List of satellite missions (alphabetical)

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
ACRIMSAT (Active Cavity Radiometer Irradiance Monitor) **NASA**	Currently being flown	20 Dec 99	01 Oct 07	Will sustain long-term solar luminosity database by providing measurements of total solar irradiance and the solar constant	ACRIM III	Type: Sun-synchronous Altitude: 716 km Period: 90 mins Inclination: 98.13 deg Repeat cycle: LST: 1050 Longitude (if geo): Asc/desc: Ascending URL: acrim.jpl.nasa.gov
ADM-Aeolus (Atmospheric Dynamics Mission (Earth Explorer Core Mission)) **ESA**	Approved	15 Oct 07	15 Oct 10	Will provide wind profile measurements for global 3-D wind field products used for study of atmospheric dynamics, including global transport of energy, water, aerosols, and chemicals	ALADIN	Type: Sun-synchronous Altitude: 408 km Period: Inclination: 96.99 deg Repeat cycle: 7 days LST: Longitude (if geo): Asc/desc: TBD URL: www.esa.int/export/esaLP/aeolus.html
ALOS (Advanced Land Observing Satellite) **JAXA**	Approved	01 Sep 05	01 Sep 10	Cartography, digital terrain models, environmental monitoring, disaster monitoring, civil planning, agriculture and forestry, Earth resources, land surface	AVNIR-2, PALSAR, PRISM	Type: Sun-synchronous Altitude: 692 km Period: 98.7 mins Inclination: 98.16 deg Repeat cycle: 3 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: alos.jaxa.jp/index-e.html
Aqua (Aqua (formerly EOS PM-1)) **NASA**	Currently being flown	04 May 02	04 May 07	Atmospheric dynamics/water and energy cycles, cloud formation, precipitation and radiative properties, air/sea fluxes of energy and moisture, sea ice extent and heat exchange with the atmosphere. Option of 705km or 438km orbit altitude.	AIRS, AMSR-E, AMSU-A, CERES, HSB, MODIS	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 1330 Longitude (if geo): Asc/desc: Ascending URL: eos-pm.gsfc.nasa.gov
Aura (Aura (formerly EOS Chemistry)) **NASA**	Currently being flown	15 Jul 04	15 Jul 10	Chemistry and dynamics of Earth's atmosphere from the ground through the mesosphere.	HiRDLS, MLS (EOS-Aura), OMI, TES	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 1345 Longitude (if geo): Asc/desc: Ascending URL: aura.gsfc.nasa.gov
Baumanets **ROSKOSMOS**	Planned	05 Dec 05	31 Dec 06	Experimental satellite for data transmission, remote sensing, and spacecraft management.	OEA	Type: Sun-synchronous Altitude: 700 km Period: Inclination: 98 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru
BelKA **ROSKOSMOS**	Planned	01 Jan 06	31 Dec 11	Regular imaging of terrestrial sites in visible and near IR ranges with high spatial resolution	MSS (Roskosmos), PSS	Type: Sun-synchronous Altitude: 505 km Period: Inclination: 97.4 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
BIRD (Bi-spectral Infrared Detection) **DLR**	Currently being flown	22 Oct 01	31 Dec 05	Small satellite mission with technical and scientific objectives (Study of thermal processes on the Earth surface)	HSRS, WAOSS-B	Type: Sun-synchronous Altitude: 572 km Period: Inclination: 97.8 deg Repeat cycle: LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.fire.uni-freiburg.de/iffn/tech/tech_9.htm
BISSAT ((Bistatic SAR mission)) **ASI**	Considered	01 Jan 06	01 Jan 08	Evaluation of bistatic radar cross section of natural and man-made targets, image classification, land surface. Receive-only satellite in formation with main mission COSMO-Skymed	BISSAT	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD
CALIPSO (Cloud-Aerosol Lidar and Infrared Pathfinder Satellite Observations) **NASA / CNES**	Approved	15 Apr 05	15 Apr 08	Measurements of aerosol & cloud properties for climate predictions, using a 3 channel lidar and passive instruments in formation with Aqua and CloudSat for coincident observations of radiative fluxes and atmospheric state	CALIOP, IIR, WFC	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: LST: 1330 Longitude (if geo): Asc/desc: Ascending URL: www-calipso.larc.nasa.gov/
CARTOSAT-1 (Indian Remote Sensing Satellite - P5) **ISRO**	Approved	15 Mar 05	01 Jul 09	High precision large-scale cartographic mapping of 1:10000 scale and thematic applications (with merged XS data) at 1:4000 scales	PAN (Cartosat-1)	Type: Sun-synchronous Altitude: 630 km Period: 97.178 mins Inclination: 97.87 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
CARTOSAT-2 **ISRO**	Approved	31 Dec 05	01 Jan 10	High precision large-scale cartographic mapping of 1:10000 scale and thematic applications (with merged XS data) at 1:4000 scales	HR-PAN	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
CBERS-2 (China Brazil Earth Resources Satellite - 2) **CAST / INPE**	Currently being flown	22 Oct 03	18 Aug 07	Earth resources, environmental monitoring, land surface	CCD (CBERS), DCS (CAST), IR-MSS, WFI	Type: Sun-synchronous Altitude: 778 km Period: 100.26 mins Inclination: 98.5 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/ & www.cbers.inpe.br/en/programas/cbers1-2.htm

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
CBERS-2B (China Brazil Earth Resources Satellite - 2B) **CAST / INPE**	Approved	20 Oct 06	20 Oct 08	Earth resources, environmental monitoring, land surface	CCD (CBERS), DCS (CAST), IR-MSS, WFI	Type: Sun-synchronous Altitude: 778 km Period: Inclination: 98.5 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/ & www.cbers.inpe.br/en/programas/cbers1-2.htm
CBERS-3 (China Brazil Earth Resources Satellite - 3) **CAST / INPE**	Approved	20 Oct 08	20 Oct 11	Earth resources, environmental monitoring, land surface	DCS (CAST), IRS, MUX, PAN, WFI-2	Type: Sun-synchronous Altitude: 778 km Period: 100.26 mins Inclination: 98.5 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/ & www.cbers.inpe.br/en/programas/cbers3-4.htm
CBERS-4 **(China Brazil Earth Resources Satellite - 4)** **CAST / INPE**	Approved	20 Oct 11	20 Oct 14	Earth resources, environmental monitoring, land surface	DCS (CAST), IRS, MUX, PAN, WFI-2	Type: Sun-synchronous Altitude: 778 km Period: 100.26 mins Inclination: 98.5 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/ & www.cbers.inpe.br/en/programas/cbers3-4.htm
CHAMP (Challenging Mini-Satellite Payload for Geophysical Research and Application) **DLR**	Currently being flown	15 Jul 00	15 Jul 05	Gravity field, Precise geoid, Magnetic field, Atmospheric physics	CHAMP GPS Sounder, CHAMP gravity package (Accelerometer+GPS), CHAMP magnetometry package (1 Scalar + 2 Vector Magnetometer)	Type: Inclined, non-sunsynchronous Altitude: 470 km Period: Inclination: 87 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: op.gfz-potsdam.de/champ/index_CHAMP.html
CloudSat (CloudSat) **NASA**	Approved	15 Apr 05	15 Feb 07	CloudSat will use advanced radar to "slice" through clouds to see their vertical structure, providing a completely new observational capability from space. One of first satellites to study clouds on global basis. Will fly in formation with Aqua and CALIPSO.	CPR (Cloudsat)	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: LST: 1335 Longitude (if geo): Asc/desc: Ascending URL: cloudsat.atmos.colostate.edu/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
COSMO - SkyMed (COnstellation of small Satellites for Mediterranean basin Observation) **ASI**	Planned	31 Dec 06	31 Dec 20	Environmental monitoring, surveillance and risk management applications, environmental resources management, maritime management, earth topographic mapping, law enforcement, informative / science applications	SAR 2000	Type: Sun-synchronous Altitude: 619 km Period: 97.86 mins Inclination: Repeat cycle: 16 days LST: 600 Longitude (if geo): Asc/desc: Ascending URL: www.alespazio.it/program/tlr/cosmo/cosmo.htm
CRYOSAT (CryoSat (Earth Explorer Opportunity Mission)) **ESA**	Approved	31 Mar 05	31 Mar 08	A radar altimetry mission to determine variations in the thickness of the Earth's continental ice sheets and marine ice cover. Primary objective is to test the prediction of thinning arctic ice due to global warming	DORIS-NG, Laser reflectors (ESA), SIRAL	Type: Inclined, non-sunsynchronous Altitude: 717 km Period: Inclination: 92 deg Repeat cycle: 369 days LST: Longitude (if geo): Asc/desc: TBD URL: www.esa.int/export/esaLP/cryosat.html
DEMETER (Detection of Electro-Magnetic Emissions Transmitted from Earthquake Regions)	Approved	29 Jun 04	29 Jun 06	Micro-satellite to study; ionospheric disturbances related to seismic activity, ionospheric disturbances related to human activity, pre and post-seismic effects in the ionosphere, global information on the Earth's electromagnetic environment	IAP, ICE, IDP, IMSC, ISL	Type: Sun-synchronous Altitude: 800 km Period: Inclination: Repeat cycle: LST: 1030 Longitude (if geo): Asc/desc: TBD URL: smsc.cnes.fr/DEMETER/index.htm
Diademe 1&2 CNES	Currently being flown	15 Feb 67	31 Dec 50	Geodetic measurements using satellite laser ranging	RRA	Type: Inclined, non-sunsynchronous Altitude: 1200 km Period: 108 mins Inclination: 40 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: ilrs.gsfc.nasa.gov/satellite_missions/list_of_satellites/diademe
DMSP F-13 (Defense Meteorological Satellite Program F-13) **NOAA**	Currently being flown	01 Mar 97	30 Sep 05	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide atmospheric, oceanographic, solar-geophyscial, and cloud cover data on a daily basis. (Primary operational satellite)	OLS, SSB/X-2, SSIES-2, SSJ/4, SSM, SSM/I, SSM/T-1, SSM/T-2, SSZ	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: LST: 1812 Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
DMSP F-15 (Defense Meteorological Satellite Program F-15) **NOAA**	Currently being flown	12 Dec 99	30 Sep 06	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide cloud cover data on a daily basis. (Primary operational satellite)	OLS, SSB/X-2, SSIES-2, SSJ/4, SSM, SSM/I, SSM/T-1, SSM/T-2, SSZ	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.9 deg Repeat cycle: LST: 2029 Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-16 (Defense Meteorological Satellite Program F-16) **NOAA**	Approved	15 Oct 03	15 Oct 07	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide cloud cover data on a daily basis.	OLS, SSB/X-2, SSIES-2, SSIES-3, SSJ/4, SSJ/5, SSM, SSM/I, SSM/T-1, SSM/T-2, SSMIS, SSULI, SSUSI, SSZ	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.9 deg Repeat cycle: LST: 2132 Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-17 (Defense Meteorological Satellite Program F-17) **NOAA**	Approved	15 Apr 05	01 Jun 08	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide cloud cover data on a daily basis.	OLS, SSIES-3, SSJ/5, SSM, SSM/T-1, SSMIS, SSULI, SSUSI	Type: Sun-synchronous Altitude: 850 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-18 (Defense Meteorological Satellite Program F-18) **NOAA**	Approved	15 Oct 07	15 Oct 10	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide cloud cover data on a daily basis.	OLS, SSIES-3, SSJ/5, SSM, SSM/T-1, SSMIS, SSULI, SSUSI	Type: Sun-synchronous Altitude: 850 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-19 (Defense Meteorological Satellite Program F-19) **NOAA**	Approved	15 Apr 09	15 Apr 12	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide cloud cover data on a daily basis.	OLS, SSIES-3, SSJ/5, SSM, SSM/T-1, SSMIS, SSULI, SSUSI	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-20 (Defense Meteorological Satellite Program F-20) **NOAA**	Approved	15 Oct 11	15 Oct 14	The long-term meteorological programme of the US Department of Defense (DoD) - with the objective to collect and disseminate worldwide cloud cover data on a daily basis.	OLS, SSIES-3, SSJ/5, SSM, SSM/T-1, SSMIS, SSULI, SSUSI	Type: Sun-synchronous Altitude: 850 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
DSCOVR (formerly Triana) **NASA**	Approved	01 Jan 08	01 Jan 12	Continuously observes the sunlit Earth (full disk) – transmitting an image every 15 minutes for distribution by internet. Studies how solar radiation affects climate. Will be positioned at the Langrange point between Earth and sun.	EPIC, NISTAR, Plasma-Mag	Type: TBD Altitude: 1500000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: triana.gsfc.nasa.gov/home/www-pm.larc.nasa.gov/triana.html
Elektro-L (Geostationary Operational Meteorological Satellite - 2) **ROSHYDROMET / ROSKOSMOS**	Approved	01 Dec 06	31 Dec 12	Hydrometeorology, climatology, disaster management, space environment, ice and snow, land surface, space environment, data collection and communication.	DCS (ROSHYDROMET), GGAK-E, MSU-GS	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -76 Asc/desc: N/A URL: sputnik1.infospace.ru/
Envisat (Environmental Satellite) **ESA**	Currently being flown	01 Mar 02	01 Mar 07	Physical oceanography, land surface, ice and snow, atmospheric chemistry, atmospheric dynamics/water and energy cycles	AATSR, ASAR, ASAR (image mode), ASAR (wave mode), DORIS-NG, ENVISAT Comms, GOMOS, MERIS, MIPAS, MWR (BNSC), RA-2, SCIAMACHY	Type: Sun-synchronous Altitude: 782 km Period: 100.5 mins Inclination: 98.52 deg Repeat cycle: 35 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: envisat.esa.int/
ERBS (Earth Radiation Budget Satellite) **NASA**	Currently being flown	05 Oct 84	30 Apr 05	Earth radiation budget measurements.	ERBE, SAGE II	Type: Inclined, non-sunsynchronous Altitude: 585 km Period: 96.3 mins Inclination: 57 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: asd-www.larc.nasa.gov/erbe/erbs.html
ERS-2 (European Remote Sensing satellite - 2) **ESA**	Currently being flown	21 Apr 95	31 Dec 05	Earth resources plus physical oceanography, ice and snow, land surface, meteorology, geodesy/gravity, environmental monitoring, atmospheric chemistry	AMI/SAR/Image, AMI/SAR/wave, AMI/scatterometer, ATSR/M, ATSR-2, ERS Comms, GOME, MWR (BNSC), RA	Type: Sun-synchronous Altitude: 782 km Period: 100.5 mins Inclination: 98.52 deg Repeat cycle: 35 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.esa.int/export/esaEO/SEMGWH2VQUD_index_0_m.html
ESA Future Missions **ESA**	Considered	01 Jan 08	01 Jan 18	Physical Oceanogreaphy, land surface, ice and snow, atmospheric dynamics/water and energy cycles	ATLID, CPR, MASTER, SPECTRA	Type: TBD Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.esa.int/export/esaLP/index.html

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
FedSat (Federation Satellite) **CSIRO / CRCSS**	Currently being flown	14 Dec 02	14 Dec 05	Communications, data relay, near Earth environment, upper atmospheric physics, meteorology	Communications payload (Ka and UHF band), Fluxgate magnetometer, GPS receiver	Type: Sun-synchronous Altitude: 803 km Period: 101 mins Inclination: 98.6 deg Repeat cycle: LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.crcss.csiro.au/
FY-2C (FY-2C Geostationary Meteorological Satellite) **NRSCC**	Currently being flown	19 Oct 04	19 Oct 07	Meteorology and environmental monitoring. Data collection and redistribution	IVISSR (FY-2)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: TBD URL:
FY-2D (FY-2D Geostationary Meteorological Satellite) **NRSCC**	Planned	31 Dec 06	31 Dec 09	Meteorology and environmental monitoring. Data collection and redistribution	IVISSR (FY-2)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: TBD URL:
FY-2E (FY-2E Geostationary Meteorological Satellite) **NRSCC**	Planned	31 Dec 09	31 Dec 12	Meteorology and environmental monitoring. Data collection and redistribution	IVISSR (FY-2)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: TBD URL:
FY-3A (FY-3A Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	01 Jan 06	01 Jan 08	Meteorology and environmental monitoring. Data collection and redistribution	IRAS, MERSI, MWRI, MWTS, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:
FY-3B (FY-3B Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	31 Dec 06	31 Dec 08	Meteorology and environmental monitoring. Data collection and redistribution	IRAS, MERSI, MWRI, MWTS, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:
FY-3C (FY-3C Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	31 Dec 08	31 Dec 10	Meteorology and environmental monitoring. Data collection and redistribution	IMWTS, IRAS, MERSI, MIRAS, MWHS, MWRI, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
FY-3D (FY-3D Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	31 Dec 10	31 Dec 12	Meteorology and environmental monitoring. Data collection and redistribution	IMWTS, IRAS, MERSI, MIRAS, MWHS, MWRI, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:
FY-3E (FY-3E Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	31 Dec 12	31 Dec 14	Meteorology and environmental monitoring. Data collection and redistribution	IMWTS, IRAS, MERSI, MIRAS, MWHS, MWRI, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:
FY-3F (FY-3F Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	31 Dec 14	31 Dec 16	Meteorology and environmental monitoring. Data collection and redistribution	IMWTS, IRAS, MERSI, MIRAS, MWHS, MWRI, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:
FY-3G (FY-3G Polar-orbiting Meteorological Satellite) **NRSCC**	Planned	31 Dec 16	31 Dec 18	Meteorology and environmental monitoring. Data collection and redistribution	IMWTS, IRAS, MERSI, MIRAS, MWHS, MWRI, OP, TOM, VIRR	Type: Sun-synchronous Altitude: 890 km Period: Inclination: Repeat cycle: 98.728 deg LST: 1010 Longitude (if geo): Asc/desc: Descending URL:
GCOM-C (Global Climate Observation Mission-C) **JAXA**	Considered	01 Jan 10	01 Jan 15	Atmospheric and terrestrial observation	GLI follow-on	Type: Sun-synchronous Altitude: 800 km Period: Inclination: Repeat cycle: LST: 1330 Longitude (if geo): Asc/desc: Descending URL:
GCOM-W (Global Climate Observation Mission-W) **JAXA**	Considered	01 Jan 09	01 Jan 14	Sea surface observation	AMSR follow-on, Scatterometer (JAXA)	Type: Sun-synchronous Altitude: 800 km Period: Inclination: Repeat cycle: LST: 1330 Longitude (if geo): Asc/desc: Descending URL:

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
Glory **NASA**	Planned	01 Dec 07	01 Dec 10	Concentration and nature of both natural and anthropogenic aerosols (BC, sulfates, etc.) with accuracy and coverage sufficient for quantification of the aerosol effect on climate, the anthropogenic component of this effect, and the long-term change of this effect caused by natural and anthropogenic factors	APS, TIM	Type: Sun-synchronous Altitude: 824 km Period: 101 mins Inclination: 1030 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL:
GMS-5 (Geostationary Meteorogical Satellite - 5) **JAXA / JMA**	Currently being flown	18 Mar 95	01 Jun 05	Meteorology	DCS (JAXA), GMS Comms, VISSR (GMS-5)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -140 Asc/desc: N/A URL: spaceinfo.jaxa.jp/db/kaihatu/eisei/eisei_e/gms_5_e.html
GOCE (Gravity Field and Steady-State Ocean Circulation Explorer (Earth Explorer Core Mission)) **ESA**	Approved	15 Feb 06	15 Feb 08	Research in steady-state ocean circulation, physics of Earth's interior and levelling systems (based on GPS). Will also provide unique data set required to formulate global and regional models of the Earth's gravity field and geoid.	EGG, GPS (ESA), Laser reflectors (ESA)	Type: Sun-synchronous Altitude: 250 km Period: Inclination: 96.5 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.esa.int/export/esaLP/goce.html
GOES-9 (Geostationary Operational Environmental Satellite - 9) **NOAA**	Currently being flown	23 May 95	15 Jan 05	Meteorology (primary mission), search and rescue, space environment monitoring, data collection, platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 255 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-10 (Geostationary Operational Environmental Satellite - 10) **NOAA**	Currently being flown	25 Apr 97	15 Jan 06	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 135 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-11 (Geostationary Operational Environmental Satellite - 11) **NOAA**	Currently being flown	03 May 00	15 Jul 11	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 103 Asc/desc: N/A URL: www.oso.noaa.gov/goes/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
GOES-12 (Geostationary Operational Environmental Satellite - 12) **NOAA**	Currently being flown	23 Jul 01	15 Jan 11	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, SXI, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 75 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-N (Geostationary Operational Environmental Satellite - N) **NOAA**	Approved	14 Apr 05	14 Apr 17	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, SXI, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 75 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-O (Geostationary Operational Environmental Satellite - O) **NOAA**	Approved	07 Apr 07	07 Apr 19	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 75 Asc/desc: TBD URL: www.oso.noaa.gov/goes/
GOES-P (Geostationary Operational Environmental Satellite - P) **NOAA**	Approved	15 Oct 08	15 Oct 20	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	DCS (NOAA), GOES Comms, Imager, S&R (GOES), SEM (GOES), Sounder, SXI, WEFAX	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 135 Asc/desc: TBD URL: www.oso.noaa.gov/goes/
GOES-R (Geostationary Operational Environmental Satellite - R) **NOAA**	Approved	31 Oct 12	31 Oct 20	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX	ABI, EHIS, EUVS, Geomicrowave sounder, GLM, HES, Magnetometer (NOAA), MPS, SGPS, SXI, SXS	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): 135 Asc/desc: URL: www.osd.noaa.gov/goes_R/index.htm
GOSAT (Greenhouse gases Observing Satellite) **JAXA**	Planned	01 Feb 08	01 Feb 13	Observation of Greenhouse gases	Cloud Sensor, GHG Sensor	Type: Sun-synchronous Altitude: 666 km Period: 98 mins Inclination: 98 deg Repeat cycle: 3 days LST: Longitude (if geo): Asc/desc: TBD URL: www.jaxa.jp/missions/projects/sat/eos/gosat/index_e.html

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
GPM Constellation (Global Precipitation Measurement Mission Constellation spacecraft) **NASA**	Planned	01 Nov 10	01 Nov 14	Study of global precipitation, evaporation, and cycling of water are changing. The mission comprises a primary spacecraft with active and passive microwave instruments, and a number of 'constellation spacecraft with passive microwave instruments.	GMI	Type: Inclined, non-sunsynchronous Altitude: 600 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: gpm.gsfc.nasa.gov/
GPM Core (Global Precipitation Measurement Mission Core spacecraft) **NASA**	Planned	01 Nov 09	01 Nov 13	Study of global precipitation, evaporation, and cycling of water are changing. The mission comprises a primary spacecraft with active and passive microwave instruments, and a number of 'constellation spacecraft with passive microwave instruments	DPR, GMI	Type: Inclined, non-sunsynchronous Altitude: 400 km Period: Inclination: 65 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: gpm.gsfc.nasa.gov/gpm.gsfc.nasa.gov/
GRACE (Gravity Recovery and Climate Experiment) **NASA**	Currently being flown	17 Mar 02	01 Mar 07	Extremely high precision gravity measurements for use in construction of gravity field models	GPS (GRACE), HAIRS	Type: Inclined, non-sunsynchronous Altitude: 400 km Period: 94 mins Inclination: 89 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.csr.utexas.edu/grace/
HJ-1A (Disaster and Environment Monitoring and Forecast Small Satellite A) **CAST**	Planned	01 Dec 06	01 Dec 09	Disaster and Environment Monitoring and Forecast	CCD (HJ, HY), HSI (HJ-1A)	Type: Sun-synchronous Altitude: 649 km Period: Inclination: 97.9 deg Repeat cycle: 31 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/
HJ-1B **(Disaster and Environment Monitoring and Forecast Small Satellite B)** **CAST**	Planned	01 Dec 06	01 Dec 09	Disaster and Environment Monitoring and Forecast	CCD (HJ, HY), IR (HJ-1B)	Type: Sun-synchronous Altitude: 649 km Period: Inclination: 97.9 deg Repeat cycle: 31 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/
HJ-1C (Disaster and Environment Monitoring and Forecast Small Satellite B) **CAST**	Planned	01 May 07	01 May 10	Disaster and Environment Monitoring and Forecast	S-band SAR	Type: Sun-synchronous Altitude: 499 km Period: Inclination: 97.3 deg Repeat cycle: 31 days LST: 600 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
HY-1B (Ocean color satellite B) **CAST**	Planned	01 Dec 06	01 Dec 09	Detecting ocean color and sea surface temperature	COCTS, CZI	Type: Altitude: 798 km Period: Inclination: 98.6 deg Repeat cycle: 7 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.cast.cn/
HYDROS (Hydrosphere State) **NASA**	Planned	01 Dec 10	01 Dec 14	Measure soil moisture content and freeze-thaw state	HYDROS	Type: Sun-synchronous Altitude: 670 km Period: Inclination: 98 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: hydros.gsfc.nasa.gov/
Hyperspectral Mission (Hyperspectral Earth Observer) **ASI**	Considered	01 Jan 09	31 Dec 14	Land surface, agriculture and forestry, regional geology, land use studies, water resources, vegetation studies, coastal studies and soils	CIA, HYC	Type: Sun-synchronous Altitude: 620 km Period: 97 mins Inclination: 91.87 deg Repeat cycle: 16 days LST: 1000 Longitude (if geo): Asc/desc: Descending URL: www.ifac.cnr.it/ot/hyperspectral_workshop_2004.html
ICESat (Ice, Cloud, and Land Elevation Satellite) **NASA**	Currently being flown	12 Jan 03	30 Jun 05	Monitors mass balance of polar ice sheets and their contribution to global sea level change. Secondary goals: cloud heights and vertical structure of clouds/aerosols; roughness, reflectivity, vegetation heights, snow-cover.	GLAS	Type: Inclined, non-sunsynchronous Altitude: 600 km Period: 97 mins Inclination: 94 deg Repeat cycle: 183 days LST: Longitude (if geo): Asc/desc: N/A URL: icesat.gsfc.nasa.gov/
IGPM **ASI**	Considered	01 Jan 06	01 Jan 08	To detect and measure rain and snowfall, to demonstrate the feasibility of high quality measurements of light rain and snow from space	IGPM radiometer, IGPM rain radar	Type: Sun-synchronous Altitude: 510 km Period: Inclination: Repeat cycle: LST: 1430 Longitude (if geo): Asc/desc: TBD URL:
INSAT-2E (Indian National Satellite - 2E) **ISRO**	Currently being flown	03 Apr 99	04 Mar 11	Meteorology, data collection and communication, search and rescue	CCD camera, VHRR	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -83 Asc/desc: TBD URL: www.isro.org/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
INSAT-3A (Indian National Satellite - 3A) **ISRO**	Currently being flown	10 Apr 03	10 Apr 13	Meteorology, data collection and communication, search and rescue	CCD camera, VHRR)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -94 Asc/desc: TBD URL: www.isro.org/
INSAT-3D (Indian National Satellite - 3D) **ISRO**	Approved	01 Jul 06	01 Jul 15	Meteorology, data collection and communication, search and rescue	Imager (INSAT), Sounder (INSAT)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -83 Asc/desc: TBD URL: www.isro.org/
IRS-P4 (OCEANSAT-1) **ISRO**	Currently being flown	26 May 99	31 Dec 06	Ocean biology, physical oceanography	MSMR, OCM, WiFS	Type: Sun-synchronous Altitude: 720 km Period: 99.31 mins Inclination: 98.28 deg Repeat cycle: 2 days LST: 1215 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
Jason (Ocean surface topography) **NASA / CNES**	Currently being flown	07 Dec 01	01 Oct 07	Physical oceanography, geodesy/gravity, climate monitoring, marine meteorology	DORIS-NG, JMR, LRA, POSEIDON-2 (SSALT-2), TRSR	Type: Inclined, non-sunsynchronous Altitude: 1336 km Period: 112.4 mins Inclination: 66 deg Repeat cycle: 10 days LST: Longitude (if geo): Asc/desc: N/A URL: topex-www.jpl.nasa.gov/mission/jason-1.html
Jason-2 (also known as OSTM) (Ocean Surface Topography Mission) **NASA / CNES**	Planned	07 Dec 06	07 Dec 11	Physical oceanography, geodesy/gravity, climate monitoring, marine meteorology	DORIS-NG, JMR, LRA, POSEIDON-3, TRSR	Type: Inclined, non-sunsynchronous Altitude: 1336 km Period: 112.4 mins Inclination: 66 deg Repeat cycle: 10 days LST: Longitude (if geo): Asc/desc: N/A URL: topex-www.jpl.nasa.gov/mission/mission.html
KALAPANA (Meteorological satellite) **ISRO**	Currently being flown	09 Dec 02	09 Dec 12	Meteorological applications	VHRR	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -83 Asc/desc: TBD URL: www.isro.org/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
Kanopus-Vulkan **ROSKOSMOS**	Planned	01 Jan 06	31 Dec 11	Hydrology, hydrometeorology, monitoring man-made and natural accidents, research into short-term forecasting of earthquakes	ECHO-V, GID-12T, MTVZA-OK, NVK, RBE, RCHA	Type: Sun-synchronous Altitude: 700 km Period: Inclination: 97 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru
KOMPSAT-1 (Korea Multi-Purpose Satellite 1) **KARI**	Currently being flown	21 Dec 99	21 Dec 05	Cartography, land use and planning, disaster monitoring, Global marine resource and environmental monitoring, ocean contamination and chlorophyll detection	EOC, OSMI	Type: Sun-synchronous Altitude: 685 km Period: 98.5 mins Inclination: 28 deg Repeat cycle: 1050 days LST: Longitude (if geo): Asc/desc: Ascending URL: kompsat.kari.re.kr/english/index.asp
KOMPSAT-2 (Korea Multi-Purpose Satellite 2) **KARI**	Approved	01 Oct 05	01 Oct 08	Cartography, land use and planning, disaster monitoring	MSC	Type: Sun-synchronous Altitude: 685 km Period: 98.5 mins Inclination: 28 deg Repeat cycle: 1050 days LST: Longitude (if geo): Asc/desc: Ascending URL: kompsat.kari.re.kr/english/index.asp
LAGEOS-1 (Laser Geodynamics Satellite - 1) **NASA**	Currently being flown	04 May 76	04 May 16	Geodesy, crustal motion and gravity field measurements by laser ranging	LRA (LAGEOS)	Type: Inclined, non-sunsynchronous Altitude: 6000 km Period: 225 mins Inclination: 110 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: ilrs.gsfc.nasa.gov/satellite_missions/list_of_satellites/lagoes.html
LAGEOS-2 (Laser Geodynamics Satellite - 2) **NASA / ASI**	Currently being flown	22 Oct 92	22 Oct 32	Geodesy, crustal motion and gravity field measurements by laser ranging	LRA (LAGEOS)	Type: Inclined, non-sunsynchronous Altitude: 5900 km Period: 223 mins Inclination: 52 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: ilrs.gsfc.nasa.gov/satellite_missions/list_of_satellites/lagoes.htmlNASA\NASA_Agency_Missions1x2.doc
LAGEOS-3 (Laser Geodynamics Satellite - 3) **NASA / ASI**	Planned	01 Jan 06	01 Jan 46	Geodesy, crustal motion and gravity field measurements by laser ranging. Launch TBD - dates given are for illustration only.	LRA (LAGEOS)	Type: Inclined, non-sunsynchronous Altitude: 5900 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.laeff.esa.es/eng/laeff/activity/lageos3.html

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
Landsat-5 **USGS**	Currently being flown	01 Mar 84	31 Dec 09	Earth resources, land surface, environmental monitoring, agriculture and forestry, disaster monitoring and assessment, ice and snow cover	Landsat Comms, MSS, TM	Type: Sun-synchronous Altitude: 705 km Period: 98.9 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 945 Longitude (if geo): Asc/desc: Descending URL: landsat7.usgs.gov/
Landsat-7 **USGS**	Currently being flown	15 Apr 99	31 Dec 10	Earth resources, land surface, environmental monitoring, agriculture and forestry, disaster monitoring and assessment, ice and snow cover	ETM+, Landsat Comms	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 1000 Longitude (if geo): Asc/desc: Descending URL: landsat7.usgs.gov/
MEGHA-TROPIQUES **CNES / ISRO**	Approved	01 Jan 09	01 Jan 14	Study of the inter-tropical zone and its convective systems (water and energy cycles).	MADRAS, SAPHIR, ScaRaB	Type: Sun-synchronous Altitude: 867 km Period: 100 mins Inclination: 20 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL:
METEOR-3M N1 **ROSHYDROMET / ROSKOSMOS**	Currently being flown	10 Dec 01	31 Dec 05	Hydrometeorology, climatology, land surface, physical oceanography, heliogeophysics and space environment, sounding of the atmosphere, agriculture.	KGI-4C, Klimat, MIVZA, MR-2000M1, MSTE-5E, MSU-E, MSU-SM, MTVZA, SAGE III, SFM-2	Type: Sun-synchronous Altitude: 1018 km Period: 105.3 mins Inclination: 99.6 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: sputnik1.infospace.ru/
METEOR-3M N2 **ROSHYDROMET / ROSKOSMOS**	Approved	01 Dec 05	31 Dec 09	Hydrometeorology, climatology, land surface, physical oceanography, heliogeophysics and space environment, data collection, sounding of the atmosphere, agriculture	DCS (ROSHYDROMET), IKFS-2, KMSS, MSGI-MKA, MSU-MR, MTVZA, SAR (ROSHYDROMET),	Type: Sun-synchronous Altitude: 1024 km Period: 105.3 mins Inclination: 99.6 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: sputnik1.infospace.ru/
Meteor-M No1 **ROSHYDROMET / ROSKOSMOS**	Planned	01 Jan 05	01 Jan 12	Meteorology, hydrology, climate and environmental monitoring	GALS-M, GGAK-M, IKFS-2, IKOR-M, KMSS, MSGI-MKA, MSS-BIO, MSU-MR, MTVZA, Radiomet, RIMS-M, SKL-M	Type: Sun-synchronous Altitude: 835 km Period: Inclination: 98.8 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
Meteor-M No2 **ROSHYDROMET / ROSKOSMOS**	Planned	01 Jan 07	01 Jan 14	Meteorology, hydrology, climate and environmental monitoring	GALS-M, GGAK-M, IKFS-2, IKOR-M, KMSS, MSGI-MKA, MSS-BIO, MSU-MR, MTVZA, Radiomet, RIMS-M, SKL-M	Type: Sun-synchronous Altitude: 835 km Period: Inclination: 98.8 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru
METEOSAT-5 **EUMETSAT**	Currently being flown	02 Mar 91	31 Dec 05	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	METEOSAT Comms, MVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -63 Asc/desc: N/A URL: umetsat.de/en/dps/news/spacecraft.html
METEOSAT-6 **EUMETSAT**	Currently being flown	20 Nov 93	01 Jun 08	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	METEOSAT Comms, MVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 9 Asc/desc: N/A URL: www.eumetsat.de/en/dps/news/spacecraft.html
METEOSAT-7 **EUMETSAT**	Currently being flown	03 Sep 97	01 Jun 09	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	METEOSAT Comms, MVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.de/en/mtp/index.html
METEOSAT-8 (Meteosat Second Generation-1) **EUMETSAT**	Currently being flown	13 Aug 02	13 Aug 09	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	GERB, MSG Comms, SEVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.de/en/area4/topic1.html
METEOSAT-9 (Meteosat Second Generation-2) **EUMETSAT**	Approved	01 Jun 05	01 Jun 12	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	GERB, MSG Comms, SEVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.de/en/area4/topic1.html

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
METEOSAT-10 (Meteosat Second Generation-3) **EUMETSAT**	Approved	01 Jun 08	01 Jun 15	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	GERB, MSG Comms, SEVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.de/en/area4/topic1.html
METEOSAT-11 (Meteosat Second Generation-4) **EUMETSAT**	Approved	01 Dec 11	01 Dec 18	Meteorology, climatology, Atmospheric dynamics/water and energy cycles. Meteosat 1-7 are first generation. Meteosat 8-11 are second generation and known as MSG in the development phase	GERB, MSG Comms, SEVIRI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.de/en/area4/topic1.html
METOP-1 (Meteorological Operational Polar Satellite - 1) **EUMETSAT**	Approved	01 Dec 05	01 Dec 10	Meteorology, climatology	AMSU-A, ARGOS, ASCAT, AVHRR/3, GOME-2, GRAS, HIRS/4, IASI, MCP, MHS, S&R (NOAA)	Type: Sun-synchronous Altitude: 840 km Period: 101.7 mins Inclination: 98.8 deg Repeat cycle: 5 days LST: 930 Longitude (if geo): Asc/desc: Descending URL: www.eumetsat.de/en/area4/topic2.html
METOP-2 (Meteorological Operational Polar Satellite - 2) **EUMETSAT**	Approved	31 Dec 09	31 Dec 14	Meteorology, climatology	AMSU-A, ARGOS, ASCAT, AVHRR/3, GOME-2, GRAS, HIRS/4, IASI, MCP, MHS, S&R (NOAA), SEM (POES)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: 930 Longitude (if geo): Asc/desc: N/A URL: www.eumetsat.de/en/area4/topic2.html
METOP-3 (Meteorological Operational Polar Satellite - 3) **EUMETSAT**	Approved	01 Jun 14	01 Jun 19	Meteorology, climatology	AMSU-A, ARGOS, ASCAT, AVHRR/3, GOME-2, GRAS, HIRS/4, IASI, MCP, MHS	Type: Sun-synchronous Altitude: 840 km Period: 101.7 mins Inclination: 98.8 deg Repeat cycle: 5 days LST: 930 Longitude (if geo): Asc/desc: Descending URL: www.eumetsat.de/en/area4/topic2.html
Monitor-E **ROSKOSMOS**	Planned	01 Apr 05	31 Dec 10	Agriculture and forestry, hydrology, environmental monitoring, hydrometeorology, ice and snow, land surface, meteorology	PSA, RDSA	Type: Sun-synchronous Altitude: 540 km Period: Inclination: 97.5 deg Repeat cycle: LST: 540 Longitude (if geo): Asc/desc: TBD URL: www.federalspace.ru

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
MTSAT-2 (Multi-functional Transport Satellite) **JMA**	Approved	01 Feb 06	31 Dec 15	Meteorology, aeronautical applications	IMAGER/MTSAT-2, MTSAT Comms	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -140 Asc/desc: N/A URL:
NMP EO-1 (New Millennium Program Earth Observing-1) **NASA**	Currently being flown	21 Nov 00	30 Sep 05	Land surface, earth resources	ALI, Hyperion, LAC	Type: Sun-synchronous Altitude: 705 km Period: 99 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: eo1.gsfc.nasa.gov/
NMP EO-3 GIFTS (New Millennium Program EO-3 - Geosynchronous Imaging Fourier Transform Spectrometer) **NASA**	Considered	01 Oct 06	01 Oct 08	Continuous observation of atmospheric temperature, water vapour content and distribution, and the concentration of certain other atmospheric gases as a function of altitude over time - providing a new way to observe weather and the changing atmosphere.	GIFTS	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -83 Asc/desc: N/A URL: nmp.jpl.nasa.gov/eo3/index.html
NOAA-12 (National Oceanic and Atmospheric Administration - 12) **NOAA**	Currently being flown	14 May 91	31 Dec 05	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, space environment, solar flux analysis, search and rescue	ARGOS, AVHRR/2, HIRS/2, MSU, NOAA Comms, SEM (POES), SSU	Type: Sun-synchronous Altitude: 850 km Period: 101.3 mins Inclination: 98.5 deg Repeat cycle: LST: 449 Longitude (if geo): Asc/desc: Descending URL: www.oso.noaa.gov/poes/
NOAA-14 (National Oceanic and Atmospheric Administration - 14) **NOAA**	Currently being flown	30 Dec 94	31 Dec 05	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, space environment, solar flux analysis, search and rescue	ARGOS, AVHRR/2, HIRS/2, MSU, NOAA Comms, S&R (NOAA), SBUV/2, SEM (POES), SSU	Type: Sun-synchronous Altitude: 850 km Period: 102.1 mins Inclination: 99.1 deg Repeat cycle: LST: 1752 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NOAA-15 (National Oceanic and Atmospheric Administration - 15) **NOAA**	Currently being flown	01 May 98	31 Dec 06	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, space environment, solar flux analysis, search and rescue	AMSU-A, AMSU-B, ARGOS, AVHRR/3, HIRS/3, NOAA Comms, S&R (NOAA), SBUV/2, SEM (POES)	Type: Sun-synchronous Altitude: 813 km Period: 101.4 mins Inclination: 98.6 deg Repeat cycle: LST: 708 Longitude (if geo): Asc/desc: Descending URL: www.oso.noaa.gov/poes/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
NOAA-16 (National Oceanic and Atmospheric Administration - 16) **NOAA**	Currently being flown	21 Sep 00	31 Dec 06	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, total ozone studies, space environment, solar flux analysis, search and rescue	AMSU-A, AMSU-B, ARGOS, AVHRR/3, HIRS/3, NOAA Comms, S&R (NOAA), SBUV/2, SEM (POES)	Type: Sun-synchronous Altitude: 870 km Period: 102 mins Inclination: 98.8 deg Repeat cycle: LST: 1354 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NOAA-17 (National Oceanic and Atmospheric Administration - 17) **NOAA**	Approved	10 Mar 05	30 Nov 08	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, total ozone studies, space environment, solar flux analysis, search and rescue	AMSU-A, ARGOS, AVHRR/3, HIRS/4, MHS, NOAA Comms, S&R (NOAA), SBUV/2, SEM (POES)	Type: Sun-synchronous Altitude: 870 km Period: 102.1 mins Inclination: 98.75 deg Repeat cycle: LST: 1400 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NOAA-N **(National Oceanic and Atmospheric Administration - N)** **NOAA**	Approved	11 Feb 05	30 Nov 08	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, total ozone studies, space environment, solar flux analysis, search and rescue	AMSU-A, ARGOS, AVHRR/3, HIRS/4, MHS, NOAA Comms, S&R (NOAA), SBUV/2, SEM (POES)	Type: Sun-synchronous Altitude: 870 km Period: 102.1 mins Inclination: 98.75 deg Repeat cycle: LST: 1400 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NOAA-N' (National Oceanic and Atmospheric Administration - N') **NOAA**	Approved	30 Nov 08	01 Dec 11	Meteorology, agriculture and forestry, environmental monitoring, climatology, physical oceanography, volcanic eruption monitoring, ice and snow cover, total ozone studies, space environment, solar flux analysis, search and rescue	AMSU-A, ARGOS, AVHRR/3, HIRS/4, MHS, NOAA Comms, S&R (NOAA), SBUV/2, SEM (POES)	Type: Sun-synchronous Altitude: 870 km Period: 102.1 mins Inclination: 98.75 deg Repeat cycle: LST: 1400 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NPOESS-1 (National Polar-orbiting Operational Environmental Satellite System - 1) **NOAA**	Approved	30 Nov 09	01 Nov 15	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	A-DCS, APS, CMIS, SARSAT, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: 2130 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.npoess.noaa.gov/
NPOESS-2 (National Polar-orbiting Operational Environmental Satellite System - 2) **NOAA**	Approved	30 Jun 11	01 Jun 17	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	A-DCS, ATMS, CERES, CMIS, CrIS, OMPS, S&R (NOAA), SARSAT, SESS, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: 1330 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.npoess.noaa.gov/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
NPOESS-3 (National Polar-orbiting Operational Environmental Satellite System - 3) **NOAA**	Approved	04 Jun 13	09 Jun 18	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	A-DCS, ALT, CMIS, ERBS, S&R (NOAA), SARSAT, SESS, TSIS, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: 1730 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.npoess.noaa.gov/
NPOESS-4 (National Polar-orbiting Operational Environmental Satellite System - 4) **NOAA**	Approved	01 Nov 15	06 Nov 20	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	A-DCS, APS, CMIS, SARSAT, SESS, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: 2130 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.npoess.noaa.gov/
NPOESS-5 (National Polar-orbiting Operational Environmental Satellite System - 4) **NOAA**	Approved	01 Jan 18	01 Jun 23	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	A-DCS, ATMS, CERES, CMIS, CrIS, OMPS, S&R (NOAA), SARSAT, SESS, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: 1330 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.npoess.noaa.gov/
NPOESS-6 (National Polar-orbiting Operational Environmental Satellite System - 4) **NOAA**	Approved	09 May 19	01 May 24	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	A-DCS, ALT, CMIS, ERBS, S&R (NOAA), SARSAT, SESS, TSIS, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: 1730 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.npoess.noaa.gov/
NPP (NPOESS (National Polar-orbiting Operational Environmental Satellite System) Preparatory Project) **NOAA**	Approved	31 Oct 06	26 Oct 11	Meteorological, climatic, terrestrial, and oceanographic applications; global and regional environmental monitoring. (Joint mission with NASA)	ATMS, CrIS, OMPS, VIIRS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 1030 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: jointmission.gsfc.nasa.gov/
OCEANSAT-2 (Ocean satellite-2) **ISRO**	Planned	01 Jan 07	01 Jan 11	Ocean and atmosphere applications	OCM, Scatterometer (ISRO)	Type: Sun-synchronous Altitude: 720 km Period: 99.31 mins Inclination: 98.28 deg Repeat cycle: 2 days LST: 1200 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
OCO (Orbiting Carbon Observatory) **NASA**	Planned	01 Aug 07	01 Aug 09	High resolution carbon dioxide measurements to characterize sources and sinks on regional scales and quantify their variability over the seasonal cycle	OCO	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: essp.gsfc.nasa.gov/oco/index.html
Odin **SNSB**	Currently being flown	20 Feb 01	30 Mar 05	Atmospheric research, stratospheric ozone chemistry, mesospheric ozone science, summer mesospheric science	OSIRIS, SMR	Type: Sun-synchronous Altitude: 590 km Period: 97.6 mins Inclination: 97.8 deg Repeat cycle: LST: 1800 Longitude (if geo): Asc/desc: Ascending URL: www.ssc.se
PARASOL (Polarization and Anisotropy of Reflectances for Atmospheric Science coupled with Observations from a LIDAR) **CNES**	Approved	18 Dec 04	18 Dec 06	Micro-satellite with the aim of characterisation of the clouds and aerosols microphysical and radiative properties, needed to understand and model the radiative impact of clouds and aerosols.	POLDER-P	Type: Sun-synchronous Altitude: 700 km Period: 98.8 mins Inclination: Repeat cycle: LST: 1200 Longitude (if geo): Asc/desc: TBD URL: smsc.cnes.fr/PARASOL/index.htm
PICARD **CNES**	Approved	06 Jan 08	01 Aug 10	Simultaneous measurements of solar diameter, differential rotation, solar constant, and variability	PREMOS, SODISM, SOVAP	Type: TBD Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www-projet.cst.cnes.fr:8060/PICARD/index.html
Pleiades 1 **CNES**	Approved	01 Jul 08	01 Jul 13	Cartography, land use, risk, agriculture and forestry, civil planning and mapping, digital terrain models, defence	Pleiades HR	Type: Sun-synchronous Altitude: 694 km Period: Inclination: Repeat cycle: 26 days LST: 1015 Longitude (if geo): Asc/desc: Descending URL: smsc.cnes.fr/PLEIADES/Fr/index.htm
Pleiades 2 **CNES**	Approved	31 Dec 09	31 Dec 14	Cartography, land use, risk, agriculture and forestry, civil planning and mapping, digital terrain models, defence	Pleiades HR	Type: Sun-synchronous Altitude: 694 km Period: Inclination: Repeat cycle: LST: 1015 Longitude (if geo): Asc/desc: Descending URL: smsc.cnes.fr/PLEIADES/Fr/index.htm

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
QuikSCAT (Quick Scatterometer) **NASA**	Currently being flown	19 Jun 99	01 Oct 07	Acquires accurate, high-resolution, global measurements of sea-surface wind vectors in 1 to 2 day repeat cycles for studies of tropospheric dynamics and air-sea interaction processes, including air-sea momentum transfer. End of life date TBD	SeaWinds	Type: Sun-synchronous Altitude: 803 km Period: 101 mins Inclination: 98.6 deg Repeat cycle: LST: 600 Longitude (if geo): Asc/desc: Ascending URL: winds.jpl.nasa.gov/missions/quikscat/index.cfm
RADARSAT-1 (Radar satellite-1) **CSA**	Currently being flown	04 Nov 95	31 Dec 05	Environmental monitoring, physical oceanography, ice and snow, land surface	RADARSAT DTT, RADARSAT TTC, SAR (RADARSAT)	Type: Sun-synchronous Altitude: 798 km Period: 100.7 mins Inclination: 98.594 deg Repeat cycle: 24 days LST: 1800 Longitude (if geo): Asc/desc: Ascending URL: www.space.gc.ca/csa_sectors/earth_environment / radarsat/default.asp
RADARSAT-2 (Radar satellite-2) **CSA**	Approved	31 Dec 05	31 Dec 12	Environmental monitoring, physical oceanography, ice and snow, land surface	SAR (RADARSAT-2)	Type: Sun-synchronous Altitude: 798 km Period: 100.7 mins Inclination: 98.6 deg Repeat cycle: 24 days LST: 1800 Longitude (if geo): Asc/desc: Ascending URL: www.space.gc.ca/csa_sectors/earth_environment /radarsat2/default.asp
RapidEye (RapidEye) **DLR**	Approved	01 Jan 07	01 Jan 14	System of 5 satellites for cartography, land surface, digital terrain models, disaster management, environmental monitoring.	MSI	Type: Sun-synchronous Altitude: 600 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.rapideye.de/
RESOURCESAT-1 (Resource satellite-1) **ISRO**	Currently being flown	01 Oct 03	01 Oct 08	Natural Resources Management; Agricultural applications; Forestry	AWiFS, LISS-III, LISS-IV	Type: Sun-synchronous Altitude: 817 km Period: 102 mins Inclination: 98.72 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
RESOURCESAT-2 (Resource satellite-2) **ISRO**	Planned	01 Jul 06	01 Jul 11	Natural Resources Management; Agricultural applications; Forestry	AWiFS, LISS-III, LISS-IV	Type: Sun-synchronous Altitude: 817 km Period: 102 mins Inclination: 98.72 deg Repeat cycle: 26 days LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
Resurs DK **ROSKOSMOS**	Planned	01 Jun 05	31 Dec 08	Agriculture and forestry, hydrology, environmental monitoring, hydrometeorology, ice and snow, land surface, meteorology	Arina, Geoton-L1, Pamela	Type: Inclined, non-sunsynchronous Altitude: 480 km Period: Inclination: 70.4 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: sputnik1.infospace.ru/
RISAT-1 (Radar Imaging Satellite) **ISRO**	Approved	01 Jul 06	01 Jul 11	Land surface, agriculture and forestry, regional geology, land use studies, water resources, vegetation studies, coastal studies and soils - especially during cloud season	SAR (RISAT)	Type: Sun-synchronous Altitude: 586 km Period: 96.5 mins Inclination: 12 deg Repeat cycle: 600 days LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
SAC-C **CONAE**	Currently being flown	21 Nov 00	31 Dec 05	Earth Observation, studies the structure and dynamics of the Earth's surface, atmosphere, ionosphere and geomagnetic field	GOLPE, HRTC, HSTC, ICARE, INES, IST, MMP, MMRS, WTE	Type: Sun-synchronous Altitude: 705 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: 9 days LST: 1015 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAC-D/Aquarius **CONAE / NASA**	Approved	11 Sep 08	11 Sep 11	Earth observation studies; measurement of ocean salinity; emergency management	Aquarius, HSC, ICARE, MWR (CONAE), NIRST, ROSA, SODAD	Type: Sun-synchronous Altitude: 705 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: 9 days LST: 1015 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAC-E/SABIA **CONAE**	Planned	21 Nov 09	01 Dec 14	Food production; environmental monitoring; inner coastal and water quality	MOC	Type: Sun-synchronous Altitude: 705 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: 9 days LST: 1015 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAC-F **CONAE**	Planned	21 Nov 07	01 Dec 11	Earth observation studies; emergency management; landscape epidemiology	HRMS, HSMS, HSS, TIS (CONAE)	Type: Sun-synchronous Altitude: 705 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: 9 days LST: 1015 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
SAOCOM 1A **CONAE**	Approved	01 Oct 07	01 Oct 11	Earth Observation and Emergency management with an L-band SAR	IR Camera (SAOCOM), SAR (SAOCOM)	Type: Sun-synchronous Altitude: 629 km Period: 96 mins Inclination: 98 deg Repeat cycle: 16 days LST: 600 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAOCOM 1B **CONAE**	Approved	01 Oct 08	01 Oct 12	Earth Observation and Emergency management with an L-band SAR	IR Camera (SAOCOM), SAR (SAOCOM)	Type: Sun-synchronous Altitude: 629 km Period: 96 mins Inclination: 98 deg Repeat cycle: 16 days LST: 600 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAOCOM-2B (1) **CONAE**	Planned	01 Oct 13	01 Oct 17	Earth Observation and Emergency management with an L-band SAR	IR Camera (SAOCOM), SAR (SAOCOM)	Type: Sun-synchronous Altitude: 629 km Period: 96 mins Inclination: 98 deg Repeat cycle: 16 days LST: 600 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAOCOM-2B (2) **CONAE**	Planned	01 Oct 12	01 Oct 16	Earth Observation and Emergency management with an L-band SAR	IR Camera (SAOCOM), SAR (SAOCOM)	Type: Sun-synchronous Altitude: 629 km Period: 96 mins Inclination: 98 deg Repeat cycle: 16 days LST: 600 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SCD-1 (Data Collecting Satellite 1) **INPE**	Currently being flown	09 Feb 93	01 Dec 05	Data collection and communication	DCP (SCD)	Type: Inclined, non-sunsynchronous Altitude: 750 km Period: 100 mins Inclination: 25 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.inpe.br/programas/mecb/default.htm
SCD-2 (Data Collecting Satellite 2) **INPE**	Currently being flown	22 Oct 98	01 Dec 05	Data collection and communication	DCP (SCD)	Type: Inclined, non-sunsynchronous Altitude: 750 km Period: 100 mins Inclination: 25 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.inpe.br/programas/mecb/default.htm

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
SCISAT-1 (SCISAT-I/ACE) **CSA**	Currently being flown	12 Aug 03	20 Dec 07	To improve our understanding of the depletion of the ozone layer, particularly over Canada and the Arctic	ACE-FTS, MAESTRO	Type: Sun-synchronous Altitude: 650 km Period: Inclination: 74 deg Repeat cycle: 15 days LST: Longitude (if geo): Asc/desc: TBD URL: www.space.gc.ca/scisat1
SICH-1M **NSAU / ROSKOSMOS**	Approved	24 Dec 04	31 Dec 07	Physical Oceanography, Hydrometeorology, Land Observation	MSU-EU, MSU-M, MTVZA-OK, RLSBO, RM-08	Type: Inclined, non-sunsynchronous Altitude: 650 km Period: 98 mins Inclination: 82.5 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL:
SICH-2 **NSAU**	Planned	31 Dec 05	31 Dec 10	Land Observation	MBEI, MIREI	Type: Sun-synchronous Altitude: 668 km Period: 98 mins Inclination: 98 deg Repeat cycle: 4 days LST: 1050 Longitude (if geo): Asc/desc: TBD URL:
SMOS (Soil Moisture and Ocean Salinity (Earth Explorer Opportunity Mission)) **ESA**	Approved	15 Feb 07	15 Feb 10	Overall objectives are to provide global observations of two crucial variables for modelling the weather and climate, Soil Moisture and Ocean Salinity. It will also monitor the vegetation water content, snow cover and ice structure.	MIRAS (SMOS)	Type: Sun-synchronous Altitude: 756 km Period: Inclination: 98.45 deg Repeat cycle: 165 days LST: 600 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/export/esaLP/smos.html
SORCE (Solar Radiation and Climate Experiment) **NASA**	Currently being flown	25 Jan 03	25 Jan 09	Continues the precise, long-term measurements of total solar irradiance at UV and VNIR wavelengths. Daily measurements of solar UV. Precise measurements of visible solar irradiance for climate studies.	SIM, SOLSTICE, TIM, XPS	Type: Inclined, non-sunsynchronous Altitude: 600 km Period: Inclination: 40 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: lasp.colorado.edu/sorce/
SPOT-2 (Satellite Pour l'Observation de la Terre - 2) **CNES**	Currently being flown	22 Jan 90	31 Dec 05	Cartography, land surface, agriculture and forestry, civil planning and mapping, digital terrain models, environmental monitoring	DORIS, HRV	Type: Sun-synchronous Altitude: 832 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.spotimage.fr/html/_167_224_229_.php

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
SPOT-4 (Satellite Pour l'Observation de la Terre - 4) **CNES**	Currently being flown	24 Mar 98	31 Dec 05	Cartography, land surface, agriculture and forestry, civil planning and mapping, digital terrain models, environmental monitoring	DORIS, HRVIR, VEGETATION	Type: Sun-synchronous Altitude: 832 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.spotimage.fr/html/_167_224_229_.php
SPOT-5 (Satellite Pour l'Observation de la Terre - 5) **CNES**	Currently being flown	04 May 02	04 May 07	Cartography, land surface, agriculture and forestry, civil planning and mapping, digital terrain models, environmental monitoring	DORIS-NG, HRG, HRS, VEGETATION	Type: Sun-synchronous Altitude: 832 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 26 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: www.spotimage.fr/html/_167_224_229_.php
SSR-1 (Remote Sensing Satellite 1) **INPE**	Approved	01 Dec 07	01 Dec 11	Earth resources, environmental monitoring, land surface	OBA	Type: Inclined, non-sunsynchronous Altitude: 905 km Period: 103.2 mins Inclination: 0 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.inpe.br/programas/mecb/default.htm
SSR-2 (Remote Sensing Satellite 2) **INPE**	Planned	01 Dec 12	01 Dec 15	Earth resources, environmental monitoring, land surface	L-band SAR, OBA	Type: Inclined, non-sunsynchronous Altitude: 905 km Period: 103 mins Inclination: 0 deg Repeat cycle: 16 days LST: Longitude (if geo): Asc/desc: TBD URL: www.inpe.br/programas/mecb/default.htm
STARLETTE **CNES**	Currently being flown	06 Feb 75	31 Dec 50	Geodesy/gravity Study of the Earth's gravitational field and its temporal variations	Laser reflectors	Type: Inclined, non-sunsynchronous Altitude: 812 km Period: 104 mins Inclination: 49.83 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
STELLA **CNES**	Currently being flown	30 Sep 93	31 Dec 50	Geodesy/gravity Study of the Earth's gravitational field and its temporal variations	Laser reflectors	Type: Inclined, non-sunsynchronous Altitude: 830 km Period: 101 mins Inclination: 98 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
Swarm (Earth's Magnetic Field and Environment Explorer; Constellation of three satellites) **ESA**	Approved	01 Jan 09	01 Jan 13	To provide the best ever survey of the geomagnetic field and its temporal evolution, and gain new insights into improving our knowledge of the Earth's interior and climate.	ACC, ASM, EFI, GPS (ESA), STR, VFM	Type: Inclined, non-sunsynchronous Altitude: 450 km Period: Inclination: 87.4 deg Repeat cycle: LST: 600 Longitude (if geo): Asc/desc: URL: www.esa.int/export/esaLP/swarm.html
Terra (formerly EOS AM-1) **NASA**	Currently being flown	18 Dec 99	18 Dec 05	Atmospheric dynamics/water and energy cycles, Atmospheric chemistry, Physical and radiative properties of clouds, airland exchanges of energy, carbon and water, vertical profiles of CO and methane vulcanology	ASTER, CERES, MISR, MODIS, MOPITT	Type: Sun-synchronous Altitude: 705 km Period: 99 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 1030 Longitude (if geo): Asc/desc: Descending URL: terra.nasa.gov/
TerraSAR-L (TerraSAR L band) **BNSC**	Considered	01 Jan 06	01 Jan 11	SAR imagery in support of agriculture, forestry etc.	L-SAR	Type: TBD Altitude: 660 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.infoterra-global.com/terrasar.html
TerraSAR-X (TerraSAR X band) **DLR**	Approved	27 Oct 05	01 Mar 11	Cartography, land surface, civil planning and mapping, digital terrain models, environmental monitoring.	TerraSAR-X	Type: Sun-synchronous Altitude: 514 km Period: 94.85 mins Inclination: 97.4 deg Repeat cycle: 11 days LST: 1800 Longitude (if geo): Asc/desc: Ascending URL: www.terrasar.de/
TES (Technology Experimental Satellite) **ISRO**	Currently being flown	22 Oct 01	31 Dec 05	For demonstrating many satellite technologies for future Cartosat satellites		Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
THEOS (Thailand Earth Observation System) **GISTDA**	Approved	01 Jul 07	01 Jul 12	Earth Resources, Land surface and Disaster Monitoring, Civil Planning	MS (GISTDA), PAN (GISTDA)	Type: Sun-synchronous Altitude: 822 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 35 days LST: 1000 Longitude (if geo): Asc/desc: Descending URL: www.gistda.or.th

Mission	Status	Launch date	EOL date	Applications	Instruments	Orbit details & URL
TIMED (Thermosphere Ionosphere Mesosphere Energetics and Dynamics mission) **NASA**	Currently being flown	07 Dec 01	07 Dec 20	Investigates the influences of the sun and humans on the least explored and understood region of the Earth's atmosphere - the mesosphere and lower thermosphere/ ionosphere (MLTI)	SABER	Type: Inclined, non-sunsynchronous Altitude: 625 km Period: Inclination: 74.1 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.timed.jhuapl.edu/
Topex-Poseidon (Topographic Experiment/Poseidon) **NASA / CNES**	Currently being flown	10 Aug 92	01 Oct 05	Physical oceanography, geodesy/gravity	DORIS, GPSDR, LRA, POSEIDON-1 (SSALT-1), TMR, TOPEX	Type: Inclined, non-sunsynchronous Altitude: 1336 km Period: 112.4 mins Inclination: 66 deg Repeat cycle: 10 days LST: Longitude (if geo): Asc/desc: N/A URL: topex-www.jpl.nasa.gov/mission/tp-launch.html
TopSat (Optical Imaging Satellite) **BNSC**	Approved	01 May 05	01 May 06	Prototype low-cost high-resolution imager	TOPSAT telescope	Type: Sun-synchronous Altitude: 600 km Period: Inclination: 98 deg Repeat cycle: LST: 1030 Longitude (if geo): Asc/desc: TBD URL: www.qinetiq.com/industries/space/spacecraft_technology/case_study_topsat/index.asp
UARS (Upper Atmosphere Research Satellite) **NASA**	Currently being flown	15 Sep 91	30 Apr 05	Atmospheric chemistry (middle to upper atmosphere), atmospheric dynamics/water and energy cycles. HALOE, HRDI, MLS, PEM instruments still functioning. End date TBD.	ACRIM II, CLAES, HALOE, HRDI, ISAMS, PEM, SOLSTICE, SUSIM (UARS), WINDII	Type: Inclined, non-sunsynchronous Altitude: 585 km Period: 95.9 mins Inclination: 57 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: umpgal.gsfc.nasa.gov/uars-science.html
UK-DMC (UK Disaster Monitoring Constellation) **BNSC**	Currently being flown	27 Sep 03	31 Dec 06	Medium resolution visible imager for support of disaster management	DMC Imager	Type: TBD Altitude: 785 km Period: Inclination: 98.2 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.sstl.co.uk/index.php?loc=113
Vulkan-Kompas-2 **ROSKOSMOS**	Planned	01 Jan 05	31 Dec 06	Monitoring of Earth's seismic activity for earthquake and volcanic eruption forecasting	DRF, GID-12T, NVK, RBE, RCHA	Type: Inclined, non-sunsynchronous Altitude: 500 km Period: Inclination: 79 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru