for 21 countries.¹ These 21 countries generated a combined revenue of USD 67.3 billion in 2019. The United States of America (U.S.) (USD 23.5 billion) reported the largest net revenue, followed by Japan (USD 16.1 billion), the Republic of Korea (USD 6.2 billion), Germany (USD 5.6 billion), the United Kingdom (U.K.) (USD 5.4 billion) and France (USD 3 billion) (figure 6.1). Trade sector revenue accounted for 50% or more of total revenue for 16 of the 19 countries for which data by sector are available – ranging from 55.2% in Japan up to 94.8% in the Czech Republic. For the educational sector, revenue accounted for over half of total revenue in Brazil (57.9%), Mexico (74.2%) and Turkey (59.5%).

Publishing industry survey

In 2017, in collaboration with the International Publishers Association (IPA), WIPO launched a new survey of the global publishing industry.

In 2019, cooperation with the Federation of European Publishers (FEP) and Centro Regional para al Fomento del Libro en América Latina y el Caribe (CERLALC) was established and helped to reduce the burden on respondents and increase the geographical coverage of survey responses. WIPO is grateful to FEP and CERLALC for sharing their data in the implementation of the survey. WIPO has also established cooperation with the International ISBN Agency and the Nielsen Company in order to validate survey responses.

The scope of the publishing industry survey is limited to (a) the trade and educational sectors, and (b) published materials (i.e., books, monographs, etc.) issued with an ISBN, a Digital Object Identifier (DOI) or any other book identifier.

Children's books accounted for 39.7% of the trade sector revenue in New Zealand

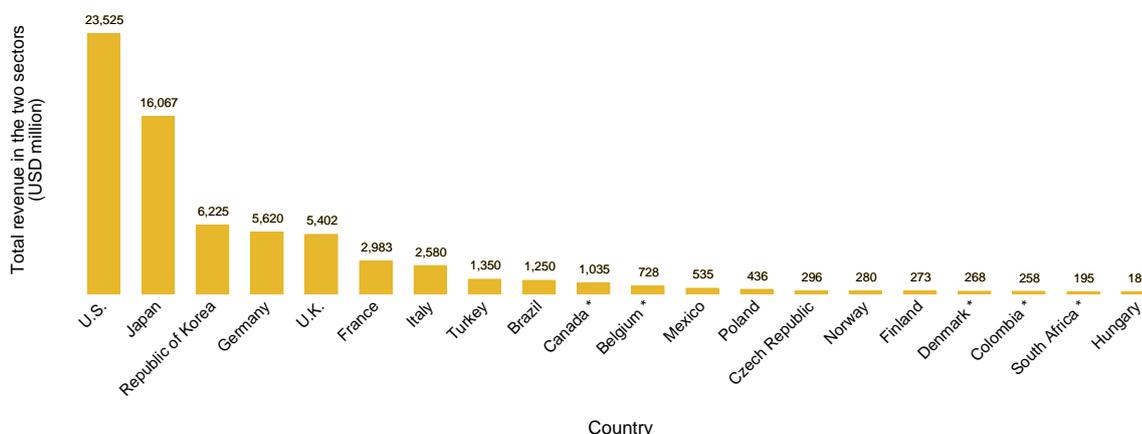
Revenue from children's books – a subsector of trade sector publishing – represented the highest share of trade sector revenue in New Zealand (39.7%), Poland (35.4%), the U.S. (29.2%) and Mexico (28.5%) (figure F2). The total revenue generated from sales of children's books is available for 13 countries and amounted to USD 6.3 billion in 2019. The U.S. reported USD 4.7 billion revenue from children's books in 2019, followed by the U.K. (USD 497 million), France (USD 393 million), Italy (USD 276.1 million) and Poland (USD 100.3 million) (figure F3).

Online sales generated more than half of trade sector revenue in Sweden and the U.K.

Trade sector revenue in 2019 is available for 21 countries. The U.S., with USD 16.2 billion, reported the largest revenue, followed by Japan (USD 8.9 billion), the Republic of Korea (USD 3.8 billion), the U.K. (USD 3.2 billion) and France (USD 2 billion) (figure F1).

Ten countries provided 2019 trade sector revenue broken down by format: print, digital and other formats. For each of these countries, print editions generated more than three-quarters of trade sector revenue. Japan (30.4%), Sweden (28.8%), Finland (26.8%) and the U.S. (19.8%) had the largest shares of digital editions in total trade sector revenue (figure F4).

6.1. Total net publishing industry revenue (USD million), 2019



* indicates 2018 data.

Note: The revenue from Italy and Hungary is at market value.

Source: Table F30.

Ten countries reported their 2019 trade sector revenue broken down by destination market. Domestic sales accounted for the bulk of total revenue for all observed countries, ranging from 67.6% in the U.K. to 99.9% in Turkey. The share of revenue from foreign sales and licensing represents a relatively high proportion of trade revenue in the U.K. (32.4%), Sweden (13.9%) and Slovenia (10.6%) (figure F5).

Seven countries provided their 2019 trade sector revenue broken down by sales channel, that is, brick and mortar, online and other categories. Online sales generated more than half of total trade sector revenue in Sweden (50.1%) and the U.K. (55.2%). The U.S. (43.5%) and Turkey (22%) also had a large proportion of their total trade sector revenue generated by online sales. However, the brick and mortar channel continues to generate the bulk of total trade sector revenue in Norway (89.3%), Japan (73.8%), New Zealand (70.5%) and Turkey (68%) (figure F6).

Foreign sales accounted for 56.8% of educational sector revenue in the U.K. in 2019

Revenue generated by the educational sector is available for 19 countries. The U.S. (USD 7.3 billion) and Japan (USD 7.2 billion) each reported a total revenue of over USD 7 billion, followed by the Republic of Korea (USD 2.5 billion) and the U.K. (USD 2.2 billion) (figure F17). Five countries reported their 2019 revenue data generated from print and digital editions. This shows

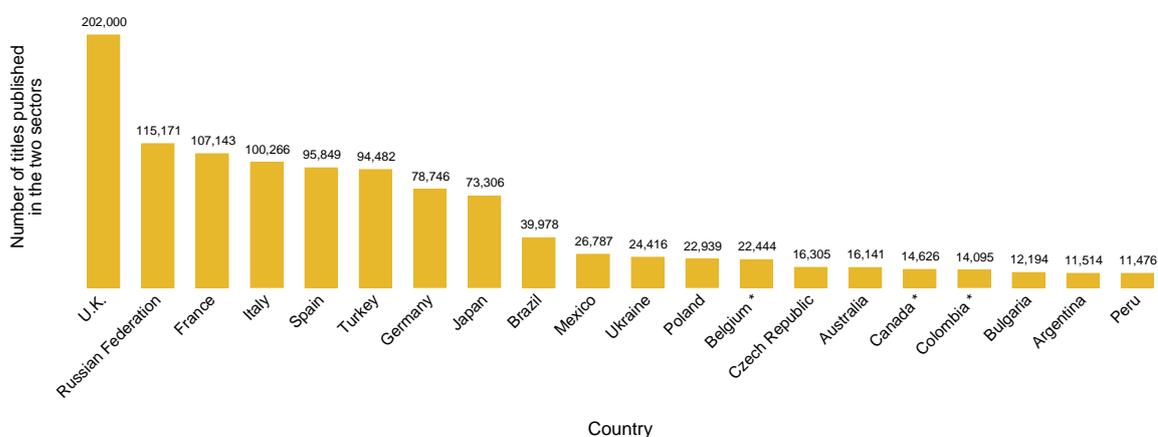
that print editions accounted for the bulk of total educational sector revenue, ranging from 64.5% in Norway up to 88.8% in New Zealand. Digital editions, on the other hand, accounted for 34.9% in Norway and 22.5% in France (figure F18). Four countries reported their 2019 educational sector revenue broken down into destination market. This shows that the U.K. (56.8%) and New Zealand (42.9%) had the largest shares of total revenue generated from the foreign market (figure F19).

Titles published

In 2019, the U.K. published around 202,000 titles covering the trade and educational sectors

Data on the total number of titles published in 2019 covering both the trade and the educational sectors are available for 38 countries. The U.K. reported a combined total of around 202,000 published titles in 2019, followed by the Russian Federation (115,171), France (107,143), Italy (100,266) and Spain (95,849) (figure 6.2). The trade sector accounted for more than half of all titles published in 31 of the 33 countries that had a by-sector breakdown available. The two exceptions are Mexico (41%) and New Zealand (23.2%), where the trade sector share is below 50%. The trade sector accounted for the bulk of published titles in Iceland (98.9%), Japan (98.1%), Italy (95.5%), the Czech Republic (95.1%), Malta (94.4%) and Spain (94%) (table F31).

6.2. Total number of titles published, 2019



* indicates 2018 data.
Source: Table F31.

Children's books accounted for 39.1% of trade sector titles published in New Zealand

Data on children's books published by the trade sector in 2019 is available for 31 countries. France (18,510) reported the highest number of children's books titles published in 2019, followed by Spain (10,052), Turkey (9,864), Italy (9,506) and the Republic of Korea (8,078) (figure F9). Children's books represented the largest share of the trade sector's published titles in New Zealand (39.1%), Malta (31.5%), Argentina (27.3%), Hungary (26.6%), Sweden (25.8%) and Mexico (25.8%) (figure F8).

Digital editions accounted for a large proportion of the trade sector titles published in Cuba, Norway and Sweden

Data on the number of titles published by the trade sector are available for 37 countries. Italy reported the highest number of titles published in 2019 (95,732), followed by Spain (90,073), France (78,224) and Japan (71,903) (figure F7). In total, 21 countries were able to disaggregate the number of titles published by their trade sector, distinguishing between print editions, digital editions and other formats. Print editions accounted for more than half of all titles published by the trade sector in most countries. Cuba (55.2%), Sweden (51.1%) and Norway (47.1%) reported the largest shares of digital editions (figure F10).

Turkey and France published the highest number of titles in the educational sector

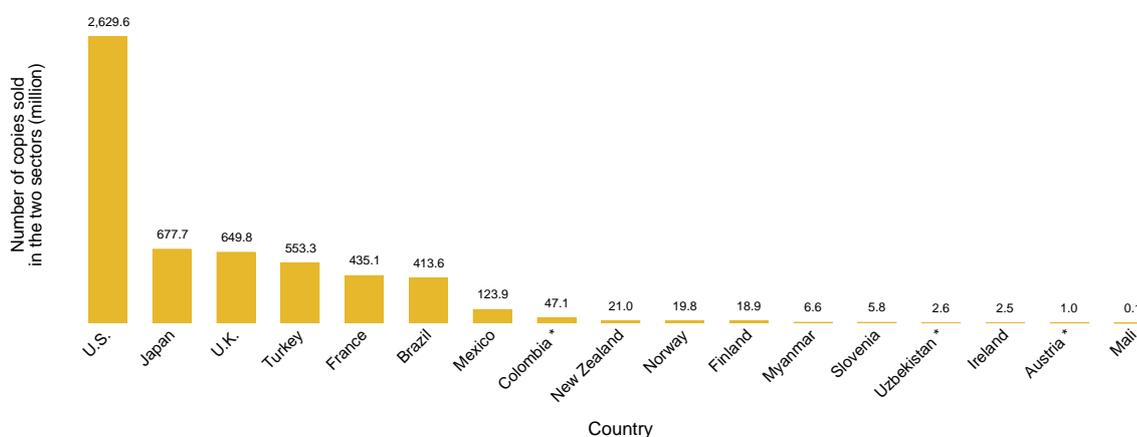
Data on the number of titles published by the educational sector are available for 34 countries. Of these, Turkey reported the highest number of titles published (30,803), followed by France (28,919), Mexico (15,808) and Brazil (12,369) (table F31). Print editions accounted for the majority of published titles in almost all countries, except for Cuba, where digital format titles accounted for 73.2% of the total educational titles. Finland (41.8%), Spain (33.6%) and Norway (30.8%) also reported high shares of digital educational titles in 2019 (figure F22).

Copies sold

The U.S. sold 2,630 million copies of published titles in 2019

Fifteen countries reported data on the total number of copies sold covering the two sectors in 2019. The U.S. reported the largest number of copies sold, amounting to 2,629.6 million copies in 2019, followed by Japan (677.7 million), the U.K. (649.8 million) and Turkey (553.3 million) (figure 6.3). The trade sector accounted for more than 80% of total copies sold in the U.S. (95.3%), Norway (86.8%) and France (80.6%). The educational sector had a high share of total copies sold in Turkey (69.9%), Mali (67.1%) and Mexico (66.1%) (table F32).

6.3. Total number of copies sold, 2019



* indicates 2018 data.
Source: Table F32.

Data on the number of copies sold in 2019 by the trade sector are available for 18 countries. The U.S. reported the highest number of copies sold in this sector (2,505.5 million), followed by Japan (542.4 million) and the U.K. (505.8 million) (figure F11). Six countries were able to disaggregate their trade sector data into formats. Digital editions accounted for almost one-third of copies sold by the trade sector in Finland (31.2%) and Sweden (29.3%) (figure F15). The 2019 data on the number of copies sold by the educational sector are available for 15 countries. Turkey (386.9 million) reported the highest number of copies sold in this sector, followed by Brazil (221.9 million), the U.K. (144 million) and Japan (135.3 million) (figure F23).

Legal deposits

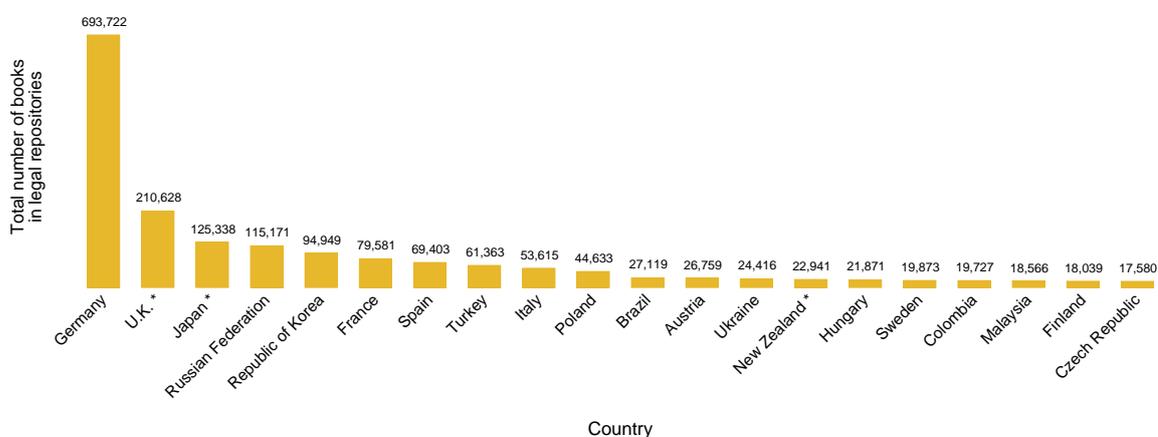
This is the second year that WIPO has conducted a legal deposits survey. This year the scope of the survey has been extended to cover the following categories: books; music sheets; music audio files and films; and videos. Legal repositories from 57 countries shared their 2019 data with WIPO.

Around 693,700 books were deposited in Germany in 2019

The highest number of books published and deposited in a national repository in 2019 was recorded by Germany (693,722),² followed by the U.K. (210,628), Japan (125,338) and the Russian Federation (115,171) (figure 6.4). It should be noted, however, that several large book markets, notably those of the U.S. and China, did not participate in the survey. Data for all available countries are presented in table F33.

Disaggregated data by format – print, digital and others – were reported by 36 countries. The largest shares of digital books in national legal deposits are in Germany (82.2%), New Zealand³ (65.3%), the U.K. (61.8%), Norway (42%) and Finland (41.3%) (figure 25). Belgium (6.8%), Singapore (9.1%) and Israel (12.2%) have low shares of digital books in legal deposits.

6.4. Number of books in legal repositories, 2019



* indicates 2018–2019 fiscal year data.
Source: Table F33.

Legal deposits

Legal deposit is a statutory obligation at the national level requiring publishers to deposit a certain number of copies of their published documents at a repository, that is, a recognized place of legal deposit. Ordinarily, national legal provisions require at least two copies to be submitted, although this varies across countries.

It should be noted that in some countries legal deposits are required only for printed books, while in others digital publications and other formats are required also. Moreover, a number of countries reported that items have undergone a process of digitization recently, which has resulted in a significant increase in digital publications in recent years (e.g., Germany and New Zealand). In some countries, there is no legal obligation to deposit e-books, although it may be done on a voluntary basis. For this reason, care should be exercised when making cross-country comparisons.

The U.K. reported the highest number of music sheets deposits in 2019

Thirty countries reported 2019 data on music sheets deposited. The U.K. reported the highest number of music sheets deposits (58,034), followed by Spain (13,572) and Germany (6,033) (figure F26). The 2019 data for music audio files are available for 33 countries. Finland reported the most music audio files deposited, amounting to 60,548, followed by Germany (24,478), Japan (12,849) and the Republic of Korea (8,645) (figure F27).

Music audio accounted for a very large proportion of total music items (music sheets and music audio) deposited in Peru (99.8%), Finland (99.5%), Japan (94.2%) and Sweden (93.7%) (figure F28).

The Republic of Korea had the highest number of films and videos deposited in 2019

Data on the number of films and videos deposited are available for 22 countries. It should be noted that some data on the visual or audiovisual items in legal deposits are collected by other than national libraries agencies. This is the case in Finland and Italy. The Republic of Korea reported the highest number of films and videos deposited in legal repositories, amounting to 18,591 items. It was followed by France (11,368), Japan (7,665), Italy (2,600) and Poland (2,177) (figure F29).

International Standard Book Number (ISBN) data

An ISBN is a permanent international standard book identifier assigned to a publication and administrated by the International ISBN Agency. ISBN data provides a good indication as to the size of the publishing market in different countries and is a means of validating data from other sources.

In 2019, the ISBN Agency shared data for 16 countries. Table 6.5 presents data on (a) the lifetime ISBNs registered and (b) the number of ISBNs registered in 2019. The U.S., with 5.2 million registered ISBNs in 2019, was by far the biggest user of the ISBN identifier in 2019, followed by the Republic of Korea (331,937), Germany (274,000), China (268,407), the U.K. (204,015), Italy (145,579) and the Russian Federation (105,856). Although ISBN data represents the number of publications, there will be some double counting, as alternative formats for the same publication (e.g., e-book, paperback and hardcover editions) will each have been assigned a separate ISBN identifier.

ISBN identifier

The ISBN identifier is the most common publication identifier in use. The ISBN system has a three-tier administrative structure – the International ISBN Agency, the registration agencies and publishers. The International ISBN Agency is the official authority appointed by the International Organization for Standardization (ISO) to supervise the global use of the ISBN Standard. There are around 150 registration agencies with unique group prefixes. These registration agencies assign unique prefixes to publishers. Publishers are responsible for assigning unique codes with allocated prefixes to their individual publications.

Publishers do, however, use other identifiers, such as Amazon Standard Identification Number (ASIN), Digital Object Identifier, and so on.

6.5. Number of ISBN registrations, 2019

Country	Lifetime ISBNs registered	ISBNs registered in 2019
Argentina	571,142	27,371
Canada (French)	477,693	12,693
China *	2,944,452	268,407
Germany	5,200,000	274,000
Italy	2,072,986	145,579
Japan	2,409,876	91,295
Netherlands	1,829,567	52,127
Nigeria	460,664	14,364
Norway	430,978	8,380
Republic of Korea	3,479,527	331,937
Russian Federation	1,729,432	105,856
Spain	2,502,621	100,647
Thailand	222,291	19,576
Turkey	844,359	68,554
U.K.	7,644,015	204,015
U.S.	36,089,124	5,225,667

* Lifetime ISBN for period 2009 until 2019 for China.
Source: WIPO Statistics Database, October 2020.

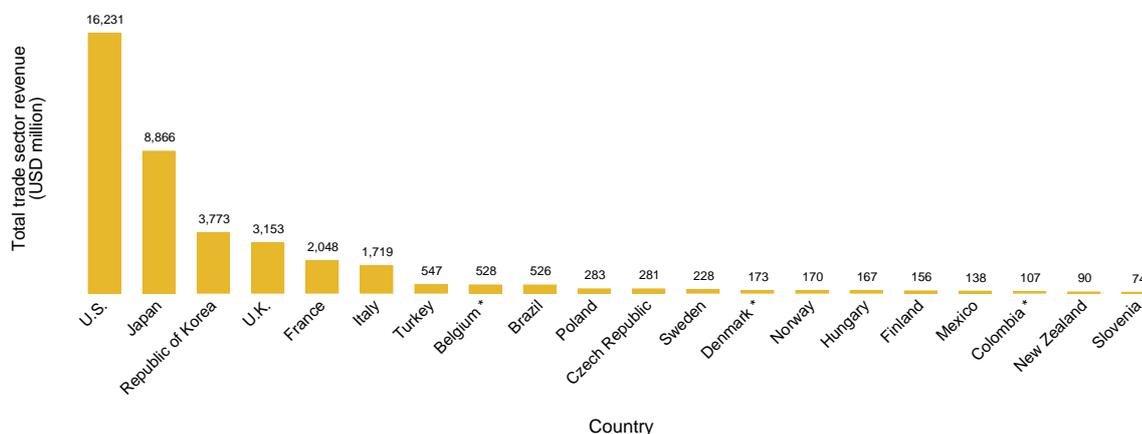
- 1 In addition, seven countries provided 2018 data, which are the latest available.
- 2 Data for Germany increased from 351,083 in 2018 to 693,722 in 2019. This is explained by the fact there was a significant digitalization of old records in 2019.
- 3 Note that the digital submissions in New Zealand include items from a single bulk digital collecting project for case law (over 11,000 items).

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Trade sector

F1. Trade sector revenue (USD million), 2019

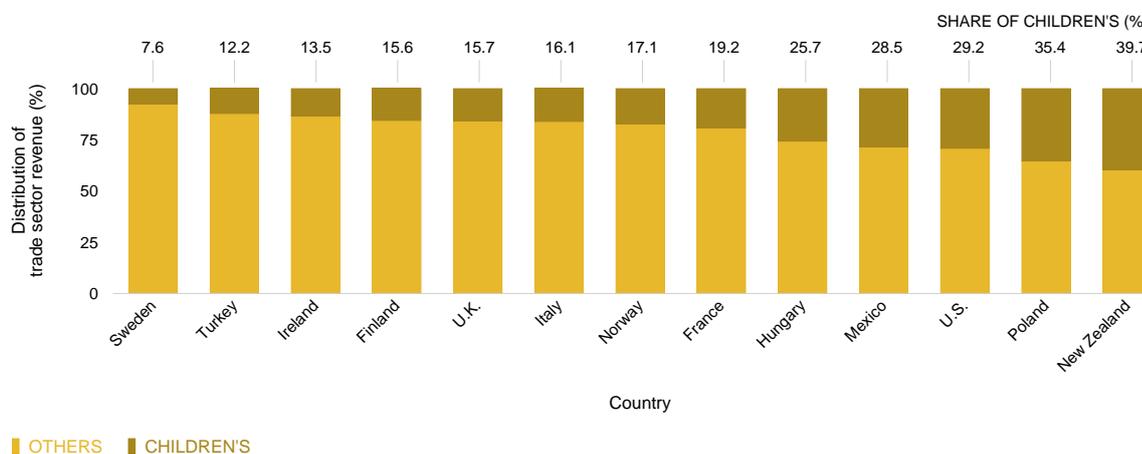


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries. The revenue from Italy and Hungary is a market value at retail prices.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

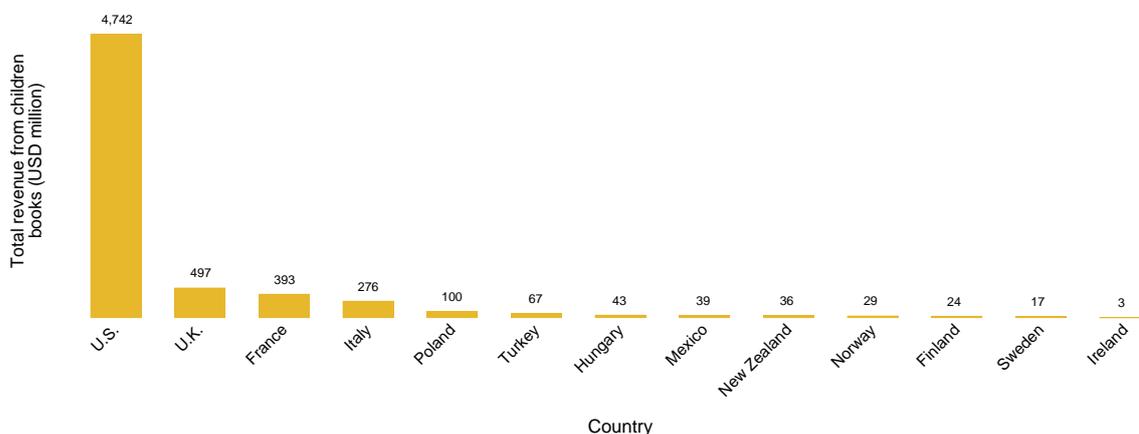
F2. Share of children's books within trade sector revenue, 2019



Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries. The revenue from Italy and Hungary is a market value at retail prices.

Source: WIPO Statistics Database, October 2020.

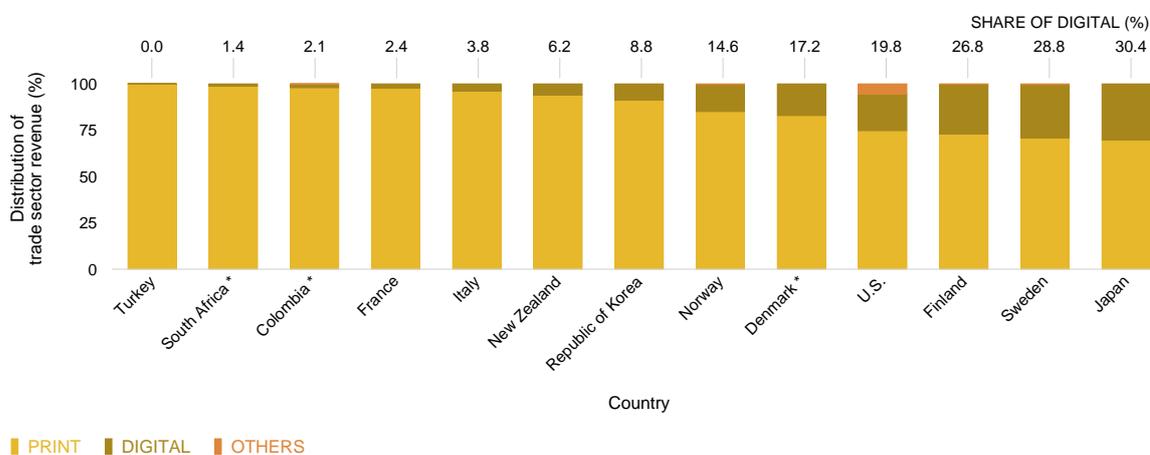
F3. Children's books revenue (USD million), 2019



Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries. The revenue from Italy and Hungary is a market value at retail prices.

Source: WIPO Statistics Database, October 2020.

F4. Distribution of trade sector revenue by format, 2019

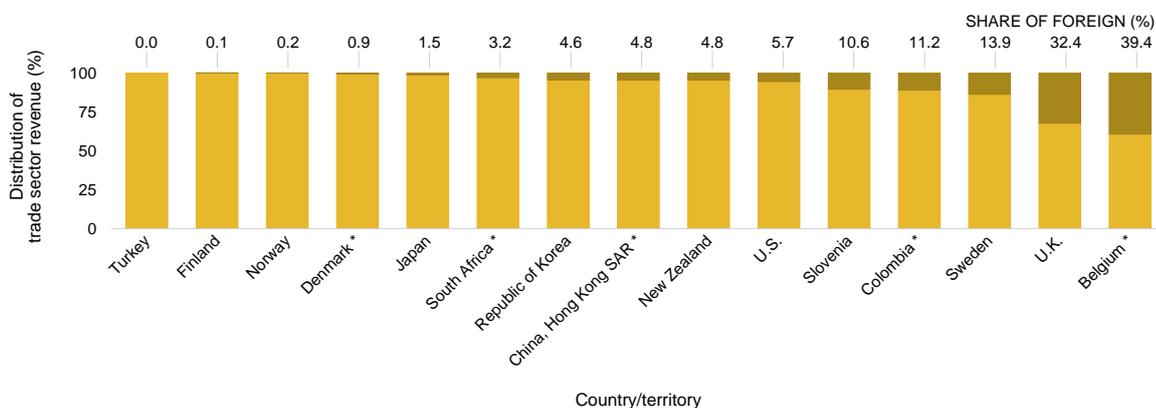


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries. The revenue from Italy is a market value at retail prices.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F5. Distribution of trade sector revenue by destination, 2019



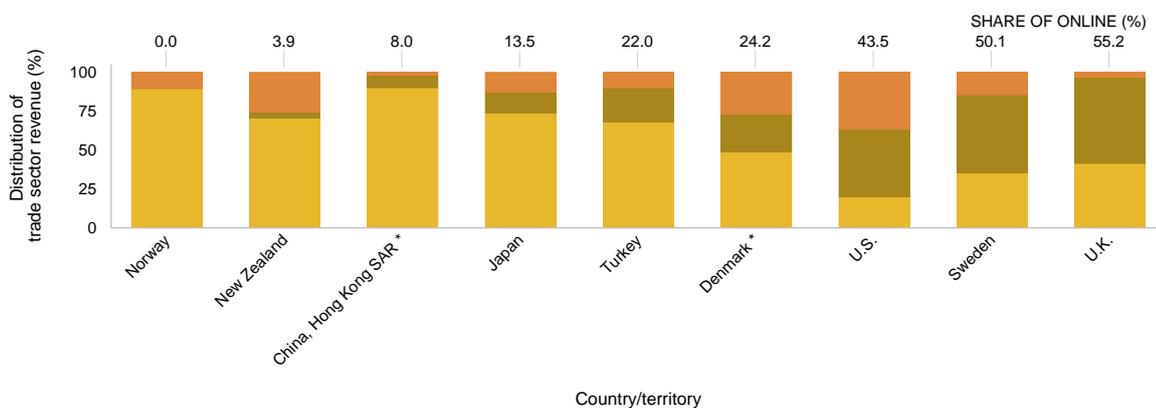
■ DOMESTIC ■ FOREIGN

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F6. Distribution of trade sector revenue by sales channel, 2019



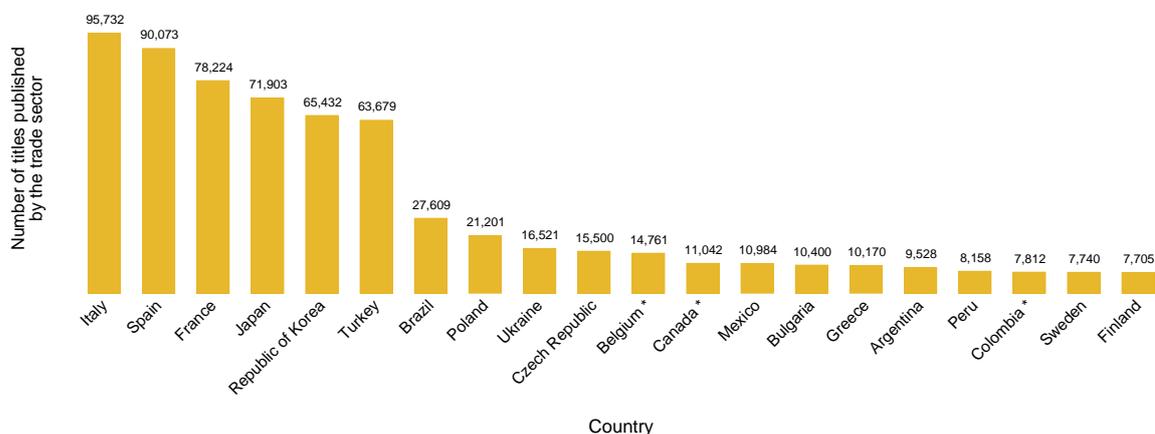
■ BRICK AND MORTAR ■ ONLINE ■ OTHERS

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F7. Number of titles published by the trade sector, 2019

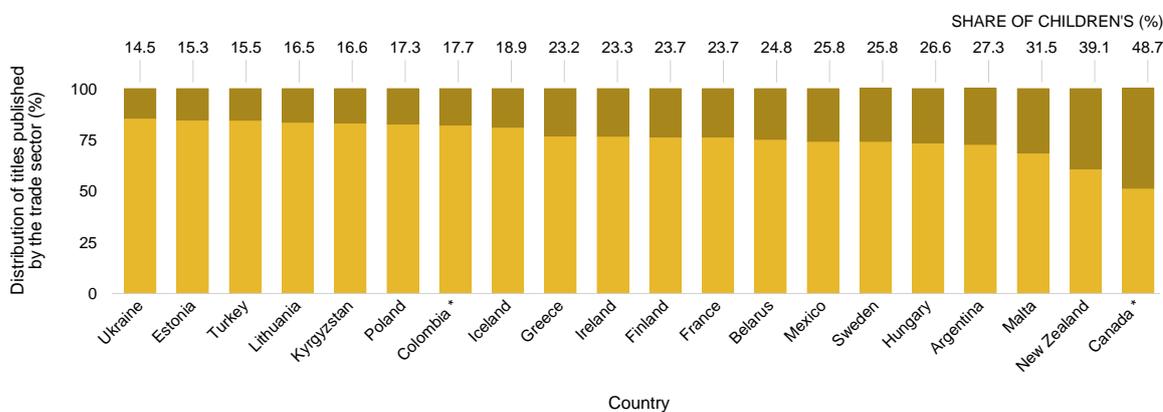


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F8. Share of children's books in the number of titles published by the trade sector, 2019



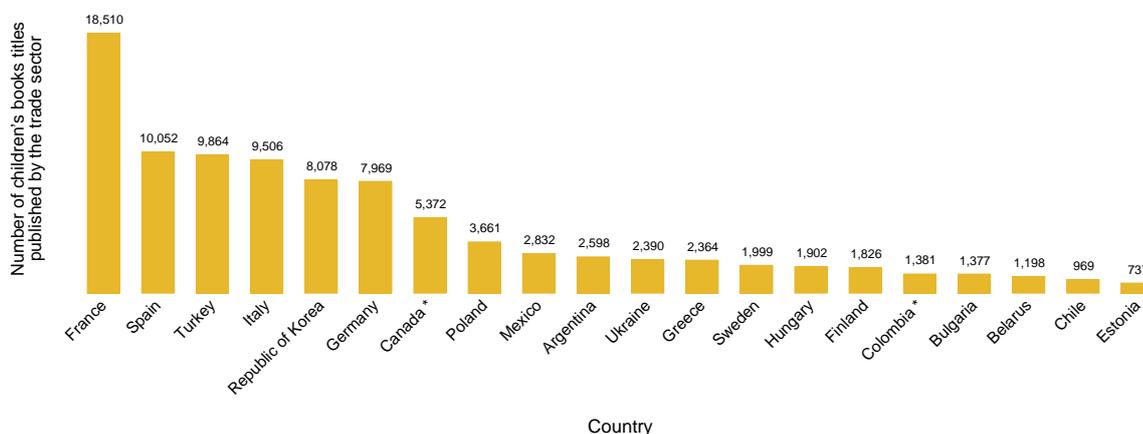
■ OTHERS ■ CHILDREN'S

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F9. Number of children's books titles published by the trade sector, 2019

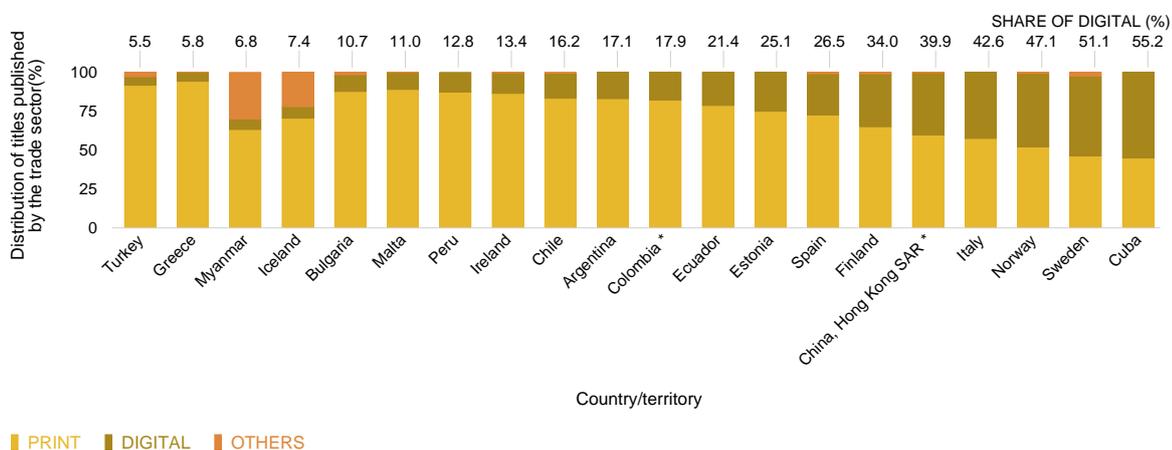


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F10. Distribution of titles published by the trade sector by format, 2019

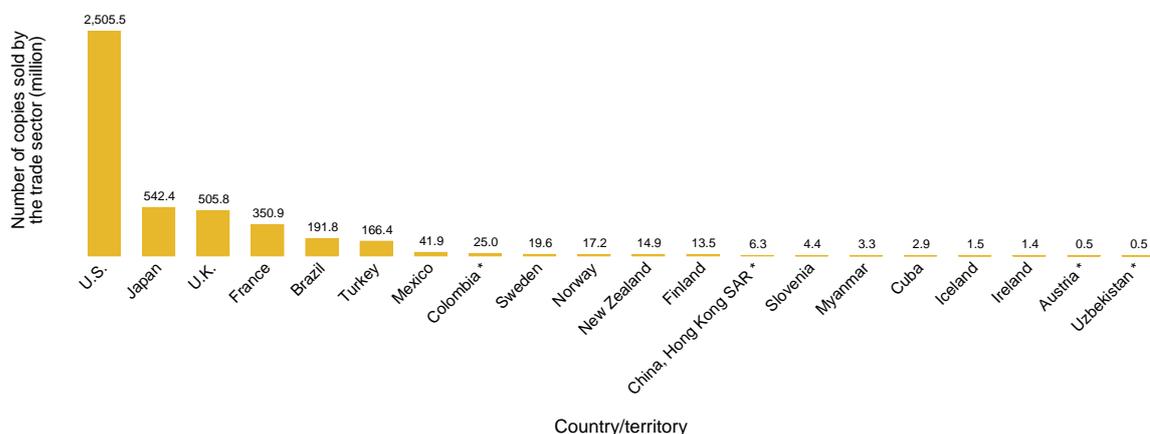


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F11. Number of copies sold by the trade sector, 2019

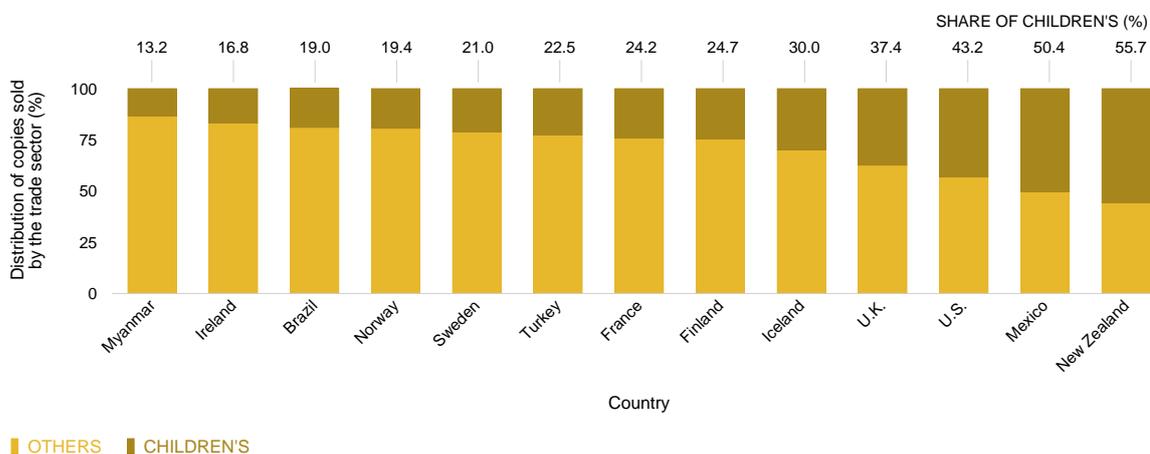


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

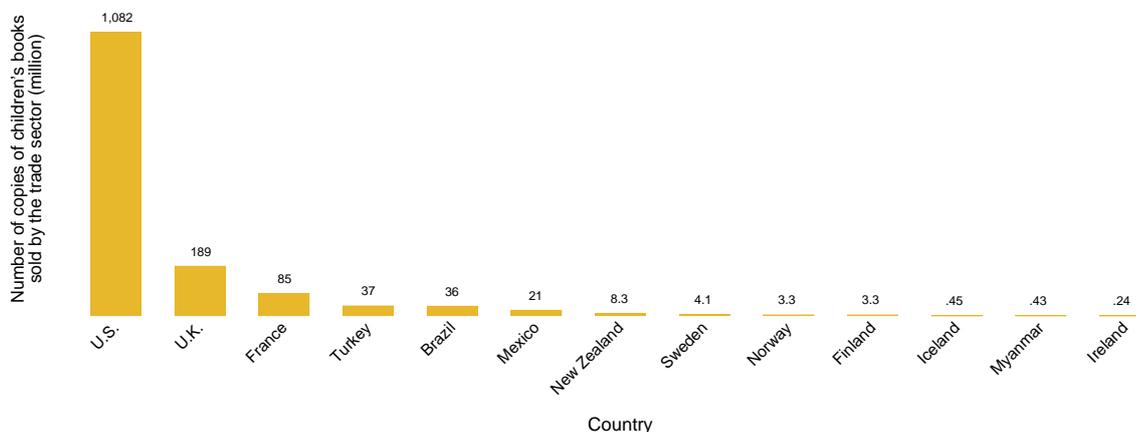
F12. Share of children's books in the number of copies sold by the trade sector, 2019



Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

Source: WIPO Statistics Database, October 2020.

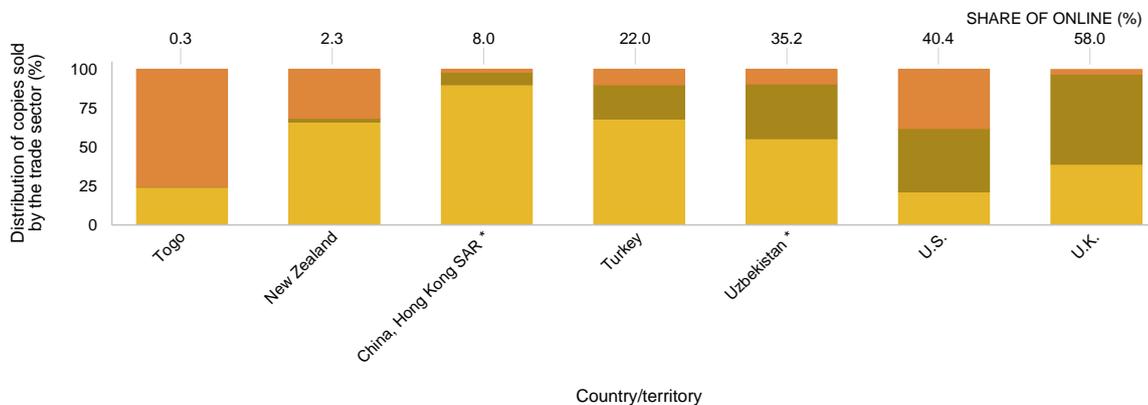
F13. Number of copies of children's books sold by the trade sector, 2019



Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

Source: WIPO Statistics Database, October 2020.

F14. Distribution of copies sold by sales channel for the trade sector, 2019



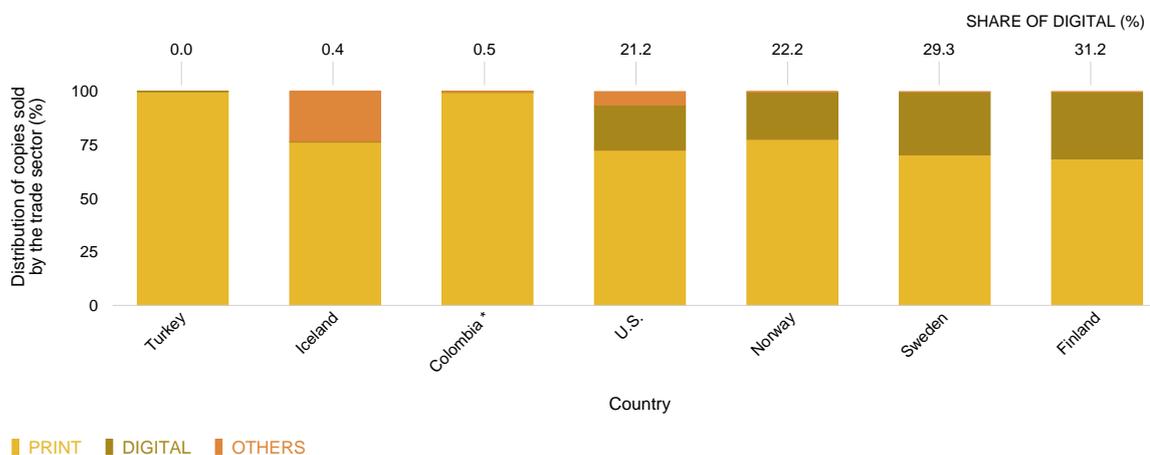
■ BRICK AND MORTAR ■ ONLINE ■ OTHERS

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F15. Distribution of copies sold by format in the trade sector, 2019

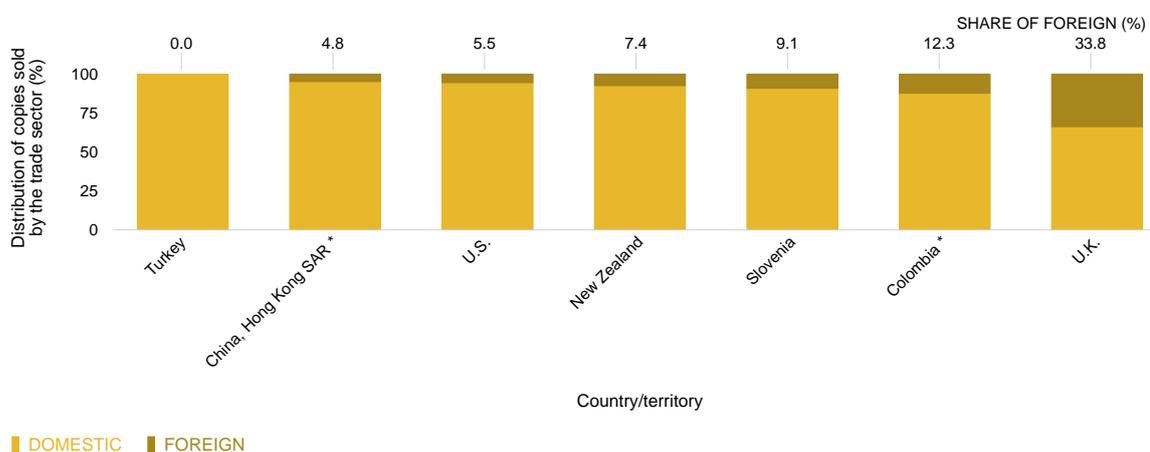


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F16. Distribution of copies sold by destination in the trade sector, 2019



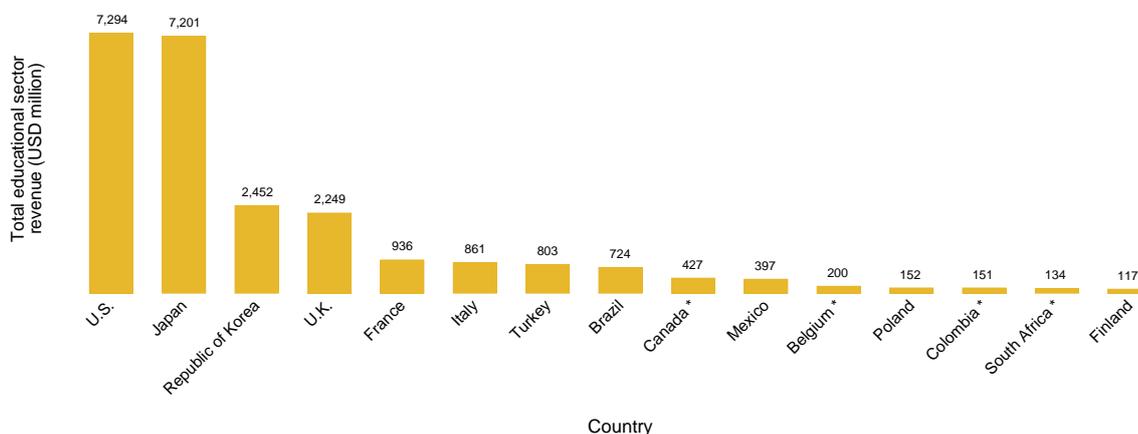
Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

Educational sector

F17. Educational sector revenue (USD million), 2019

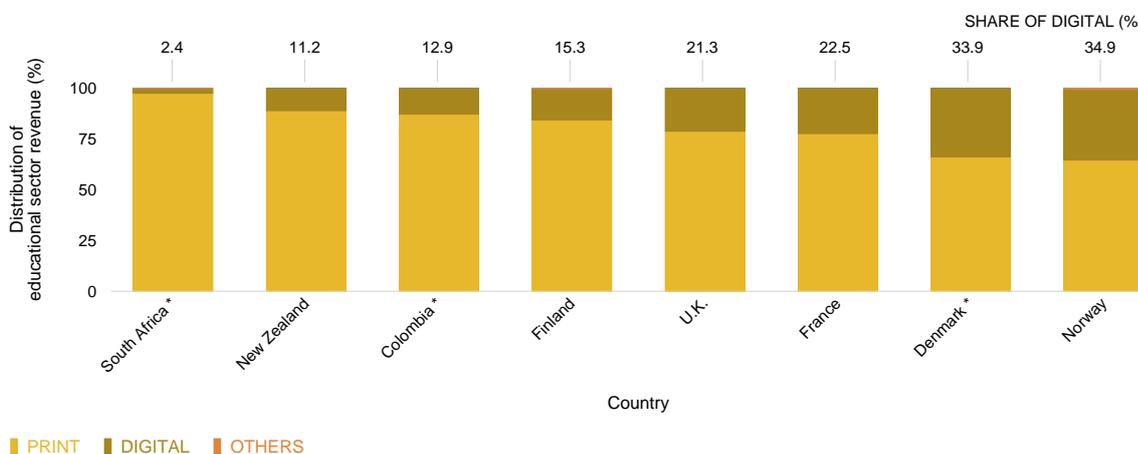


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries. The revenue from Italy is a market value at retail prices.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F18. Distribution of educational sector revenue by format, 2019

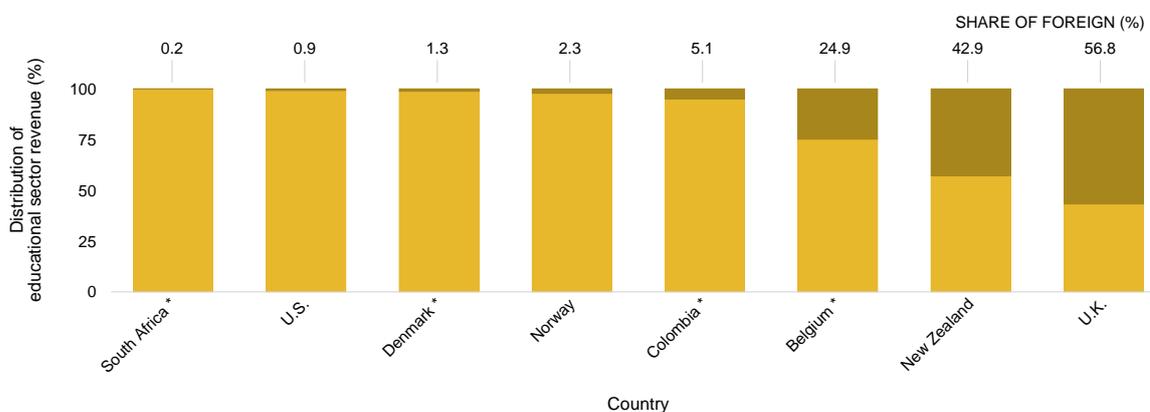


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F19. Distribution of educational sector revenue by destination, 2019



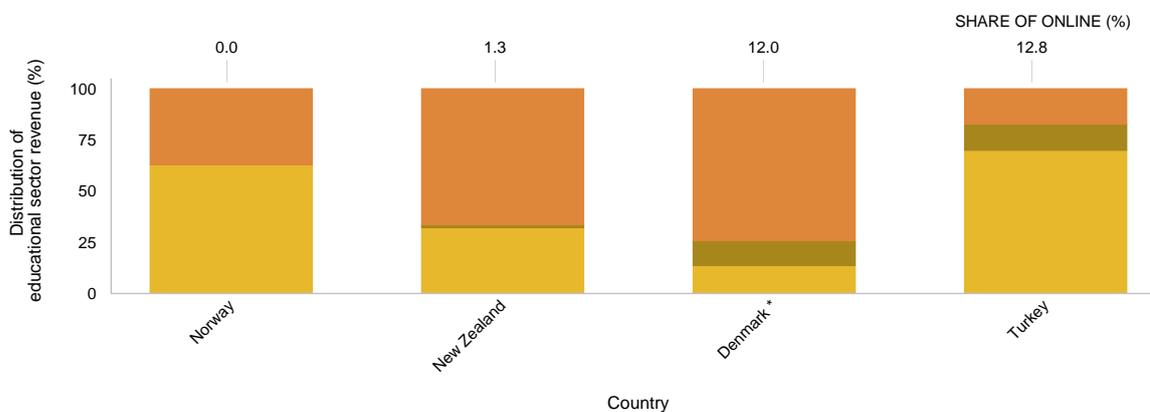
■ DOMESTIC ■ FOREIGN

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F20. Distribution of educational sector revenue by sales channel, 2019



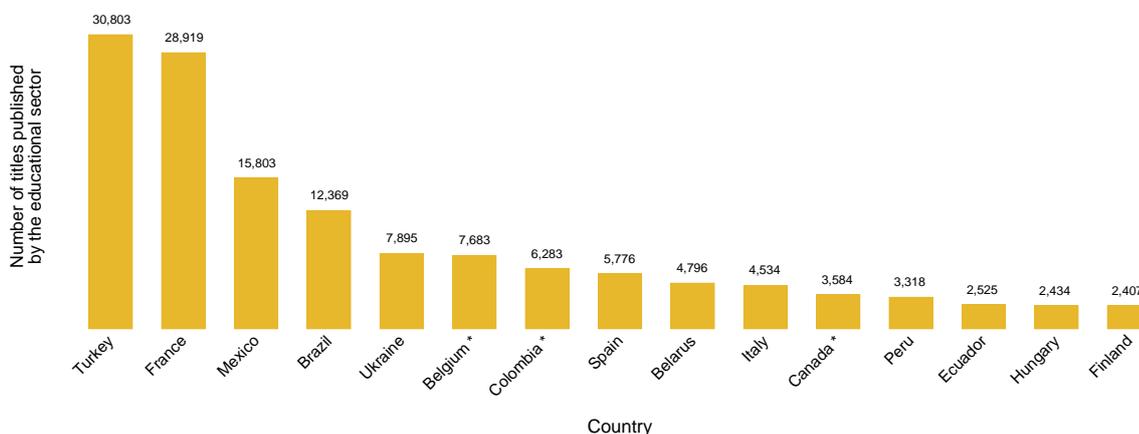
■ BRICK AND MORTAR ■ ONLINE ■ OTHERS

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F21. Number of titles published by the educational sector, 2019

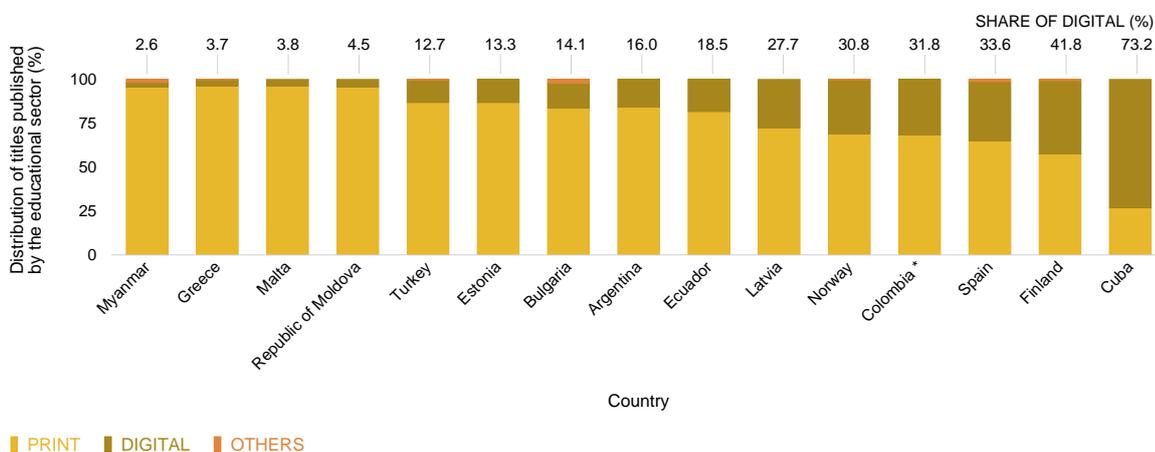


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F22. Distribution of titles published by the educational sector by format, 2019

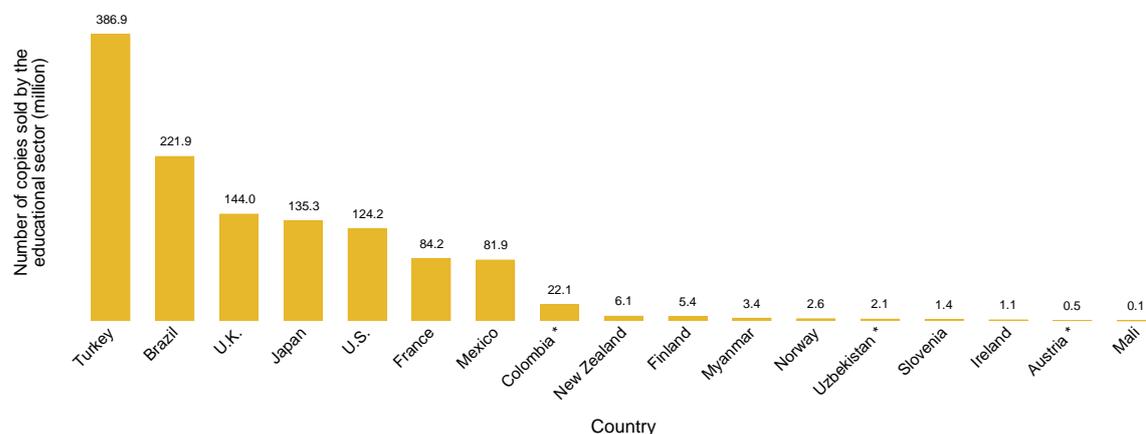


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F23. Number of copies sold by the educational sector, 2019

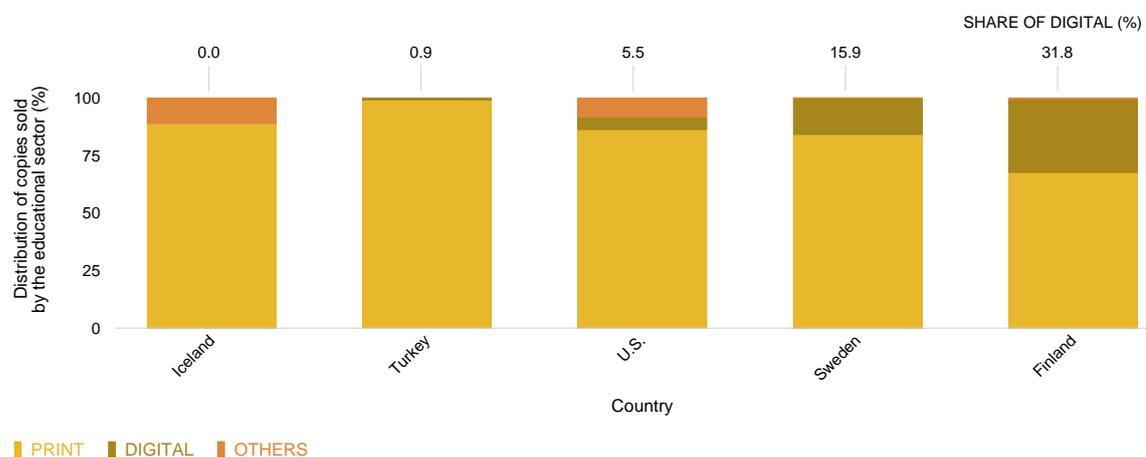


Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

* indicates 2018 data.

Source: WIPO Statistics Database, October 2020.

F24. Distribution of copies sold by format by the educational sector, 2019



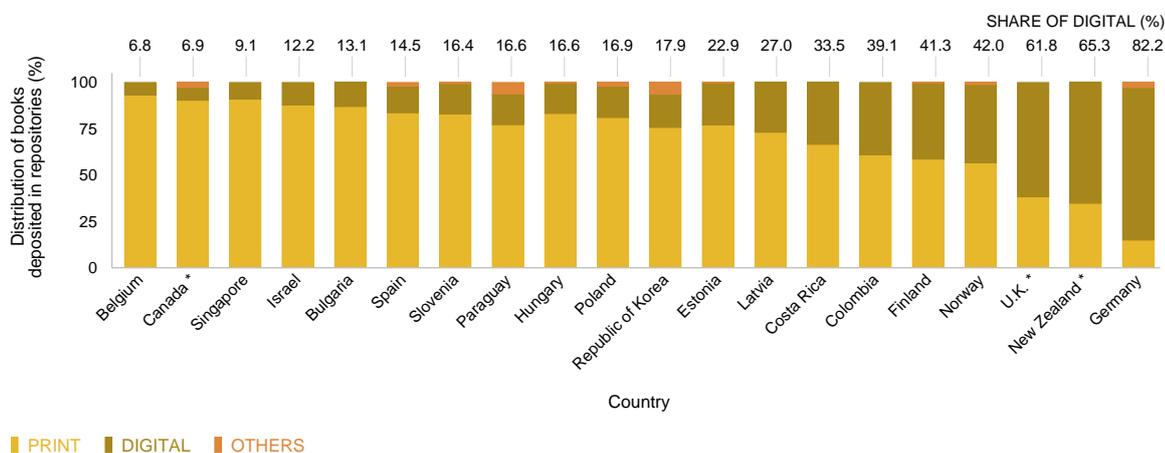
■ PRINT ■ DIGITAL ■ OTHERS

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

Source: WIPO Statistics Database, October 2020.

Legal deposits

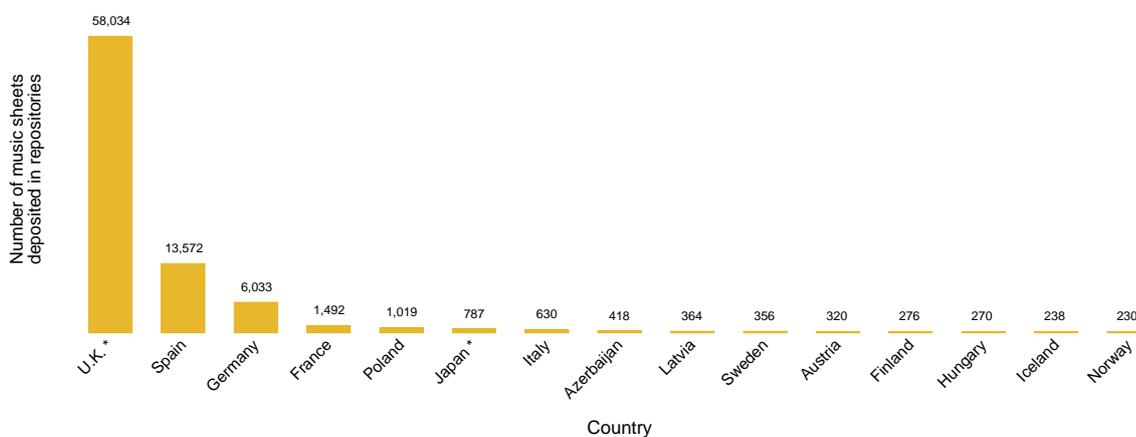
F25. Distribution of books deposited in a recognized repository by format, 2019



* indicates 2018–2019 fiscal year data.

Source: WIPO Statistics Database, October 2020.

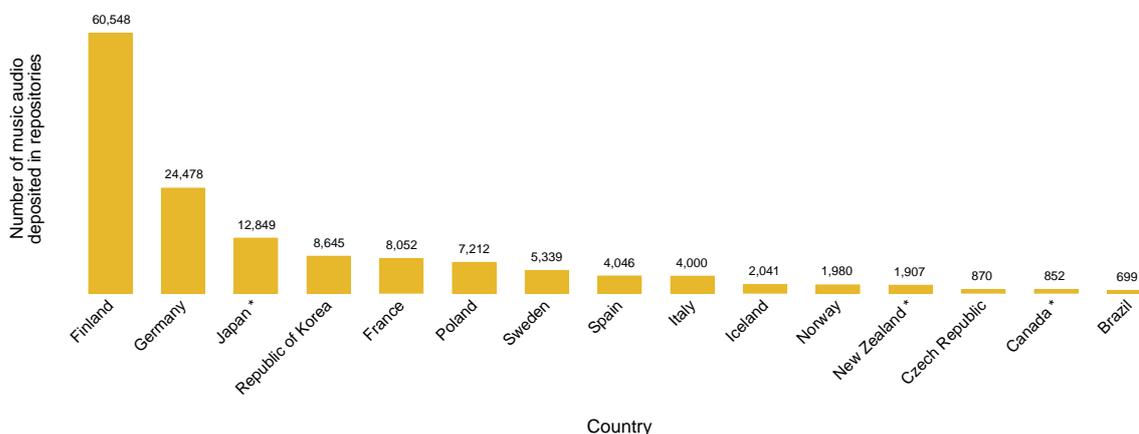
F26. Total number of music sheets deposited in a recognized repository, 2019



* indicates 2018–2019 fiscal year data.

Source: WIPO Statistics Database, October 2020.

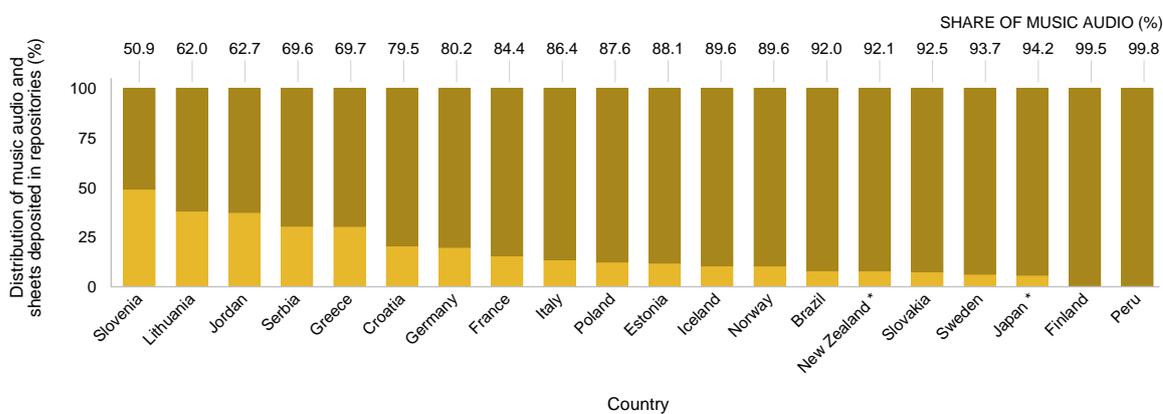
F27. Total number of music audio deposited in a recognized repository, 2019



* indicates 2018–2019 fiscal year data.

Source: WIPO Statistics Database, October 2020.

F28. Distribution of music sheets and music audio deposited in a recognized repository, 2019

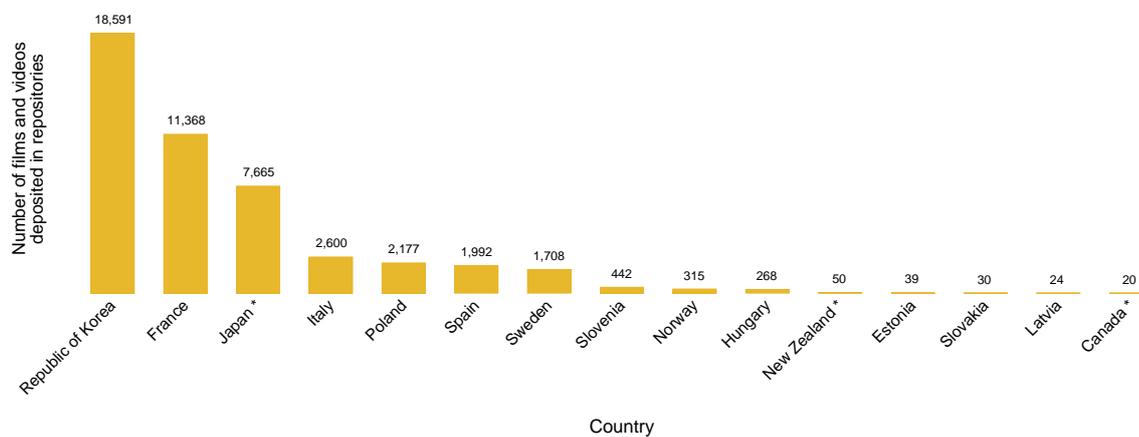


■ MUSIC SHEETS ■ MUSIC AUDIO

* indicates 2018–2019 fiscal year data.

Source: WIPO Statistics Database, October 2020.

F29. Total number of films and videos deposited in a recognized repository, 2019



* indicates 2018–2019 fiscal year.

Source: WIPO Statistics Database, October 2020.

Statistical tables

F30. Total net publishing industry revenue by sector (USD million), 2019

Country/territory	Total	Trade	Educational	Share of total (%)	
				Trade	Educational
Azerbaijan	20.1	..	..	..	..
Belgium (a)	727.8	528.2	199.6	72.6	27.4
Brazil	1,250.4	526.1	724.3	42.1	57.9
Canada (a)	1,035.5	..	426.6	..	..
China, Hong Kong SAR (a)	..	64.3	..	..	..
Colombia (a)	258.0	106.8	151.2	41.4	58.6
Czech Republic	296.0	280.7	15.3	94.8	5.2
Denmark (a)	267.8	173.2	94.6	64.7	35.3
Estonia	41.2	33.6	7.6	81.5	18.5
Finland	272.8	156.1	116.8	57.2	42.8
France	2,983.5	2,047.6	935.9	68.6	31.4
Germany	5,619.8	..	..	..	..
Hungary	180.4	167.4	13.0	92.8	7.2
Iceland	..	22.4	..	..	..
Ireland	37.1	22.1	15.0	59.6	40.4
Italy	2,580.3	1,719.4	860.9	66.6	33.4
Japan	16,067.4	8,866.2	7,201.2	55.2	44.8
Mali	1.5	1.0	0.5	66.2	33.8
Mexico	535.0	138.2	396.8	25.8	74.2
New Zealand	114.1	90.0	24.1	78.9	21.1
Norway	279.6	169.8	109.7	60.8	39.2
Philippines (a)	60.8	..	..	..	..
Poland	435.7	283.4	152.4	65.0	35.0
Republic of Korea	6,225.3	3,773.1	2,452.2	60.6	39.4
Slovenia	96.3	73.9	22.4	76.7	23.3
South Africa (a)	195.0	61.1	133.9	31.3	68.7
Sweden	..	228.4	..	..	..
Turkey	1,350.2	547.2	803.0	40.5	59.5
U.K.	5,401.8	3,152.7	2,249.0	58.4	41.6
U.S.	23,524.9	16,231.3	7,293.6	69.0	31.0

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries. The revenue from Italy and Hungary is a market value at retail prices.

(a) indicates 2018 data.

.. indicates not available.

Source: WIPO Statistics Database, October 2020.

F31. Total number of titles published by sector, 2019

Country/territory	Total	Trade	Educational	Share of total (%)	
				Trade	Educational
Argentina	11,514	9,528	1,986	82.8	17.2
Australia	16,141	..	..	..	..
Austria (a)	8,466	7,500	966	88.6	11.4
Belarus	9,619	4,823	4,796	50.1	49.9
Belgium (a)	22,444	14,761	7,683	65.8	34.2
Brazil	39,978	27,609	12,369	69.1	30.9
Bulgaria	12,194	10,400	1,794	85.3	14.7
Canada (a)	14,626	11,042	3,584	75.5	24.5
Chile	7,826	7,204	622	92.1	7.9
China, Hong Kong SAR (a)	..	5,510	..	..	..
Colombia (a)	14,095	7,812	6,283	55.4	44.6
Croatia	..	6,721	..	..	..
Cuba	3,827	2,411	1,416	63.0	37.0
Czech Republic	16,305	15,500	805	95.1	4.9
Denmark (a)	10,841	..	..	..	..
Ecuador	7,309	4,784	2,525	65.5	34.5
Estonia	5,143	4,805	338	93.4	6.6
Finland	10,112	7,705	2,407	76.2	23.8
France	107,143	78,224	28,919	73.0	27.0
Germany	78,746	..	..	..	..
Greece	11,278	10,170	1,108	90.2	9.8
Hungary	9,589	7,155	2,434	74.6	25.4
Iceland	2,051	2,028	23	98.9	1.1
Ireland	2,143	1,977	166	92.3	7.7
Italy	100,266	95,732	4,534	95.5	4.5
Japan	73,306	71,903	1,403	98.1	1.9
Kazakhstan	..	4,447	..	..	..
Kyrgyzstan	782	543	239	69.4	30.6
Latvia	..	..	112	..	..
Lebanon	4,000	..	..	..	..
Lithuania	3,479	3,199	280	92.0	8.0
Mali	119	89	30	74.8	25.2
Malta	935	883	52	94.4	5.6
Mexico	26,787	10,984	15,803	41.0	59.0
Myanmar	6,099	5,155	944	84.5	15.5
New Zealand	2,663	617	2,046	23.2	76.8
Norway	6,151	5,242	909	85.2	14.8
Peru	11,476	8,158	3,318	71.1	28.9
Philippines (a)	7,474	..	..	..	..
Poland	22,939	21,201	1,738	92.4	7.6
Republic of Korea	..	65,432	..	..	..
Republic of Moldova	4,427	2,633	1,794	59.5	40.5
Russian Federation	115,171	..	..	..	..
Slovenia	5,076	4,324	752	85.2	14.8
Spain	95,849	90,073	5,776	94.0	6.0
Sweden	..	7,740	..	..	..
Togo	43	34	9	79.1	20.9
Turkey	94,482	63,679	30,803	67.4	32.6
U.K.	202,000	..	..	..	..
Ukraine	24,416	16,521	7,895	67.7	32.3

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

(a) indicates 2018 data.

.. indicates not available.

Source: WIPO Statistics Database, October 2020.

F32. Total number of copies sold by sector (million), 2019

Country/territory	Total	Trade	Educational	Share of total (%)	
				Trade	Educational
Austria (a)	1.0	0.5	0.5	52.9	47.1
Brazil	413.6	191.8	221.9	46.4	53.6
China, Hong Kong SAR (a)	..	6.3	..	..	..
Colombia (a)	47.1	25.0	22.1	53.1	46.9
Cuba	..	2.9	..	..	..
Finland	18.9	13.5	5.4	71.2	28.8
France	435.1	350.9	84.2	80.6	19.4
Iceland	..	1.5	..	..	..
Ireland	2.5	1.4	1.1	56.7	43.3
Japan	677.7	542.4	135.3	80.0	20.0
Mali	0.1	0.0	0.1	32.9	67.1
Mexico	123.9	41.9	81.9	33.9	66.1
Myanmar	6.6	3.3	3.4	49.2	50.8
New Zealand	21.0	14.9	6.1	71.0	29.0
Norway	19.8	17.2	2.6	86.8	13.2
Slovenia	5.8	4.4	1.4	75.9	24.1
Sweden	..	19.6	..	..	..
Togo	0.0	0.0	0.0	76.6	23.4
Turkey	553.3	166.4	386.9	30.1	69.9
U.K.	649.8	505.8	144.0	77.8	22.2
U.S.	2,629.6	2,505.5	124.2	95.3	4.7
Uzbekistan (a)	2.6	0.5	2.1	19.2	80.8

Note: Caution should be exercised when interpreting the data shown here due to data being incomplete and partial. The share of the total publishing industry represented by national publishers' associations (NPAs) varies between countries. There are also methodological differences that mean it is difficult to make comparisons between countries.

(a) indicates 2018 data.

.. indicates not available.

Source, WIPO Statistics Database, October 2020.

F33. Total number of books deposited in a recognized repository, 2019

Country/territory	Total	Print	Digital	Other formats
Austria	26,759	26,759	..	..
Azerbaijan	3,427	3,427	..	..
Belgium (b)	15,254	14,216	1,038	..
Brazil	27,119	..	..	..
Bulgaria	12,093	10,508	1,585	..
Canada (a)	11,046	9,971	763	312
China, Hong Kong SAR	14,536	14,536	..	..
Colombia	19,727	12,022	7,705	..
Costa Rica	1,173	780	393	..
Croatia	7,760	7,132	229	399
Cyprus	42	42	..	..
Czech Republic	17,580	17,300	..	280
Estonia	4,011	3,088	918	5
Finland	18,039	10,559	7,448	32
France	79,581	79,581	..	..
Germany	693,722	103,234	570,388	20,100
Ghana	1,640	1,638	2	..
Greece	14,987	14,801	179	7
Hungary	21,871	18,179	3,634	58
Iceland	5,220	4,758	324	138
Ireland	1,871	1,871	..	..
Israel	12,462	10,943	1,519	..
Italy	53,615	53,615	..	..
Jamaica	199	199	..	..
Japan (a)	125,338	125,338	..	..
Jordan	6,358	6,358	..	..
Kazakhstan	2,893	2,873	20	..
Kyrgyzstan	1,459	1,459	..	..
Latvia	3,687	2,692	995	..
Lithuania	5,500	5,284	216	..
Malaysia	18,566	17,365	..	1,201
Maldives	71	71	..	..
Malta	485	485	..	..
Mauritius	1,573	1,527	3	43
Monaco	123	123	..	..
Myanmar	3,235	3,235	..	..
New Zealand (a)	22,941	7,964	14,977	..
Norway	16,277	9,229	6,835	213
Paraguay	314	242	52	20
Peru	16,406	16,382	..	24
Philippines	726	726	..	..
Poland	44,633	36,138	7,534	961
Portugal	17,117	17,117	..	..
Republic of Korea	94,949	71,805	17,001	6,143
Republic of Moldova	2,280	2,200	80	..
Russian Federation	115,171	115,171	..	..
Serbia	11,891	11,886	..	5
Seychelles	150	150	..	..
Singapore	11,716	10,647	1,069	..
Slovakia	7,923	7,411	509	3
Slovenia	9,506	7,882	1,555	69
South Africa	8,608	8,053	555	..
Spain	69,403	57,934	10,078	1,391
Sweden	19,873	18,320	320	1,233
Turkey	61,363	59,559	1,804	..
U.K. (a)	210,628	80,470	130,158	..
Ukraine	24,416	24,416	..	..

(a) 2018–2019 fiscal year data.

(b) digital deposits are collected on a voluntary basis.

.. indicates not available.

Source: WIPO Statistics Database, October 2020.

Additional information

Data description

Spanish at www.wipo.int/ipstats/en/data_collection/questionnaire.

Data sources

Intellectual property (IP) data are taken from the WIPO Statistics Database and based primarily on WIPO's annual IP statistics surveys (see below) and on data compiled by WIPO in processing international applications/registrations through the Patent Cooperation Treaty (PCT) and the Madrid and Hague Systems. Data are available from WIPO's Statistics Data Center at www.wipo.int/ipstats.

Patent family and technology data are extracted from the WIPO Statistics Database and from the 2020 spring edition of the European Patent Office's PATSTAT database.

Gross domestic product and population data are from the World Bank's World Development Indicators database.

This report uses the World Bank's income classifications. Economies are classified according to 2019 gross national income per capita, calculated using the World Bank Atlas method. These classifications are low-income (USD 1,035 or less), lower middle-income (USD 1,036 to USD 4,045), upper middle-income (USD 4,046 to USD 12,535) and high-income (over USD 12,536).

This report uses United Nations (UN) definitions of regions and sub-regions, whereas the geographical terms used may differ slightly from the ones defined by the UN.

WIPO's annual IP statistics surveys

WIPO collects data from national/regional IP offices, other competent authorities and publishers' associations from around the world through annual surveys consisting of multiple questionnaires. These data are then entered into the WIPO Statistics Database. Where possible, data published on IP offices' websites or in their annual reports are used to supplement the questionnaire responses in cases where IP offices/countries do not provide statistics. Continuous efforts are being made to improve the quality and availability of IP statistics and to gather data from as many IP offices and countries as possible.

WIPO's long-established and regular IP survey covers patents, utility models, trademarks, industrial designs and plant varieties. It consists of 28 questionnaires, all of which are available in English, French and

In 2017, WIPO started to collect data on geographical indications (GIs) through an annual survey. The simple questionnaire seeks to collect data on GIs in force broken down by legal means of protection (e.g., *sui generis* system, trademarks, international agreements, and so on) and products types (e.g., wines and spirits, agricultural products, and so on). This 2020 edition reports data for 117 authorities – a considerable improvement upon the 54 responses that WIPO received only three years ago in 2017.

In 2017, in collaboration with the International Publishers Association (IPA), WIPO launched a new survey of the global publishing industry. This survey covers trade and educational publishing only. Its scope is limited to published materials (i.e., books, monographs, etc.) that have been issued with an International Standard Book Number (ISBN), a Digital Object Identifier (DOI) or any other national/international book identifier (e.g., ASIN, and so on).

In 2018, 28 associations/authorities shared their 2017 data with the IPA and WIPO. This edition includes publishing industry data for the 45 associations/authorities who shared their 2019 data and nine associations/authorities shared their 2018 data. Although the data coverage is improved for this new survey, yet further efforts will be made over the coming years to enhance the quality and coverage of publishing industry data.

To validate the data collected through the global publishing survey, WIPO has begun to collect data on legal deposit. Legal deposit is a statutory obligation at the national level requiring publishers to deposit a certain number of copies of their published documents at a repository, that is, a recognized place of legal deposit. In 2019, WIPO conducted a pilot survey among national legal repositories, to which 51 countries responded. This 2020 edition reports data for 57 authorities.

IP office survey coverage

IP offices are requested to report data by the origin (country or territory) of applications, grants or registrations. However, some offices are unable to provide a detailed breakdown. Instead, these offices report either an aggregate total or a simple breakdown by total resident and total non-resident counts. For this reason, the totals for each origin are underreported. However, the unknown origin shares of the 2019 totals are low – only 1.8% for patent applications, 0.5% for trademark application class counts and 0.4% for application design counts.

IP applications data coverage by IP type

IP type	Number of offices on which 2019 world totals are based	Number of offices for which 2019 data are available	Data coverage (%)
Patents	162	120	99.8
Utility models	66	14	99.9
Trademarks (a)	168	123	98.9
Industrial designs (b)	153	101	99.6
Plant varieties	70	65	99.2

(a) Refers to the number of trademark applications based on class count (that is, the number of classes specified in applications).

(b) Refers to the number of industrial design applications based on design count (that is, the number of designs contained in applications).

Estimating world totals

World totals of applications for, and grants/registrations of, patents, utility models, trademarks, industrial designs and plant varieties are WIPO estimates. Data are not available for every IP office for each year. Missing data are estimated using methods such as linear extrapolation and averaging adjacent data points. The estimation method chosen depends on the year and the office in question. When an office provides data not broken down by origin, WIPO makes an estimate of the resident and non-resident counts using the historical shares recorded at that office. Data are available for most of the larger offices; only small shares of world totals are estimated. For example, the estimated total number of patent applications worldwide covers 162 offices; data are available for 120 of these, which together account for 99.8% of the estimated world total.

National and international data

Application and grant/registration data include data on both direct filings and filings made through WIPO-administered international systems (where applicable). For patents and utility models, data comprise direct filings at national patent offices, as well as PCT national phase entries. For trademarks, data comprise filings at national and regional offices and designations received by relevant offices through the Madrid System. For industrial designs, data comprise national and regional applications combined with designations received by relevant offices through the Hague System.

International comparability of indicators

Every effort has been made to compile IP statistics based on the same definitions and to facilitate international comparability. Although data are collected from offices using questionnaires from WIPO's harmonized annual IP survey, national laws and regulations for filing IP applications or for issuing IP rights, as well as statistical reporting practices, may vary between jurisdictions. Due to the continual updating of data and the revision of historical statistics, data in this report may differ from data in previous editions and from data available on WIPO's website.

Change in method of counting IP applications by CNIPA in 2017

Due to a change in the method by which the National Intellectual Property Administration of the People's Republic of China (CNIPA) calculates how many patent, utility model and industrial design applications are filed, data on the number of such applications filed in China in 2017 and 2018 are not comparable with data for previous years. Prior to 2017, these data included all applications received; from 2017 onwards, however, they include only those applications for which the office received the necessary application fees. As a result, it is not meaningful to report growth rates in the number of patent, utility model and industrial design applications filed in China in 2017 compared to 2016. Moreover, since China accounts for such a large proportion of IP applications globally, it is not meaningful to report growth rates in the numbers of such applications filed worldwide in 2017 compared to 2016. For the reason of this break in the data series, figures A1 (page 24), A53 (page 56), C1 (page 137) and C2 (page 137) do not report 2017 growth.

IP systems at a glance

The patent system

A patent is a set of exclusive rights granted by law to applicants for an invention that meets the standards of novelty, non-obviousness and industrial applicability. It is valid for a limited period (generally 20 years), during which time the patent holder can commercially exploit the invention on an exclusive basis. In return, applicants are obliged to disclose their inventions to the public, so that others skilled in the art may replicate them. The patent system is designed to encourage innovation by providing innovators with time-limited exclusive legal rights, thus enabling them to appropriate the returns from their innovative activity.

The procedures for acquiring patent rights are governed by the rules and regulations of national and regional patent offices. These offices are responsible for issuing patents and rights are limited to the jurisdiction of the issuing authority. To obtain patent rights, applicants must file an application describing the invention with a national or regional office.

Applicants can also file an international application through the Patent Cooperation Treaty (PCT) System, an international treaty administered by WIPO that facilitates the acquisition of patent rights in multiple jurisdictions. The PCT System simplifies the process of multiple national patent filings by delaying the requirement to file a separate application in each jurisdiction in which protection is sought. However, the decision on whether to grant a patent remains the prerogative of national or regional patent offices and patent rights are limited to the jurisdiction of each patent-granting authority.

The PCT application process begins with the international phase, during which an international search and optional preliminary examination and supplementary international search are performed. It concludes with the national phase, during which national (or regional) patent offices decide on the patentability of an invention according to national law. Further information about the PCT System is available at www.wipo.int/pct.

The utility model system

Like a patent, a utility model (UM) confers a set of rights to an invention for a limited period, during which time the UM rights holder can commercially exploit their invention on an exclusive basis. The terms and condi-

tions for granting a UM differ from those for granting a traditional patent. For example, UMs are issued for a shorter period (6–10 years) and at most offices protection is granted without substantive examination. As with patents, procedures for granting UM rights are governed by the rules and regulations of national intellectual property (IP) offices and rights are limited to the jurisdiction of the issuing authority. In this report, the term “utility model” refers to UMs and other types of protection similar to UMs, such as innovation patents in Australia and short-term patents in Ireland.

Microorganisms under the Budapest Treaty

The Budapest Treaty on the International Recognition of the Deposit of Microorganisms for the Purposes of Patent Procedure plays an important role in relation to biotechnological inventions. Disclosing an invention is a generally recognized requirement for receiving a patent. When an invention involves microorganisms, national laws in most countries require the applicant to deposit a sample at a designated International Depository Authority (IDA).

To eliminate the need to deposit a microorganism in every country in which patent protection is sought, the Budapest Treaty provides that depositing a microorganism with any IDA will suffice for the purposes of patent procedures at the national patent offices of all contracting states and at regional patent offices that recognize the Treaty. An IDA is a scientific institution – typically a “culture collection” – capable of storing microorganisms. As of July 2020, there are 48 IDAs around the world. Further information about the Budapest Treaty is available at www.wipo.int/treaties/en/registration/budapest.

The trademark system

A trademark is a sign used to distinguish the goods or services of one enterprise from those of another and is protected as an intellectual property right. Trademarks can be registered for both goods and services. In the latter case, the term “service mark” is sometimes used. For simplicity, this report uses “trademark,” regardless of whether the registration concerns goods or services. The holder of a registered trademark has the exclusive right to use the mark in relation to the goods or services for which it is registered and can block unauthorized use of the trademark, or a confusingly similar mark, to prevent consumers from being misled. Unlike patents, trademark registrations can be maintained indefinitely, provided that the trademark holder pays the required renewal fees.

The procedures for registering trademarks are governed by the legislation and procedures of national and regional IP offices. Therefore, trademark rights are limited to the jurisdiction of the authority in which a trademark is registered. Trademark applicants can file an application with the relevant national or regional IP office or an international application through the Madrid System. However, when an applicant files internationally via the Madrid System, the decision to issue a trademark registration remains the prerogative of the national or regional IP office concerned and trademark rights remain limited to the jurisdiction of the authority issuing that registration.

Between December 1995 and October 2016, two treaties administered by the World Intellectual Property Organization (WIPO) governed the Madrid System for the International Registration of Marks: the Madrid Agreement Concerning the International Registration of Marks, adopted in 1891, and the Protocol Relating to the Madrid Agreement, adopted in 1989. As of October 11, 2016, following a decision by the Madrid Union Assembly that no country could accede only to the Agreement, the Protocol is now the sole governing treaty of the Madrid System. The Madrid System offers many advantages to both trademark holders and IP offices compared with the alternative method of obtaining international protection for marks called the Paris route or the direct route. The Paris route involves filing separate applications directly at IP offices in the countries or regions where protection is sought (under the Paris Convention for the Protection of Industrial Property). In contrast, by paying a single set of fees in one currency (Swiss francs), the Madrid System allows trademark holders to submit a single application in one language (English, French or Spanish) indicating the Madrid members where protection is sought (designations).

The Madrid System also simplifies managing the mark after registration by making it possible to centrally request the recording of further changes or to renew the registration through a single procedural step. A registration recorded in the International Register yields the same effect as a registration made directly with each designated Contracting Party (Madrid member), if the competent authority of that jurisdiction has not issued a refusal within a specified time period. Further information about the Madrid System is available at www.wipo.int/madrid.

The industrial design system

Industrial designs are applied to a wide variety of industrial products and handicrafts.¹ They refer to the ornamental or aesthetic aspects of a useful article, including compositions of lines or colors or three-dimensional forms that give a special appearance to a product or handicraft. The holder of a registered industrial design has exclusive rights over the design and can prevent unauthorized copying or imitation of the design by others.

The procedures for registering industrial designs are governed by national or regional laws. An industrial design can be protected, if it is new or original and rights are limited to the jurisdiction of the issuing authority. Registrations can be obtained by filing an application with a relevant national or regional IP office or by filing an international application through the Hague System. Once a design is registered, the term of protection is generally five years and may be renewed for additional five-year periods up to a total of 15 years, in most cases. In some countries, industrial designs are protected through the delivery of a design patent rather than design registration.

The Hague System comprises two international treaties – the Hague Act and the Geneva Act. The System makes it possible for an applicant to register industrial designs in multiple territories by filing a single application with the International Bureau of WIPO, thus simplifying the multinational registration process. Moreover, by allowing the filing of up to 100 different designs per application, the System offers considerable opportunities for efficiency gains. It also streamlines the subsequent management of industrial design registration, since it is possible to record changes or renew a registration through a single procedure for all territories. Further information about the Hague System is available at www.wipo.int/hague.

Plant variety protection

To obtain protection, a plant breeder must file an individual application with each authority entrusted with granting breeders' rights. A breeder's right is granted only when a variety is new, distinct, uniform and stable, and has a suitable denomination.

In the United States of America (U.S.), two legal frameworks protect new plant varieties: the Plant Patent Act (PPA) and the Plant Variety Protection Act (PVPA). Under the PPA, whoever invents or discovers and asexually reproduces any distinct and new variety of plant – including cultivated sports, mutants, hybrids and newly found seedlings, other than a tuber-propagated plant (in practice, Irish potato and Jerusalem artichoke) or a plant found in an uncultivated state – may obtain a patent. Under the PVPA, the U.S. protects all sexually reproduced plant varieties and tuber-propagated plant varieties, excluding fungi and bacteria.

The geographical indication system

A geographical indication (GI) is a sign identifying a good as originating in a specific geographical area and possessing a given quality, reputation or other characteristic essentially attributable to that geographical origin. Thus, the main function of a GI is to indicate a connection between the quality, characteristic or reputation of the good and its territory of origin.

World-renowned examples of GIs include Café de Colombia (Colombia), Bordeaux (France), Kampot Pepper (Cambodia), Penja Pepper (Cameroon) and Scotch Whisky (U.K.).

GIs are mainly used for agricultural and food products, which typically tend to have a close natural link with their place of origin. There are, however, also many GIs for other kinds of products, whose specific characteristics may derive from traditional manufacturing skills or from a combination of local know-how and natural resources. Examples of GIs for handicraft and manufactured goods include Bohemia Crystal (Czech Republic), Solingen Cutlery (Germany), Isfahan Handmade Carpet (Islamic Republic of Iran), Swiss Watches (Switzerland) and Yangzhou Lacquerware (China).

Although GIs are commonly names of places, they may also consist of non-geographical terms with a traditional geographical connotation (traditional denominations); for example, Reblochon (France) and Argane (Morocco) serve as GIs, although neither are geographical names.

GIs can only be used on goods that conform to the applicable requirements concerning the area of origin, processing method and typicity of the product. Goods from production sites located outside the area of origin and goods that do not meet the applicable requirements are prevented from using the protected indication.

Appellations of origin

An appellation of origin is a special kind of geographical indication. It generally consists of a geographical name or a traditional denomination which serves to designate a product as originating in a defined geographical area, where the quality or characteristics of the product are due exclusively or essentially to that geographical environment, including natural and human factors, and which has given the good its reputation. The most important difference between appellations of origin and other GIs is that the link with the geographical area should be stronger in the case of an appellation of origin; in other words, appellations of origin are a more restrictive sub-category of GIs.

Protection of GIs

At the national and regional levels, GIs are protected through a variety of legal means. These include *sui generis* systems – laws specifically designed to protect geographical indications,² often based on a registration procedure. *Sui generis* systems generally provide protection against any direct and indirect commercial use of the GI, as well as against its imitation. *Sui generis* systems for GI protection are used in many countries and also by two regional intergovernmental organizations: the African Intellectual Property Organization (OAPI) and the European Union (EU).

GIs can also be protected on the basis of trademark law, commonly through the use of collective and certification marks. Because trademarks incorporating geographical terms are typically not recorded by IP offices as a separate category of trademarks, and because not all trademarks incorporating geographical terms can be considered to be GIs, it may be difficult to determine the exact number of registered GIs within jurisdictions. It is also worth noting that GI protection via *sui generis* or trademark systems are not mutually exclusive, but often coexist under many legal frameworks and are available to the benefit of GI holders.

Finally, GIs are typically also protected under unfair competition regulations, consumer protection laws and administrative and judicial decisions, as well as under specific laws or decrees recognizing individual GIs.

As for other IP rights, the effects of a GI right obtained in a particular jurisdiction are limited to the territory of that jurisdiction. Thus, where a right over a GI is obtained in one jurisdiction, it is protected there but not abroad. In order to obtain protection in a foreign jurisdiction, GI holders must, in principle, seek protection under the relevant national or regional laws prevailing

in the jurisdiction in question. However, international agreements can facilitate the acquisition of GI rights abroad. In particular, bilateral and regional agreements – (often trade agreements) – have incorporated lists of GIs that are to be protected in the relevant parties to the agreement. The listed GIs may relate to existing or subsequent GI rights, but protection may also emanate from the trade agreements themselves.

Another way of obtaining protection for GIs abroad is through two international registration systems administered by WIPO: the Lisbon System and the Madrid System.

The Lisbon System

The Lisbon System was established in 1958 to facilitate the international protection of appellations of origin through a single registration procedure.³ Registration with the WIPO International Bureau ensures protection in all Lisbon contracting parties, without the need for renewal and for as long as the appellation of origin remains protected in its contracting party of origin. However, the decision as to whether to protect a newly registered appellation of origin at the national or regional level remains the prerogative of each contracting party and each Lisbon member can refuse protection based on any ground foreseen at national or regional level within one year of being notified of a new appellation of origin by the WIPO International Bureau.

Globally-renowned examples of appellations of origin protected under the Lisbon System include Tequila for spirits (Mexico), Chianti for wines (Italy), Habanos for cigars (Cuba) and handicrafts such as Chulucanas for ceramics (Peru), Herend for porcelain (Hungary) and Kraslice for musical instruments (Czech Republic). The scope of the System extends to non-geographical traditional names, such as Reblochon for cheese (France) and Vinho Verde for wines (Portugal).

In 2015, with the adoption of the Geneva Act of the Lisbon Agreement on Appellations of Origin and Geographical Indications, which entered into force on February 26, 2020, Lisbon contracting parties modernized the System to attract a wider membership, while preserving its principles and objectives. The Geneva Act formally extends the scope of the Lisbon System to the general category of GIs in addition to appellations of origin. The new Act also opened the Lisbon System to accession by intergovernmental organizations, such as the EU and OAPI. It also made the Lisbon System more flexible in order to secure a wider recognition for and inclusion of the various means by which countries may provide protection to their appellations of origin

and GIs at a national or regional level (e.g., *sui generis* systems, trademark laws or specific *ad hoc* decrees, as well as judicial and administrative decisions).

Protection of GIs abroad through the Madrid System

GIs can be protected in several countries as trademarks (most commonly collective and certification marks) through the Madrid System, an international registration system legally governed by the Madrid Agreement (1891) and the Madrid Protocol (1989) and administered by WIPO.⁴ A famous example of a collective/certification mark registered under the Madrid System is Napa Valley for wines from the U.S.

- 1 The products and handicrafts to which industrial designs are applied range from technical and medical instruments to watches, jewelry and other luxury items, and from housewares, electrical appliances, vehicles and construction materials to textile designs and leisure goods.
- 2 The terminology used at national and regional levels to refer to *sui generis* rights over GIs is not uniform. Different terms, such as appellations of origin, controlled appellations of origin, protected designations of origin, protected geographical indications, (qualified) indications of source, or simply geographical indications are used in different legislations. Despite the different terminology, however, the common denominator remains the link between the specific quality, characteristics or reputation of the product and its territory of origin. For simplicity, the present text generally uses “geographical indication (GI),” regardless of differences in national and regional terminology.
- 3 The Lisbon System is administered by WIPO and comprises the Lisbon Agreement for the Protection of Appellations of Origin and their International Registration (1958), as revised at Stockholm in 1967 and amended in 1979, and the Geneva Act of the Lisbon Agreement on Appellations of Origin and Geographical Indications (2015), which entered into force on February 26, 2020.
- 4 For further information about the Madrid System, see the *Madrid Yearly Review 2020*.

Glossary

This glossary provides definitions of key technical terms and concepts. Many are defined generically (for example, “application”), but apply to several or all of the various forms of intellectual property (IP) covered in this report.

Applicant

An individual or other legal entity that files an application for a patent, utility model, trademark or industrial design. There may be more than one applicant in an application. For the statistics in this publication, the name of the first named applicant is used to determine the origin of the application.

Application

The procedure for requesting IP rights at an office, which then examines the application and decides whether to grant protection. Also refers to a set of documents submitted to an office by the applicant.

Application abroad

For statistical purposes, an application filed by a resident of a given state or jurisdiction with the IP office of another state or jurisdiction. For example, an application filed by an applicant domiciled in France with the Japan Patent Office (JPO) is considered an application abroad from the perspective of France. This differs from a “non-resident application,” which describes an application filed by a resident of a foreign state or jurisdiction from the perspective of the office receiving the application: the example above would be a non-resident application from the JPO’s point of view.

Application date

The date on which the IP office receives an application that meets the minimum requirements. Also referred to as the filing date.

Budapest Treaty

Disclosure of an invention is a requirement for granting a patent. Normally, an invention is disclosed by means of a written description. Where an invention involves a microorganism or the use of a microorganism, disclosure is not always possible in writing and can sometimes only be effected by depositing a sample of the microorganism with a specialized institution. To eliminate the need to deposit a microorganism in each country in which patent protection is sought, the Budapest Treaty provides that the deposit of a microorganism with any International Depository Authority (IDA) suffices for the purposes of patent procedure at the national patent offices of all contracting states and at any regional patent office that recognizes the Treaty.

Certification trademark

Certification marks are usually given for compliance with defined standards, but are not confined to any membership. They may instead be used by anyone able to certify that the products involved meet certain established standards. In many countries, the main difference between collective marks and certification marks is that collective marks may only be used by a specific group of enterprises – for example, members of an association – while certification marks may be used by anybody who complies with the standards defined by the owner of the certification mark.

Class

May refer to the classes defined in either the Locarno Classification or the Nice Classification. Classes indicate the categories of goods and services (where applicable) for which industrial design or trademark protection is requested. See “Locarno Classification” and “Nice Classification.”

Class count

The number of classes specified in a trademark application or registration. In the international trademark system and at certain national and regional offices, an applicant can file a trademark application specifying one or more of the 45 goods and services classes of the Nice Classification. Offices use either a multi-class or a single filing system. For example, the offices of Japan, the Republic of Korea and the United States of America (U.S.), as well as many European IP offices, have multi-class filing systems. On the other hand, the offices of Brazil, Mexico and South Africa follow a single-class filing system, requiring a separate application for each class in which an applicant seeks trademark protection. To capture the differences in application and registration numbers across offices, it is useful to compare their respective application and registration class counts.

Collective trademark

Collective marks are usually defined as signs that distinguish the geographical origin, material, mode of manufacture or other common characteristics of goods or services of different enterprises using the collective mark. The owner may be either an association of which those enterprises are members or any other entity, including a public institution or a cooperative.

Community Plant Variety Office (CPVO) of the European Union (EU)

An EU agency that manages a system of plant variety rights covering all EU member states.

Design count

The number of designs contained in an industrial design application or registration. Under the Hague System for the International Registration of Industrial Designs,

it is possible for an applicant to obtain protection for up to 100 industrial designs for products belonging to one and the same class by filing a single application. Some national or regional IP offices allow applications to contain more than one design for the same product or within the same class, while others allow only one design per application. In order to capture the differences in application and registration numbers across offices, it is useful to compare their respective application and registration design counts.

Designation

A request, made in an international application or registration, by which the applicant/international registration holder specifies the jurisdiction(s) in which they seek to protect their industrial designs (Hague System) or trademarks (Madrid System).

Direct filing

See “National route.”

Equivalent application

Applications at regional offices are equivalent to multiple applications, one in each of the states that is a member of those offices. To calculate the number of equivalent applications for the Benelux Office for Intellectual Property (BOIP), the Eurasian Patent Organization (EAPO), the African Intellectual Property Organization (OAPI), the Patent Office of the Cooperation Council for the Arab States of the Gulf (GCC Patent Office) and the European Union Intellectual Property Office (EUIPO), each application is multiplied by the corresponding number of member states. For European Patent Office (EPO) and African Regional Intellectual Property Organization (ARIPO) data, each application is counted as one application abroad, if the applicant does not reside in a member state, or as one resident application and one application abroad, if the applicant resides in a member state. The equivalent application concept is used for reporting data by origin.

Equivalent grant (registration)

Grants (registrations) at regional offices are equivalent to multiple grants (registrations), one in each of the states that is a member of those offices. To calculate the number of equivalent grants (registrations) for BOIP, EAPO, the EUIPO, the GCC Patent Office or OAPI, each grant (registration) is multiplied by the corresponding number of member states. For EPO and ARIPO data, each grant is counted as one grant abroad, if the applicant does not reside in a member state, or as one resident grant and one grant abroad, if the applicant resides in a member state. The equivalent grant (registration) concept is used for reporting data by origin.

European Patent Office (EPO)

The EPO is the regional patent office created under

the European Patent Convention (EPC), in charge of granting European patents for EPC member states. Under Patent Cooperation Treaty (PCT) procedures, the EPO acts as a receiving office, an International Searching Authority and an International Preliminary Examining Authority.

European Union Intellectual Property Office (EUIPO)

The EUIPO is the office responsible for managing the EU trademark and the registered community design. The validity of these two intellectual property rights extends across the jurisdictions of the EU's 28 member states as of December 31, 2019.

Filing

See “Application.”

Foreign-oriented patent families

A special subset of patent families that comprises foreign-oriented patent families: this includes only those patent families with at least one filing office that differs from the office of the applicant's country of origin. Some foreign-oriented patent families include only one filing office, because applicants may choose to file directly with a foreign office. For example, if a Canadian applicant files a patent application directly with the United States Patent and Trademark Office (USPTO) without having first filed with the patent office of Canada, that application will form a foreign-oriented patent family.

Geographical indication

A geographical indication (GI) is a sign identifying a good as originating in a specific geographical area and possessing a given quality, reputation or other characteristic essentially attributable to that geographical origin. Thus, the main function of a GI is to identify goods while informing about a connection between the quality, characteristic or reputation of the good and its territory of origin.

Grant

A set of exclusive rights legally accorded to the applicant when a patent or utility model is granted or issued.

Gross domestic product (GDP)

The total unduplicated output of economic goods and services produced within a country as measured in monetary terms.

Hague international application

An application for the international registration of an industrial design filed under the WIPO-administered Hague System.

Hague international registration

An international registration issued via the Hague

System, which facilitates the acquisition of industrial design rights in multiple jurisdictions. An application for international registration of an industrial design leads to its recording in the International Register and the publication of the registration in the *International Designs Bulletin*. If the registration is not refused by the IP office of a designated Hague member, the international registration will have the same effect as a registration made in that jurisdiction.

Hague member (Contracting Party)

A state or intergovernmental organization that is a member of the Hague System. Includes any state or intergovernmental organization which is party to the Geneva Act of 1999 and/or the Hague Act of 1960. Entitlement to file an international application under the Hague Agreement is limited to natural persons or legal entities having a real and effective industrial or commercial establishment, or a domicile, in at least one of the Contracting Parties to the Agreement, or being a national of one of those Contracting Parties or of a member state of an intergovernmental organization that is a Contracting Party. In addition – but only under the 1999 Act – an international application may be filed on the basis of habitual residence in the jurisdiction of a Contracting Party.

Hague route

An alternative to the Paris route (i.e., the direct national or regional route), the Hague route enables an application for the international registration of industrial designs to be filed using the Hague System.

Hague System

The abbreviated form of the Hague System for the International Registration of Industrial Designs. The System comprises two international treaties: the Hague Act of 1960 and the Geneva Act of 1999. The Hague System makes it possible for an applicant to register up to 100 industrial designs in multiple jurisdictions by filing a single application with the International Bureau of WIPO. It simplifies multinational registration by reducing the requirement to file separate applications with each IP office. The System also simplifies the subsequent management of the industrial design, since it is possible to record changes or renew a registration through a single procedural step for all designated Hague members.

Industrial design

Industrial designs are applied to a wide variety of industrial products and handicrafts. They refer to the ornamental or aesthetic aspects of a useful article, including compositions of lines or colors or any three-dimensional forms that give a special appearance to a product or handicraft. The holder of a registered industrial design has exclusive rights against unauthor-

ized copying or imitation of the design by third parties. Industrial design registrations are valid for a limited period. The term of protection is usually 15 years in most jurisdictions. However, differences in legislation exist, notably in China (which provides for a 10-year term from the application date).

In force

Refers to IP rights that are currently valid or, in the case of trademarks, active. To remain in force, IP protection must be maintained.

Intellectual property (IP)

Refers to creations of the mind: inventions, literary and artistic works, and symbols, names, images and designs used in commerce. IP is divided into two categories: industrial property – which includes patents, utility models, trademarks, industrial designs and geographical indications of source – and copyright, which includes literary and artistic works (such as novels, poems, plays, films), musical works, artistic works (such as drawings, paintings, photographs and sculptures) and architectural designs. Rights related to copyright include those of performing artists in their performances, those of producers of sound recordings in their recordings and those of broadcasters in their radio and television programs.

International Depository Authority (IDA)

A scientific institution – typically a culture collection – capable of storing microorganisms that has acquired the status of an International Depository Authority under the Budapest Treaty and provides for the receipt, acceptance and storage of microorganisms and the furnishing of samples thereof. As of July 2020, 48 such authorities exist around the world.

International Patent Classification (IPC)

An internationally recognized patent classification system, the IPC has a hierarchical structure of language-independent symbols and is divided into sections, classes, sub-classes and groups. IPC symbols are assigned according to the technical features in patent applications. A patent application that relates to multiple technical features can be assigned several IPC symbols.

International Union for the Protection of New Varieties of Plants (UPOV)

An intergovernmental organization established by the International Convention for the Protection of New Varieties of Plants (the UPOV Convention), which was adopted on December 2, 1961. UPOV provides and promotes an effective system of plant variety protection aimed at encouraging the development of new varieties of plants for the benefit of society.

Invention

A new solution to a technical problem. To qualify for patent protection, the invention must be novel, involve an inventive step and be industrially applicable, as judged by a person skilled in the art.

Lisbon System

The Lisbon System was established in 1958 and revised first in 1967 and then again in 2015 to facilitate the international protection of appellations of origin and geographical indications through a single registration procedure. Registration with the WIPO International Bureau ensures protection in all Lisbon contracting parties, without the need for renewal and for as long as the appellation of origin or the GI remains protected in its contracting party of origin. However, the decision on whether to protect a newly registered appellation of origin or GI at the national or regional level remains the prerogative of each contracting party, and each Lisbon member can refuse protection based on any ground foreseen at national or regional level within one year of being notified of a new appellation of origin or GI by the WIPO International Bureau. The Lisbon System is flexible with regard to the means by which countries may provide protection at national or regional level for their appellations of origin or GIs (e.g., *sui generis* systems, trademark laws or specific *ad hoc* decrees, as well as judicial and administrative decisions).

Locarno Classification

The abbreviated form of the International Classification for Industrial Designs under the Locarno Agreement used for registering industrial designs. The Locarno Classification consists of 32 classes and their respective subclasses with explanatory notes, plus an alphabetical list of the goods in which industrial designs are incorporated and an indication of the classes and subclasses into which they fall.

Madrid international application

An application for international registration under the Madrid System, which is a request for the protection of a trademark in one or more Madrid members' jurisdictions. An international application must be based on a basic mark, that is, prior application or registration of a mark in a Madrid member jurisdiction.

Madrid international registration

An application for international registration of a mark leads to its recording in the International Register and the publication of the international registration in the *WIPO Gazette of International Marks*. If the international registration is not refused protection by a designated Madrid member, it will have the same effect as a national or regional trademark registration made under the law applicable in that Madrid member's jurisdiction.

Madrid member (Contracting Party)

A state or intergovernmental organization – for example, the African Intellectual Property Organization (OAPI) or the European Union (EU) – that is party to the Madrid Protocol.

Madrid route

The Madrid route (the Madrid System) is an alternative to the direct national or regional route (also called the Paris route).

Madrid System

An abbreviation describing the system for the international registration of trademarks, originally established by the Madrid Agreement Concerning the International Registration of Marks and later also governed by the Protocol Relating to the Madrid Agreement. Following a decision by the Madrid Union Assembly in October 2016, the Protocol is now the sole governing treaty of the Madrid System. The Madrid System is administered by the International Bureau of WIPO.

Maintenance

An act by the applicant to keep an IP grant/registration valid (in force), primarily by paying the required fee to the IP office of the state or jurisdiction providing protection. That fee is also known as a “maintenance fee.” A trademark can be maintained indefinitely by paying renewal fees; however, patents, utility models and industrial designs can be maintained for only a limited period of years.

Microorganism deposit

The transmittal of a microorganism to an International Depositary Authority (IDA), which receives and accepts it, the storage of such a microorganism by the IDA, or both transmittal and storage.

National phase under the PCT

The phase that follows the international phase of the PCT procedure and that consists of the entry and processing of the international application in the individual countries or regions in which the applicant seeks protection for an invention.

National route

Applications for IP protection filed directly with the national office of, or acting for, the relevant state or jurisdiction (see also “Hague route,” “Madrid route” and “PCT route”). The national route is also called the direct route or Paris route.

Nice Classification

The abbreviated form of the International Classification of Goods and Services for the Purposes of Registering Marks, an international classification established under

the Nice Agreement. The Nice Classification consists of 45 classes, which are divided into 34 classes for goods and 11 for services. (See “Class.”)

Non-resident

For statistical purposes, a “non-resident” application refers to an application filed with the IP office of, or acting for, a state or jurisdiction in which the first named applicant in the application is not domiciled. For example, an application filed with the Japan Patent Office (JPO) by an applicant residing in France is considered to be a non-resident application from the perspective of the JPO. Non-resident applications are sometimes referred to as foreign applications. A non-resident grant or registration is an IP right issued on the basis of a non-resident application.

Origin (country or region)

For statistical purposes, the origin of an application means the country or territory of residence of the first named applicant in the application. In some cases (notably in the U.S.), the country of origin is determined by the residence of the assignee rather than that of the applicant.

Paris Convention

The Paris Convention for the Protection of Industrial Property, signed on March 20, 1883, is one of the most important treaties, as it establishes general principles applicable to all IP rights. It establishes the “right of priority” enabling an IP applicant, when filing an application in countries other than the original country of filing, to claim priority of an earlier application filed up to 12 months previously for patents and utility models, and up to six months previously for trademarks and industrial designs.

Paris route

An alternative to the Hague, Madrid or PCT routes, the Paris route (also called the direct route or national route) enables individual IP applications to be filed directly with an IP office of a country/territory that is a signatory to the Paris Convention.

Patent

A set of exclusive rights granted by law to applicants for inventions that are new, non-obvious and commercially applicable. A patent is valid for a limited period of time (generally 20 years), during which time patent holders can commercially exploit their inventions on an exclusive basis. In return, applicants are obliged to disclose their inventions to the public in a manner that enables others skilled in the art to replicate the invention. The patent system is designed to encourage innovation by providing innovators with time-limited exclusive legal rights, thus enabling them to appropriate the returns from their innovative activity.

Patent Cooperation Treaty (PCT)

An international treaty administered by WIPO, the PCT allows applicants to seek patent protection for an invention simultaneously in a large number of countries (PCT contracting states) by filing a single PCT international application. The granting of patents, which remains under the control of national or regional patent offices, is carried out in what is called the “national phase under the PCT.”

Patent family

Applicants often file patent applications in multiple jurisdictions, so some inventions are recorded more than once. To take this into account, WIPO has indicators related to patent families, defined as patent applications interlinked by one or more of: priority claim, Patent Cooperation Treaty national phase entry, continuation, continuation-in-part, internal priority and addition or division. WIPO’s patent family definition includes only those associated with patent applications for inventions and excludes patent families associated with utility model applications.

PCT application

A patent application filed through the WIPO-administered PCT, also known as an international application.

PCT-patent prosecution highway (PCT-PPH) pilots

A number of bilateral agreements signed between patent offices enabling applicants to request an accelerated examination procedure, because of positive patentability findings made by the International Searching and/or International Preliminary Examining Authority, in the written opinion of an International Searching Authority, the written opinion of an International Preliminary Examining Authority or the international preliminary report on patentability.

PCT route

The procedure outlined in the PCT, as opposed to the Paris route.

PCT System

The PCT, an international treaty administered by WIPO, facilitates the acquisition of patent rights in a large number of jurisdictions. The PCT System simplifies the process of multiple national patent filings by reducing the requirement to file a separate application in each jurisdiction. However, the decision on whether to grant patent rights remains in the hands of national and regional patent offices, and patent rights remain limited to the jurisdiction of the patent granting authority. The PCT application process starts with the international phase, during which an international search and, possibly, a preliminary examination are performed, and concludes with the national phase, during which

a national or regional patent office decides on the patentability of an invention according to national law.

Pending patent application

In general, this refers to a patent application filed with a patent office for which no patent has yet been either granted or refused, and for which the application has not been withdrawn. In jurisdictions where a request for examination is required to start the examination process, a pending application may refer to an application for which a request for examination has been received or one for which no patent has been granted or refused, and for which the application has not been withdrawn.

Plant Patent Act (PPA) of the U.S.

Under the law commonly known as the “Plant Patent Act,” whoever invents or discovers and asexually reproduces any distinct and new variety of plant, including cultivated sports, mutants, hybrids and newly found seedlings, other than a tuber-propagated plant or a plant found in an uncultivated state, may obtain a patent therefor.

Plant variety

According to the UPOV Convention, plant variety means a plant grouping within a single botanical taxon of the lowest known rank which, irrespective of whether the conditions for the granting of a breeder’s right are fully met, can be defined by the expression of the characteristics resulting from a given genotype or combination of genotypes, distinguished from any other plant grouping by the expression of at least one of the said characteristics and considered as a unit with regard to its suitability for being propagated unchanged.

Plant variety grant

Under the UPOV Convention, the breeder’s right is granted (title of protection is issued) only when the variety is new, distinct, uniform, stable and has a suitable denomination.

Plant Variety Protection Act (PVPA) of the U.S.

Under the PVPA, the U.S. protects all sexually reproduced plant varieties and tuber-propagated plant varieties, excluding fungi and bacteria.

Prior art

All information disclosed to the public about an invention, in any form, before a given date. Information on prior art can assist in determining whether the claimed invention is new and involves an inventive step (i.e., is non-obvious) for the purposes of international searches and international preliminary examination.

Priority date

The filing date of the application on the basis of which priority is claimed. (See “Paris Convention.”)

Publication date

The date on which an IP application is disclosed to the public. On that date, the subject matter of the application becomes prior art.

Regional application/grant (registration)

An application filed with or granted (registered) by an IP office having regional jurisdiction over more than one country. There are currently seven regional offices: the African Intellectual Property Organization (OAPI), the African Regional Intellectual Property Organization (ARIPO), the Benelux Office for Intellectual Property (BOIP), the Eurasian Patent Organization (EAPO), the European Patent Office (EPO), the European Union Intellectual Property Office (EUIPO) and the Patent Office of the Cooperation Council for the Arab States of the Gulf (GCC Patent Office).

Registered Community Design

A registration issued by the EUIPO based on a single application filed directly with the office by an applicant seeking protection within the EU as a whole.

Registration

An exclusive set of rights legally accorded to the applicant when an industrial design or trademark is registered or issued. See “Industrial design” or “Trademark.” Registrations are issued to applicants to make use of and exploit their industrial designs or trademarks for a limited period of time and can, in some cases (particularly in the case of trademarks), be renewed indefinitely.

Renewal

The process by which the protection of an IP right is maintained (kept in force). This usually consists of paying renewal fees to an IP office at regular intervals. If renewal fees are not paid, the registration may lapse. See also “Maintenance.”

Resident

For statistical purposes, a resident application refers to an application filed with the IP office of, or acting for, the state or jurisdiction in which the first named applicant in the application has residence. For example, an application filed with the JPO by a resident of Japan is considered a resident application from the perspective of the JPO. Resident applications are sometimes referred to as “domestic applications.” A resident grant/registration is an IP right issued on the basis of a resident application.

Trademark

A sign used to distinguish the goods or services of one undertaking from those of others. A trademark may consist of words and combinations of words (for instance, names or slogans), logos, figures and images,

letters, numbers, sounds, or, in rare instances, smells or moving images, or a combination thereof. The procedures for registering trademarks are governed by the legislation and procedures of national and regional IP offices and WIPO. Trademark rights are limited to the jurisdiction of the IP office that registers the trademark. Trademarks can be registered by filing an application at the relevant national or regional office(s), or by filing an international application through the Madrid System.

Utility model

A special form of patent right granted by a state or jurisdiction to an inventor or the inventor's assignee for a fixed period of time. The terms and conditions for granting a utility model are slightly different from those for normal patents (including a shorter term of protection and less stringent patentability requirements). The term "utility model" can also describe what are known in certain countries as "petty patents," "short-term patents" or "innovation patents."

World Intellectual Property Organization (WIPO)

A United Nations specialized agency dedicated to the promotion of innovation and creativity for the economic, social and cultural development of all countries through a balanced and effective international IP system. WIPO was established in 1967 with a mandate to promote the protection of IP throughout the world through cooperation between states and in collaboration with other international organizations.

Abbreviations

ARIPO	African Regional Intellectual Property Organization
BOIP	Benelux Office for Intellectual Property
CNIPA	National Intellectual Property Administration of the People's Republic of China
CPVO	Community Plant Variety Office of the European Union
EAPO	Eurasian Patent Organization
EPO	European Patent Office
EU	European Union
EUIPO	European Union Intellectual Property Office
GCC Patent Office	Patent Office of the Cooperation Council for the Arab States of the Gulf
GDP	gross domestic product
GI	geographical indication
IDA	International Depository Authority
IP	intellectual property
IPA	International Publishers Association
IPC	International Patent Classification
JPO	Japan Patent Office
KIPO	Korean Intellectual Property Office
LAC	Latin America and the Caribbean
NPA	national publishers' association
OAPI	African Intellectual Property Organization
PCT	Patent Cooperation Treaty
PPA	Plant Patent Act of the United States of America
PRO	public research organization
PVPA	Plant Variety Protection Act of the United States of America
U.K.	United Kingdom
UM	utility model
UN	United Nations
UPOV	International Union for the Protection of New Varieties of Plants
U.S.	United States of America
USPTO	United States Patent and Trademark Office
WIPO	World Intellectual Property Organization

Annexes

Annex A. Definitions for selected energy-related technology fields

Energy-related technologies	International patent classification (IPC) symbols
Solar energy technology	E04D 1/30, E04D 13/18, F24J 2/00, F24J 2/02, F24J 2/04, F24J 2/05, F24J 2/06, F24J 2/07, F24J 2/08, F24J 2/10, F24J 2/12, F24J 2/13, F24J 2/14, F24J 2/15, F24J 2/16, F24J 2/18, F24J 2/23, F24J 2/24, F24J 2/36, F24J 2/38, F24J 2/42, F24J 2/46, F03G 6/06, G02B 5/10, H01L 31/052, H01L 31/04, H01L 31/042, H01L 31/18, G02F 1/136, G05F 1/67, H01L 25/00, H01L 31/00, H01L 31/048, H01L 33/00, H02J 7/35, H02N 6/00
Fuel cell technology	H01M 4/00, H01M 4/86, H01M 4/88, H01M 4/90, H01M 8/00, H01M 8/02, H01M 8/04, H01M 8/06, H01M 8/08, H01M 8/10, H01M 8/12, H01M 8/14, H01M 8/16, H01M 8/18, H01M 8/20, H01M 8/22, H01M 8/24
Wind energy	F03D 1/00, F03D 3/00, F03D 5/00, F03D 7/00, F03D 9/00, F03D 11/00, 60L 8/00
Geothermal energy	F24J 3/08, F03G 4/00, F03G 7/05

Note: For definitions of IPC symbols, see www.wipo.int/classifications/ipc. The correspondence between IPC symbols and technology fields is not always clear-cut, therefore it is difficult to capture all patents in a specific technology field. Nonetheless, the IPC-based definitions of the four technologies presented above are likely to capture the vast majority of related patents.

Source: WIPO.

Annex B. Composition of industry sectors by Nice goods and services classes

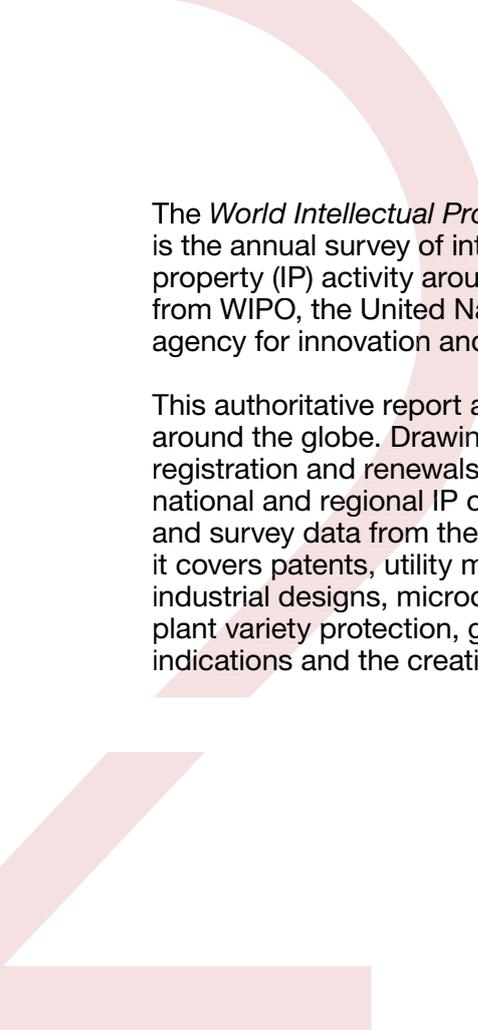
Industry sector	Abbreviation (where applicable)	Nice classes
Agricultural products and services	Agriculture	29, 30, 31, 32, 33, 43
Management, communications, real estate and financial services	Business services	35, 36
Chemicals	..	1, 2, 4
Textiles – clothing and accessories	Clothing and accessories	14, 18, 22, 23, 24, 25, 26, 27, 34
Construction, infrastructure	Construction	6, 17, 19, 37, 40
Pharmaceuticals, health, cosmetics	Health	3, 5, 10, 44
Household equipment	..	8, 11, 20, 21
Leisure, education, training	Leisure & Education	13, 15, 16, 28, 41
Scientific research, information and communication technology	Research & Technology	9, 38, 42, 45
Transportation and logistics	Transportation	7, 12, 39

Source: Edital®.

Annex C. Industry sectors by Locarno classes

Sector	Locarno classes
Advertising	20, 32
Agricultural products and food preparation	1, 27, 31
Construction	23, 25, 29
Electricity and lighting	13, 26
Furniture and household goods	6, 7, 30
Health, pharma and cosmetics	24, 28
ICT and audiovisual	14, 16, 18
Leisure and education	17, 19, 21, 22
Packaging	9
Textiles and accessories	2, 3, 5, 11
Tools and machines	4, 8, 10, 15
Transport	12

Source: Organisation for Economic Co-operation and Development (OECD).



The *World Intellectual Property Indicators* is the annual survey of intellectual property (IP) activity around the world from WIPO, the United Nations specialized agency for innovation and IP.

This authoritative report analyzes IP activity around the globe. Drawing on 2019 filing, registration and renewals statistics from national and regional IP offices and WIPO, and survey data from the publishing industry, it covers patents, utility models, trademarks, industrial designs, microorganisms, plant variety protection, geographical indications and the creative economy.

World Intellectual Property Organization
34, chemin des Colombettes
P.O. Box 18
CH-1211 Geneva 20
Switzerland

Tel: +41 22 338 91 11
Fax: +41 22 733 54 28

For contact details of WIPO's External Offices
visit: www.wipo.int/about-wipo/en/offices

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