



CGMS-34, NOAA-WP-41
Prepared by NOAA
Agenda Item: N/A
Discussed in N/A

NOAA TABLE OF SATELLITES

In response to CGMS Permanent Action 01

NOAA provided a status of its geostationary and polar-orbiting satellite constellations. The new configuration takes in to account the planned operation of GOES-10 to support Central And South America at 60°W and the post launch operation of GOES-13. The current polar-orbiting spacecrafts continue to function well with minor problems with HIRS on NOAA-18. The launch schedules for the future geostationary and polar-orbiting constellations have been revised to reflect a more robust development and implementation plan.

Current Geostationary Satellites Coordinated within CGMS

(as of 03 October 2006)

1	2	SECTOR	Satellites currently in orbit (+type) P: Pre-operational Op: Operational B: Back-up L: Limited availability	Operator	Location	Launch date	Status
	EAST - PACIFIC (180°W-108°W)		GOES-11(Op)	USA/NOA A	135°W	5/00	Operational spacecraft since 06/2006
	WEST-ATLANTIC (108°W-36°W)		GOES-12 (Op)	USA/NOA A	75°W	7/ 01	Solar X-Ray Imager anomaly 9/05 under investigation
			GOES-13 (P)	USA/NOA A	90°W	05/06	Early checkout, available operationally if needed
			GOES-10 (B)	USA/NOA A	Drift to 60° W	04/97	To support South America in December 2006
			GOES-9 (L)	USA/NOA A	200°W	05/95	Backup spacecraft
			GOES-8 (L)	USA/NOA A	n/a	4/94	De-orbited May 5, 2004
2.1	EAST ATLANTIC (36°W-36°E)		METEOSAT-6 (B)	EUMETSA T	9.5°	11/93	Rapid Scanning Service minor gain anomaly on IR imager
			METEOSAT-7 (Op)	EUMETSA T	0°	02/97	Functional
			MSG-1 (P) (METEOSAT-8 when Op)	EUMETSA T	0°	28/08/02	Commissioning phase. First test images expected on 23 October 2002.



Current Polar-Orbiting Satellites Coordinated within CGMS
(as of 01 October 2005)

Orbit type (equatorial crossing times)	Satellites in orbit (+operation mode) P=Pre-operational Op=operational B=back-up L=limited availability	Operator	Crossing Time A=North w D=South w +Altitude	Launch date	Status
Sun-synchr. "Morning" (6:00 – 12:00) (18:00 – 24:00)	NOAA-17 (Op)	USA/NOAA	22:19 (A) 810 km	6/02	Functional. AMSU-A1 Failed.
	NOAA-15 (B)	USA/NOAA	17:36 (A) 807 km	05/98	Functional (intermittent problems with AVHRR, AMSU-B & HIRS)
	NOAA-12 (L)	USA/NOAA	17:08 (A) 804 km	05/91	Functional (except sounding).
	DMSP-F16 (Op)	USA/NOAA	20:12 (A)	10/03	Defense satellite. SSMIS. Data available to civilian users through NOAA.
	DMSP-F15 (B)	USA/NOAA	20:10 (A) 850 km	12/99	Defense satellite. SSMT2 (microwave water vapor sounder) non-functional. Data available to civilian users through NOAA.
	DMSP-F14 (B)	USA/NOAA	17:58 (A) 852 km	04/97	Defense satellite. SSMT1 (microwave temperature sounder) non-functional. SSMT2 non-functional. Only 1 functional onboard recorder. Data available to civilian users through NOAA.
	DMSP-F12 (L)	USA/NOAA	16:01 (A) 850 km	8/94	Defense Satellite. SSMI (microwave imager) and SSMT1 non-functional. Non-operational (no onboard recorders).
	RESURS-01-N4 (P)	Russia	09:30 (A) 835 km	7/98	Temporarily out of operations
	METEOR-3M-N1 (P)	Russia	9:15	10Dec01	Functional. In commissioning phase till end of 2002.
Sun-synchr. "Afternoon" (12:00 – 16:00) (00:00 –	NOAA-18 (Op)	USA/NOAA	13:42 (A) 854 km ³	5/05	Functional. Noise on HIRS long wave channels
	NOAA-16 (B)	USA/NOAA	15:26 (A) 850 km	09/00	Functional, no APT. Intermittent problems with AVHRR.



04:00 CGMS	NOAA-14 (B)	2.2 USA/ NOAA	21:29 (A) 845 km	12/94	Functional. AVHRR and SBUV degraded.
Sun-synchr. “Early morning” (4:00 - 6:00) (16:00 – 18:00)	DMSP-F13 (Op)	USA/NOAA	18:33 (A) 850 km	03/95	Defense satellite. On orbit 136 months – estimate 7 months of mission life remaining. Data available to civilian users through NOAA.
Sun-synchr. “morning”	FY-1C (B)	China	7:50 (A) 862 km	5/99	Replaced by FY-1D
	FY-1D (Op)	China	08:40 CHRPT	15May02	Replaces FY-1C
Non sun-Synchronou s or unspecified orbits	METEOR 3-N5 (Op)	Russia	1200 km	08/91	Functional (APT transmissions of visible images)

**Future Geostationary Satellites Coordinated within CGMS***(as of 01 October 2006)*

Sector	Future additional satellites	Operator	Planned launch	(Planned location) Other remarks
EAST PACIFIC (180°W- 108°W) AND WEST- ATLANTIC (108°W- 36°W)	GOES-O	USA/NOAA	04/2008	135° W or 75° W
	GOES-P	USA/NOAA	10/2009	135° W or 75° W
	GOES-R	USA/NOAA	2014	135° W or 75° W

FUTURE POLAR-ORBITING SATELLITES COORDINATED WITHIN CGMS
(as of 01 October 2006)

Orbit type (equatorial crossing times)	Future Additional Satellites	Operator	Planned launch date	Other information
Sun-synchr. “Morning” (6:00 – 12:00) (18:00 – 24:00)	METOP-1	EUMETSAT	Oct 2006	(827 km) (9:30) AHRPT
	METOP-2	EUMETSAT	06/2010	(827 km) (9:30) AHRPT
	METOP-3	EUMETSAT	12/2014	(827 km) (9:30) AHRPT
	FY-3A	China	2004	(9:30) series of 7 satellites
	FY-3B	China	2006	(9:30)
	METEOR 3M- N2	Russia	2005	(9:15) (10:30) or (16:30) AHRPT
	DMSP F-18	USA/NOAA	2008	(SSMI/S)
	DMSP F-20	USA/NOAA	2012	(SSMI/S)
Sun-synchr. “Afternoon” (12:00 – 16:00) (00:00 – 04:00)	NOAA-N’	USA/NOAA	2009	(14:00)
	NPP – NPOESS Preparatory Project	USA NOAA/NASA	09/2009	(833 km) (13:30 A) (VIIRS, CrIS, ATMS, OMPS) HRD
	NPOESS-1	USA/NOAA	01/2013	(833 km) (13:30 A) LRD(AHRPT), HRD
	NPOESS-3	USA/NOAA	06/2019	(833 km) (13:30 A) LRD(AHRPT), HRD
Sun-synchr. “Early morning” (4:00 - 6:00) (16:00 – 18:00)	DMSP-F17	USA/NOAA	11/2006	(SSMI/S)
	DMSP-F19	USA/NOAA	2010	(SSMI/S)
	NPOESS-2	USA/NOAA	01/2013	(833 km) (5:30 D) LRD(AHRPT), HRD
	NPOESS-4	USA/NOAA	~2021	(833 km) (5:30 D) LRD(AHRPT), HRD