

Annex

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Note: Tables A34–A39 are available on-line only at www.iaea.org/publications/reports.

Table A1. Regular Budget allocation and utilization of resources in 2019 by Programme and Major Programme (in euros)

Major Programme (MP)/Programme	Original budget US \$1/€1	Adjusted budget US \$1/€0.893	Expenditure	Resource utilization	Balances
	a*	b**	c	d = c/b	e = b - c
MP1 — Nuclear Power, Fuel Cycle and Nuclear Science					
Overall management, coordination and common activities	3 184 785	3 129 881	3 144 260	100.5%	(14 379)
Nuclear Power	8 841 191	8 687 257	8 789 805	101.2%	(102 548)
Nuclear Fuel Cycle and Materials Technologies	7 467 818	7 344 036	7 235 956	98.5%	108 080
Capacity Building and Nuclear Knowledge for Sustainable Energy Development	10 473 766	10 318 073	10 300 619	99.8%	17 454
Nuclear Science	10 494 976	10 376 158	10 326 169	99.5%	49 989
Total Major Programme 1	40 462 536	39 855 405	39 796 809	99.9%	58 596
MP2 — Nuclear Techniques for Development and Environmental Protection					
Overall management, coordination and common activities	7 978 595	7 912 219	7 909 592	100.0%	2 627
Food and Agriculture	11 817 017	11 681 915	11 699 785	100.2%	(17 870)
Human Health	8 666 935	8 549 474	8 543 384	99.9%	6 090
Water Resources	3 666 420	3 625 316	3 615 692	99.7%	9 624
Environment	6 557 374	6 475 741	6 467 165	99.9%	8 576
Radioisotope Production and Radiation Technology	2 421 962	2 393 810	2 395 692	100.1%	(1 882)
Total Major Programme 2	41 108 303	40 638 475	40 631 310	100.0%	7 165
MP3 — Nuclear Safety and Security					
Overall management, coordination and common activities	3 978 652	3 906 865	3 850 072	98.5%	56 793
Incident and Emergency Preparedness and Response	4 393 537	4 326 546	4 300 355	99.4%	26 191
Safety of Nuclear Installations	10 524 029	10 325 001	10 303 267	99.8%	21 734
Radiation and Transport Safety	7 536 756	7 401 694	7 583 163	102.5%	(181 469)
Radioactive Waste Management and Environmental Safety	3 800 859	3 737 355	3 593 682	96.2%	143 673
Nuclear Security	5 934 522	5 813 509	5 853 278	100.7%	(39 769)
Total Major Programme 3	36 168 355	35 510 970	35 483 817	99.9%	27 153
MP4 — Nuclear Verification					
Overall management, coordination and common activities	14 273 041	14 106 398	13 788 091	97.7%	318 307
Safeguards Implementation	124 751 186	122 703 636	122 942 062	100.2%	(238 426)
Other Verification Activities	2 843 747	2 771 619	2 791 445	100.7%	(19 826)
Development	3 428 805	3 365 367	3 405 004	101.2%	(39 637)
Total Major Programme 4	145 296 779	142 947 020	142 926 602	100.0%	20 418
MP5 — Policy, Management and Administration Services					
Policy, Management and Administration Services	79 978 272	79 158 647	79 155 330	100.0%	3 317
Total Major Programme 5	79 978 272	79 158 647	79 155 330	100.0%	3 317
MP6 — Management of Technical Cooperation for Development					
Management of Technical Cooperation for Development	25 941 045	25 543 049	25 525 507	99.9%	17 542
Total Major Programme 6	25 941 045	25 543 049	25 525 507	99.9%	17 542
Total Operational Regular Budget	368 955 290	363 653 566	363 519 375	100.0%	134 191
Major Capital Investment Funding Requirements***					
MP1 — Nuclear Power, Fuel Cycle and Nuclear Science	—	—	—	—	—
MP2 — Nuclear Techniques for Development and Environmental Protection	2 051 956	2 051 956	1 176 306	57.3%	875 650
MP3 — Nuclear Safety and Security	308 146	308 146	178 288	57.9%	129 858
MP4 — Nuclear Verification	1 027 152	1 027 152	—	—	1 027 152
MP5 — Policy, Management and Administration Services	2 827 614	2 827 614	426 210	15.1%	2 401 404
MP6 — Management of Technical Cooperation for Development	—	—	—	—	—
Total Capital Regular Budget	6 214 868	6 214 868	1 780 804	28.7%	4 434 064
Total Agency Programmes	375 170 158	369 868 434	365 300 179	98.8%	4 568 255
Reimbursable Work for Others	2 835 725	2 835 725	3 267 443	115.2%	(431 718)
Total Regular Budget	378 005 883	372 704 159	368 567 622	98.9%	4 136 537

* General Conference resolution GC(62)/RES/2 of September 2018 original budget at US \$1/€1.

** Original budget revalued at the United Nations operational average rate of exchange of €0.893 to US \$1 in 2019.

*** Additional information about the Major Capital Investment Fund can be found in note 39d of *The Agency's Financial Statements for 2019*.

Table A2. Extrabudgetary regular programme fund resource utilization in 2019 by Programme and Major Programme (in euros)

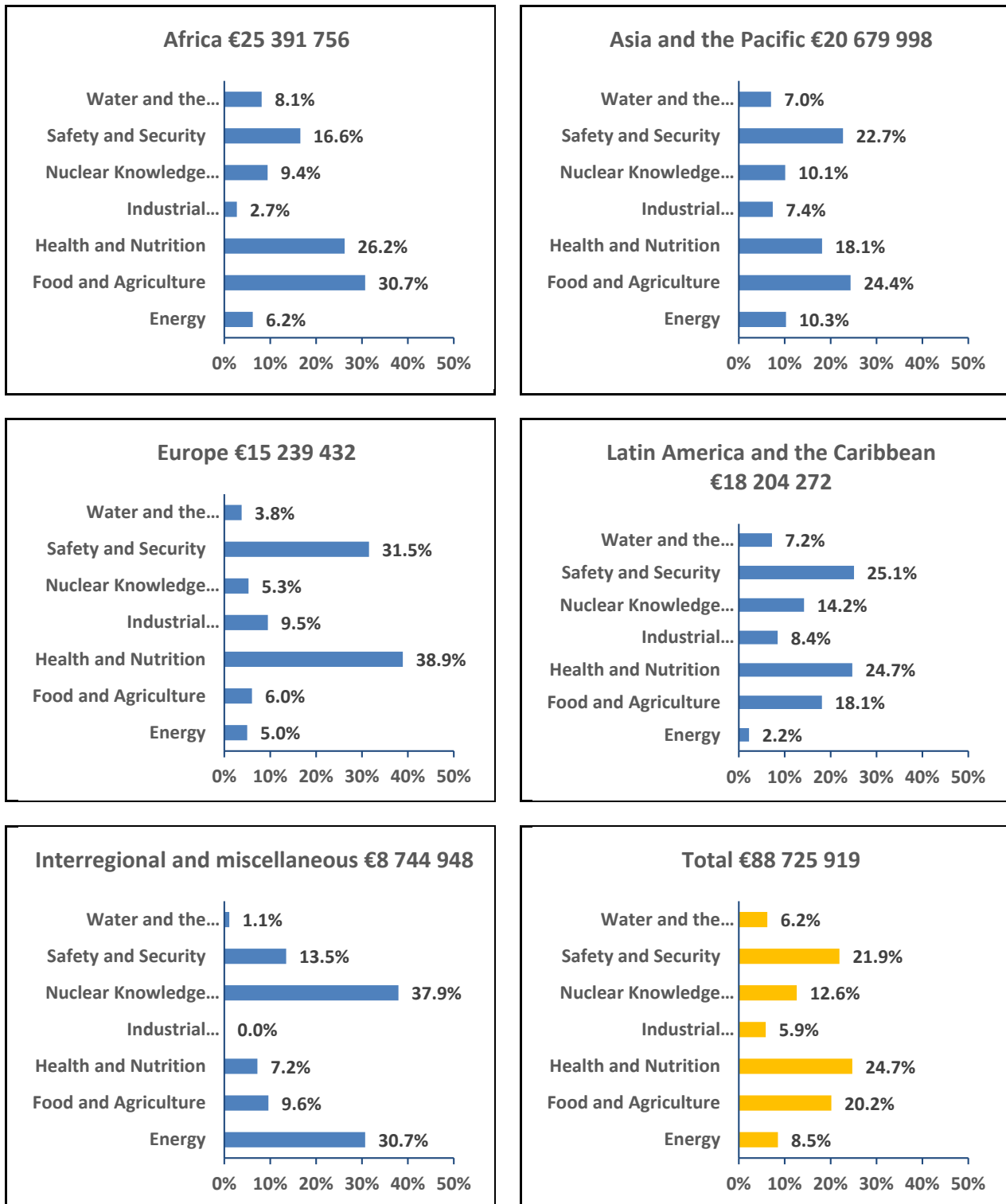
Major Programme (MP)/Programme	2019 net expenditure
MP1 — Nuclear Power, Fuel Cycle and Nuclear Science	
Overall management, coordination and common activities	79 168
Nuclear Power	3 685 827
Nuclear Fuel Cycle and Materials Technologies	60 722 878
Capacity Building and Nuclear Knowledge for Sustainable Energy Development	1 056 765
Nuclear Science	786 548
Total Major Programme 1	66 331 186
MP2 — Nuclear Techniques for Development and Environmental Protection	
Overall management, coordination and common activities	733 290
Food and Agriculture	3 858 265
Human Health	367 295
Water Resources	41 337
Environment	1 565 511
Radioisotope Production and Radiation Technology	335 288
Total Major Programme 2	6 900 986
MP3 — Nuclear Safety and Security	
Overall management, coordination and common activities	4 308 923
Incident and Emergency Preparedness and Response	1 561 277
Safety of Nuclear Installations	4 504 077
Radiation and Transport Safety	1 959 595
Radioactive Waste Management and Environmental Safety	1 279 657
Nuclear Security	21 738 722
Total Major Programme 3	35 352 251
MP4 — Nuclear Verification	
Overall management, coordination and common activities	626 500
Safeguards Implementation	13 378 525
Other Verification Activities	5 403 083
Development	747 617
Total Major Programme 4	20 155 725
MP5 — Policy, Management and Administration Services	
Policy, Management and Administration Services	1 231 413
Total Major Programme 5	1 231 413
MP6 — Management of Technical Cooperation for Development	
Management of Technical Cooperation for Development	251 308
Total Major Programme 6	251 308
Total extrabudgetary programme funds	130 222 869

Table A3(a). Disbursements (actuals) of the Technical Cooperation Fund by technical field and region in 2019

Summary of all regions (in euros)							
Technical field	Africa	Asia and the Pacific	Europe	Latin America and the Caribbean	interregional and miscellaneous	PACT ^a	Total
Energy	1 573 629	2 125 923	762 164	407 457	2 683 879	0	7 553 052
Food and Agriculture	7 792 518	5 035 682	919 239	3 294 191	840 887	0	17 882 518
Health and Nutrition	6 657 846	3 748 716	5 928 045	4 498 798	630 329	465 512	21 929 247
Industrial Applications/ Radiation Technology	696 979	1 527 119	1 446 549	1 538 162	0	0	5 208 809
Nuclear Knowledge Development and Management	2 398 243	2 092 727	803 879	2 585 139	3 316 819	0	11 196 808
Safety and Security	4 206 728	4 695 657	4 806 253	4 567 315	1 177 375	0	19 453 329
Water and the Environment	2 065 812	1 454 173	573 303	1 313 209	95 659	0	5 502 156
Total	25 391 756	20 679 998	15 239 432	18 204 272	8 744 948	465 512	88 725 919

^a PACT: Programme of Action for Cancer Therapy.

Table A3(b). Graphical representation of the information in Table A3(a)



Note: See Table A3(a) for the full titles of the technical fields.

Table A4. Amount of nuclear material under Agency safeguards at the end of 2019 by type of agreement

Nuclear material	Comprehensive safeguards agreement ^a	INFCIRC/66-type agreement	Voluntary offer agreement	Quantity in significant quantities (SQs)
Plutonium ^b contained in irradiated fuel and in fuel elements in reactor cores	144 507	2 892	20 273	167 672
Separated plutonium outside reactor cores	1 131	5	10 941	12 077
High enriched uranium (equal to or greater than 20% U-235)	154	2	0	156
Low enriched uranium (less than 20% U-235)	19 247	358	1 240	20 845
Source material ^c (natural and depleted uranium and thorium)	11 644	1 308	2 728	15 680
U-233	18	0	0	18
Total SQs of nuclear material	176 701	4 565	35 182	216 448

Amount of heavy water under Agency safeguards at the end of 2019 by type of agreement

Non-nuclear material ^d	Comprehensive safeguards agreement	INFCIRC/66-type agreement	Voluntary offer agreement	Quantity in tonnes
Heavy water (tonnes)		429.5		430.2^e

^a Includes nuclear material under Agency safeguards in Taiwan, China; excludes nuclear material in the Democratic People's Republic of Korea.

^b The quantity includes an estimated amount (9 000 SQs) of plutonium in fuel elements loaded into reactor cores and plutonium in other irradiated fuel, which has not yet been reported to the Agency under agreed reporting procedures.

^c This table does not include material within the terms of subparagraphs 34(a) and 34(b) of INFCIRC/153 (Corrected).

^d Non-nuclear material subject to Agency safeguards under INFCIRC/66/Rev.2-type agreements.

^e Includes 0.7 tonnes of heavy water under Agency safeguards in Taiwan, China.

Table A5. Number of facilities and material balance areas outside facilities under Agency safeguards during 2019

Type	Comprehensive safeguards agreement ^a	INFCIRC/66-type agreement ^b	Voluntary offer agreement	Total
Power reactors	241	17	1	259
Research reactors and critical assemblies	146	3	1	150
Conversion plants	17	0	0	17
Fuel fabrication plants	38	2	1	41
Reprocessing plants	10	0	1	11
Enrichment plants	16	0	3	19
Separate storage facilities	136	2	4	142
Other facilities	78	0	0	78
Facility subtotals	682	24	11	717
Material balance areas containing locations outside facilities ^c	606	1	0	607
Total	1288	25	11	1324

^a Covering safeguards agreements pursuant to the Treaty on the Non-Proliferation of Nuclear Weapons and/or the Treaty of Tlatelolco and other comprehensive safeguards agreements; includes facilities in Taiwan, China.

^b Covering facilities in India, Israel and Pakistan.

^c Includes 64 material balance areas in States with amended small quantities protocols.

Table A6. Conclusion of safeguards agreements, additional protocols and small quantities protocols (as of 31 December 2019)

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
Afghanistan	Amended: 28 Jan. 2016	In force: 20 Feb. 1978	257	In force: 19 Jul. 2005
Albania ¹		In force: 25 Mar. 1988	359	In force: 3 Nov. 2010
Algeria		In force: 7 Jan. 1997	531	Signed: 16 Feb. 2018
Andorra	Amended: 24 Apr. 2013	In force: 18 Oct. 2010	808	In force: 19 Dec. 2011
Angola	In force: 28 Apr. 2010	In force: 28 Apr. 2010	800	In force: 28 Apr. 2010
Antigua and Barbuda ²	Amended: 5 Mar. 2012	In force: 9 Sep. 1996	528	In force: 15 Nov. 2013
Argentina ³		In force: 4 Mar. 1994	435	
Armenia		In force: 5 May 1994	455	In force: 28 Jun. 2004
Australia		In force: 10 Jul. 1974	217	In force: 12 Dec. 1997
Austria ⁴		Accession: 31 Jul. 1996	193	In force: 30 Apr. 2004
Azerbaijan		In force: 29 Apr. 1999	580	In force: 29 Nov. 2000
Bahamas ²	Amended: 25 Jul. 2007	In force: 12 Sep. 1997	544	
Bahrain	In force: 10 May 2009	In force: 10 May 2009	767	In force: 20 Jul. 2011
Bangladesh		In force: 11 Jun. 1982	301	In force: 30 Mar. 2001
Barbados ²	X	In force: 14 Aug. 1996	527	
Belarus		In force: 2 Aug. 1995	495	Signed: 15 Nov. 2005
Belgium		In force: 21 Feb. 1977	193	In force: 30 Apr. 2004
Belize ⁵	X	In force: 21 Jan. 1997	532	
Benin	In force: 17 Sep. 2019	In force: 17 Sep. 2019	930	In force: 17 Sep. 2019
Bhutan	X	In force: 24 Oct. 1989	371	
Bolivia, Plurinational State of ²	X	In force: 6 Feb. 1995	465	Signed: 18 Sep. 2019
Bosnia and Herzegovina		In force: 4 Apr. 2013	851	In force: 3 Jul. 2013
Botswana		In force: 24 Aug. 2006	694	In force: 24 Aug. 2006
Brazil ⁶		In force: 4 Mar. 1994	435	
Brunei Darussalam	X	In force: 4 Nov. 1987	365	
Bulgaria ⁷		Accession: 1 May 2009	193	Accession: 1 May 2009
Burkina Faso	Amended: 18 Feb. 2008	In force: 17 Apr. 2003	618	In force: 17 Apr. 2003

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
Burundi	In force: 27 Sep. 2007	In force: 27 Sep. 2007	719	In force: 27 Sep. 2007
<i>Cabo Verde</i>	<i>Amended: 27 Mar. 2006</i>	<i>Signed: 28 Jun. 2005</i>		<i>Signed: 28 Jun. 2005</i>
Cambodia	Amended: 16 Jul. 2014	In force: 17 Dec. 1999	586	In force: 24 Apr. 2015
Cameroon	Amended: 15 Jul. 2019	In force: 17 Dec. 2004	641	In force: 29 Sep. 2016
Canada		In force: 21 Feb. 1972	164	In force: 8 Sep. 2000
Central African Republic	In force: 7 Sep. 2009	In force: 7 Sep. 2009	777	In force: 7 Sep. 2009
Chad	In force: 13 May 2010	In force: 13 May 2010	802	In force: 13 May 2010
Chile ⁸		In force: 5 Apr. 1995	476	In force: 3 Nov. 2003
China		In force: 18 Sep. 1989	369*	In force: 28 Mar. 2002
Colombia ⁸		In force: 22 Dec. 1982	306	In force: 5 Mar. 2009
Comoros	In force: 20 Jan. 2009	In force: 20 Jan. 2009	752	In force: 20 Jan. 2009
Congo	In force: 28 Oct. 2011	In force: 28 Oct. 2011	831	In force: 28 Oct. 2011
Costa Rica ²	Amended: 12 Jan. 2007	In force: 22 Nov. 1979	278	In force: 17 Jun. 2011
Côte d'Ivoire		In force: 8 Sep. 1983	309	In force: 5 May 2016
Croatia ⁹		Accession: 1 Apr. 2017	193	Accession: 1 Apr. 2017
Cuba ²		In force: 3 Jun. 2004	633	In force: 3 Jun. 2004
Cyprus ¹⁰		Accession: 1 May 2008	193	Accession: 1 May 2008
Czech Republic ¹¹		Accession: 1 Oct. 2009	193	Accession: 1 Oct. 2009
Democratic Republic of the Congo		In force: 9 Nov. 1972	183	In force: 9 Apr. 2003
Denmark ¹²		In force: 1 Mar. 1972 In force: 21 Feb. 1977	176 193	In force: 22 Mar. 2013 In force: 30 Apr. 2004
Djibouti	In force: 26 May 2015	In force: 26 May 2015	884	In force: 26 May 2015
Dominica ⁵	X	In force: 3 May 1996	513	
Dominican Republic ²	Amended: 11 Oct. 2006	In force: 11 Oct. 1973	201	In force: 5 May 2010
Democratic People's Republic of Korea		In force: 10 Apr. 1992	403	
Ecuador ²	Amended: 7 Apr. 2006	In force: 10 Mar. 1975	231	In force: 24 Oct. 2001
Egypt		In force: 30 Jun. 1982	302	
El Salvador ²	Amended: 10 Jun. 2011	In force: 22 Apr. 1975	232	In force: 24 May 2004

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
<i>Equatorial Guinea</i>	<i>Approved: 13 Jun. 1986</i>	<i>Approved: 13 Jun. 1986</i>		
<i>Eritrea</i>				
Estonia ¹³		Accession: 1 Dec. 2005	193	Accession: 1 Dec. 2005
Eswatini	Amended: 23 Jul. 2010	In force: 28 Jul. 1975	227	In force: 8 Sep. 2010
Ethiopia	Amended: 2 Jul. 2019	In force: 2 Dec. 1977	261	In force: 18 Sep. 2019
Fiji	X	In force: 22 Mar. 1973	192	In force: 14 Jul. 2006
Finland ¹⁴		Accession: 1 Oct. 1995	193	In force: 30 Apr. 2004
France	Amended: 25 Feb. 2019	In force: 12 Sep. 1981 In force: 26 Oct. 2007 ¹⁵	290* 718	In force: 30 Apr. 2004
Gabon	Amended: 30 Oct. 2013	In force: 25 Mar. 2010	792	In force: 25 Mar. 2010
Gambia	Amended: 17 Oct. 2011	In force: 8 Aug. 1978	277	In force: 18 Oct. 2011
Georgia		In force: 3 Jun. 2003	617	In force: 3 Jun. 2003
Germany ¹⁶		In force: 21 Feb. 1977	193	In force: 30 Apr. 2004
Ghana		In force: 17 Feb. 1975	226	In force: 11 Jun. 2004
Greece ¹⁷		Accession: 17 Dec. 1981	193	In force: 30 Apr. 2004
Grenada ²	X	In force: 23 Jul. 1996	525	
Guatemala ²	Amended: 26 Apr. 2011	In force: 1 Feb. 1982	299	In force: 28 May 2008
<i>Guinea</i>	<i>Signed: 13 Dec. 2011</i>	<i>Signed: 13 Dec. 2011</i>		<i>Signed: 13 Dec. 2011</i>
<i>Guinea-Bissau</i>	<i>Signed: 21 Jun. 2013</i>	<i>Signed: 21 Jun. 2013</i>		<i>Signed: 21 Jun. 2013</i>
Guyana ²	X	In force: 23 May 1997	543	
Haiti ²	X	In force: 9 Mar. 2006	681	In force: 9 Mar. 2006
Holy See	Amended: 11 Sep. 2006	In force: 1 Aug. 1972	187	In force: 24 Sep. 1998
Honduras ²	Amended: 20 Sep. 2007	In force: 18 Apr. 1975	235	In force: 17 Nov. 2017
Hungary ¹⁸		Accession: 1 Jul. 2007	193	Accession: 1 Jul. 2007
Iceland	Amended: 15 Mar. 2010	In force: 16 Oct. 1974	215	In force: 12 Sep. 2003
India ¹⁹		In force: 30 Sep. 1971	211	
		In force: 17 Nov. 1977	260	
		In force: 27 Sep. 1988	360	
		In force: 11 Oct. 1989	374	
		In force: 1 Mar. 1994	433	
		In force: 11 May 2009	754	In force: 25 Jul. 2014
Indonesia		In force: 14 Jul. 1980	283	In force: 29 Sep. 1999

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
Iran, Islamic Republic of ²⁰		In force: 15 May 1974	214	Signed: 18 Dec. 2003
Iraq		In force: 29 Feb. 1972	172	In force: 10 Oct. 2012
Ireland		In force: 21 Feb. 1977	193	In force: 30 Apr. 2004
Israel		In force: 4 Apr. 1975	249/Add.1	
Italy		In force: 21 Feb. 1977	193	In force: 30 Apr. 2004
Jamaica ²		In force: 6 Nov. 1978	265	In force: 19 Mar. 2003
Japan		In force: 2 Dec. 1977	255	In force: 16 Dec. 1999
Jordan		In force: 21 Feb. 1978	258	In force: 28 Jul. 1998
Kazakhstan		In force: 11 Aug. 1995	504	In force: 9 May 2007
Kenya	In force: 18 Sep. 2009	In force: 18 Sep. 2009	778	In force: 18 Sep. 2009
Kiribati	X	In force: 19 Dec. 1990	390	Signed: 9 Nov. 2004
Korea, Republic of		In force: 14 Nov. 1975	236	In force: 19 Feb. 2004
Kuwait	Amended: 26 Jul. 2013	In force: 7 Mar. 2002	607	In force: 2 Jun. 2003
Kyrgyzstan	X	In force: 3 Feb. 2004	629	In force: 10 Nov. 2011
Lao People's Democratic Republic	X	In force: 5 Apr. 2001	599	Signed: 5 Nov. 2014
Latvia ²¹		Accession: 1 Oct. 2008	193	Accession: 1 Oct. 2008
Lebanon	Amended: 5 Sep. 2007	In force: 5 Mar. 1973	191	
Lesotho	Amended: 8 Sep. 2009	In force: 12 Jun. 1973	199	In force: 26 Apr. 2010
Liberia	In force: 10 Dec. 2018	In force: 10 Dec. 2018	927	In force: 10 Dec. 2018
Libya		In force: 8 Jul. 1980	282	In force: 11 Aug. 2006
Liechtenstein		In force: 4 Oct. 1979	275	In force: 25 Nov. 2015
Lithuania ²²		Accession: 1 Jan. 2008	193	Accession: 1 Jan. 2008
Luxembourg		In force: 21 Feb. 1977	193	In force: 30 Apr. 2004
Madagascar	Amended: 29 May 2008	In force: 14 Jun. 1973	200	In force: 18 Sep. 2003
Malawi	Amended: 29 Feb. 2008	In force: 3 Aug. 1992	409	In force: 26 Jul. 2007
Malaysia		In force: 29 Feb. 1972	182	Signed: 22 Nov. 2005
Maldives	X	In force: 2 Oct. 1977	253	
Mali	Amended: 18 Apr. 2006	In force: 12 Sep. 2002	615	In force: 12 Sep. 2002

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
Malta ²³		Accession: 1 Jul. 2007	193	Accession: 1 Jul. 2007
Marshall Islands		In force: 3 May 2005	653	In force: 3 May 2005
Mauritania	Amended: 20 Mar. 2013	In force: 10 Dec. 2009	788	In force: 10 Dec. 2009
Mauritius	Amended: 26 Sep. 2008	In force: 31 Jan. 1973	190	In force: 17 Dec. 2007
Mexico ²⁴		In force: 14 Sep. 1973	197	In force: 4 Mar. 2011
<i>Micronesia, Federated States of</i>	<i>Signed: 1 Jun. 2015</i>	<i>Signed: 1 Jun. 2015</i>		
Monaco	Amended: 27 Nov. 2008	In force: 13 Jun. 1996	524	In force: 30 Sep. 1999
Mongolia	X	In force: 5 Sep. 1972	188	In force: 12 May 2003
Montenegro	In force: 4 Mar. 2011	In force: 4 Mar. 2011	814	In force: 4 Mar. 2011
Morocco		In force: 18 Feb. 1975	228	In force: 21 Apr. 2011
Mozambique	In force: 1 Mar. 2011	In force: 1 Mar. 2011	813	In force: 1 Mar. 2011
Myanmar	X	In force: 20 Apr. 1995	477	Signed: 17 Sep. 2013
Namibia	X	In force: 15 Apr. 1998	551	In force: 20 Feb. 2012
Nauru	X	In force: 13 Apr. 1984	317	
Nepal	X	In force: 22 Jun. 1972	186	
Netherlands	X	In force: 5 Jun. 1975 ¹⁵ In force: 21 Feb. 1977	229 193	In force: 30 Apr. 2004
New Zealand ²⁵	Amended: 24 Feb. 2014	In force: 29 Feb. 1972	185	In force: 24 Sep. 1998
Nicaragua ²	Amended: 12 Jun. 2009	In force: 29 Dec. 1976	246	In force: 18 Feb. 2005
Niger		In force: 16 Feb. 2005	664	In force: 2 May 2007
Nigeria		In force: 29 Feb. 1988	358	In force: 4 Apr. 2007
North Macedonia	Amended: 9 Jul. 2009	In force: 16 Apr. 2002	610	In force: 11 May 2007
Norway		In force: 1 Mar. 1972	177	In force: 16 May 2000
Oman	X	In force: 5 Sep. 2006	691	
Pakistan		In force: 5 Mar. 1962 In force: 17 Jun. 1968 In force: 17 Oct. 1969 In force: 18 Mar. 1976 In force: 2 Mar. 1977 In force: 10 Sep. 1991 In force: 24 Feb. 1993 In force: 22 Feb. 2007 In force: 15 Apr. 2011 In force: 3 May 2017	34 116 135 239 248 393 418 705 816 920	

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
Palau	Amended: 15 Mar. 2006	In force: 13 May 2005	650	In force: 13 May 2005
Panama ⁸	Amended: 4 Mar. 2011	In force: 23 Mar. 1984	316	In force: 11 Dec. 2001
Papua New Guinea	Amended: 6 Feb. 2019	In force: 13 Oct. 1983	312	
Paraguay ²	Amended: 17 Jul. 2018	In force: 20 Mar. 1979	279	In force: 15 Sep. 2004
Peru ²		In force: 1 Aug. 1979	273	In force: 23 Jul. 2001
Philippines		In force: 16 Oct. 1974	216	In force: 26 Feb. 2010
Poland ²⁶		Accession: 1 Mar. 2007	193	Accession: 1 Mar. 2007
Portugal ²⁷		Accession: 1 Jul. 1986	193	In force: 30 Apr. 2004
Qatar	In force: 21 Jan. 2009	In force: 21 Jan. 2009	747	
Republic of Moldova	Amended: 1 Sep. 2011	In force: 17 May 2006	690	In force: 1 Jun. 2012
Romania ²⁸		Accession: 1 May 2010	193	Accession: 1 May 2010
Russian Federation		In force: 10 Jun. 1985	327*	In force: 16 Oct. 2007
Rwanda	In force: 17 May 2010	In force: 17 May 2010	801	In force: 17 May 2010
Saint Kitts and Nevis ⁵	Amended: 19 Aug. 2016	In force: 7 May 1996	514	In force: 19 May 2014
Saint Lucia ⁵	X	In force: 2 Feb. 1990	379	
Saint Vincent and the Grenadines ⁵	X	In force: 8 Jan. 1992	400	
Samoa	X	In force: 22 Jan. 1979	268	
San Marino	Amended: 13 May 2011	In force: 21 Sep. 1998	575	
<i>Sao Tome and Principe</i>	<i>Approved: 21 Nov. 2019</i>	<i>Approved: 21 Nov. 2019</i>		<i>Approved: 21 Nov. 2019</i>
Saudi Arabia	X	In force: 13 Jan. 2009	746	
Senegal	Amended: 6 Jan. 2010	In force: 14 Jan. 1980	276	In force: 24 Jul. 2017
Serbia ²⁹		In force: 28 Dec. 1973	204	In force: 17 Sep. 2018
Seychelles	Amended: 31 Oct. 2006	In force: 19 Jul. 2004	635	In force: 13 Oct. 2004
Sierra Leone	X	In force: 4 Dec. 2009	787	
Singapore	Amended: 31 Mar. 2008	In force: 18 Oct. 1977	259	In force: 31 Mar. 2008
Slovakia ³⁰		Accession: 1 Dec. 2005	193	Accession: 1 Dec. 2005
Slovenia ³¹		Accession: 1 Sep. 2006	193	Accession: 1 Sep. 2006
Solomon Islands	X	In force: 17 Jun. 1993	420	

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
<i>Somalia</i>				
South Africa		In force: 16 Sep. 1991	394	In force: 13 Sep. 2002
Spain		Accession: 5 Apr. 1989	193	In force: 30 Apr. 2004
Sri Lanka		In force: 6 Aug. 1984	320	Approved: 12 Sep. 2018
<i>State of Palestine</i> ³²	<i>Signed: 14 Jun. 2019</i>	<i>Signed: 14 Jun. 2019</i>		
Sudan	X	In force: 7 Jan. 1977	245	
Suriname ²	X	In force: 2 Feb. 1979	269	
Sweden ³³		Accession: 1 Jun. 1995	193	In force: 30 Apr. 2004
Switzerland		In force: 6 Sep. 1978	264	In force: 1 Feb. 2005
Syrian Arab Republic		In force: 18 May 1992	407	
Tajikistan		In force: 14 Dec. 2004	639	In force: 14 Dec. 2004
Thailand		In force: 16 May 1974	241	In force: 17 Nov. 2017
<i>Timor-Leste</i>	<i>Signed: 6 Oct. 2009</i>	<i>Signed: 6 Oct. 2009</i>		<i>Signed: 6 Oct. 2009</i>
Togo	Amended: 8 Oct. 2015	In force: 18 Jul. 2012	840	In force: 18 Jul. 2012
Tonga	Amended: 3 Apr. 2018	In force: 18 Nov. 1993	426	
Trinidad and Tobago ²	X	In force: 4 Nov. 1992	414	
Tunisia		In force: 13 Mar. 1990	381	Signed: 24 May 2005
Turkey		In force: 1 Sep. 1981	295	In force: 17 Jul. 2001
Turkmenistan		In force: 3 Jan. 2006	673	In force: 3 Jan. 2006
Tuvalu	X	In force: 15 Mar. 1991	391	
Uganda	Amended: 24 Jun. 2009	In force: 14 Feb. 2006	674	In force: 14 Feb. 2006
Ukraine		In force: 22 Jan. 1998	550	In force: 24 Jan. 2006
United Arab Emirates		In force: 9 Oct. 2003	622	In force: 20 Dec. 2010
United Kingdom	Signed: 6 Jan. 1993	In force: 14 Dec. 1972 ³⁴ In force: 14 Aug. 1978 Signed: 6 Jan. 1993 ¹⁵ Signed: 7 Jun. 2018*	175 263*	In force: 30 Apr. 2004 Signed: 7 Jun. 2018
United Republic of Tanzania	Amended: 10 Jun. 2009	In force: 7 Feb. 2005	643	In force: 7 Feb. 2005
United States of America	Amended: 3 Jul. 2018	In force: 9 Dec. 1980 In force: 6 Apr. 1989 ¹⁵	288* 366	In force: 6 Jan. 2009
Uruguay ²		In force: 17 Sep. 1976	157	In force: 30 Apr. 2004

State ^a	Small quantities protocols ^b	Safeguards agreements ^c	INFCIRC	Additional protocols
Uzbekistan		In force: 8 Oct. 1994	508	In force: 21 Dec. 1998
Vanuatu	In force: 21 May 2013	In force: 21 May 2013	852	In force: 21 May 2013
Venezuela, Bolivarian Republic of ²		In force: 11 Mar. 1982	300	
Viet Nam		In force: 23 Feb. 1990	376	In force: 17 Sep. 2012
Yemen	X	In force: 14 Aug. 2002	614	
Zambia	X	In force: 22 Sep. 1994	456	Signed: 13 May 2009
Zimbabwe	Amended: 31 Aug. 2011	In force: 26 Jun. 1995	483	

Key

Bold States not party to the Treaty on the Non-Proliferation of Nuclear Weapons (NPT) whose safeguards agreements are of INFCIRC/66-type.

Italics States Parties to the NPT that have not yet brought into force comprehensive safeguards agreements (CSAs) pursuant to Article III of the NPT.

* Voluntary offer safeguards agreement with NPT nuclear-weapon States.

X 'X' in the 'small quantities protocols' column indicates that the State has an operative small quantities protocol (SQP). 'Amended' indicates that the operative SQP is based on the revised SQP standardized text.

NB: This table does not aim at listing all safeguards agreements that the Agency has concluded. Not included are agreements under which the application of safeguards has been suspended upon the entry into force of a CSA. Unless otherwise indicated, the safeguards agreements referred to are CSAs concluded pursuant to the NPT.

^a An entry in this column does not imply the expression of any opinion whatsoever on the part of the Agency concerning the legal status of any country or territory or of its authorities, or concerning the delimitation of its frontiers.

^b Provided that they meet certain eligibility criteria (including that the quantities of nuclear material do not exceed the limits set out in paragraph 37 of INFCIRC/153(Corrected)), countries have the option to conclude an SQP to their CSAs that holds in abeyance the implementation of most of the detailed provisions set out in Part II of the CSAs as long as eligibility criteria continue to apply. This column contains countries whose CSA with an SQP based on the original standard text has been approved by the Board of Governors and for which, as far as the Secretariat is aware, these eligibility criteria continue to apply. For those States that have accepted the revised standard SQP text (approved by the Board of Governors on 20 September 2005) the current status is reflected.

^c The Agency also applies safeguards for Taiwan, China, under two agreements, which entered into force on 13 October 1969 (INFCIRC/133) and 6 December 1971 (INFCIRC/158), respectively.

¹ *Sui generis* comprehensive safeguards agreement. On 28 November 2002, upon approval by the Board of Governors, an exchange of letters entered into force confirming that the safeguards agreement satisfies the requirement of Article III of the NPT.

² Safeguards agreement is pursuant to both the Treaty of Tlatelolco and the NPT.

³ Date refers to the safeguards agreement concluded between Argentina, Brazil, ABACC and the Agency. On 18 March 1997, upon approval by the Board of Governors, an exchange of letters entered into force between Argentina and the Agency confirming that the safeguards agreement satisfies the requirements of Article 13 of the Treaty of Tlatelolco and Article III of the NPT to conclude a safeguards agreement with the Agency.

⁴ The application of safeguards for Austria under the NPT bilateral safeguards agreement (INFCIRC/156), in force since 23 July 1972, was suspended on 31 July 1996, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Austria had acceded, entered into force for Austria.

⁵ Date refers to a safeguards agreement pursuant to Article III of the NPT. Upon approval by the Board of Governors, an exchange of letters entered into force (for Saint Lucia on 12 June 1996 and for Belize, Dominica, Saint Kitts and Nevis and Saint Vincent and the Grenadines on 18 March 1997) confirming that the safeguards agreement satisfies the requirement of Article 13 of the Treaty of Tlatelolco.

⁶ Date refers to the safeguards agreement concluded between Argentina, Brazil, ABACC and the Agency. On 10 June 1997, upon approval by the Board of Governors, an exchange of letters entered into force between Brazil and the Agency confirming that the safeguards agreement satisfies the requirement of Article 13 of the Treaty of Tlatelolco. On 20 September 1999, upon approval by the Board of Governors, an exchange of letters entered into force confirming that the safeguards agreement also satisfies the requirement of Article III of the NPT.

- ⁷ The application of safeguards for Bulgaria under the NPT bilateral safeguards agreement (INFCIRC/178), in force since 29 February 1972, was suspended on 1 May 2009, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Bulgaria had acceded, entered into force for Bulgaria.
- ⁸ Date refers to a safeguards agreement pursuant to Article 13 of the Treaty of Tlatelolco. Upon approval by the Board of Governors, an exchange of letters entered into force (for Chile on 9 September 1996; for Colombia on 13 June 2001; for Panama on 20 November 2003) confirming that the safeguards agreement satisfies the requirement of Article III of the NPT.
- ⁹ The application of safeguards for Croatia under the NPT bilateral safeguards agreement (INFCIRC/463), in force since 19 January 1995, was suspended on 1 April 2017, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Croatia had acceded, entered into force for Croatia.
- ¹⁰ The application of safeguards for Cyprus under the NPT bilateral safeguards agreement (INFCIRC/189), in force since 26 January 1973, was suspended on 1 May 2008, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Cyprus had acceded, entered into force for Cyprus.
- ¹¹ The application of safeguards for the Czech Republic under the NPT bilateral safeguards agreement (INFCIRC/541), in force since 11 September 1997, was suspended on 1 October 2009, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which the Czech Republic had acceded, entered into force for the Czech Republic.
- ¹² The application of safeguards for Denmark under the NPT bilateral safeguards agreement (INFCIRC/176), in force since 1 March 1972, was suspended on 21 February 1977, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193) entered into force for Denmark. Since 21 February 1977, INFCIRC/193 also applies to the Faroe Islands. Upon Greenland's secession from Euratom as of 31 January 1985, INFCIRC/176 re-entered into force for Greenland. The Additional Protocol for Greenland entered into force on 22 March 2013 (INFCIRC/176/Add.1).
- ¹³ The application of safeguards for Estonia under the NPT bilateral safeguards agreement (INFCIRC/547), in force since 24 November 1997, was suspended on 1 December 2005, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Estonia had acceded, entered into force for Estonia.
- ¹⁴ The application of safeguards for Finland under the NPT bilateral safeguards agreement (INFCIRC/155), in force since 9 February 1972, was suspended on 1 October 1995, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Finland had acceded, entered into force for Finland.
- ¹⁵ The safeguards agreement is in connection with Additional Protocol I to the Treaty of Tlatelolco.
- ¹⁶ The NPT safeguards agreement of 7 March 1972 concluded with the German Democratic Republic (INFCIRC/181) is no longer in force with effect from 3 October 1990, on which date the German Democratic Republic acceded to the Federal Republic of Germany.
- ¹⁷ The application of safeguards for Greece under the NPT bilateral safeguards agreement (INFCIRC/166), in force since 1 March 1972, was suspended on 17 December 1981, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Greece had acceded, entered into force for Greece.
- ¹⁸ The application of safeguards for Hungary under the NPT bilateral safeguards agreement (INFCIRC/174), in force since 30 March 1972, was suspended on 1 July 2007, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Hungary had acceded, entered into force for Hungary.
- ¹⁹ The application of safeguards for India under the safeguards agreement between the Agency, Canada and India (INFCIRC/211), in force since 30 September 1971, was suspended as of 20 March 2015. The application of safeguards for India under the following safeguards agreements between the Agency and India was suspended as of 30 June 2016: INFCIRC/260, in force since 17 November 1977; INFCIRC/360, in force since 27 September 1988; INFCIRC/374, in force since 11 October 1989; and INFCIRC/433, in force since 1 March 1994. Items subject to safeguards under the aforementioned safeguards agreements are subject to safeguards under the safeguards agreement between India and the Agency (INFCIRC/754), which entered into force on 11 May 2009.
- ²⁰ Pending entry into force, the Additional Protocol is being applied provisionally for the Islamic Republic of Iran as of 16 January 2016.
- ²¹ The application of safeguards for Latvia under the NPT bilateral safeguards agreement (INFCIRC/434), in force since 21 December 1993, was suspended on 1 October 2008, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Latvia had acceded, entered into force for Latvia.
- ²² The application of safeguards for Lithuania under the NPT bilateral safeguards agreement (INFCIRC/413), in force since 15 October 1992, was suspended on 1 January 2008, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Lithuania had acceded, entered into force for Lithuania.
- ²³ The application of safeguards for Malta under the NPT bilateral safeguards agreement (INFCIRC/387), in force since 13 November 1990, was suspended on 1 July 2007, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Malta had acceded, entered into force for Malta.
- ²⁴ The safeguards agreement was concluded pursuant to both the Treaty of Tlatelolco and the NPT. The application of safeguards under an earlier safeguards agreement pursuant to the Treaty of Tlatelolco, which entered into force on 6 September 1968 (INFCIRC/118), was suspended as of 14 September 1973.
- ²⁵ Whereas the NPT safeguards agreement and SQP with New Zealand (INFCIRC/185) also apply to Cook Islands and Niue, the additional protocol thereto (INFCIRC/185/Add.1) does not apply to those territories. Amendments to the SQP entered into force only for New Zealand on 24 February 2014 (INFCIRC/185/Mod.1).
- ²⁶ The application of safeguards for Poland under the NPT bilateral safeguards agreement (INFCIRC/179), in force since 11 October 1972, was suspended on 1 March 2007, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Poland had acceded, entered into force for Poland.

- ²⁷ The application of safeguards for Portugal under the NPT bilateral safeguards agreement (INFCIRC/272), in force since 14 June 1979, was suspended on 1 July 1986, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Portugal had acceded, entered into force for Portugal.
- ²⁸ The application of safeguards for Romania under the NPT bilateral safeguards agreement (INFCIRC/180), in force since 27 October 1972, was suspended on 1 May 2010, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Romania had acceded, entered into force for Romania.
- ²⁹ The NPT safeguards agreement concluded with the Socialist Federal Republic of Yugoslavia (INFCIRC/204), which entered into force on 28 December 1973, continues to be applied for Serbia to the extent relevant to the territory of Serbia.
- ³⁰ The application of safeguards for Slovakia under the NPT bilateral safeguards agreement with the Czechoslovak Socialist Republic (INFCIRC/173), in force since 3 March 1972, was suspended on 1 December 2005, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Slovakia had acceded, entered into force for Slovakia.
- ³¹ The application of safeguards for Slovenia under the NPT bilateral safeguards agreement (INFCIRC/538), in force since 1 August 1997, was suspended on 1 September 2006, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Slovenia had acceded, entered into force for Slovenia.
- ³² The designation employed does not imply the expression of any opinion whatsoever concerning the legal status of any country or territory or of its authorities, or concerning the delimitation of its frontiers.
- ³³ The application of safeguards for Sweden under the NPT bilateral safeguards agreement (INFCIRC/234), in force since 14 April 1975, was suspended on 1 June 1995, on which date the agreement of 5 April 1973 between the non-nuclear-weapon States of Euratom, Euratom and the Agency (INFCIRC/193), to which Sweden had acceded, entered into force for Sweden.
- ³⁴ Date refers to the INFCIRC/66-type safeguards agreement, concluded between the United Kingdom and the Agency, which remains in force.

Table A7. Participation in multilateral treaties for which the Director General is the depositary (status as of 31 December 2019)

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/CPNPM	VC	A-VC	CSC	JP
*	Afghanistan						X					
*	Albania	X	X	X	X	X	X	X				
*	Algeria		X	X			X	X				
	Andorra						X					
*	Angola		X									
*	Antigua and Barbuda						X	X				
*	Argentina	X	X	X	X	X	X	X	X	X	X	
*	Armenia		X	X	X	X	X	X	X			
*	Australia	X	X	X	X	X	X	X				
*	Austria		X	X	X	X	X	X				
*	Azerbaijan						X	X				
*	Bahamas						X					
*	Bahrain		X		X		X	X				
*	Bangladesh		X	X	X		X	X				
*	Barbados											
*	Belarus	X	X	X	X	X	X		X	X		
*	Belgium	X	X	X	X	X	X	X				
*	Belize											
*	Benin	X	X	X	X	X	X	X	X	X	X	X
	Bhutan											
*	Bolivia, Plurinational State of	X	X	X	X	X	X	X	X			
*	Bosnia and Herzegovina	X	X	X	X	X	X	X	X	X		
*	Botswana		X	X		X	X	X				
*	Brazil	X	X	X	X	X	X		X			
*	Brunei Darussalam	X										
*	Bulgaria	X	X	X	X	X	X	X	X			X

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/GPPNM	VC	A-VC	CSC	JP
*	Burkina Faso		X	X			X	X				
*	Burundi											
	Cabo Verde						X					
*	Cambodia		X		X		X					
*	Cameroon	X	X	X			X	X	X			X
*	Canada	X	X	X	X	X	X	X			X	
*	Central African Republic						X					
*	Chad						X	X				
*	Chile	X	X	X	X	X	X	X	X			X
*	China	X	X	X	X	X	X	X				
*	Colombia	X	X	X			X	X				
	Comoros						X	X				
*	Congo	X										
*	Costa Rica		X	X			X	X				
*	Côte d'Ivoire	X					X	X				
*	Croatia	X	X	X	X	X	X	X	X			X
*	Cuba	X	X	X	X	X	X	X	X			
*	Cyprus	X	X	X	X	X	X	X				
*	Czech Republic	X	X	X	X	X	X	X	X			X
	Dem. People's Rep. of Korea											
*	Dem. Rep. of the Congo	X					X					
*	Denmark	X	X	X	X	X	X	X				X
*	Djibouti						X	X				
*	Dominica						X					
*	Dominican Republic		X				X	X				
*	Ecuador	X	X	X			X	X				
*	Egypt	X	X	X					X			X
*	El Salvador		X	X			X	X				

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/CPNM	VC	A-VC	CSC	JP
	Equatorial Guinea						X					
*	Eritrea											
*	Estonia	X	X	X	X	X	X	X	X			X
*	Eswatini						X	X				
*	Ethiopia											
*	Fiji						X	X				
*	Finland	X	X	X	X	X	X	X				X
*	France		X	X	X	X	X	X				X
*	Gabon		X	X		X	X	X				
	Gambia											
*	Georgia	X	X	X		X	X	X				
*	Germany	X	X	X	X	X	X	X				X
*	Ghana	X	X	X	X	X	X	X			X	
*	Greece	X	X	X	X	X	X	X				X
*	Grenada						X					
*	Guatemala		X	X			X					
	Guinea						X					
	Guinea-Bissau						X					
*	Guyana						X					
*	Haiti											
*	Holy See	X										
*	Honduras						X					
*	Hungary	X	X	X	X	X	X	X	X			X
*	Iceland	X	X	X	X	X	X	X				
*	India	X	X	X	X		X	X			X	
*	Indonesia	X	X	X	X	X	X	X				
*	Iran, Islamic Republic of	X	X	X								
*	Iraq	X	X	X			X					

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/CPNM	VC	A-VC	CSC	JP
*	Ireland	X	X	X	X	X	X	X				
*	Israel		X	X			X	X				
*	Italy	X	X	X	X	X	X	X				X
*	Jamaica	X					X	X				
*	Japan	X	X	X	X	X	X	X			X	
*	Jordan	X	X	X	X	X	X	X	X	X		
*	Kazakhstan	X	X	X	X	X	X	X	X	X		
*	Kenya						X	X				
	Kiribati											
*	Korea, Republic of	X	X	X	X	X	X	X				
*	Kuwait	X	X	X	X		X	X				
*	Kyrgyzstan					X	X	X				
*	Lao People's Dem. Rep.		X	X			X					
*	Latvia	X	X	X	X	X	X	X	X	X		X
*	Lebanon		X	X	X		X		X			
*	Lesotho	X	X	X		X	X	X				
*	Liberia											
*	Libya		X	X	X		X	X				
*	Liechtenstein		X	X			X	X				
*	Lithuania	X	X	X	X	X	X	X	X			X
*	Luxembourg	X	X	X	X	X	X	X				
*	Madagascar		X	X	X	X	X	X				
*	Malawi						X					
*	Malaysia		X	X								
	Maldives											
*	Mali		X	X	X		X	X				
*	Malta				X	X	X	X				
*	Marshall Islands						X	X				

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/GPPNM	VC	A-VC	CSC	JP
*	Mauritania		X	X		X	X	X				
*	Mauritius	X	X	X		X			X			
*	Mexico	X	X	X	X	X	X	X	X			
	Micronesia, Federated States of											
*	Monaco		X	X			X	X				
*	Mongolia	X	X	X			X					
*	Montenegro	X	X	X	X	X	X	X	X	X	X	X
*	Morocco	X	X	X	X	X	X	X		X	X	
*	Mozambique	X	X	X			X					
*	Myanmar		X		X		X	X				
*	Namibia						X	X				
	Nauru						X	X				
*	Nepal											
*	Netherlands	X	X	X	X	X	X	X				X
*	New Zealand	X	X	X			X	X				
*	Nicaragua	X	X	X			X	X				
*	Niger	X		X	X	X	X	X	X	X		
*	Nigeria	X	X	X	X	X	X	X	X			
	Niue						X					
*	North Macedonia		X	X	X	X	X	X	X			
*	Norway	X	X	X	X	X	X	X				X
*	Oman	X	X	X	X	X	X					
*	Pakistan	X	X	X	X		X	X				
*	Palau	X					X					
	Palestine						X ^b	X ^b				
*	Panama		X	X			X	X				
*	Papua New Guinea											
*	Paraguay	X	X	X	X	X	X	X				

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/CPNM	VC	A-VC	CSC	JP
*	Peru		X	X	X	X	X	X	X			
*	Philippines	X	X	X			X		X			
*	Poland	X	X	X	X	X	X	X	X	X		X
*	Portugal	X	X	X	X	X	X	X				
*	Qatar		X	X			X	X				
*	Republic of Moldova	X	X	X	X	X	X	X	X			
*	Romania	X	X	X	X	X	X	X	X	X	X	X
*	Russian Federation	X	X	X	X	X	X	X	X			
*	Rwanda						X		X			
	Saint Kitts and Nevis						X	X				
*	Saint Lucia						X	X				
*	Saint Vincent and the Grenadines		X	X					X			X
	Samoa											
*	San Marino						X	X				
	Sao Tome and Principe											
*	Saudi Arabia		X	X	X	X	X	X	X	X		
*	Senegal	X	X	X	X	X	X	X	X			
*	Serbia	X	X	X	X	X	X	X	X			
*	Seychelles						X	X				
*	Sierra Leone											
*	Singapore	X	X	X	X		X	X				
*	Slovakia	X	X	X	X	X	X	X	X			X
*	Slovenia	X	X	X	X	X	X	X				X
	Solomon Islands											
	Somalia											
*	South Africa	X	X	X	X	X	X					
	South Sudan											
*	Spain	X	X	X	X	X	X	X				

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/CPNM	VC	A-VC	CSC	JP
*	Sri Lanka		X	X	X							
*	Sudan						X					
	Suriname											
*	Sweden	X	X	X	X	X	X	X				X
*	Switzerland	X	X	X	X	X	X	X				
*	Syrian Arab Republic	X	X	X	X							
*	Tajikistan	X	X	X		X	X	X				
*	Thailand	X	X	X	X	X	X	X				
	Timor Leste											
*	Togo						X					
	Tonga						X					
*	Trinidad and Tobago						X		X			
*	Tunisia	X	X	X	X		X	X				
*	Turkey	X	X	X	X		X	X				X
*	Turkmenistan						X	X				
	Tuvalu											
*	Uganda						X					
*	Ukraine	X	X	X	X	X	X	X	X			X
*	United Arab Emirates		X	X	X	X	X	X		X	X	X
*	United Kingdom	X	X	X	X	X	X	X				
*	United Republic of Tanzania		X	X			X					
*	United States of America		X	X	X	X	X	X			X	
*	Uruguay		X	X	X	X	X	X	X			X
*	Uzbekistan					X	X	X				
*	Vanuatu											
*	Venezuela, Bolivarian Republic of		X									
*	Viet Nam	X	X	X	X	X	X	X				
*	Yemen						X					

	State/Organization ^a	P&I	ENC	AC	CNS	JC	CPPNM	A/CPNM	VC	A-VC	CSC	JP
*	Zambia						X					
*	Zimbabwe											
	Euratom		X	X	X	X	X	X				
	FAO		X	X								
	WHO		X	X								
	WMO		X	X								

P&I	Agreement on the Privileges and Immunities of the IAEA
ENC	Convention on Early Notification of a Nuclear Accident
AC	Convention on Assistance in the Case of a Nuclear Accident or Radiological Emergency
CNS	Convention on Nuclear Safety
JC	Joint Convention on the Safety of Spent Fuel Management and on the Safety of Radioactive Waste Management
CPPNM	Convention on the Physical Protection of Nuclear Material
A/CPNM	Amendment to the Convention on the Physical Protection of Nuclear Material
VC	Vienna Convention on Civil Liability for Nuclear Damage
A-VC	Protocol to Amend the Vienna Convention on Civil Liability for Nuclear Damage
CSC	Convention on Supplementary Compensation for Nuclear Damage
JP	Joint Protocol Relating to the Application of the Vienna Convention and the Paris Convention
*	Agency Member State
X	Party

^a An entry in this column does not imply the expression of any opinion whatsoever on the part of the Agency concerning the legal status of any country or territory or of its authorities, or concerning the delimitation of its frontiers.

^b Acceded as State of Palestine.

Table A8. Member States that have concluded a Revised Supplementary Agreement (status as of 31 December 2019)^a

Afghanistan	Georgia	North Macedonia
Albania	Ghana	Oman
Algeria	Greece	Pakistan
Angola	Guatemala	Palau
Antigua and Barbuda	Guyana	Panama
Argentina	Haiti	Paraguay
Armenia	Honduras	Peru
Azerbaijan	Hungary	Philippines
Bahrain	Iceland	Poland
Bangladesh	Indonesia	Portugal
Belarus	Iran, Islamic Republic of	Qatar
Belize	Iraq	Republic of Moldova
Benin	Ireland	Romania
Bolivia, Plurinational State of	Israel	Rwanda
Bosnia and Herzegovina	Jamaica	Saint Lucia
Botswana	Jordan	Saint Vincent and the Grenadines
Brazil	Kazakhstan	Saudi Arabia
Bulgaria	Kenya	Senegal
Burkina Faso	Korea, Republic of	Serbia
Burundi	Kuwait	Seychelles
Cambodia	Kyrgyzstan	Sierra Leone
Cameroon	Lao People's Democratic Republic	Singapore
Central African Republic	Latvia	Slovakia
Chad	Lebanon	Slovenia
Chile	Lesotho	South Africa
China	Liberia	Spain
Colombia	Libya	Sri Lanka
Congo	Lithuania	Sudan
Costa Rica	Madagascar	Syrian Arab Republic
Côte d'Ivoire	Malawi	Tajikistan
Croatia	Malaysia	Thailand
Cuba	Mali	Togo
Cyprus	Malta	Trinidad and Tobago
Czech Republic	Marshall Islands	Tunisia
Democratic Republic of the Congo	Mauritania	Turkey
Djibouti	Mauritius	Turkmenistan
Dominica	Mexico	Uganda
Dominican Republic	Mongolia	Ukraine
Ecuador	Montenegro	United Arab Emirates
Egypt	Morocco	United Republic of Tanzania
El Salvador	Mozambique	Uruguay
Eritrea	Myanmar	Uzbekistan
Estonia	Namibia	Vanuatu
Eswatini	Nepal	Venezuela, Bolivarian Republic of
Ethiopia	Nicaragua	Viet Nam
Fiji	Niger	Zambia
Gabon	Nigeria	Zimbabwe

^a In 2019, 5 RSAs were concluded. By the end of the year, there were 141 States party to an RSA.

**Table A9. Acceptance of Amendment to Article VI of the Agency's Statute
(status as of 31 December 2019)**

Afghanistan	Greece	Norway
Albania	Holy See	Pakistan
Algeria	Hungary	Panama
Argentina	Iceland	Peru
Austria	Ireland	Poland
Belarus	Israel	Portugal
Bosnia and Herzegovina	Italy	Republic of Moldova
Brazil	Japan	Romania
Bulgaria	Kazakhstan	San Marino
Canada	Korea, Republic of	Slovakia
Colombia	Latvia	Slovenia
Croatia	Libya	South Africa
Cyprus	Liechtenstein	Spain
Czech Republic	Lithuania	Sweden
Denmark	Luxembourg	Switzerland
El Salvador	Malta	Tunisia
Estonia	Mexico	Turkey
Ethiopia	Monaco	Ukraine
Finland	Morocco	United Kingdom
France	Myanmar	Uruguay
Germany	Netherlands	

**Table A10. Acceptance of Amendment to Article XIV.A of the Agency's Statute
(status as of 31 December 2019)**

Albania	Greece	Norway
Algeria	Holy See	Pakistan
Argentina	Hungary	Peru
Australia	Iceland	Poland
Austria	Iran, Islamic Republic of	Portugal
Belarus	Ireland	Republic of Moldova
Bosnia and Herzegovina	Italy	Romania
Brazil	Japan	San Marino
Bulgaria	Kazakhstan	Seychelles
Canada	Kenya	Slovakia
Colombia	Korea, Republic of	Slovenia
Croatia	Latvia	South Africa
Cyprus	Liechtenstein	Spain
Czech Republic	Lithuania	Sweden
Denmark	Luxembourg	Switzerland
Ecuador	Malta	Syrian Arab Republic
Estonia	Mexico	Tunisia
Finland	Monaco	Turkey
France	Myanmar	Ukraine
Germany	Netherlands	United Kingdom

Table A11. Multilateral treaties negotiated and adopted under the auspices of the Agency and/or for which the Director General is the depositary (status and relevant developments)

Agreement on the Privileges and Immunities of the IAEA (reproduced in INFCIRC/9/Rev.2). In 2019, there were 4 new Parties to the Agreement. By the end of the year, there were 90 Parties.

Convention on Early Notification of a Nuclear Accident (reproduced in INFCIRC/335). Entered into force on 27 October 1986. In 2019, there were 2 new Parties to the Convention. By the end of the year, there were 124 Parties.

Convention on Assistance in the Case of a Nuclear Accident or Radiological Emergency (reproduced in INFCIRC/336). Entered into force on 26 February 1987. In 2019, there were 2 new Parties to the Convention. By the end of the year, there were 119 Parties.

Convention on Nuclear Safety (reproduced in INFCIRC/449). Entered into force on 24 October 1996. In 2019, there were 3 new Parties to the Convention. By the end of the year, there were 88 Parties.

Joint Convention on the Safety of Spent Fuel Management and on the Safety of Radioactive Waste Management (reproduced in INFCIRC/546). Entered into force on 18 June 2001. In 2019, there were 2 new Parties to the Convention. By the end of the year, there were 82 Parties.

Convention on the Physical Protection of Nuclear Material (reproduced in INFCIRC/274/Rev.1). Entered into force on 8 February 1987. In 2019, there were 2 new Parties to the Convention and 1 new Contracting State. By the end of the year, there were 159 Parties and 1 Contracting State.

Amendment to the Convention on the Physical Protection of Nuclear Material. Entered into force on 8 May 2016. In 2019, there were 4 new Parties to the Amendment and 1 new Contracting State. By the end of the year, there were 122 Parties and 1 Contracting State.

Vienna Convention on Civil Liability for Nuclear Damage (reproduced in INFCIRC/500). Entered into force on 12 November 1977. In 2019, there were 2 new Parties to the Convention. By the end of the year, there were 42 Parties.

Optional Protocol Concerning the Compulsory Settlement of Disputes (reproduced in INFCIRC/500/Add.3). Entered into force on 13 May 1999. In 2019, the status of the Protocol remained unchanged with 2 Parties.

Protocol to Amend the Vienna Convention on Civil Liability for Nuclear Damage (reproduced in INFCIRC/566). Entered into force on 4 October 2003. In 2019, there was 1 new Party to the Protocol. By the end of the year, there were 14 Parties.

Convention on Supplementary Compensation for Nuclear Damage (reproduced in INFCIRC/567). Entered into force on 15 April 2015. In 2019, there was 1 new Party to the Convention. By the end of the year, there were 11 Parties.

Joint Protocol Relating to the Application of the Vienna Convention and the Paris Convention (reproduced in INFCIRC/402). Entered into force on 27 April 1992. In 2019, there were 2 new Parties to the Protocol. By the end of the year, there were 30 Parties.

Regional Co-operative Agreement for Research, Development and Training Related to Nuclear Science and Technology, 2017 (2017 RCA) (reproduced in INFCIRC/919). Entered into force on 11 June 2017. In 2019, the status of the Agreement remained unchanged with 17 Parties.

African Regional Co-operative Agreement for Research, Development and Training Related to Nuclear Science and Technology (AFRA) (Fifth Extension) (reproduced in INFCIRC/377/Add.20). Entered into force on 4 April 2015. In 2019, the status of the Agreement remained unchanged with 41 Parties.

Co-operation Agreement for the Promotion of Nuclear Science and Technology in Latin America and the Caribbean (ARCAL) (First Extension) (reproduced in INFCIRC/582/Add.4). Entered into force on 5 September 2015. In 2019, the status of the Agreement remained unchanged with 21 Parties.

Co-operative Agreement for Arab States in Asia for Research, Development and Training Related to Nuclear Science and Technology (ARASIA) (Second Extension) (reproduced in INFCIRC/613/Add.3). Entered into force on 29 July 2014. In 2019, the status of the Agreement remained unchanged with 9 Parties.

Agreement on the Establishment of the ITER International Fusion Energy Organization for the Joint Implementation of the ITER Project (reproduced in INFCIRC/702). Entered into force on 24 October 2007. In 2019, the status of the Agreement remained unchanged with 7 Parties.

Agreement on the Privileges and Immunities of the ITER International Fusion Energy Organization for the Joint Implementation of the ITER Project (reproduced in INFCIRC/703). Entered into force on 24 October 2007. In 2019, the status of the Agreement remained unchanged with 6 Parties.

**Table A12. Nuclear power reactors in operation and under construction in the world
(as of 31 December 2019)^a**

Country	Reactors in operation		Reactors under construction		Nuclear electricity supplied in 2019		Total operating experience through 2019	
	No. of units	Total MW(e)	No. of units	Total MW(e)	TW-h	% of total	Years	Months
Argentina	3	1 641	1	25	7.9	5.9	88	2
Armenia	1	375			2.0	27.8	45	8
Bangladesh			2	2 160				
Belarus			2	2 220				
Belgium	7	5 930			41.4	47.6	303	7
Brazil	2	1 884	1	1 340	15.2	2.7	57	3
Bulgaria	2	2 006			15.9	37.5	167	3
Canada	19	13 554			94.9	14.9	769	6
China	48	45 518	11	10 564	330.1	4.9	370	1
Czech Republic	6	3 932			28.6	35.2	170	10
Finland	4	2 794	1	1 600	22.9	34.7	163	4
France	58	63 130	1	1 630	382.4	70.6	2 280	4
Germany	6	8 113					846	7
Hungary	4	1 902			15.4	49.2	138	2
India	22	6 255	7	4 824	40.7	3.2	526	11
Iran, Islamic Republic of	1	915	1	974	5.9	1.8	8	4
Japan	33	31 679	2	2 653	65.7	7.5	1 899	6
Kazakhstan							25	10
Korea, Republic of	24	23 172	4	5 360	138.8	26.2	572	2
Mexico	2	1 552			10.9	4.5	55	11
Netherlands	1	482			3.7	3.1	75	0
Pakistan	5	1 318	2	2 028	9	6.6	82	5
Romania	2	1 300			10.4	18.5	35	11
Russian Federation	38	28 437	4	4 525	195.5	19.7	1 334	5
Slovakia	4	1 814	2	880	14.3	53.9	172	7

Country	Reactors in operation		Reactors under construction		Nuclear electricity supplied in 2019		Total operating experience through 2019	
	No. of units	Total MW(e)	No. of units	Total MW(e)	TW·h	% of total	Years	Months
Slovenia	1	688			5.5	37.0	38	3
South Africa	2	1 860			13.6	6.7	70	3
Spain	7	7 121			55.9	21.4	343	1
Sweden	7	7 740			64.4	34.0	467	0
Switzerland	4	2 960			25.4	23.9	224	11
Turkey			1	1 114				
Ukraine	15	13 107	2	2 070	78.1	53.9	518	6
United Arab Emirates			4	5 380				
United Kingdom	15	8 923	2	3 260	51.0	15.6	1 619	7
United States of America	96	98 152	2	2 234	809.4	19.7	4 505	8
Total^{b,c,d}	443	392 098	54	57 441	2 586.2		18 329	10

^a Data are from the Agency's Power Reactor Information System (PRIS) (www.iaea.org/pris).

^b Total nuclear electricity supplied in 2019 does not include data from seven German reactor units, as information for these units was not submitted by the time of publication.

^c The total figures include the following data from Taiwan, China: 4 units, 3844 MW(e) in operation; 2 units, 2600 MW(e) under construction.

^d The total operating experience also includes shutdown plants in Italy (80 years, 8 months), Kazakhstan (25 years, 10 months) and Lithuania (43 years, 6 months), and shutdown and operational plants in Taiwan, China (224 years, 1 month).

Table A13. Member State participation in selected Agency activities

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States						
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d	
Afghanistan									
Albania	3			4					
Algeria	6								
Angola				4					
Antigua and Barbuda									
Argentina	42	1	2			1	1		
Armenia	2			2					
Australia	41	1	3						
Austria	10		4		1				
Azerbaijan	1								
Bahamas	1			2					
Bahrain									
Bangladesh	16								
Barbados				1					
Belarus	4		1						
Belgium	15		2						
Belize									
Benin	1								
Bolivia, Plurinational State of	1								
Bosnia and Herzegovina	1		3	6					
Botswana	1								
Brazil	52	3	4			2			
Brunei Darussalam				3					
Bulgaria	5		2						
Burkina Faso	7	1			2				

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States					
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d
Burundi								
Cambodia	1							
Cameroon	5			1	1			
Canada	36		3					
Central African Republic								
Chad	1							
Chile	11		1	7		1		
China	94	2	3	18				
Colombia	5			1				
Congo					1			
Costa Rica	9	1	1	6				
Côte d'Ivoire	1							
Croatia	13		2	11				
Cuba	16		3	5				
Cyprus			1	3				
Czech Republic	6		1					
Dem. Rep. of the Congo								
Denmark	4		1					
Djibouti								
Dominica								
Dominican Republic				21				
Ecuador	6		1	11				
Egypt	18	1	1					
El Salvador				2				
Eritrea								
Estonia	4		1	3				1

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States					
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d
Eswatini								
Ethiopia	7		1	1				
Fiji					3			
Finland	8		1					
France	48	2	5					
Gabon								
Georgia	1			16				
Germany	39		3		3			
Ghana	15			1	1			
Greece	17		6					
Grenada								
Guatemala	7							
Guyana				1				
Haiti								
Holy See								
Honduras				1				
Hungary	18	2	3	27	1			
Iceland			1					
India	73	1	3	33				
Indonesia	24	2	1	11				
Iran, Islamic Republic of	16		3	27				
Iraq			1	5				
Ireland	2		1					
Israel	13		2	13				
Italy	40	2	8					
Jamaica	7		1	5				

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States					
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d
Japan	37	2	5					
Jordan	6		1	3				
Kazakhstan	1		1	26				1
Kenya	15		1	3	1			
Korea, Republic of	32	2	2					
Kuwait	6	1	1	11				1
Kyrgyzstan	1							
Lao People's Dem. Rep.	1			4				
Latvia			1	12				
Lebanon	6		1	15				
Lesotho								
Liberia								
Libya				12				
Liechtenstein								
Lithuania	6		3	6		1		
Luxembourg	1		1					
Madagascar	3		1					
Malawi					1			
Malaysia	27	1	1	14				
Mali	1				2			
Malta								
Marshall Islands								
Mauritania				2				
Mauritius	4			2				
Mexico	31	2	3	19				
Monaco								
Mongolia	2		1	5	1			

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States					
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d
Montenegro	1		1	3				
Morocco	23	1	1	27				1
Mozambique								
Myanmar	4		1	3				
Namibia	2				3			
Nepal	1							
Netherlands	13	1	4		2			
New Zealand	7		1					
Nicaragua	1			2				
Niger								
Nigeria	5			2	1			
North Macedonia	5		1	5				
Norway	3	1	2					
Oman				3	1			
Pakistan	36	1	1					
Palau								
Panama	1		1	5				
Papua New Guinea	1							
Paraguay								
Peru	10		1	7				
Philippines	11	1	1	38				
Poland	24	1	6					
Portugal	9		1					
Qatar			1	3				
Republic of Moldova								
Romania	17		3	15				
Russian Federation	47	1	4	60				

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States					
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d
Rwanda								
Saint Lucia								
Saint Vincent and the Grenadines								
San Marino								
Saudi Arabia	7	1	1	10				
Senegal	7				1			
Serbia	9		5	20				
Seychelles								
Sierra Leone								
Singapore	10		2					
Slovakia	4		3					
Slovenia	7		1	5				
South Africa	31		3	2				
Spain	33	2	2		1			
Sri Lanka	13		1	7				
Sudan	6			2	1			
Sweden	8		2					
Switzerland	8	2	3					
Syrian Arab Republic	10		1					
Tajikistan			1	1				
Thailand	26	1	2	32				1
Togo					1			
Trinidad and Tobago	1							
Tunisia	18		1	1				
Turkey	19		2	16				
Turkmenistan								

Member State	No. of research contracts and agreements	No. of Collaborating Centres	Services provided to Member States					
			ALMERA ^a	Dosimetry audits for radiotherapy	Plant irradiation services	QUANUM ^b	QUAADRIL ^c	QUATRO ^d
Uganda	6			2	1			
Ukraine	20		1	9	1			
United Arab Emirates	2	1	3	3	1			
United Kingdom	47		4					
United Republic of Tanzania	4			2	1			
United States of America	108	1	7		1			
Uruguay	7		1					
Uzbekistan			1					
Vanuatu								
Venezuela, Bolivarian Republic of			2	11				
Viet Nam	23	1	3					
Yemen								
Zambia	8		1					
Zimbabwe	3				1	1		

^a ALMERA: Analytical Laboratories for the Measurement of Environmental Radioactivity.

^b QUANUM: Quality Assurance in Nuclear Medicine.

^c QUAADRIL: Quality Assurance Audit for Diagnostic Radiology Improvement and Learning.

^d QUATRO: Quality Assurance Team for Radiation Oncology.

Table A14. Advisory Missions on Regulatory Infrastructure for Radiation Safety (AMRAS) in 2019

Type	Country
AMRAS	Barbados
AMRAS	Plurinational State of Bolivia
AMRAS	Central African Republic
AMRAS	Dominican Republic
AMRAS	Grenada
AMRAS	Lesotho
AMRAS	Mauritania
AMRAS	Netherlands
AMRAS	Saint Vincent and the Grenadines
AMRAS	Sierra Leone
AMRAS	Zambia
AMRAS follow-up	Sri Lanka

Table A15. Integrated Review Service for Radioactive Waste and Spent Fuel Management, Decommissioning and Remediation (ARTEMIS) missions in 2019

Type	Country
ARTEMIS	Estonia
ARTEMIS	Germany
ARTEMIS	Latvia

Table A16. Education and Training Appraisal (EduTA) missions in 2019

Type	Country
EduTA	Indonesia
EduTA	Kenya
EduTA	Zambia

Table A17. Emergency Preparedness Review (EPREV) missions in 2019

Type	Country
EPREV	Canada
EPREV follow-up	United Arab Emirates

Table A18. IAEA-designated International Centres Based on Research Reactor (ICERR)

Type	Organization/research centre	Country	Year of designation
ICERR	Korea Atomic Energy Research Institute	Republic of Korea	2019
ICERR	Belgian Nuclear Research Centre	Belgium	2017
ICERR	Idaho National Laboratory and Oak Ridge National Laboratory	United States of America	2017
ICERR	Research Institute of Atomic Reactors	Russian Federation	2016
ICERR	CEA Cadarache and CEA Saclay Centre	France	2015

Table A19. Integrated missions of the Agency's Programme of Action for Cancer Therapy (imPACT) in 2019

Type	Country
imPACT	Armenia
imPACT	Burkina Faso
imPACT	Ecuador
imPACT	Seychelles
imPACT	Sri Lanka

Table A20. Integrated Nuclear Infrastructure Review (INIR) missions in 2019

Type	Country
INIR Phase 2	Egypt
INIR Phase 1 follow-up	Ghana

Table A21. Integrated Safety Assessment of Research Reactors (INSARR) missions in 2019

Type	Country
INSARR	Nigeria
INSARR follow-up	Netherlands

Table A22. International Physical Protection Advisory Service (IPPAS) missions in 2019

Type	Country
IPPAS	Belgium
IPPAS	Lebanon
IPPAS	Madagascar
IPPAS	Paraguay
IPPAS	Uruguay

Table A23. Integrated Regulatory Review Service (IRRS) missions in 2019

Type	Country
IRRS	Canada
IRRS	Germany
IRRS	Latvia
IRRS	Norway
IRRS	United Kingdom of Great Britain and Northern Ireland
IRRS follow-up	Armenia
IRRS follow-up	Croatia
IRRS follow-up	Estonia
IRRS follow-up	Indonesia

Table A24. Integrated Research Reactor Utilization Review (IRRUR) missions in 2019

Type	Country
Pilot IRRUR mission	Italy

Table A25. Independent Safety Culture Assessment (ISCA) missions in 2019

Type	Country
ISCA	Thailand
ISCA follow-up	Netherlands

Table A26. Knowledge Management Assist Visit (KMAV) missions in 2019

Type	Organization/nuclear power plant	Country
KMAV	Armenian Nuclear Power Plant	Armenia
KMAV	Eletrobras Eletronuclear	Brazil
KMAV	Korea Hydro & Nuclear Power Company	Republic of Korea
KMAV	Pakistan Atomic Energy Commission	Pakistan

Table A27. Operation and Maintenance Assessment for Research Reactors (OMARR) missions in 2019

Type	Country
OMARR	Indonesia
Pre-OMARR	Indonesia
Pre-OMARR	Thailand
Post-OMARR	Uzbekistan

Table A28. Occupational Radiation Protection Appraisal Service (ORPAS) missions in 2019

Type	Country
ORPAS	Nicaragua
ORPAS	Sri Lanka
ORPAS follow-up	Ghana

Table A29. Operational Safety Review Team (OSART) missions in 2019

Type	Country
OSART	Belarus
OSART	China
OSART	France
OSART	France
OSART	Slovakia
OSART follow-up	China
OSART follow-up	Finland
OSART follow-up	France
OSART follow-up	France
OSART follow-up	Romania
OSART follow-up	Russian Federation
OSART follow-up	Spain
OSART follow-up	United Kingdom of Great Britain and Northern Ireland
OSART follow-up	United States of America

Table A30. Peer Review of Operational Safety Performance Experience (PROSPER) missions in 2019

Type	Country
PROSPER	Russian Federation

Table A31. Safety Aspects of Long Term Operation (SALTO) missions in 2019

Type	Country
SALTO	Mexico
SALTO	South Africa
SALTO	Spain
SALTO	Sweden
SALTO follow-up	Belgium
SALTO follow-up	China

Table A32. Site and External Events Design (SEED) missions in 2019

Type	Country
SEED	Egypt

Table A33. Technical Safety Reviews (TSRs) in 2019

Type	Country
Safety Requirements Review	Egypt