

Cassini T34: Titan Inbound Bistatic Scattering Observation July 18-19, 2007 (DOY 199-200)

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	ERT UTC	SCET UTC OWLT = 1:24:04	PDT ERT - 7 hrs 7:00:00	Comments
Start Precals DSS 14	20:45:00	19:20:56	13:45:00	
Start Precals DSS 25, 26, 43, 34	21:00:00	19:35:56	14:00:00	See separate detailed Precals worksheets
Load Free-Space Predicts				
Begin-of-Track DSS 14	23:45:00	22:20:56	16:45:00	
Begin-of-Track DSS 25, 26, 43	0:00:00	22:35:56	17:00:00	
Begin-of-Track DSS 34	0:10:00	22:45:56	17:10:00	No Cassini downlink signals till shortly before 01:04:12
Start Bistatic Minical 1				See separate Minical 1 worksheets for time sequence
End Bistatic Minical 1				Should end before the turn to Earth starts at 00:57:31
TLM OFF/TWNC ON/ RNG OFF	0:57:24	23:33:20	17:57:24	
Start turn to Earth point	0:57:31	23:33:27	17:57:31	
Start 6 minutes free-space baseline	1:04:16	23:40:12	18:04:16	PC/N0 ~ 54, 48, 48, & 41 dB-Hz for X70, K34, X34, S70
Enable Monopulse: DSS 25, 26, 34 ?				Start/End times are provided to the operators in real-time
Disable Monopulse: DSS 25, 26, 34 ?				Keep/Clear the offsets decision made in real-time
End free-space baseline	1:10:21	23:46:17	18:10:21	
Start turn to Titan surface	1:10:23	23:46:19	18:10:23	Quick loss of of all three carriers
Load Bistatic Inbound Predicts				
End Turn to Titan surface	1:17:57	23:53:53	18:17:57	HGA boresight is pointed to Titan's surface
Start Bistatic Observations	1:17:58	23:53:54	18:17:58	Potential weak RCP & LCP surface echo centered within the observations bandwidth
End Bistatic Observations	2:22:54	0:58:50	19:22:54	
Start turn to new waypoint	2:22:56	0:58:52	19:22:56	
End Turn to new wapoint	2:29:51	1:05:46	19:29:51	
TLM ON/TWNC OFF/RNG ON	2:30:18	1:06:14	19:30:18	
End of T34 RSS Observation	2:30:24	1:06:20	19:30:24	No detectable signals at the end of the observation
Start Bistatic Minical 2				See separate Minical 2 worksheets for time sequence
End Bistatic Minical 2				
End-of-Track DSS 14, 25, 26, 43, 34	3:30:00	3:05:56	20:30:00	
End of Postcals DSS 14, 25, 26, 43, 34	4:30:00	3:05:56	21:30:00	

DSN Activities
SWITCHING OF FREQUENCY PREDICTS

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