Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
3D Winds Three Dimensional Tropospheric Winds from Space Based Lidar NASA	Considered	2030	2033	Phase-3 DS Mission, launch order unknown, 3-year nominal mission. Tropospheric winds for weather forecasting and pollution transport.	HDWL (3D Winds)	Type: Sun-synchronous Altitude: 400 km Period: Inclination: 97.03 deg Repeat cycle: 12 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: decadal.gsfc.nasa.gov/3d-winds.html
ACE Aerosol Clouds and Ecosystem Mission NASA	Considered	2020	2023	Phase-2 DS Mission, launch order unknown, 3-year nominal mission. Aerosol and cloud profiles for climate and water cycle; ocean colour for open ocean biogeochemistry.	Cloud radar (ACE), Next Gen APS (ACE), Multi-band UV/VIS Spectrometer (ACE), HSRL (ACE)	Type: Sun-synchronous Altitude: 650 km Period: Inclination: 98.2 deg Repeat cycle: LST: 13:00 Longitude (if geo): Asc/desc: Ascending URL: dsm.gsfc.nasa.gov/ace/science.html
ACRIMSAT Active Cavity Radiometer Irradiance Monitor NASA	Currently being flown	20 Dec 1999	Sep 2013	5-year nominal mission life, currently in extended operations. 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: 10:50 Longitude (if geo): Asc/desc: Descending URL: acrim.jpl.nasa.gov/
ADM-Aeolus Atmospheric Dynamics Mission (Earth Explorer Core Mission) ESA	Approved	Feb 2014	May 2017	Will provide wind profile measurements for global 3D wind field products used for study of atmospheric dynamics, including global transport of energy, water, aerosols, and chemicals.	ALADIN	Type: Sun-synchronous Altitude: 405 km Period: 92.5 mins Inclination: 97.01 deg Repeat cycle: 7 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/export/esaLP/aeolus.html
AISSat-1 Automatic Identification System Satellite-1 NSC	Currently being flown	12 Jul 2010	Aug 2013	Demonstrate and extend access to AIS (Automatic Identification System) signals beyond the land-based AIS system operated by the Norwegian Coastal Administration today. Observe ship traffic in the High North.	SDR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: TBD Longitude (if geo): Asc/desc: Descending URL:
AISSat-2 Automatic Identification System Satellite-2 NSC	Approved	Dec 2012	Dec 2015	Demonstrate and extend access to AIS (Automatic Identification System) signals beyond the land-based AIS system operated by the Norwegian Coastal Administration today. Observe ship traffic in the High North.	SDR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: TBD Longitude (if geo): Asc/desc: Descending URL:
ALOS-2 Advanced Land Observing Satellite-2 JAXA	Approved	Jan 2013	Jan 2017	Environmental monitoring, disaster monitoring, civil planning, agriculture and forestry, Earth resources, land surface.	L-Band SAR (ALOS-2)	Type: Sun-synchronous Altitude: 628 km Period: 100 mins Inclination: 97.9 deg Repeat cycle: 14 days LST: 12:00 Longitude (if geo): Asc/desc: Descending URL: www.jaxa.jp/projects/sat/alos2/index_e.html
ALOS-3 Advanced Land Observing Satellite-3 JAXA	Planned	2014	2018	Cartography, digital terrain models, environmental monitoring, disaster monitoring, civil planning, agriculture and forestry, Earth resources, land surface.	Optical Sensor, HISUI	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Descending URL:
AMAZONIA-1 Amazonia 1 INPE	Approved	Dec 2014	Dec 2017	Earth resources, environmental monitoring, land surface.	AWFI	Type: Sun-synchronous Altitude: 752 km Period: 99.9 mins Inclination: 98.4 deg Repeat cycle: 26 days LST: Longitude (if geo): Asc/desc: Descending URL: www.inpe.br
Aqua Aqua (formerly EOS PM-1) NASA / JAXA / INPE	Currently being flown	04 May 2002	Sep 2013	6-year nominal mission life, currently in extended operations. Atmosphericdynamics/water and energy cycles, cloudformation, precipitationand radiativeproperties, air/seafluxes of energy andmoisture, sea ice extentand heat exchange with the atmosphere.	AIRS, MODIS, CERES, HSB, AMSR-E, AMSU-A	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.gsfc.nasa.gov
Arctica ROSHYDROMET	Approved	Dec 2015	Dec 2018	Meteorology, oceanography, including ice cover monitoring and disaster monitoring in the Arctic region. The payload and design of the satellites is similar to the ones in the Electro-L series. Molniya orbit.		Type: Highly elliptical Altitude: Period: 718 mins Inclination: Repeat cycle: 1 days LST: Longitude (if geo): Asc/desc: N/A URL:
Arkon-2M ROSKOSMOS	Planned	2013	2018	Earth observations and weather information.	Arkon-2M SAR	Type: Sun-synchronous Altitude: 500 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.federalspace.ru
ASCENDS Active Sensing of CO2 Emissions over Nights, Days, and Seasons NASA	Considered	2020	2023	Phase-2 DS Mission, launch order unknown, 3-year nominal mission. Day/night, all-latitude, all-season CO2 column integrals for climate emissions.	CO2 LIDAR (ASCENDS)	Type: Sun-synchronous Altitude: 450 km Period: 97.3 mins Inclination: Repeat cycle: LST: 10:30 Longitude (if geo): Asc/desc: Ascending URL: cce.nasa.gov/ascends/index.htm
Aura Aura (formerly EOS Chemistry) NASA / NSO / FMI / UKSA	Currently being flown	15 Jul 2004	Sep 2013	5-year nominal mission life, currently in extended operations. Chemistry and dynamics of Earth's atmosphere from the ground through the stratosphere.	MLS (EOS-Aura), TES, HIRDLS, OMI	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 13:38 Longitude (if geo): Asc/desc: Ascending URL: aura.gsfc.nasa.gov/
CALIPSO Cloud-Aerosol Lidar and Infrared Pathfinder Satellite Observations NASA / CNES	Currently being flown	28 Apr 2006	Sep 2013	3-year nominal mission life, currently in extended operations. Measurements of aerosol and 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.	WFC, IIR, CALIOP	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www-calipso.larc.nasa.gov/
CARTOSAT-1 Cartography Satellite - 1 (IRS P5) ISRO	Currently being flown	05 May 2005	Dec 2012	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: 618 km Period: 97 mins Inclination: 97.87 deg Repeat cycle: 5 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
CARTOSAT-1A Cartography Satellite -1A ISRO	Considered	2014	2019	Ensure the continuity of high resolution imaging capability with multispectral capability, stereo imaging and hyperspectral imaging.	PAN (RS-1A)-MX, MX (RS-1A)-VNIR, HYSI (RS-1A)-VNIR, HYSI (RS-1A)-SWIR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
CARTOSAT-1B Cartosat -1B ISRO	Considered	2017	2022	Ensure the continuity of high resolution imaging capability with multispectral capability, stereo imaging and hyperspectral imaging.	PAN (RS-1A)-MX, MX (RS-1A)-VNIR, HYSI (RS-1A)-VNIR, HYSI (RS-1A)-SWIR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
CARTOSAT-2 Cartography Satellite - 2 ISRO	Currently being flown	10 Jan 2007	Dec 2012	High precision large-scale cartographic mapping of 1:10000 scale and thematic applications (with merged XS data) at 1:4000 scales.	PAN (Cartosat-2)	Type: Sun-synchronous Altitude: 635 km Period: 97.4 mins Inclination: 97.87 deg Repeat cycle: 5 days LST: 9:30 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
CARTOSAT-2A Cartography Satellite - 2A ISRO	Currently being flown	28 Apr 2008	Apr 2013	High precision large-scale cartographic mapping of 1:10000 scale and thematic applications (with merged XS data) at 1:4000 scales.	PAN (Cartosat-2A/2B)	Type: Sun-synchronous Altitude: 635 km Period: 97.4 mins Inclination: 97.87 deg Repeat cycle: 5 days LST: 9:30 Longitude (if geo): Asc/desc: Descending URL:
CARTOSAT-2B Cartography Satellite - 2B ISRO	Currently being flown	12 Jul 2010	Jul 2015	High precision large-scale cartographic mapping of 1:10000 scale and thematic applications (with merged XS data) at 1:4000 scales.	PAN (Cartosat-2A/2B)	Type: Sun-synchronous Altitude: 635 km Period: 97.4 mins Inclination: 97.87 deg Repeat cycle: 5 days LST: 9:30 Longitude (if geo): Asc/desc: Descending URL:
CARTOSAT-2C Cartography Satellite - 2C ISRO	Considered	2013	2017	High precision large-scale cartographic mapping and thematic applications with MX data at 1:4000 scales.	HRMX	Type: Sun-synchronous Altitude: 635 km Period: 97.4 mins Inclination: 97.87 deg Repeat cycle: 5 days LST: 9:30 Longitude (if geo): Asc/desc: Descending URL:
CARTOSAT-2D Cartography Satellite - 2D ISRO	Considered	2016	2022	High precision large-scale cartographic mapping and thematic applications with MX data at 1:4000 scales.	HRMX	Type: Sun-synchronous Altitude: 635 km Period: 97.4 mins Inclination: 97.87 deg Repeat cycle: 5 days LST: 9:30 Longitude (if geo): Asc/desc: Descending URL:
CARTOSAT-3 Cartography Satellite - 3 ISRO	Planned	2015	2020	Suitable for cadastral and infrastructure mapping and analysis.	PAN (Cartosat-3/3A)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
CARTOSAT-3A Cartography Satellite - 3A ISRO	Considered	2018	2023	Suitable for cadastral and infrastructure mapping and analysis.	PAN (Cartosat-3/3A)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
CBERS-3 China Brazil Earth Resources Satellite - 3 INPE / CRESDA	Approved	Nov 2012	Nov 2015	Earth resources, environmental monitoring, land surface.	WFI-2, MUX, DCS , IRS, PAN (CBERS)	Type: Sun-synchronous Altitude: 778 km Period: 100.3 mins Inclination: 98.5 deg Repeat cycle: 26 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.cbers.inpe.br/en/programas/cbers3-4.htm
CBERS-4 China Brazil Earth Resources Satellite - 4 INPE / CRESDA	Approved	Jun 2014	Jun 2017	Earth resources, environmental monitoring, land surface.	WFI-2, MUX, DCS , IRS, PAN (CBERS)	Type: Sun-synchronous Altitude: 778 km Period: 100.3 mins Inclination: 98.5 deg Repeat cycle: 26 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.cbers.inpe.br/en/programas/cbers3-4.htm
CloudSat NASA / DoD (USA) / CSA	Currently being flown	28 Apr 2006	Sep 2013	3-year nominal mission life, currently in extended operations. 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: 13:30 Longitude (if geo): Asc/desc: Ascending URL: cloudsat.atmos.colostate.edu/
COMS Communication, Oceanographic, Meteorological Satellite KARI	Currently being flown	26 Jun 2010	Dec 2017	Korea's geostationary meteorological satellite series.	GOCI, MI	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
COSMIC-1/FORMOSAT-3 FM1 Constellation Observing System for Meteorology, Ionosphere and Climate-1 NSPO / NOAA / UCAR	Currently being flown	14 Apr 2006	Mar 2013	Meteorology, ionosphere and climate.	GOX	Type: Inclined, non-sun-synchronous Altitude: 800 km Period: 100 mins Inclination: 72 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: www.cosmic.ucar.edu/
COSMIC-2/FORMOSAT-3 FM2 Constellation Observing System for Meteorology, Ionosphere and Climate-2 NSPO / NOAA / UCAR	Currently being flown	14 Apr 2006	Mar 2013	Meteorology, ionosphere and climate.	GOX	Type: Inclined, non-sun-synchronous Altitude: 800 km Period: 100 mins Inclination: 72 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: www.cosmic.ucar.edu/
COSMIC-3/FORMOSAT-3 FM3 Constellation Observing System for Meteorology, Ionosphere and Climate-3 NSPO / NOAA / UCAR	Currently being flown	14 Apr 2006	Mar 2013	Meteorology, ionosphere and climate.	GOX	Type: Inclined, non-sun-synchronous Altitude: 711 km Period: 100 mins Inclination: 72 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: www.cosmic.ucar.edu/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
COSMIC-4/FORMOSAT-3 FM4 Constellation Observing System for Meteorology, Ionosphere and Climate-4 NSPO / NOAA / UCAR	Currently being flown	14 Apr 2006	Mar 2013	Meteorology, ionosphere and climate.	GOX	Type: Inclined, non-sun-synchronous Altitude: 800 km Period: 100 mins Inclination: 72 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: www.cosmic.ucar.edu/
COSMIC-5/FORMOSAT-3 FM5 Constellation Observing System for Meteorology, Ionosphere and Climate-5 NSPO / NOAA / UCAR	Currently being flown	14 Apr 2006	Mar 2013	Meteorology, ionosphere and climate.	GOX	Type: Inclined, non-sun-synchronous Altitude: 800 km Period: 100 mins Inclination: 72 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: www.cosmic.ucar.edu/
COSMIC-6/FORMOSAT-3 FM6 Constellation Observing System for Meteorology, Ionosphere and Climate-6 NSPO / NOAA / UCAR	Currently being flown	14 Apr 2006	Mar 2013	Meteorology, ionosphere and climate.	GOX	Type: Inclined, non-sun-synchronous Altitude: 800 km Period: 100 mins Inclination: 72 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: www.cosmic.ucar.edu/
COSMO-SkyMed 1 COnstellation of small Satellites for Mediterranean basin Observation - 1 ASI / MiD (Italy)	Currently being flown	08 Jun 2007	Jun 2014	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: 620 km Period: 97.1 mins Inclination: 97.8 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: www.asi.it/en/activity/earth_observation/cosmoskymed
COSMO-SkyMed 2 COnstellation of small Satellites for Mediterranean basin Observation - 2 ASI / MiD (Italy)	Currently being flown	09 Dec 2007	Dec 2014	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: 620 km Period: 97.1 mins Inclination: 97.8 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: www.asi.it/en/activity/earth_observation/cosmoskymed
COSMO-SkyMed 3 COnstellation of small Satellites for Mediterranean basin Observation - 3 ASI / MiD (Italy)	Currently being flown	25 Oct 2008	Oct 2015	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: 620 km Period: 97.1 mins Inclination: 97.8 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: www.asi.it/en/activity/earth_observation/cosmoskymed
COSMO-SkyMed 4 COnstellation of small Satellites for Mediterranean basin Observation - 4 ASI / MiD (Italy)	Currently being flown	06 Nov 2010	Nov 2017	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: 620 km Period: 97.1 mins Inclination: 97.8 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: www.asi.it/en/activity/earth_observation/cosmoskymed
CryoSat-2 CryoSat-2 (Earth Explorer Opportunity Mission) ESA	Currently being flown	08 Apr 2010	Dec 2013	To determine fluctuations in the mass of the Earth's major land and marine ice fields.	DORIS-NG, SIRAL, Laser Reflectors (ESA)	Type: Inclined, non-sun-synchronous Altitude: 717 km Period: 100 mins Inclination: 92 deg Repeat cycle: 369 days LST: 0.25 degree nodal regression per day Longitude (if geo): Asc/desc: N/A URL: www.esa.int/cryosat
CSG-1 COSMO-SkyMed Second Generation - 1 ASI / MiD (Italy)	Approved	Jun 2015	Jun 2022	Environmental monitoring, surveillance and risk management applications, environmental resources management, maritime management, earth topographic mapping, law enforcement, informative / science applications.	SAR-2000 S.G.	Type: Sun-synchronous Altitude: 620 km Period: 97.1 mins Inclination: 97.8 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: www.asi.it
CSG-2 COSMO-SkyMed Second Generation - 2 ASI / MiD (Italy)	Approved	Jun 2016	Jun 2023	Environmental monitoring, surveillance and risk management applications, environmental resources management, maritime management, earth topographic mapping, law enforcement, informative / science applications.	SAR-2000 S.G.	Type: Sun-synchronous Altitude: 620 km Period: 97.1 mins Inclination: 97.8 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: www.asi.it
Diademe 1&2 CNES	Currently being flown	15 Feb 1967	Dec 2050	Geodetic measurements using satellite laser ranging.	RRA	Type: Inclined, non-sun-synchronous Altitude: 1200 km Period: 108 mins Inclination: 40 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: galileo.crl.go.jp/ilrs/diademe.html
DMSP F-14 Defense Meteorological Satellite Program F-14 NOAA	Currently being flown	04 Apr 1997	Dec 2012	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.	OLS, SSM/I, SSM/T-1, SSM/T-2, SSB/X-2, SSI/ES-2, SSJ/4, SSM	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: LST: 20:29 Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-15 Defense Meteorological Satellite Program F-15 NOAA	Currently being flown	12 Dec 1999	May 2013	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, SSM/I, SSM/T-1, SSM/T-2, SSI/ES-2, SSJ/4, SSM	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.9 deg Repeat cycle: LST: 20:29 Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-16 Defense Meteorological Satellite Program F-16 NOAA	Currently being flown	18 Oct 2003	Oct 2012	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, SSM/IS, SSM, SSI/ES-3, SSJ/5, SSULI, SSUSI	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.9 deg Repeat cycle: LST: 21:32 Longitude (if geo): Asc/desc: Ascending URL: dmsp.ngdc.noaa.gov/dmsp.html
DMSP F-17 Defense Meteorological Satellite Program F-17 NOAA	Currently being flown	04 Nov 2006	Jun 2013	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, SSM/IS, SSM, SSI/ES-3, 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	Currently being flown	18 Oct 2009	Apr 2014	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, SSM/IS, SSM, SSI/ES-3, 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
DMSP F-19 Defense Meteorological Satellite Program F-19 NOAA	Approved	Oct 2012	Oct 2017	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, SSM/IS, SSM, SSI/ES-3, 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	Jun 2014	Jun 2019	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, SSM/IS, SSM, SSI/ES-3, 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
DSCOVR Deep Space Climate Observatory NOAA / NASA	Approved	Jul 2014	Jul 2016	Measure a combination of solar phenomena and earth climate measurements. Provides 15 min warning for solar storms (CME) events.	NISTAR, EPIC	Type: TBD Altitude: Period: Inclination: Repeat cycle: 1 days LST: Longitude (if geo): Asc/desc: URL:
EarthCARE ESA / JAXA	Approved	Nov 2015	Nov 2018	To Improve the understanding of atmospheric cloud–aerosol interactions and of the Earth's radiative balance towards enhancing climate and numerical weather prediction models. The 2 active and 2 passive instruments of EarthCARE make unique data product synergies possible.	CPR (EarthCARE), ATLID, BBR (EarthCARE), MSI (EarthCARE)	Type: Sun-synchronous Altitude: 393 km Period: Inclination: 97 deg Repeat cycle: 25 days LST: Longitude (if geo): Asc/desc: Descending URL: www.esa.int/export/esaLP/earthcare.html
Elektro-L N1 Geostationary Operational Meteorological Satellite - 1 ROSHYDROMET / ROSKOSMOS	Currently being flown	20 Jan 2011	Dec 2018	Hydrometeorology, heliogeophysics, climatology, DCS, S&R.	MSU-GS, DCS , GGAK-E, S&R	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -76 Asc/desc: N/A URL: planet.iitp.ru
Elektro-L N2 Geostationary Operational Meteorological Satellite - 2 ROSHYDROMET / ROSKOSMOS	Approved	Nov 2012	Nov 2018	Hydrometeorology, heliogeophysics, climatology, DCS, S&R.	MSU-GS, DCS , GGAK-E, S&R	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -76 Asc/desc: N/A URL: planet.iitp.ru
Elektro-L N3 Geostationary Operational Meteorological Satellite - 3 ROSHYDROMET / ROSKOSMOS	Planned	2015	2022	Hydrometeorology, heliogeophysics, climatology, DCS, S&R.	MSU-GS, DCS , GGAK-E, S&R	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 14.5 Asc/desc: N/A URL: planet.iitp.ru
EnMAP Environmental Mapping & Analysis Program DLR	Approved	Dec 2015	Dec 2020	Hyperspectral imaging, land surface, geological and environmental investigation.	HSI	Type: Sun-synchronous Altitude: 650 km Period: 97.5 mins Inclination: Repeat cycle: 21 days LST: 11:00 Longitude (if geo): Asc/desc: Descending URL: www.enmap.org/
Environsat-1 Environmental Satellite - 1 ISRO	Considered	2013	2017	Monitoring of greenhouse gases, aerosols and other atmospheric trace gases which are responsible for global warming.	HRSS-1, HRVS-1A/-1B	Type: Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
Environsat-2 Environmental Satellite - 2 ISRO	Considered	2016	2020	Monitoring of greenhouse gases, aerosols and other atmospheric trace gases which are responsible for global warming.	HRSS-1, HRVS-1A/-1B	Type: Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
Envisat Environmental Satellite ESA	Currently being flown	01 Mar 2002	Dec 2013	Physical oceanography, land surface, ice and snow, atmospheric chemistry, atmospheric dynamics/water and energy cycles.	DORIS-NG, MWR, ASAR (image mode), ASAR (wave mode), ENVISAT Comms, MERIS, MIPAS, ASAR, GOMOS, SCIAMACHY, RA-2, AATSR	Type: Sun-synchronous Altitude: 782 km Period: 100.5 mins Inclination: 98.52 deg Repeat cycle: 35 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: envisat.esa.int/
EPS-SG-a EUMETSAT Polar System, second generation EUMETSAT / NOAA / DLR / EC / CNES / ESA	Planned	2019	2027	Meteorology, climatology. EPS-SG-a carries the Sentinel-5 mission. 3 satellites (TBC).	ATMS, METimage, IASI-NG, 3MI, RO	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: 29 days LST: Longitude (if geo): Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
EPS-SG-b EUMETSAT Polar System, second generation EUMETSAT / EC / ESA	Planned	2020	2028	Meteorology, climatology. 2 satellites (TBC).	RO, MWI-Precip, MWI-Cloud, SCA	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
FY-1D FY-1D Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Currently being flown	15 May 2002	Dec 2012	Meteorology, environmental monitoring.	MVISR (10 channels)	Type: Sun-synchronous Altitude: 863 km Period: 102.3 mins Inclination: 98.8 deg Repeat cycle: LST: 9:00 Longitude (if geo): Asc/desc: Descending URL: fy3.satellite.cma.gov.cn/arssen/
FY-2D FY-2D Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Currently being flown	08 Dec 2006	Dec 2012	Meteorology and environmental monitoring; data collection and redistribution.	IVISSR (FY-2)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -86.5 Asc/desc: N/A URL: fy3.satellite.cma.gov.cn/arssen/
FY-2E FY-2E Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Currently being flown	26 Dec 2008	Dec 2012	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: N/A URL: fy3.satellite.cma.gov.cn/arssen/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
FY-2F FY-2F Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Currently being flown	13 Jan 2012	Dec 2016	Meteorology and environmental monitoring; data collection and redistribution.	IVISSR (FY-2)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
FY-2G FY-2G Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Planned	2013	2016	Meteorology and environmental monitoring; data collection and redistribution.		Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
FY-2H FY-2H Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Planned	2015	2018	Meteorology and environmental monitoring; data collection and redistribution.		Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
FY-3A FY-3A Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Currently being flown	27 May 2008	Dec 2012	Meteorology and environmental monitoring; data collection and redistribution.	IRAS, MWAS, MWHS, MWRI, VIRR, ERM, MERSI, MWTS, TOU/SBUS, SEM, SIM	Type: Sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98.753 deg Repeat cycle: LST: 10:10 Longitude (if geo): Asc/desc: Descending URL: fy3.satellite.cma.gov.cn/arssen/
FY-3B FY-3B Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Currently being flown	05 Nov 2010	Dec 2013	Meteorology and environmental monitoring; data collection and redistribution. (Experimental pre-cursor to FY-3C).	IRAS, MWAS, MWHS, MWRI, VIRR, ERM, MERSI, MWTS, TOU/SBUS, SEM, SIM	Type: Sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98.753 deg Repeat cycle: LST: 14:00 Longitude (if geo): Asc/desc: Ascending URL: fy3.satellite.cma.gov.cn/arssen/
FY-3C FY-3C Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Approved	Dec 2012	Dec 2015	Meteorology and environmental monitoring; data collection and redistribution. (Operational follow-on to FY-3B).	IRAS, IMWAS, MIRAS, MWRI, VIRR, ERM, MERSI, TOU/SBUS, SIM, MWHS-2, MWTS-2, SES, SIM-2	Type: Sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98.753 deg Repeat cycle: LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: fy3.satellite.cma.gov.cn/arssen/
FY-3D FY-3D Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Approved	Dec 2014	Dec 2017	Meteorology and environmental monitoring; data collection and redistribution.	IMWAS, MIRAS, MWRI, ASI, GAMI, GNOS, MERSI-2, MWHS-2, MWTS-2, SES	Type: Sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98.753 deg Repeat cycle: LST: 14:00 Longitude (if geo): Asc/desc: Ascending URL: fy3.satellite.cma.gov.cn/arssen/
FY-3E FY-3E Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Planned	2017	2020	Meteorology and environmental monitoring; data collection and redistribution.	IMWAS, MIRAS, SIM, ASI, ERM-2, GNOS, MERSI-2, MWHS-2, MWTS-2, OMS, SES, WindRAD, SIM-2	Type: Sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98.753 deg Repeat cycle: LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: fy3.satellite.cma.gov.cn/arssen/
FY-3F FY-3F Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Planned	2019	2022	Meteorology and environmental monitoring; data collection and redistribution.	IMWAS, MIRAS, MVIRS, MWRI, ASI, GAMI, GNOS, MERSI-2, MWHS-2, MWTS-2, SES	Type: Sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98.753 deg Repeat cycle: LST: 14:00 Longitude (if geo): Asc/desc: Ascending URL: fy3.satellite.cma.gov.cn/arssen/
FY-3G FY-3G Polar-orbiting Meteorological Satellite NSMC-CMA / NRSCC	Considered	2021	2024	Meteorology and environmental monitoring; data collection and redistribution.	IMWAS, MIRAS, MVIRS, ASI, ERM-2, GNOS, MERSI-2, MWHS-2, MWTS-2, OMS, WindRAD, SIM-2	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: fy3.satellite.cma.gov.cn/arssen/
FY-4A FY-4A Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Approved	Dec 2014	Dec 2017	Meteorology and environmental monitoring; data collection and redistribution.	LM, MCSI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: N/A URL: fy3.satellite.cma.gov.cn/arssen/
FY-4B FY-4B Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Planned	2017	2020	Meteorology and environmental monitoring; data collection and redistribution.	LM, MCSI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: N/A URL: fy3.satellite.cma.gov.cn/arssen/
FY-4C FY-4C Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Planned	2020	2023	Meteorology and environmental monitoring; data collection and redistribution.	LM, MCSI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: N/A URL: fy3.satellite.cma.gov.cn/arssen/
FY-4D FY-4D Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Planned	2023	2026	Meteorology and environmental monitoring; data collection and redistribution.	LM, MCSI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: N/A URL: fy3.satellite.cma.gov.cn/arssen/
FY-4E FY-4E Geostationary Meteorological Satellite NSMC-CMA / NRSCC	Planned	2026	2029	Meteorology and environmental monitoring; data collection and redistribution.	LM, MCSI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -105 Asc/desc: N/A URL: fy3.satellite.cma.gov.cn/arssen/
GACM Global Atmospheric Composition Mission NASA	Considered	2030	2033	Phase-3 DS Mission, launch order unknown, 3-year nominal mission. Ozone and related gases for intercontinental air quality and stratospheric ozone layer prediction.	UV Spectrometer (GACM), IR Spectrometer(GACM), Microwave limb sounder (GACM)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: decadal.gsfc.nasa.gov/gacm.html

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
GCOM-C1 Global Change Observation Mission-C1 JAXA	Approved	Dec 2013	Dec 2018	Understanding of climate change mechanism.	SGLI	Type: Sun-synchronous Altitude: 800 km Period: 98 mins Inclination: 98.6 deg Repeat cycle: LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.jaxa.jp/projects/sat/gcom/index_e.html
GCOM-C2 Global Change Observation Mission-C2 JAXA	Planned	2017	2022	Understanding of climate change mechanism.	SGLI	Type: Sun-synchronous Altitude: 800 km Period: 98 mins Inclination: 98.6 deg Repeat cycle: LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.jaxa.jp/projects/sat/gcom/index_e.html
GCOM-C3 Global Change Observation Mission-C3 JAXA	Planned	2021	2026	Understanding of climate change mechanism.	SGLI	Type: Sun-synchronous Altitude: 800 km Period: 98 mins Inclination: 98.6 deg Repeat cycle: LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.jaxa.jp/projects/sat/gcom/index_e.html
GCOM-W1 Global Change Observation Mission-W1 JAXA	Currently being flown	18 May 2012	May 2017	Understanding of water circulation mechanism.	AMSR-2	Type: Sun-synchronous Altitude: 700 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.jaxa.jp/projects/sat/gcom/index_e.html
GCOM-W2 Global Climate Observation Mission-W2 JAXA	Planned	2016	2021	Understanding of water circulation mechanism.	AMSR-2	Type: Sun-synchronous Altitude: 700 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.jaxa.jp/projects/sat/gcom/index_e.html
GCOM-W3 Global Change Observation Mission-W3 JAXA	Planned	2020	2025	Understanding of water circulation mechanism.	AMSR-2	Type: Sun-synchronous Altitude: 700 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.jaxa.jp/projects/sat/gcom/index_e.html
GEO-CAPE Geostationary Coastal and Air Pollution Events NASA	Considered	2020	2023	Phase-2 DS Mission, launch order unknown, 3-year nominal mission. Atmospheric gas columns for air quality forecasts; ocean colour for coastal ecosystem health and climate emissions.	UV/Vis Near IR Wide Imaging Spectrometer (Geo-Cape), Event Imaging Spectrometer from GEO (GeoCape), IR Correlation Radiometer (GeoCape)	Type: Geostationary Altitude: 42000 km Period: Inclination: Repeat cycle: 1 days LST: Longitude (if geo): 80 Asc/desc: N/A URL: geo-cape.larc.nasa.gov/
GeoKOMPSAT-2A Geostationary Korea Multi-Purpose Satellite-2A KARI	Approved	May 2017	Jan 2024	Korea's geostationary meteorological satellite series.	Advanced MI	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
GeoKOMPSAT-2B Geostationary Korea Multi-Purpose Satellite-2B KARI	Approved	May 2018	Apr 2025	Korea's geostationary oceanographic and environmental satellite.	Advanced GOCI, GEMS	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
GISAT GEO HR IMAGER ISRO	Approved	Dec 2013	Dec 2022	Crop assessment, vegetation dynamics, drought assessment; quick monitoring of disasters, natural hazard and calamities, episodic events and short term events.	HRMX-VNIR, HYSI-SWIR, HYSI-VNIR, HRMX-TIR	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
GOCE Gravity Field and Steady-State Ocean Circulation Explorer ESA	Currently being flown	17 Mar 2009	Dec 2012	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, Laser Reflectors (ESA), GPS (ESA), SSTI, LRR	Type: Sun-synchronous Altitude: 270 km Period: 90 mins Inclination: 96.7 deg Repeat cycle: 61 days LST: Longitude (if geo): Asc/desc: N/A URL: earth.esa.int/goce
GOES-12 Geostationary Operational Environmental Satellite - 12 NOAA	Currently being flown	23 Jul 2001	Oct 2013	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX.	DCS (NOAA), S&R (GOES), WEFAX, SXI, Sounder, Imager, GOES Comms, SEM (GOES), LRIT	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 60 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-13 Geostationary Operational Environmental Satellite - 13 NOAA	Currently being flown	24 May 2006	Jun 2015	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX. On-orbit spare.	S&R (GOES), SXI, Sounder, Imager, GOES Comms, SEM (GOES), A-DCS4, LRIT	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 75 Asc/desc: TBD URL: www.oso.noaa.gov/goes
GOES-14 Geostationary Operational Environmental Satellite - 14 NOAA	Currently being flown	27 Jun 2009	Dec 2019	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX.	S&R (GOES), Sounder, Imager, GOES Comms, SEM (GOES), A-DCS4, LRIT	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 105 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-15 Geostationary Operational Environmental Satellite - 15 NOAA	Currently being flown	04 Mar 2010	Jan 2017	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX.	S&R (GOES), SXI, Sounder, Imager, GOES Comms, SEM (GOES), A-DCS4, LRIT	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 105 Asc/desc: N/A URL: www.oso.noaa.gov/goes/
GOES-R Geostationary Operational Environmental Satellite - R NOAA	Approved	Oct 2015	Mar 2025	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX.	ABI, GLM, Magnetometer (NOAA), EXIS, SEISS, SUVI, DCS (GOES-R)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.goes-r.gov/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
GOES-S Geostationary Operational Environmental Satellite - S NOAA	Approved	Feb 2017	Oct 2028	Meteorology (primary mission), search and rescue, space environment monitoring, data collection platform, data gathering, WEFAX.	ABI, GLM, Magnetometer (NOAA), EXIS, SEISS, SUVI, DCS (GOES-R)	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.goes-r.gov/
GOSAT Greenhouse gases Observing SATellite JAXA / MOE (Japan) / NIES (Japan)	Currently being flown	23 Jan 2009	Jan 2014	Observation of greenhouse gases.	TANSO-CAI, TANSO-FTS	Type: Sun-synchronous Altitude: 666 km Period: 98.18 mins Inclination: 98.06 deg Repeat cycle: 3 days LST: 13:00 Longitude (if geo): Asc/desc: Descending URL: www.jaxa.jp/projects/sat/gosat/index_e.html
GOSAT Follow-On Greenhouse gases Observing SATellite Follow-On JAXA / MOE (Japan) / NIES (Japan)	Planned	2016	2021	Observation of greenhouse gases.	FTS	Type: Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL:
GPM Core Global Precipitation Measurement Mission Core spacecraft NASA / JAXA	Approved	Feb 2014	Feb 2017	3-year nominal mission life, 5-year goal. 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, DPR	Type: Inclined, non-sun-synchronous Altitude: 407 km Period: 95 mins Inclination: 65 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: gpm.gsfc.nasa.gov
GRACE Gravity Recovery and Climate Experiment NASA / DLR	Currently being flown	17 Mar 2002	Sep 2013	5-year nominal mission life, currently in extended operations. Extremely high precision gravity measurements for use in construction of gravity field models. GRACE consists of two satellites (A, B) serving one mission.	GRACE instrument	Type: Inclined, non-sun-synchronous Altitude: 400 km Period: 94 mins Inclination: 89 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.csr.utexas.edu/grace/
GRACE FO Gravity Recovery and Climate Experiment - Follow-on NASA / DLR	Planned	2017	2022	5-year nominal mission life, currently in extended operations. Extremely high precision gravity measurements for use in construction of gravity field models. GRACE consists of two satellites (A, B) serving one mission.	GRACE instrument	Type: Inclined, non-sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
GRACE-II Gravity Recovery and Climate Experiment NASA	Considered	2030	2033	Phase-3 DS Mission, launch order unknown, 3-year nominal mission. High temporal resolution gravity fields for tracking large scale water movement.	GRACE instrument	Type: Inclined, non-sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: eospso.gsfc.nasa.gov/eos_homepage/mission_profiles/show_mission.php?id=83
HJ-1C Disaster and Environment Monitoring and Forecast Small Satellite Constellation C CRESDA / CAST / NRSCC	Approved	Dec 2012	Dec 2014	Disaster and environment monitoring and forecasting.	S-Band SAR	Type: Sun-synchronous Altitude: 499 km Period: Inclination: 97.3 deg Repeat cycle: 31 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: http:/www.cresda.com/
HY-2A Ocean dynamics satellite A NSOAS / CAST	Currently being flown	16 Aug 2011	Dec 2012	Detecting ocean surface temperature, wind field, wave and topography.	RAD, SCAT, ALT	Type: Sun-synchronous Altitude: 963 km Period: Inclination: 99.3 deg Repeat cycle: 14 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.naoas.gov.cn/
HY-2B Ocean dynamics satellite B NSOAS / CAST	Planned	2012	2015	Detecting ocean surface temperature, wind field, wave and topography.	RAD, SCAT, ALT	Type: Sun-synchronous Altitude: 963 km Period: Inclination: 99.3 deg Repeat cycle: 14 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.naoas.gov.cn/
HY-2C Ocean dynamics satellite C NSOAS / CAST	Planned	2015	2018	Detecting ocean surface temperature, wind field, wave and topography.	RAD, SCAT, ALT	Type: Sun-synchronous Altitude: 963 km Period: Inclination: 99.3 deg Repeat cycle: 14 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.naoas.gov.cn/
HY-2D Ocean dynamics satellite D NSOAS / CAST	Planned	2019	2022	Detecting ocean surface temperature, wind field, wave and topography.	RAD, SCAT, ALT	Type: Sun-synchronous Altitude: 963 km Period: Inclination: 99.3 deg Repeat cycle: 14 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.naoas.gov.cn/
HY-3A NSOAS / CAST	Planned	2015	2020	Ocean monitoring, environmental protection, coastal zone survey, etc.	WSAR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
HY-3B NSOAS / CAST	Planned	2017	2022	Ocean monitoring, environmental protection, coastal zone survey, etc.	WSAR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
HY-3C NSOAS / CAST	Planned	2022	2027	Ocean monitoring, environmental protection, coastal zone survey, etc.	WSAR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
HyspIRI Hyperspectral Infrared Imager NASA	Considered	2020	2023	Phase-2 DS Mission, launch order unknown, 3-year nominal mission. Land surface composition for agriculture and mineral characterization; vegetation types for ecosystem health.	Visible imaging spectrometer (HyspIRI), Multi-spectral thermal infrared imager (HyspIRI)	Type: Sun-synchronous Altitude: 626 km Period: Inclination: 98 deg Repeat cycle: 19 days LST: 11:00 Longitude (if geo): Asc/desc: URL: hyspiri.jpl.nasa.gov/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
ICESat-II Ice, Cloud, and Land Elevation Satellite II NASA	Planned	2016	2018	Early 2015 launch expected (after SMAP), 3-year nominal mission life. Continue the assessment of polar ice changes and measure vegetation canopy heights, allowing estimates of biomass and carbon in aboveground vegetation in conjunction with related missions, and allow measurements of solid earth properties.	ATLAS	Type: Inclined, non-sun-synchronous Altitude: 600 km Period: 97 mins Inclination: 94 deg Repeat cycle: 183 days LST: Longitude (if geo): Asc/desc: TBD URL: icesat.gsfc.nasa.gov/index.php
IMS-1 Indian Mini Satellite-1 ISRO	Currently being flown	28 Apr 2008	Dec 2012	Micro-satellite for Third World countries for natural resources monitoring and management .	MxT, HySI (IMS-1)	Type: Sun-synchronous Altitude: 632 km Period: 97 mins Inclination: 97.92 deg Repeat cycle: 22 days LST: 9:30 Longitude (if geo): Asc/desc: Descending URL:
Ingenio CDTI / ESA	Approved	Jan 2014	Jan 2021	Cartography, land use, urban management, water management, agriculture and environmental monitoring, risk management and security.	PAN+MS (RGB+NIR), UVAS	Type: Sun-synchronous Altitude: 685 km Period: 98 mins Inclination: 98 deg Repeat cycle: 49 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL:
INSAT-3A Indian National Satellite - 3A ISRO	Currently being flown	04 Apr 2003	Apr 2013	Meteorology, data collection and communication, search and rescue.	VHRR, DRT-S&R, CCD camera	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -94 Asc/desc: N/A URL: www.isro.org/
INSAT-3D Indian National Satellite - 3D ISRO	Approved	Dec 2012	Dec 2019	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): -93.5 Asc/desc: N/A URL: www.isro.org/
INSAT-3DR Indian National Satellite - 3DR ISRO	Approved	Dec 2013	Dec 2020	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): -93.5 Asc/desc: N/A URL: www.isro.org/
INSAT-3DS Indian National Satellite - 3DS ISRO	Approved	Dec 2015	Dec 2022	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): -93.5 Asc/desc: N/A URL: www.isro.org/
ISS/JEM International Space Station/Japanese Experiment Mo JAXA	Currently being flown	10 Sep 2009	Apr 2020	Scientific experiments on orbit.	SMILES	Type: Inclined, non-sun-synchronous Altitude: 407 km Period: 93 mins Inclination: 51.6 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: iss.jaxa.jp/iss/index_e.html
Jason-1 Ocean surface topography NASA / CNES	Currently being flown	07 Dec 2001	Sep 2013	3-year nominal mission life, currently in extended operations. Physical oceanography, geodesy/gravity, climate monitoring, marine meteorology.	LRA, JMR, DORIS-NG, POSEIDON-2 (SSALT-2), TRSR	Type: Inclined, non-sun-synchronous Altitude: 1336 km Period: 112.4 mins Inclination: 66 deg Repeat cycle: 10 days LST: Longitude (if geo): Asc/desc: N/A URL: sealevel.jpl.nasa.gov/mission/jason-1.html
Jason-3 NASA / NOAA / CNES / EUMETSAT	Approved	Apr 2014	Apr 2017	3-year nominal mission life, currently in extended operations. Physical oceanography, geodesy/gravity, climate monitoring, marine meteorology.	AMR, POSEIDON-3B	Type: Inclined, non-sun-synchronous Altitude: 1336 km Period: 112.4 mins Inclination: 66 deg Repeat cycle: 10 days LST: Longitude (if geo): Asc/desc: N/A URL:
JPSS-1 Joint Polar Satellite System - 1 NOAA / EUMETSAT / NASA	Approved	Jul 2017	Jun 2023	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection.	CrIS, CERES, VIIRS, ATMS, OMPS	Type: Sun-synchronous Altitude: 824 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.nesdis.noaa.gov/jpss/
JPSS-2 Joint Polar Satellite System - 2 NOAA / EUMETSAT / NASA	Approved	Jan 2023	Oct 2029	Meteorological, climatic, terrestrial, oceanographic, and solar-geophysical applications; global and regional environmental monitoring, search and rescue, data collection. Note that free-flyer options are being considered for the A-DCS4 and SARSAT instruments, though these are considered part of the JPSS system.	CrIS, VIIRS, ATMS, TSIS, OMPS, A-DCS4, SARSAT, ERBS	Type: Sun-synchronous Altitude: 833 km Period: 101 mins Inclination: 98.75 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.nesdis.noaa.gov/jpss/
KALPANA-1 Meteorological Satellite ISRO	Currently being flown	12 Sep 2002	Dec 2012	Meteorological applications.	VHRR, DRT-S&R	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -83 Asc/desc: N/A URL: www.isro.org/insat2b.htm
Kanopus-V N1 Kanopus-V Environmental Satellite N1 ROSKOSMOS / ROSHYDROMET	Approved	Jun 2012	Jun 2019	Land surface, disaster monitoring.	PSS, MSS (Kanonpus), MSU-200	Type: Sun-synchronous Altitude: 600 km Period: 98 mins Inclination: 98 deg Repeat cycle: 17 days LST: Longitude (if geo): Asc/desc: Ascending URL: planet.iitp.ru
Kanopus-V N2 Kanopus-V Environmental Satellite N2 ROSKOSMOS / ROSHYDROMET	Considered	2013	2018	Land surface, disaster monitoring.	PSS, MSS (Kanonpus), MSU-200	Type: Sun-synchronous Altitude: 600 km Period: Inclination: 98 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: planet.iitp.ru
KOMPSAT-2 Korea Multi-Purpose Satellite -2 KARI	Currently being flown	27 Jul 2006	Jul 2013	Cartography, land use and planning, disaster monitoring.	MSC	Type: Sun-synchronous Altitude: 685 km Period: 98.5 mins Inclination: Repeat cycle: 28 days LST: 10:50 Longitude (if geo): Asc/desc: Ascending URL: kompsat.kari.re.kr/english/index.asp

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
KOMPSAT-3 Korea Multi-Purpose Satellite -3 KARI / DLR	Currently being flown	18 May 2012	May 2016	Cartography, land use and planning, disaster monitoring.	AEISS	Type: Sun-synchronous Altitude: 685 km Period: 98.5 mins Inclination: Repeat cycle: 28 days LST: 10:50 Longitude (if geo): Asc/desc: Ascending URL: kompsat.kari.re.kr/english/index.asp
KOMPSAT-3A Korea Multi-Purpose Satellite -3A KARI / DLR	Approved	May 2014	May 2018	Cartography, land use and planning, disaster monitoring.	AEISS-A	Type: Sun-synchronous Altitude: 528 km Period: 98.5 mins Inclination: Repeat cycle: 28 days LST: Longitude (if geo): Asc/desc: Ascending URL:
KOMPSAT-5 Korea Multi-Purpose Satellite -5 KARI	Approved	May 2012	Dec 2016	Cartography, land use and planning, disaster monitoring.	COSI	Type: Sun-synchronous Altitude: 550 km Period: 98.5 mins Inclination: Repeat cycle: 28 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: kompsat.kari.re.kr/english/index.asp
LAGEOS-1 Laser Geodynamics Satellite - 1 ASI	Currently being flown	04 May 1976	May 2016	Geodesy, crustal motion and gravity field measurements by laser ranging.	LRA (LAGEOS)	Type: Inclined, non-sun-synchronous Altitude: 5900 km Period: 226 mins Inclination: 110 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.asi.it
LAGEOS-2 Laser Geodynamics Satellite - 2 ASI	Currently being flown	22 Oct 1992	Oct 2032	Geodesy, crustal motion and gravity field measurements by laser ranging.	LRA (LAGEOS)	Type: Inclined, non-sun-synchronous Altitude: 5800 km Period: 223 mins Inclination: 52.6 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.asi.it
Landsat-5 USGS / NASA	Currently being flown	01 Mar 1984	Dec 2012	Earth resources, land surface, environmental monitoring, agriculture and forestry, disaster monitoring and assessment, ice and snow cover.	MSS (Landsat), TM	Type: Sun-synchronous Altitude: 705 km Period: 98.9 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: landsat.usgs.gov/
Landsat-7 USGS / NASA	Currently being flown	15 Apr 1999	Jan 2017	5-year nominal mission life, currently in extended operations. Earth resources, land surface, environmental monitoring, agriculture and forestry, disaster monitoring and assessment, ice and snow cover.	ETM+	Type: Sun-synchronous Altitude: 705 km Period: 98.9 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 10:05 Longitude (if geo): Asc/desc: Descending URL: landsat.usgs.gov/
LARES LAser RElativity Satellite ASI	Currently being flown	13 Feb 2012	Feb 2052	Scientific objectives are the measurement of the dragging of inertial frames due to the Earth's angular momentum, or Lense-Thirring effect, and a high precision test of the Earth's gravitomagnetic field with accuracy of the order of a few percent. Gravitomagnetic field and dragging of inertial frames are predictions of Einstein's theory of General Relativity. In addition, LARES will allow other measurements in geodesy and geodynamics.	LCCRA	Type: Inclined, non-sun-synchronous Altitude: 1450 km Period: 99.1 mins Inclination: 71 deg Repeat cycle: LST: Not defined Longitude (if geo): Asc/desc: Ascending URL: www.asi.it
LDCM Landsat Data Continuity Mission NASA / USGS	Approved	Jan 2013	Jan 2018	5-year nominal mission life. Earth resources, land surface, environmental monitoring, agriculture and forestry, disaster monitoring and assessment, ice and snow cover.	OLI, TIRS	Type: Sun-synchronous Altitude: 705 km Period: 99 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: ldcm.nasa.gov/
LIST Lidar Surface Topography NASA	Considered	2030	2033	Phase-3 DS Mission, launch order unknown, 3-year nominal mission. Land surface topography for landslide hazards and water runoff.	Laser altimeter (LIST)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: 365 days LST: Longitude (if geo): Asc/desc: URL: decadal.gsfc.nasa.gov/list.html
MEGHA-TROPIQUES CNES / ISRO	Currently being flown	12 Oct 2011	Nov 2014	Study of the inter-tropical zone and its convective systems (water and energy cycles).	ScaRaB, SAPHIR, MADRAS, ROSA	Type: Inclined, non-sun-synchronous Altitude: 867 km Period: 102.16 mins Inclination: 20 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: smsc.cnes.fr/MEGHAT/
MERLIN Methane Remote Sensing Lidar Mission DLR / CNES	Planned	2016	2019	Global atmospheric methane concentration.	IPDA LIDAR	Type: Sun-synchronous Altitude: 500 km Period: 90 mins Inclination: Repeat cycle: 28 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.dlr.de/rd/desktopdefault.aspx/tabid-2440/3586_read-31672/
Meteor-3M N2 ROSHYDROMET / ROSKOSMOS	Approved	Apr 2012	Apr 2016	Hydrometeorology, climatology, land surface, physical oceanography, heliogeophysics and space environment, data collection, sounding of the atmosphere, agriculture.	BRK, MTVZA, IKFS-2, MSU-MR, MSGI-MKA, DCS , SAR, KMSS	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 N1 Meteor-M N1 Meteorological Satellite ROSHYDROMET / ROSKOSMOS	Currently being flown	17 Sep 2009	Sep 2014	Hydrometeorology, climatology, heliogeophysics, DCS.	MTVZA, MSU-MR, DCS , KMSS, GGAK-M, Severjanin	Type: Sun-synchronous Altitude: 820 km Period: 102 mins Inclination: 98.79 deg Repeat cycle: 37 days LST: 09:30 Longitude (if geo): Asc/desc: Ascending URL: planet.iitp.ru
Meteor-M N2 Meteor-M Meteorological Satellite N2 ROSHYDROMET / ROSKOSMOS	Approved	Sep 2012	Sep 2017	Hydrometeorology, climatology, heliogeophysics, DCS.	MTVZA, IKFS-2, MSU-MR, DCS , KMSS, GGAK-M, Severjanin	Type: Sun-synchronous Altitude: 835 km Period: 102 mins Inclination: 98.7 deg Repeat cycle: 37 days LST: 09:30 Longitude (if geo): Asc/desc: Ascending URL: planet.iitp.ru
Meteor-M N3 Meteor-M Oceanographical Satellite N3 ROSHYDROMET / ROSKOSMOS	Approved	Dec 2015	Dec 2020	Oceanography, hydrometeorology, climatology.	DCS , SAR, Radiomet, OCS, CZS, Scatterometer (Meteor)	Type: Sun-synchronous Altitude: 835 km Period: 102 mins Inclination: 98.7 deg Repeat cycle: 37 days LST: TBD Longitude (if geo): Asc/desc: Ascending URL: planet.iitp.ru

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
Meteor-MP N1 Meteor-MP Meteorological Satellite N1 ROSHYDROMET / ROSKOSMOS	Planned	2014	2019	Hydrometeorology, climatology, heliogeophysics, DCS.	Advanced MSU-MR, Advanced KMSS, Advanced IKFS-2, Advanced MTVZA, Advanced Scatterometer , Advanced SAR , Advanced Radiomet, Advanced DCS , Advanced GGAK-M, TGSP	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: planet.iitp.ru
Meteor-MP N2 Meteor-MP Meteorological Satellite N2 ROSHYDROMET / ROSKOSMOS	Planned	2015	2020	Hydrometeorology, climatology, heliogeophysics, DCS.	Advanced MSU-MR, Advanced KMSS, Advanced IKFS-2, Advanced MTVZA, Advanced Scatterometer , Advanced SAR , Advanced Radiomet, Advanced DCS , Advanced GGAK-M, TGSP	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: planet.iitp.ru
Meteor-MP N3 Meteor-MP Meteorological Satellite N3 ROSHYDROMET / ROSKOSMOS	Planned	2016	2021	Hydrometeorology, climatology, heliogeophysics, DCS.	Advanced MSU-MR, Advanced KMSS, Advanced IKFS-2, Advanced MTVZA, Advanced Scatterometer , Advanced SAR , Advanced Radiomet, Advanced DCS , Advanced GGAK-M, TGSP	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: planet.iitp.ru
Meteosat-10 Meteosat Second Generation-3 EUMETSAT / ESA	Approved	Jun 2012	Jun 2020	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.	MSG Comms, SEVIRI, GERB	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
Meteosat-11 Meteosat Second Generation-4 EUMETSAT / ESA	Approved	Jan 2015	Jan 2023	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.	MSG Comms, SEVIRI, GERB	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
Meteosat-7 EUMETSAT / ESA	Currently being flown	03 Sep 1997	Dec 2016	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.int/Home/Main/Satellites/index.htm?l=en?
Meteosat-8 Meteosat Second Generation-1 EUMETSAT / ESA	Currently being flown	13 Aug 2002	Dec 2019	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.	MSG Comms, SEVIRI, GERB	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
Meteosat-9 Meteosat Second Generation-2 EUMETSAT / ESA	Currently being flown	21 Dec 2005	Dec 2021	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.	MSG Comms, SEVIRI, GERB	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
Metop-A Meteorological Operational Polar Satellite - A EUMETSAT / ESA	Currently being flown	19 Oct 2006	Dec 2013	Meteorology, climatology.	SEM (POES), ARGOS, S&R (NOAA), MHS, IASI, GRAS, GOME-2, ASCAT, AMSU-A, AVHRR/3, HIRS/4	Type: Sun-synchronous Altitude: 840 km Period: 107.1 mins Inclination: 98.8 deg Repeat cycle: 29 days LST: 9:30 Longitude (if geo): Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
Metop-B Meteorological Operational Polar Satellite - B EUMETSAT / ESA	Approved	Jul 2012	Jul 2017	Meteorology, climatology.	SEM (POES), ARGOS, S&R (NOAA), MHS, IASI, GRAS, GOME-2, ASCAT, AMSU-A, AVHRR/3, HIRS/4	Type: Sun-synchronous Altitude: 840 km Period: 101.7 mins Inclination: 98.8 deg Repeat cycle: 29 days LST: 9:30 Longitude (if geo): Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
Metop-C Meteorological Operational Polar Satellite - C EUMETSAT / ESA	Approved	Apr 2016	Dec 2021	Meteorology, climatology.	SEM (POES), ARGOS, MHS, IASI, GRAS, GOME-2, ASCAT, AMSU-A, AVHRR/3, A-DCS4	Type: Sun-synchronous Altitude: 840 km Period: 101.7 mins Inclination: 98.8 deg Repeat cycle: 29 days LST: 9:30 Longitude (if geo): Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
MIOSAT Piccola MIssione Ottica basata su microSATellite ASI	Approved	Jun 2014	Jun 2016	Land surface, agriculture and forestry, regional geology, land use studies, water resources, vegetation studies, coastal studies and soils and main atmospheric gases detection.	PAN CAM, ALISEO, Mach-Zehnder Micro-interferometer	Type: Sun-synchronous Altitude: 615 km Period: 97 mins Inclination: 97.9 deg Repeat cycle: LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.asi.it/en/activity/earth_observation/miosat_
MTG-I1 (imaging) Meteosat Third Generation - Imaging Satellite 1 EUMETSAT / ESA	Approved	Dec 2017	Jun 2026	Meteorology, climatology, Atmospheric dynamics/water and energy cycles.	FCI, LI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
MTG-I2 (imaging) Meteosat Third Generation - Imaging Satellite 2 EUMETSAT / ESA	Approved	Jun 2022	Jan 2031	Meteorology, climatology, Atmospheric dynamics/water and energy cycles.	FCI, LI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
MTG-I3 (imaging) Meteosat Third Generation - Imaging Satellite 3 EUMETSAT / ESA	Approved	Jan 2026	Jul 2034	Meteorology, climatology, Atmospheric dynamics/water and energy cycles.	FCI, LI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
MTG-I4 (imaging) Meteosat Third Generation - Imaging Satellite 4 EUMETSAT / ESA	Approved	Jun 2030	Dec 2038	Meteorology, climatology, Atmospheric dynamics/water and energy cycles.	FCI, LI	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
MTG-S1 (sounding) Meteosat Third Generation S1 Sounding Satellite 1 EUMETSAT / EC / ESA	Planned	2019	2027	Supporting European atmospheric composition and air quality monitoring services. MTG S1 carries the Sentinel-4 A mission.	IRS	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
MTG-S2 (sounding) Meteosat Third Generation S2 Sounding Satellite 2 EUMETSAT / EC / ESA	Planned	2027	2035	Supporting European atmospheric composition and air quality monitoring services. MTG S2 carries the Sentinel-4 B mission.	IRS	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.eumetsat.int/Home/Main/Satellites/index.htm?l=en?
MTSAT-1R Multi-functional Transport Satellite JMA / JCAB	Currently being flown	26 Feb 2005	Jan 2015	Meteorology, aeronautical applications. As of 2010 satellite on stand-by operational.	MTSAT Comms, JAMI/MTSAT-1R, MTSAT DCS	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -140 Asc/desc: N/A URL:
MTSAT-2 Multi-functional Transport Satellite JMA / JCAB	Currently being flown	18 Feb 2006	Jan 2017	Meteorology, aeronautical applications.	IMAGER/MTSAT-2, MTSAT Comms, MTSAT DCS	Type: Geostationary Altitude: 36000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): -145 Asc/desc: N/A URL:
NigeriaSat-2 NASRDA	Currently being flown	17 Aug 2011	Aug 2018	Small satellite mission with technical and scientific objectives (environmental) monitoring.	NigeriaSat Medium and High Resolution	Type: Sun-synchronous Altitude: 700 km Period: 97 mins Inclination: 98 deg Repeat cycle: 4 days LST: Longitude (if geo): Asc/desc: Descending URL: www.nasrda.net
NigeriaSat-X NASRDA	Currently being flown	17 Aug 2011	Aug 2018	Small satellite mission with technical and scientific objectives (capability demonstration).	NigeriaSat Medium Resolution	Type: Sun-synchronous Altitude: 700 km Period: 97 mins Inclination: 98 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Descending URL: www.nasrda.net
NMP EO-1 New Millenium Program Earth Observing-1 NASA	Currently being flown	21 Nov 2000	Sep 2013	1.5-year nominal mission life, currently in extended operations. Land surface, earth resources.	ALI, Hyperion, LEISA AC	Type: Sun-synchronous Altitude: 690 km Period: 99 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: eo1.gsfc.nasa.gov/
NOAA-15 National Oceanic and Atmospheric Administration - 15 NOAA	Currently being flown	01 May 1998	Dec 2012	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.	ARGOS, S&R (NOAA), ATOVS (HIRS/3 + AMSU + AVHRR/3), AMSU A, HIRS/3, AMSU-B, AVHRR/3, NOAA Comms	Type: Sun-synchronous Altitude: 813 km Period: 101.4 mins Inclination: 98.6 deg Repeat cycle: LST: 7:08 Longitude (if geo): Asc/desc: Descending URL: www.oso.noaa.gov/poes/
NOAA-16 National Oceanic and Atmospheric Administration - 16 NOAA	Currently being flown	21 Sep 2000	Dec 2012	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.	SEM (POES), ARGOS, S&R (NOAA), ATOVS (HIRS/3 + AMSU + AVHRR/3), AMSU-A, HIRS/3, SBUV/2, AMSU-B, AVHRR/3, NOAA Comms	Type: Sun-synchronous Altitude: 870 km Period: 102 mins Inclination: 98.8 deg Repeat cycle: LST: 13:54 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NOAA-17 National Oceanic and Atmospheric Administration - 17 NOAA	Currently being flown	24 Jun 2002	Dec 2014	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.	SEM (POES), ARGOS, S&R (NOAA), AMSU-A, HIRS/3, SBUV/2, AMSU-B, AVHRR/3, NOAA Comms	Type: Sun-synchronous Altitude: 833 km Period: 101.4 mins Inclination: 98.75 deg Repeat cycle: LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: www.oso.noaa.gov/poes/
NOAA-18 National Oceanic and Atmospheric Administration - 18 NOAA	Currently being flown	20 May 2005	Dec 2015	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.	SEM (POES), ARGOS, S&R (NOAA), MHS, AMSU-A, SBUV/2, AVHRR/3, NOAA Comms, HIRS/4	Type: Sun-synchronous Altitude: 870 km Period: 102.1 mins Inclination: 98.75 deg Repeat cycle: LST: 14:00 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
NOAA-19 National Oceanic and Atmospheric Administration - 19 NOAA	Currently being flown	04 Feb 2009	Mar 2016	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.	SEM (POES), ARGOS, S&R (NOAA), MHS, SBUV/2, AVHRR/3, NOAA Comms, HIRS/4, A-DCS4, LRIT	Type: Sun-synchronous Altitude: 870 km Period: 102.1 mins Inclination: 98.75 deg Repeat cycle: LST: 14:00 Longitude (if geo): Asc/desc: Ascending URL: www.oso.noaa.gov/poes/
OCEANSAT-2 Ocean Satellite-2 ISRO	Currently being flown	24 Sep 2009	Sep 2014	Ocean and atmosphere applications.	OCM, Scatterometer (OCEANSAT), ROSA	Type: Sun-synchronous Altitude: 720 km Period: 99.31 mins Inclination: 98.28 deg Repeat cycle: 2 days LST: 12:00 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
OCEANSAT-3 Ocean Satellite-3 ISRO	Considered	2014	2019	Ocean and atmosphere applications.	TIR (Oceansat-3/3A), OCM (Oceansat-3/3A)	Type: Sun-synchronous Altitude: 720 km Period: 99.31 mins Inclination: 98.28 deg Repeat cycle: 2 days LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
OCEANSAT-3A Ocean Satellite-3A ISRO	Considered	2018	2023	Ocean and atmosphere applications.	TIR (Oceansat-3/3A), OCM (Oceansat-3/3A)	Type: Sun-synchronous Altitude: 720 km Period: 99.31 mins Inclination: 98.28 deg Repeat cycle: 2 days LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
OCO-2 Orbiting Carbon Observatory-2 NASA	Approved	Jul 2014	Jul 2017	High resolution carbon dioxide measurements to characterize sources and sinks on regional scales and quantify their variability over the seasonal cycle.	Spectrometer (OCO-2)	Type: Sun-synchronous Altitude: 705 km Period: 98.8 mins Inclination: 98.2 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: oco.jpl.nasa.gov/
Odin SNSB / TEKES / CNES / CSA	Currently being flown	20 Feb 2001	Dec 2012	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: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.ssc.se/?id=7180
Ørsted (Oersted) DNSC / CNES	Currently being flown	21 Nov 1999	Dec 2012	Earth magnetic field mapping.	Overhauser Magnetometer, CSC FVM, SI, GPSRO (Oersted)	Type: Inclined, non-sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: web.dmi.dk/projects/oersted/
OSTM (Jason-2) Ocean Surface Topography Mission NASA / NOAA / CNES / EUMETSAT	Currently being flown	20 Jun 2008	Dec 2013	3-year nominal mission life. Physical oceanography, geodesy/gravity, climate monitoring, marine meteorology.	LRA, JMR, DORIS-NG, POSEIDON-3, AMR, GPSP	Type: Inclined, non-sun-synchronous Altitude: 1336 km Period: 112.4 mins Inclination: 66 deg Repeat cycle: 10 days LST: Longitude (if geo): Asc/desc: N/A URL: sealevel.jpl.nasa.gov/mission/ostm.html
PACE Preliminary Aerosol, Cloud, Ecosystem NASA	Considered	2019	2021	Phase-2 DS Mission, launch order unknown, 3-year nominal mission. Aerosol and cloud profiles for climate and water cycle; ocean colour for open ocean biogeochemistry.	Next Gen APS (ACE), OES	Type: Sun-synchronous Altitude: 650 km Period: Inclination: 98.2 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL: dsm.gsfc.nasa.gov/ace/index.html
PARASOL Polarization and Anisotropy of Reflectances for Atmospheric Science coupled with Observations from a LIDAR CNES	Currently being flown	01 Dec 2004	Jun 2012	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: 12:00 Longitude (if geo): Asc/desc: TBD URL: smsc.cnes.fr/PARASOL/index.htm
PATH Precipitation and All-weather Temperature and Humidity NASA	Considered	2030	2033	Phase-3 DS Mission, launch order unknown, 3-year nominal mission. High frequency, all-weather temperature and humidity soundings for weather forecasting and SST.	GeoSTAR	Type: Geostationary Altitude: 42000 km Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: decadal.gsfc.nasa.gov/path.html
PAZ CDTI	Approved	Feb 2013	Feb 2018	Security, land use, urban management, environmental monitoring, risk management.	Paz SAR-X	Type: Sun-synchronous Altitude: 514 km Period: 95 mins Inclination: 97.44 deg Repeat cycle: 11 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.hisdesat.es
PCW-1 Polar Communications and Weather-1 CSA	Planned	2018	2028	Continuous meteorological observation and communications service to the Arctic.	PCWMP, PCW PHEMOS - Solar-Terrestrial, PCW PHEMOS - Atmospheric	Type: Highly elliptical Altitude: Period: 718 mins Inclination: 63.4 deg Repeat cycle: 1 days LST: N/A Longitude (if geo): Asc/desc: N/A URL: www.asc-csa.gc.ca/eng/satellites/pcw/default.asp
PCW-2 Polar Communications and Weather-2 CSA	Planned	2018	2028	Continuous meteorological observation and communications service to the Arctic.	PCWMP, PCW PHEMOS - Solar-Terrestrial, PCW PHEMOS - Atmospheric	Type: Highly elliptical Altitude: Period: 718 mins Inclination: 63.4 deg Repeat cycle: 1 days LST: N/A Longitude (if geo): Asc/desc: N/A URL: www.asc-csa.gc.ca/eng/satellites/pcw/default.asp
PICARD CNES	Currently being flown	15 Jun 2010	Jun 2013	Simultaneous measurements of solar diameter, differential rotation, solar constant, and variability.	SODISM, SOVAP, PREMOS	Type: TBD Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: smsc.cnes.fr/PICARD/
Pleiades 1 CNES	Currently being flown	17 Dec 2011	Dec 2016	Cartography, land use, risk, agriculture and forestry, civil planning and mapping, digital terrain models, defence.	HiRI	Type: Sun-synchronous Altitude: 694 km Period: Inclination: Repeat cycle: 26 days LST: 10:15 Longitude (if geo): Asc/desc: Descending URL: smsc.cnes.fr/PLEIADES/Fr/index.htm
Pleiades 2 CNES	Approved	Mar 2013	Mar 2018	Cartography, land use, risk, agriculture and forestry, civil planning and mapping, digital terrain models, defence.	HiRI	Type: Sun-synchronous Altitude: 694 km Period: Inclination: Repeat cycle: LST: 10:15 Longitude (if geo): Asc/desc: Descending URL: smsc.cnes.fr/PLEIADES/Fr/index.htm
PRISMA PRecursore IperSpettrale della Missione Applicativa ASI	Approved	Jun 2014	Jun 2019	Land surface, agriculture and forestry, regional geology, land use studies, water resources, vegetation studies, coastal studies and soils.	HYC, PAN CAMERA	Type: Sun-synchronous Altitude: 615 km Period: 97 mins Inclination: 97.9 deg Repeat cycle: LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.asi.it/en/activity/earth_observation/prisma_
PROBA Project for On-Board Autonomy ESA	Currently being flown	22 Oct 2001	Dec 2012	PROBA is a technology experiment to demonstrate the on-board autonomy of a generic platform suitable for small scientific or application missions. A number of earth observation instruments are included. CHRIS - a hyperspectral imager provides data related to Earth Resources science and applications.	CHRIS	Type: Sun-synchronous Altitude: 615 km Period: 96.97 mins Inclination: 97.9 deg Repeat cycle: 7 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: earth.esa.int/proba/
QuikSCAT Quick Scatterometer NASA	Currently being flown	19 Jun 1999	Sep 2013	The 3-year nominal QuikSCAT mission life is complete, and it is currently in extended operations. Due to technical failure (the antenna stopped rotating in November 2009), and the instrument no longer collects ocean wind vector data. However it still provides calibration data for other on-orbit scatterometers, which enables the continuation of a climate-quality wind vector dataset. The 2011 NASA Senior Review panel strongly endorsed the continuation of the mission with these modified objectives through 2013.	SeaWinds	Type: Sun-synchronous Altitude: 803 km Period: 101 mins Inclination: 98.6 deg Repeat cycle: LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: winds.jpl.nasa.gov/missions/quikscat/index.cfm

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
RADARSAT C-1 RADARSAT CONSTELLATION-1 CSA	Approved	Aug 2016	Dec 2023	Ecosystem monitoring, maritime surveillance, disaster management.	SAR (RCM), AIS (RCM)	Type: Sun-synchronous Altitude: 600 km Period: 96.4 mins Inclination: 97.7 deg Repeat cycle: 12 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.asc-csa.gc.ca/eng/satellites/radarsat/default.asp
RADARSAT C-2 RADARSAT CONSTELLATION-2 CSA	Approved	Dec 2017	Mar 2025	Ecosystem monitoring, maritime surveillance, disaster management.	SAR (RCM), AIS (RCM)	Type: Sun-synchronous Altitude: 600 km Period: 96.4 mins Inclination: 97.7 deg Repeat cycle: 12 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.asc-csa.gc.ca/eng/satellites/radarsat/default.asp
RADARSAT C-3 RADARSAT CONSTELLATION-3 CSA	Approved	Dec 2017	Mar 2025	Ecosystem monitoring, maritime surveillance, disaster management.	SAR (RCM), AIS (RCM)	Type: Sun-synchronous Altitude: 600 km Period: 96.4 mins Inclination: 97.7 deg Repeat cycle: 12 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.asc-csa.gc.ca/eng/satellites/radarsat/default.asp
RADARSAT-1 CSA	Currently being flown	04 Nov 1995	Mar 2015	Environmental monitoring, physical oceanography, ice and snow, land surface.	SAR (RADARSAT)	Type: Sun-synchronous Altitude: 798 km Period: 100.7 mins Inclination: 98.594 deg Repeat cycle: 24 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.asc-csa.gc.ca/eng/satellites/radarsat1/default.asp
RADARSAT-2 CSA	Currently being flown	14 Dec 2007	Apr 2015	Environmental monitoring, physical oceanography, ice and snow, land surface. Note: Ownership of RADARSAT-2 has been transferred to MDA Corporation. CSA investment in the project is paid back with the data generated by the satellite since it entered operations.	SAR (RADARSAT-2)	Type: Sun-synchronous Altitude: 798 km Period: 100.7 mins Inclination: 98.6 deg Repeat cycle: 24 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.asc-csa.gc.ca/eng/satellites/radarsat2/default.asp
RapidEye DLR	Currently being flown	29 Aug 2008	Aug 2015	System of 5 satellites for cartography, land surface, digital terrain models, disaster management, environmental monitoring.	MSI	Type: Sun-synchronous Altitude: 622 km Period: Inclination: 98.7 deg Repeat cycle: 1 days LST: 11:00 Longitude (if geo): Asc/desc: Descending URL: www.rapideye.de/
RASAT RASAT Remote Sensing Satellite TUBITAK	Currently being flown	17 Aug 2011	Aug 2014	Cartography, land cover/land use, city planning, disaster mitigation/monitoring, environmental monitoring.	RASAT VIS Panchromatic, RASAT VIS Multispectral	Type: Sun-synchronous Altitude: 700 km Period: 98.8 mins Inclination: 98.21 deg Repeat cycle: 4 days LST: 10:30 Longitude (if geo): Asc/desc: Ascending URL: www.uzay.tubitak.gov.tr/
RESOURCESAT-1 Resource Satellite-1 ISRO	Currently being flown	17 Oct 2003	Dec 2012	Natural resources management, agricultural applications, forestry, etc.	AWiFS, LISS-IV, LISS-III (Resourcesat)	Type: Sun-synchronous Altitude: 817 km Period: 102 mins Inclination: 98.72 deg Repeat cycle: 26 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
RESOURCESAT-2 Resource Satellite-2 ISRO	Currently being flown	20 Apr 2011	Apr 2016	Natural resources management, agricultural applications, forestry, etc.	AWiFS, LISS-IV, LISS-III (Resourcesat)	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/
RESOURCESAT-2A Resource Satellite-2A ISRO	Considered	2013	2018	Natural resources management, agricultural applications, forestry, etc.	AWiFS, LISS-IV, LISS-III (Resourcesat)	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/
RESOURCESAT-3 Resource Satellite-3 ISRO	Considered	2015	2020	Natural resources management, agricultural applications, forestry, etc.	WS LISS III, ATCOR	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/
RESOURCESAT-3A Resource Satellite-3A ISRO	Considered	2018	2023	Natural resources management, agricultural applications, forestry, etc.	WS LISS III, ATCOR	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/
Resurs DK 1 Resurs DK Environmental Satellite 1 ROSKOSMOS / ROSHYDROMET	Currently being flown	15 Jun 2006	Jun 2012	Land surface.	Geoton-L1, Pamela, Arina	Type: Inclined, non-sun-synchronous Altitude: 600 km Period: 92 mins Inclination: 70 deg Repeat cycle: 17 days LST: Longitude (if geo): Asc/desc: Ascending URL: planet.iitp.ru
Resurs P N1 Resurs P Environmental Satellite N1 ROSKOSMOS / ROSHYDROMET	Approved	Jul 2012	Jul 2017	Land surface.	Geoton-L1, Pamela, Arina	Type: Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
Resurs P N2 Resurs P Environmental Satellite N2 ROSKOSMOS / ROSHYDROMET	Planned	2013	2018	Land surface.	Geoton-L1, Pamela, Arina	Type: Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
RISAT-1 Radar Imaging Satellite ISRO	Currently being flown	26 Apr 2012	Apr 2016	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: 610 km Period: 96.5 mins Inclination: 97.844 deg Repeat cycle: 12 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
RISAT-1A Radar Imaging Satellite ISRO	Considered	2015	2019	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: 610 km Period: 96.5 mins Inclination: 97.844 deg Repeat cycle: 12 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
RISAT-2 Radar Imaging Satellite ISRO	Currently being flown	20 Apr 2009	Apr 2013	For research and disaster management applications purpose.	SAR-X	Type: Sun-synchronous Altitude: 550 km Period: 90 mins Inclination: Repeat cycle: LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
RISAT-3 Radar Imaging Satellite ISRO	Considered	2016	2021	Land surface, agriculture and forestry, regional geology, land use studies, water resources, vegetation studies, coastal studies and soils - especially during cloud season.	SAR-L	Type: Sun-synchronous Altitude: Period: 96.5 mins Inclination: 97.844 deg Repeat cycle: 12 days LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/
SAC-C CONAE	Currently being flown	21 Nov 2000	Jan 2013	Earth observation, studies the structure and dynamics of the Earth's surface, atmosphere, ionosphere and geomagnetic field.	MMRS, HRTC, HSTC, MMP, GOLPE, IST, INES, ICARE, WTE, DCS (SAC-C)	Type: Sun-synchronous Altitude: 705 km Period: 98 mins Inclination: 98.2 deg Repeat cycle: 9 days LST: 10:25 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAC-D/Aquarius CONAE / NASA	Currently being flown	10 Jun 2011	Jun 2017	Earth observation studies; measurement of ocean salinity; atmospheric and environmental parameters, emergency management.	Lagrange, MWR, HSC, SODAD/CARMEN-1, NIRST, CARMEN-1, DCS (SAC-D), ROSA, TDP, Aquarius L-Band radiometer, Aquarius L-Band Scatterometer	Type: Sun-synchronous Altitude: 657 km Period: 98 mins Inclination: 98 deg Repeat cycle: 7 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.conae.gov.ar/
SAC-E/SABIA_MAR-A CONAE	Approved	Sep 2016	Sep 2021	Global ocean colour medium resolution, urban lights, polar auroras, centralised data collection.	DCS (SABIA_MAR), HSC, MUS-M	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: 1 days LST: Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAC-E/SABIA_MAR-B CONAE	Approved	Nov 2017	Nov 2022	Coastal zones ocean colour low resolution.	DCS (SABIA_MAR), HSC, MUS-L	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: 4 days LST: Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAGE-III Stratospheric Aerosol and Gas Experiment NASA	Planned	2014	2017	Refurbishment of the SAGE-III instrument and of a hexapod pointing platform, and accommodation studies. This mission flies on the ISS.	SAGE-III	Type: Inclined, non-sun-synchronous Altitude: 425 km Period: Inclination: 51 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: www-sage3.larc.nasa.gov/missions/
SAOCOM 1A CONAE / ASI	Approved	Dec 2014	Dec 2019	Earth observation and emergency management with an L-band SAR.	SAR-L	Type: Sun-synchronous Altitude: 620 km Period: 97.2 mins Inclination: 97.89 deg Repeat cycle: 16 days LST: 6:12 Longitude (if geo): Asc/desc: Ascending URL: www.conae.gov.ar/
SAOCOM 1B CONAE / ASI	Approved	Dec 2015	Dec 2020	Earth observation and emergency management with an L-band SAR.	SAR-L	Type: Sun-synchronous Altitude: 620 km Period: 97.2 mins Inclination: 97.89 deg Repeat cycle: 16 days LST: 6:12 Longitude (if geo): Asc/desc: Ascending URL: www.conae.gov.ar/
SAOCOM-2A CONAE	Planned	2019	2024	Earth observation and emergency management with an L-band SAR.	SAR-L	Type: Sun-synchronous Altitude: 620 km Period: Inclination: 98 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SAOCOM-2B CONAE	Planned	2020	2025	Earth observation and emergency management with an L-band SAR.	SAR-L	Type: Sun-synchronous Altitude: 620 km Period: Inclination: 98 deg Repeat cycle: 16 days LST: 6:00 Longitude (if geo): Asc/desc: Descending URL: www.conae.gov.ar/
SARAL Satellite with ARgos and ALtiKa CNES / ISRO	Approved	Jun 2012	May 2014	This will provide precise, repetitive global measurements of sea surface height, significant wave heights and wind speed.	ARGOS, AltiKa	Type: Sun-synchronous Altitude: 799 km Period: 100.59 mins Inclination: 98.55 deg Repeat cycle: 35 days LST: Longitude (if geo): Asc/desc: Descending URL:
SARE-1B SARE-1 CONAE	Planned	2014	2017	Segmented architecture development.	SAR components testing	Type: Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
Scatterometer Satellite-1 Scatsat-1 ISRO	Considered	2013	2017	Ocean and atmosphere applications, wind speed over oceans, temperature.	Scatterometer (OCEANSAT), TSU	Type: TBD Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: URL:
SCD-1 Data Collecting Satellite 1 INPE	Currently being flown	09 Feb 1993	Dec 2012	Data collection and communication.	DCS	Type: Inclined, non-sun-synchronous Altitude: 750 km Period: 100 mins Inclination: 25 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.inpe.br

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
SCD-2 Data Collecting Satellite 2 INPE	Currently being flown	22 Oct 1998	Dec 2012	Data collection and communication.	DCS	Type: Inclined, non-sun-synchronous Altitude: 750 km Period: 100 mins Inclination: 25 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: TBD URL: www.inpe.br
SCISAT-1 SCISAT-I/ACE CSA	Currently being flown	12 Aug 2003	Mar 2015	To improve our understanding of the depletion of the ozone layer, particularly over Canada and the Arctic.	ACE-FTS, MAESTRO	Type: Inclined, non-sun-synchronous Altitude: 650 km Period: 97.7 mins Inclination: 74 deg Repeat cycle: 365 days LST: Longitude (if geo): Asc/desc: N/A URL: www.asc-csa.gc.ca/eng/satellites/scisat/default.asp
SCLP Snow and Cold Land Processes NASA	Considered	2030	2033	Phase-3 DS Mission, launch order unknown, 3-year nominal mission. Snow accumulation for fresh water availability.	Ku and X-band radars (SCLP), K band radiometers (SCLP)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: 15 days LST: Longitude (if geo): Asc/desc: URL: decadal.gsfc.nasa.gov/sclp.html
Sentinel-1 A ESA / EC	Approved	May 2013	Aug 2020	Providing continuity of C-band SAR data for operational applications notably in the following areas: monitoring of sea ice zones and the arctic environment, surveillance of marine environment, monitoring of land surface motion risks and mapping in support of humanitarian aid in crisis situations.	C-Band SAR	Type: Sun-synchronous Altitude: 693 km Period: 98.74 mins Inclination: 98.19 deg Repeat cycle: 12 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-1 B ESA / EC	Approved	Jan 2015	May 2022	Providing continuity of C-band SAR data for operational applications notably in the following areas: monitoring of sea ice zones and the arctic environment, surveillance of marine environment, monitoring of land surface motion risks and mapping in support of humanitarian aid in crisis situations.	C-Band SAR	Type: Sun-synchronous Altitude: 693 km Period: 98.74 mins Inclination: 98.19 deg Repeat cycle: 12 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-1 C ESA / EC	Considered	2019	2026	Providing continuity of C-band SAR data for operational applications notably in the following areas: monitoring of sea ice zones and the arctic environment, surveillance of marine environment, monitoring of land surface motion risks and mapping in support of humanitarian aid in crisis situations.	C-Band SAR	Type: Sun-synchronous Altitude: 693 km Period: 98.74 mins Inclination: 98.19 deg Repeat cycle: 12 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-2 A ESA / EC	Approved	Nov 2013	Feb 2021	Supporting land monitoring related services, including: generation of generic land cover maps, risk mapping and fast images for disaster relief, generation of leaf coverage leaf chlorophyll content and leaf water content.	MSI (Sentinel-2)	Type: Sun-synchronous Altitude: 786 km Period: 100.7 mins Inclination: 98.62 deg Repeat cycle: 10 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-2 B ESA / EC	Approved	May 2015	Aug 2022	Supporting land monitoring related services, including: generation of generic land cover maps, risk mapping and fast images for disaster relief, generation of leaf coverage leaf chlorophyll content and leaf water content.	MSI (Sentinel-2)	Type: Sun-synchronous Altitude: 786 km Period: 100.7 mins Inclination: 98.62 deg Repeat cycle: 10 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-2 C ESA / EC	Considered	2020	2027	Supporting land monitoring related services, including: generation of generic land cover maps, risk mapping and fast images for disaster relief, generation of leaf coverage, leaf chlorophyll content and leaf water content.	MSI (Sentinel-2)	Type: Sun-synchronous Altitude: 786 km Period: 100.7 mins Inclination: 98.62 deg Repeat cycle: 10 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-3 A ESA / EUMETSAT / EC	Approved	Oct 2013	Mar 2021	Supporting global land and ocean monitoring services, in particular: sea/land colour data and surface temperature; sea surface and land ice topography; coastal zones, inland water and sea ice topography; vegetation products.	OLCI, SLSTR, SRAL	Type: Sun-synchronous Altitude: 814 km Period: 100 mins Inclination: 98.65 deg Repeat cycle: 27 days LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-3 B ESA / EUMETSAT / EC	Approved	Oct 2014	Feb 2022	Supporting global land and ocean monitoring services, in particular: sea/land colour data and surface temperature; sea surface and land ice topography; coastal zones, inland water and sea ice topography; vegetation products.	OLCI, SLSTR, SRAL	Type: Sun-synchronous Altitude: 814 km Period: 100 mins Inclination: 98.65 deg Repeat cycle: 27 days LST: 10:00 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-3 C ESA / EUMETSAT / EC	Considered	2020	2027	Supporting global land and ocean monitoring services, in particular: sea/land colour data and surface temperature; sea surface and land ice topography; coastal zones, inland water and sea ice topography; vegetation products.	OLCI, SLSTR, SRAL	Type: Sun-synchronous Altitude: 814 km Period: 100 mins Inclination: 98.65 deg Repeat cycle: 27 days LST: 10:00 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/esaL P/LPgmes.html
Sentinel-4 A ESA / EC	Planned	2018	2027	Supporting European atmospheric composition and air quality monitoring services. The Sentinel-4 A mission is carried on MTG S1.	UVN (Sentinel-4), IRS	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.esa.int/esaL P/LPgmes.html
Sentinel-4 B ESA / EC	Planned	2024	2033	Supporting European atmospheric composition and air quality monitoring services. The Sentinel-4 B mission is carried on MTG S2.	UVN (Sentinel-4), IRS	Type: Geostationary Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): 0 Asc/desc: N/A URL: www.esa.int/esaL P/LPgmes.html
Sentinel-5 ESA	Planned	2019	2026	In early stages of mission definition. Other payloads will be added. The Sentinel-5 mission is carried on EPS-SG-a.	IRS, METimage, UVNS (Sentinel-5)	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.esa.int/esaL P/LPgmes.html
Sentinel-5 precursor ESA / NSO	Approved	Oct 2014	Jan 2020	Supporting global atmospheric composition and air quality monitoring services. It will bridge the gap between Envisat and Sentinel-5.	UVNS (Sentinel-5 precursor)	Type: Sun-synchronous Altitude: 824 km Period: 17 mins Inclination: 98.742 deg Repeat cycle: LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: www.esa.int/esaL P/LPgmes.html

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
Sich-2 NSAU	Currently being flown	17 Aug 2011	Aug 2015	Land observation.	MSS (Sich), MIRS	Type: Sun-synchronous Altitude: 668 km Period: 98 mins Inclination: 98 deg Repeat cycle: 5 days LST: 10:50 Longitude (if geo): Asc/desc: Descending URL:
SMAP Soil Moisture Active Passive NASA	Planned	2014	2017	Late 2014 launch expected, 3-year nominal mission life. Global soil moisture mapping.	L-band Radar (SMAP), L-band Radiometer (SMAP)	Type: Sun-synchronous Altitude: 685 km Period: Inclination: 98 deg Repeat cycle: LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: smap.jpl.nasa.gov/
SMOS Soil Moisture and Ocean Salinity (Earth Explorer Opportunity Mission) ESA / CDTI / CNES	Currently being flown	02 Nov 2009	Nov 2012	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: 758 km Period: 100.075 mins Inclination: 98.44 deg Repeat cycle: 23 days LST: 6:00 Longitude (if geo): Asc/desc: Ascending URL: earth.esa.int/SMOS/
SORCE Solar Radiation and Climate Experiment NASA	Currently being flown	25 Jan 2003	Sep 2013	5-year nominal mission life, currently in extended operations. 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.	SOLSTICE, SIM, TIM, XPS	Type: Inclined, non-sun-synchronous Altitude: 600 km Period: Inclination: 40 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: URL: lasp.colorado.edu/sorce/
SPOT-4 Satellite Pour l'Observation de la Terre - 4 CNES	Currently being flown	24 Mar 1998	Jun 2013	Cartography, land surface, agriculture and forestry, civil planning and mapping, digital terrain models, environmental monitoring.	HRVIR, VEGETATION, DORIS (SPOT)	Type: Sun-synchronous Altitude: 832 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 26 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.spot.com/home/system/introsat/welcome.htm
SPOT-5 Satellite Pour l'Observation de la Terre - 5 CNES	Currently being flown	04 May 2002	Jun 2014	Cartography, land surface, agriculture and forestry, civil planning and mapping, digital terrain models, environmental monitoring.	HRG, VEGETATION, HRS, DORIS-NG (SPOT)	Type: Sun-synchronous Altitude: 832 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 26 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: www.spotimage.fr/home/system/future/spot5/welcome.htm
STARLETTE CNES	Currently being flown	06 Feb 1975	Dec 2050	Geodesy/gravity study of the Earth's gravitational field and its temporal variations.	Laser Reflectors	Type: Inclined, non-sun-synchronous 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 1993	Dec 2050	Geodesy/gravity study of the Earth's gravitational field and its temporal variations.	Laser Reflectors	Type: Inclined, non-sun-synchronous Altitude: 830 km Period: 101 mins Inclination: 98 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL:
Suomi NPP Suomi National Polar-orbiting Partnership NASA / NOAA	Currently being flown	28 Oct 2011	Oct 2016	5-year nominal mission life. Operational polar weather and climate measurements.	CrIS, CERES, VIIRS, ATMS, OMPS	Type: Sun-synchronous Altitude: 824 km Period: 101 mins Inclination: Repeat cycle: 16 days LST: 13:30 Longitude (if geo): Asc/desc: Ascending URL: jointmission.gsfc.nasa.gov/
Swarm Earth's Magnetic Field and Environment Explorers ESA / CNES / CSA	Approved	Jul 2012	Oct 2016	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.	Laser Reflectors (ESA), ASM, VFM, STR, EFI, ACC, GPS Receiver (Swarm)	Type: Inclined, non-sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: www.esa.int/export/esaLP/swarm.html
SWOT Surface Water Ocean Topography NASA / CNES	Considered	2019	2022	Phase-2 DS Mission, launch order unknown, 3-year nominal mission. Ocean, lake, and river water levels for ocean and inland water dynamics.	CO Sensor (ASCENDS), Ka-band Radar INterferometer (KaRIN)	Type: Inclined, non-sun-synchronous Altitude: 970 km Period: Inclination: 78 deg Repeat cycle: 22 days LST: Longitude (if geo): Asc/desc: URL: bprc.osu.edu/water/index.php
TanDEM-X TerraSAR-X Add-on for Digital Elevation Measurements DLR	Currently being flown	21 Jun 2010	Dec 2015	Cartography, land surface, civil planning and mapping, digital terrain models, environmental monitoring.	X-Band SAR	Type: Sun-synchronous Altitude: 514 km Period: 94.85 mins Inclination: 97.4 deg Repeat cycle: 11 days LST: Longitude (if geo): Asc/desc: Ascending URL: www.dlr.de/hr/desktopdefault.aspx/tabid-2317/3669_read-5488/
Terra Terra (formerly EOS AM-1) NASA / METI / CSA	Currently being flown	18 Dec 1999	Sep 2013	6-year nominal mission life, currently in extended operations. Atmospheric dynamics/water and energy cycles, atmospheric chemistry, physical and radiative properties of clouds, air-land exchanges of energy, carbon and water, vertical profiles of CO and methane vulcanology.	MOPITT, MODIS, MISR, CERES, ASTER	Type: Sun-synchronous Altitude: 705 km Period: 99 mins Inclination: 98.2 deg Repeat cycle: 16 days LST: 10:30 Longitude (if geo): Asc/desc: Descending URL: terra.nasa.gov/
TerraSAR-X DLR	Currently being flown	15 Jun 2007	Dec 2013	Cartography, land surface, civil planning and mapping, digital terrain models, environmental monitoring.	X-Band SAR, GPSRO (Terra-SAR)	Type: Sun-synchronous Altitude: 514 km Period: 94.85 mins Inclination: 97.4 deg Repeat cycle: 11 days LST: 18:00 Longitude (if geo): Asc/desc: Ascending URL: www.terrasar.de/
TES Technology Experimental Satellite on Cartography ISRO	Currently being flown	22 Oct 2001	Dec 2012	For demonstrating many satellite technologies for future Cartosat satellites.	TES PAN	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	Currently being flown	01 Oct 2008	Oct 2013	Earth resources, land surface and disaster monitoring, civil planning.	PAN (GISTDA), MS (GISTDA)	Type: Sun-synchronous Altitude: 822 km Period: 101 mins Inclination: 98.7 deg Repeat cycle: 26 days LST: 10:00 Longitude (if geo): Asc/desc: Descending URL: www.gistda.or.th

Mission	Status	Launch Date	EOL Date	Applications	Instruments	Orbit Details & URL
TRMM Tropical Rainfall Measuring Mission NASA / JAXA	Currently being flown	27 Nov 1997	Sep 2013	3-year nominal mission life, currently in extended operations. Atmospheric dynamics/water and energy cycles.	LIS, PR, CERES, VIRS, TMI	Type: Inclined, non-sun-synchronous Altitude: 405 km Period: 93.5 mins Inclination: 35 deg Repeat cycle: LST: Longitude (if geo): Asc/desc: N/A URL: trmm.gsfc.nasa.gov/
TSX-NG TerraSAR Next Generation DLR	Planned	2016	2023	Commercial follow-on mission to TerraSAR-X operated by Infoterra. Cartography, land surface, civil planning and mapping, digital terrain models, environmental monitoring.	X-Band SAR	Type: Sun-synchronous Altitude: Period: Inclination: Repeat cycle: LST: Longitude (if geo): Asc/desc: Ascending URL:
UK-DMC2 UK Disaster Monitoring Constellation 2 UKSA	Currently being flown	29 Jul 2009	Jul 2014	Wide area, medium resolution optical imaging for mapping, crop monitoring, environmental resource and disaster management.	SLIM-6-22	Type: Sun-synchronous Altitude: 670 km Period: 98.5 mins Inclination: 98.14 deg Repeat cycle: 5 days LST: 10:45 Longitude (if geo): Asc/desc: Ascending URL: www.dmcii.com
VENUS Vegetation and Environment monitoring on a New Micro-Satellite CNES / ISA	Approved	Jan 2013	Jan 2016	Vegetation, agriculture monitoring, water management.	VSC	Type: Sun-synchronous Altitude: 720 km Period: Inclination: 98.27 deg Repeat cycle: 2 days LST: Longitude (if geo): Asc/desc: Descending URL: smsc.cnes.fr/VENUS/index.htm
YOUTHSAT ISRO	Currently being flown	20 Apr 2011	Apr 2013	Airglow of Earth's atmosphere (ionosphere), mapping total electron content in ionosphere.	LIV HYSI, RaBIT	Type: Sun-synchronous Altitude: 817 km Period: 101.35 mins Inclination: 98.731 deg Repeat cycle: 24 days LST: Longitude (if geo): Asc/desc: Descending URL: www.isro.org/