

EPHEMERIDES

5 13.9

5 14.0

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
494307	2016 SY ₁₁		5 13.9 224°51	0°8/13.4 18			318672	2005 PN		5 14.0 245°41	6°7/20.1 16		
4 11	15 45.52	-17 8.0	2.774	3.627	9.5	22.1	4 11	15 53.61	-46 48.5	3.422	4.130	10.8	22.7
4 21	15 40.34	-16 46.6	2.687	3.618	6.9	22.0	4 21	15 46.54	-47 16.5	3.309	4.107	9.5	22.6
5 1	15 33.75	-16 21.0	2.626	3.610	4.0	21.8	5 1	15 37.53	-47 28.7	3.218	4.084	8.1	22.5
5 11	15 26.31	-15 53.2	2.592	3.601	1.1	21.5	5 11	15 27.25	-47 22.6	3.151	4.060	7.1	22.4
5 21	15 18.63	-15 25.3	2.589	3.591	2.6	21.6	5 21	15 16.52	-46 57.2	3.111	4.035	6.7	22.3
5 31	15 11.40	-14 59.9	2.614	3.582	5.7	21.8	5 31	15 6.27	-46 13.7	3.098	4.009	7.3	22.3
6 10	15 5.21	-14 39.4	2.666	3.572	8.5	22.0	6 10	14 57.34	-45 15.8	3.112	3.982	8.5	22.4
6 20	15 0.49	-14 25.6	2.741	3.561	11.0	22.1	6 20	14 50.35	-44 8.6	3.149	3.955	10.1	22.4
416705	2005 AR ₆₄		5 14.0 95°59	2°9/10.4 18			460269	2014 QC ₃₁₇		5 14.0 145°76	4°5/11.6 16		
4 11	15 38.72	-4 13.4	4.431	5.283	6.2	21.1	4 11	15 51.41	-9 43.5	1.592	2.463	14.4	21.6
4 21	15 34.94	-3 47.6	4.365	5.288	4.7	21.0	4 21	15 45.25	-8 52.2	1.533	2.470	10.7	21.4
5 1	15 30.43	-3 24.4	4.326	5.292	3.4	20.9	5 1	15 36.82	-8 1.4	1.496	2.477	6.8	21.2
5 11	15 25.52	-3 5.6	4.316	5.297	2.9	20.9	5 11	15 27.06	-7 16.3	1.485	2.484	4.5	21.0
5 21	15 20.53	-2 52.5	4.335	5.302	3.5	20.9	5 21	15 17.09	-6 41.9	1.501	2.490	6.4	21.2
5 31	15 15.80	-2 46.3	4.382	5.307	4.9	21.0	5 31	15 8.07	-6 22.1	1.542	2.495	10.1	21.4
6 10	15 11.66	-2 47.4	4.455	5.312	6.4	21.2	6 10	15 0.95	-6 19.0	1.607	2.501	13.8	21.6
6 20	15 8.34	-2 55.9	4.551	5.317	7.8	21.3	6 20	14 56.28	-6 32.3	1.691	2.505	17.0	21.8
297442	2000 SF ₁₉₁		5 14.0 252°72	3°0/17.3 18			34102	Shawnzhang		5 14.0 230°35	1°3/13.1 18	R	
4 11	15 42.98	-34 15.7	4.577	5.363	7.2	20.4	4 11	15 46.21	-16 5.4	2.269	3.130	11.1	19.7
4 21	15 38.19	-34 37.2	4.483	5.357	5.8	20.3	4 21	15 41.08	-15 40.2	2.191	3.126	8.1	19.5
5 1	15 32.40	-34 51.2	4.414	5.351	4.4	20.2	5 1	15 34.28	-15 11.1	2.137	3.123	4.7	19.3
5 11	15 25.99	-34 57.0	4.373	5.345	3.2	20.1	5 11	15 26.46	-14 40.2	2.111	3.119	1.5	19.1
5 21	15 19.39	-34 55.0	4.361	5.339	3.1	20.0	5 21	15 18.41	-14 10.6	2.113	3.115	3.2	19.2
5 31	15 13.06	-34 46.0	4.377	5.333	4.0	20.1	5 31	15 10.92	-13 45.2	2.143	3.111	6.7	19.4
6 10	15 7.41	-34 31.9	4.422	5.327	5.4	20.2	6 10	15 4.71	-13 26.9	2.199	3.107	10.0	19.6
6 20	15 2.77	-34 14.7	4.492	5.321	6.9	20.3	6 20	15 0.27	-13 17.5	2.277	3.103	12.8	19.8
271097	2003 QA ₇₂		5 14.0 282°40	1°8/13.0 18			518911	2010 FW ₁₁₈		5 14.0 330°05	4°1/16.2 16		
4 11	15 48.18	-14 41.0	1.833	2.700	12.9	20.2	4 11	15 49.12	-29 39.9	1.999	2.831	13.5	20.7
4 21	15 42.92	-14 24.2	1.752	2.691	9.5	20.0	4 21	15 43.70	-30 9.4	1.917	2.827	10.5	20.5
5 1	15 35.52	-14 4.4	1.695	2.681	5.6	19.7	5 1	15 36.03	-30 26.2	1.858	2.822	7.4	20.3
5 11	15 26.77	-13 44.0	1.664	2.671	2.0	19.5	5 11	15 26.92	-30 29.0	1.825	2.818	4.6	20.2
5 21	15 17.61	-13 26.0	1.660	2.661	4.0	19.6	5 21	15 17.36	-30 18.0	1.818	2.814	4.6	20.1
5 31	15 9.10	-13 13.7	1.683	2.652	8.1	19.8	5 31	15 8.47	-29 55.8	1.838	2.811	7.2	20.3
6 10	15 2.17	-13 9.9	1.730	2.642	12.0	20.0	6 10	15 1.25	-29 27.2	1.883	2.807	10.5	20.5
6 20	14 57.44	-13 16.5	1.798	2.632	15.3	20.2	6 20	14 56.33	-28 57.3	1.950	2.804	13.5	20.7
49025	1998 QL ₉₆		5 14.0 268°61	4°1/16.3 18			158412	2002 AN ₅₁		5 14.0 98°61	0°7/14.4 17		
4 11	15 52.07	-30 29.6	1.854	2.683	14.5	20.6	4 11	15 48.72	-22 8.7	1.774	2.632	13.7	20.1
4 21	15 46.21	-30 32.8	1.750	2.658	11.4	20.3	4 21	15 43.32	-21 50.4	1.703	2.635	10.2	19.9
5 1	15 37.70	-30 19.6	1.667	2.632	8.0	20.1	5 1	15 35.73	-21 22.1	1.655	2.638	6.1	19.7
5 11	15 27.33	-29 48.4	1.610	2.606	4.8	19.8	5 11	15 26.82	-20 45.4	1.633	2.641	1.7	19.4
5 21	15 16.23	-28 59.8	1.580	2.578	4.7	19.8	5 21	15 17.64	-20 3.7	1.638	2.644	3.1	19.5
5 31	15 5.74	-27 58.2	1.576	2.551	8.0	19.9	5 31	15 9.29	-19 21.6	1.669	2.646	7.4	19.8
6 10	14 57.06	-26 50.5	1.598	2.522	12.0	20.1	6 10	15 2.69	-18 44.1	1.726	2.649	11.3	20.0
6 20	14 51.02	-25 44.2	1.641	2.493	15.7	20.2	6 20	14 58.40	-18 14.9	1.803	2.652	14.7	20.2
479149	2013 BG ₇₃		5 14.0 203°79	3°9/16.9 16			67470	2000 RQ ₃		5 14.0 186°78	1°5/12.9 18		
4 11	15 48.12	-32 27.0	2.632	3.441	11.3	21.6	4 11	15 48.55	-15 21.5	2.586	3.438	10.2	20.8
4 21	15 42.48	-32 37.6	2.546	3.439	8.9	21.4	4 21	15 42.55	-14 49.3	2.506	3.437	7.4	20.6
5 1	15 35.10	-32 35.8	2.483	3.436	6.4	21.2	5 1	15 35.05	-14 13.6	2.453	3.436	4.3	20.4
5 11	15 26.65	-32 20.7	2.447	3.433	4.3	21.1	5 11	15 26.65	-13 36.6	2.428	3.434	1.6	20.2
5 21	15 17.92	-31 53.3	2.439	3.430	4.1	21.1	5 21	15 18.05	-13 1.2	2.432	3.432	3.2	20.3
5 31	15 9.76	-31 16.1	2.459	3.426	6.0	21.2	5 31	15 9.99	-12 30.4	2.466	3.428	6.3	20.5
6 10	15 2.90	-30 33.2	2.506	3.423	8.5	21.4	6 10	15 3.11	-12 6.7	2.527	3.424	9.3	20.7
6 20	14 57.87	-29 49.2	2.576	3.419	11.0	21.5	6 20	14 57.86	-11 51.8	2.611	3.419	11.8	20.9
72071	Gábor		5 14.0 107°29	0°1/13.9 18			441075	2007 RQ ₁₀₇		5 14.0 158°89	2°6/16.8 18		
4 11	15 51.15	-21 2.9	1.599	2.461	14.8	19.7	4 11	15 44.30	-31 21.9	3.881	4.684	8.1	21.9
4 21	15 45.09	-20 26.0	1.540	2.475	10.8	19.5	4 21	15 39.19	-31 28.3	3.798	4.689	6.3	21.7
5 1	15 36.71	-19 38.5	1.504	2.488	6.3	19.3	5 1	15 33.00	-31 26.4	3.741	4.694	4.5	21.6
5 11	15 27.01	-18 43.7	1.493	2.502	1.5	19.0	5 11	15 26.16	-31 16.2	3.711	4.698	2.9	21.5
5 21	15 17.19	-17 46.3	1.509	2.515	3.4	19.1	5 21	15 19.17	-30 58.3	3.711	4.702	2.8	21.5
5 31	15 8.42	-16 52.1	1.552	2.527	8.0	19.4	5 31	15 12.56	-30 34.5	3.740	4.706	4.2	21.6
6 10	15 1.64	-16 6.7	1.619	2.540	12.1	19.7	6 10	15 6.79	-30 6.9	3.797	4.710	6.0	21.7
6 20	14 57.38	-15 33.4	1.708	2.551	15.6	19.9	6 20	15 2.21	-29 38.3	3.879	4.713	7.8	21.9
37377	2001 VP ₄₆		5 14.0 201°28	1°8/15.3 18			370474	2003 FE ₁₀₀		5 14.0 79°64	3°3/12.3 18		
4 11	15 49.70	-26 15.0	2.161	2.999	12.4	19.0	4 11	15 51.70	-11 15.8	1.697	2.563	13.9	20.5
4 21	15 43.78	-25 50.4	2.076	2.995	9.4	18.8	4 21	15 45.14	-10 44.5	1.655	2.591	10.1	20.3
5 1	15 35.91	-25 13.4	2.016	2.991	5.9	18.6	5 1	15 36.58	-10 13.5	1.636	2.619	6.1	20.1
5 11	15 26.85	-24 24.9	1.982	2.987	2.5	18.3	5 11	15 27.00	-9 46.7	1.644	2.647	3.4	20.0
5 21	15 17.51	-23 27.9	1.977	2.981	2.9	18.4	5 21	15 17.44	-9 27.5	1.679	2.674	5.1	20.2
5 31	15 8.87	-22 26.9	2.000	2.976	6.5	18.6	5 31	15 8.93	-9 18.5	1.741	2.701	8.7	20.5
6 10	15 1.76	-21 27.4	2.050	2.970	10.0	18.8	6 10	15 2.26	-9 21.4	1.827	2.727	12.1	20.7
6 20	14 56.73	-20 34.0	2.122	2.963	13.1	19.0	6 20	14 57.87	-9 36.2	1.934	2.753	15.0	21.0
67649	2000 SS ₂₂₇		5 14.0 295°57	6°8/ 8.9 18			371527	2006 UB ₂₁₆		5 14.0 328°78	4°3/14.9 17		</

EPHEMERIDES

5 14.0

5 14.0

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
380557	2004 <i>PT</i> ₅₁		5 14.0 329°64	6°5/11.1	17		58632	1997 <i>WM</i> ₂		5 14.0 140°79	0°2/14.1	18	
4 11	15 44.62	- 7 1.0	1.234	2.127	16.1	20.2	4 11	15 47.65	-20 4.6	2.198	3.052	11.6	19.7
4 21	15 41.18	- 6 17.2	1.156	2.103	12.4	19.9	4 21	15 42.19	-19 54.5	2.124	3.055	8.5	19.5
5 1	15 34.94	- 5 36.6	1.098	2.080	8.5	19.6	5 1	15 34.97	-19 38.1	2.075	3.058	5.0	19.3
5 11	15 26.74	- 5 6.2	1.061	2.058	6.5	19.4	5 11	15 26.68	-19 16.6	2.052	3.061	1.2	19.1
5 21	15 17.81	- 4 52.2	1.048	2.037	8.5	19.4	5 21	15 18.16	-18 52.4	2.058	3.063	2.6	19.2
5 31	15 9.60	- 4 59.6	1.057	2.017	12.8	19.6	5 31	15 10.29	-18 28.4	2.092	3.066	6.3	19.4
6 10	15 3.43	- 5 30.0	1.085	1.998	17.3	19.8	6 10	15 3.80	-18 8.1	2.151	3.068	9.7	19.6
6 20	15 0.13	- 6 22.0	1.130	1.981	21.4	20.0	6 20	14 59.20	-17 53.8	2.233	3.071	12.6	19.8
474846	2005 <i>SR</i> ₇₆		5 14.0 264°29	0°6/13.6	18		174498	2003 <i>BK</i> ₃₈		5 14.0 141°76	3°9/17.2	18	
4 11	15 46.17	-17 58.2	2.445	3.300	10.6	21.4	4 11	15 49.59	-33 24.2	2.725	3.526	11.1	21.4
4 21	15 41.07	-17 36.9	2.351	3.283	7.7	21.2	4 21	15 43.42	-33 30.2	2.650	3.537	8.8	21.3
5 1	15 34.32	-17 10.4	2.282	3.266	4.5	21.0	5 1	15 35.60	-33 23.2	2.598	3.547	6.4	21.1
5 11	15 26.52	-16 40.5	2.241	3.249	1.1	20.7	5 11	15 26.83	-33 2.7	2.573	3.557	4.4	21.0
5 21	15 18.39	-16 9.7	2.228	3.232	2.8	20.8	5 21	15 17.88	-32 29.8	2.577	3.566	4.1	21.0
5 31	15 10.72	-15 40.8	2.244	3.215	6.3	21.0	5 31	15 9.58	-31 47.5	2.609	3.574	5.8	21.1
6 10	15 4.22	-15 17.1	2.286	3.197	9.5	21.1	6 10	15 2.62	-30 59.8	2.668	3.583	8.2	21.3
6 20	14 59.40	-15 0.9	2.352	3.179	12.4	21.3	6 20	14 57.47	-30 11.4	2.752	3.591	10.5	21.4
500541	2012 <i>UE</i> ₂₅		5 14.0 23°74	5°8/17.6	18		103326	2000 <i>AD</i> ₆₇		5 14.0 17°91	4°1/12.1	18	
4 11	15 49.57	-34 32.5	1.850	2.669	14.9	20.3	4 11	15 46.35	- 9 49.0	1.514	2.395	14.4	18.6
4 21	15 44.19	-34 55.9	1.777	2.672	12.1	20.1	4 21	15 41.72	- 9 20.7	1.457	2.400	10.6	18.4
5 1	15 36.36	-35 1.2	1.724	2.675	9.0	19.9	5 1	15 34.85	- 8 54.0	1.422	2.406	6.7	18.2
5 11	15 27.01	-34 46.6	1.696	2.678	6.4	19.8	5 11	15 26.67	- 8 33.4	1.412	2.413	4.1	18.0
5 21	15 17.30	-34 12.9	1.694	2.681	6.0	19.8	5 21	15 18.26	- 8 22.6	1.427	2.421	5.9	18.2
5 31	15 8.47	-33 23.9	1.717	2.685	8.0	19.9	5 31	15 10.73	- 8 24.5	1.467	2.429	9.7	18.4
6 10	15 1.57	-32 26.4	1.765	2.689	11.1	20.1	6 10	15 5.02	- 8 40.5	1.529	2.438	13.4	18.6
6 20	14 57.22	-31 27.3	1.834	2.693	14.0	20.3	6 20	15 1.68	- 9 9.9	1.611	2.448	16.7	18.9
271658	2004 <i>RP</i> ₁₈		5 14.0 235°45	2°4/15.4	17		173072	2006 <i>SG</i> ₃₈₇		5 14.0 105°39	1°3/13.2	18	
4 11	15 50.20	-26 9.5	2.030	2.870	13.0	21.3	4 11	15 46.95	-15 40.9	2.301	3.160	11.0	21.0
4 21	15 44.40	-26 11.0	1.942	2.861	9.9	21.1	4 21	15 41.52	-15 20.3	2.236	3.170	8.0	20.8
5 1	15 36.42	-26 1.0	1.877	2.852	6.4	20.8	5 1	15 34.50	-14 56.6	2.195	3.180	4.6	20.6
5 11	15 27.03	-25 39.4	1.839	2.842	3.0	20.6	5 11	15 26.57	-14 31.9	2.183	3.190	1.5	20.4
5 21	15 17.22	-25 7.9	1.828	2.832	3.3	20.6	5 21	15 18.50	-14 8.7	2.199	3.200	3.1	20.6
5 31	15 8.06	-24 30.0	1.845	2.821	6.9	20.8	5 31	15 11.06	-13 49.8	2.243	3.210	6.5	20.8
6 10	15 0.51	-23 50.6	1.887	2.810	10.5	21.0	6 10	15 4.93	-13 37.6	2.312	3.220	9.6	21.0
6 20	14 55.18	-23 14.6	1.952	2.799	13.8	21.2	6 20	15 0.54	-13 33.5	2.405	3.229	12.2	21.2
249286	2008 <i>TB</i> ₅		5 14.0 276°39	2°2/15.1	17		172442	2003 <i>QC</i> ₄₈		5 14.0 295°32	0°6/14.4	17	
4 11	15 49.83	-24 28.8	1.841	2.691	13.7	20.7	4 11	15 48.27	-22 51.9	1.387	2.258	16.1	20.5
4 21	15 44.29	-24 41.1	1.758	2.683	10.4	20.4	4 21	15 43.74	-22 16.4	1.304	2.242	12.1	20.2
5 1	15 36.43	-24 43.2	1.697	2.675	6.6	20.2	5 1	15 36.37	-21 25.3	1.241	2.227	7.3	19.8
5 11	15 27.05	-24 34.9	1.663	2.667	2.9	19.9	5 11	15 27.10	-20 21.0	1.202	2.211	2.0	19.5
5 21	15 17.19	-24 17.5	1.655	2.660	3.4	20.0	5 21	15 17.21	-19 8.6	1.189	2.195	3.8	19.5
5 31	15 8.03	-23 54.1	1.674	2.652	7.3	20.2	5 31	15 8.19	-17 55.8	1.200	2.180	9.2	19.8
6 10	15 0.59	-23 29.5	1.718	2.644	11.2	20.4	6 10	15 1.29	-16 50.9	1.234	2.165	14.2	20.0
6 20	14 55.53	-23 8.1	1.784	2.636	14.7	20.6	6 20	14 57.29	-16 0.1	1.287	2.150	18.6	20.3
484722	2008 <i>WX</i> ₁₃₄		5 14.0 144°54	12°3/21.5	18		308479	2005 <i>TN</i> ₆₁		5 14.0 260°05	3°8/16.3	16	
4 11	16 1.78	-46 12.6	1.251	2.033	22.7	20.9	4 11	15 49.36	-30 15.9	2.390	3.210	11.9	21.1
4 21	15 54.67	-46 49.9	1.187	2.040	19.6	20.7	4 21	15 43.61	-30 44.0	2.301	3.203	9.4	21.0
5 1	15 43.07	-46 50.3	1.138	2.047	16.4	20.5	5 1	15 35.92	-31 1.0	2.236	3.196	6.6	20.8
5 11	15 28.63	-46 5.8	1.108	2.054	13.5	20.4	5 11	15 26.95	-31 5.4	2.198	3.188	4.3	20.6
5 21	15 13.76	-44 35.0	1.100	2.060	12.3	20.3	5 21	15 17.56	-30 57.5	2.187	3.181	4.2	20.6
5 31	15 0.95	-42 26.6	1.114	2.065	13.3	20.4	5 31	15 8.72	-30 39.2	2.204	3.173	6.5	20.7
6 10	14 51.96	-39 57.2	1.150	2.069	16.0	20.6	6 10	15 1.27	-30 14.5	2.247	3.166	9.3	20.9
6 20	14 47.44	-37 24.4	1.206	2.073	19.3	20.8	6 20	14 55.82	-29 47.6	2.314	3.158	12.0	21.0
227473	2005 <i>WO</i> ₁₆₆		5 14.0 140°86	0°3/14.2	17		316193	2010 <i>LJ</i> ₇₁		5 14.0 261°68	1°7/13.1	18	
4 11	15 50.04	-21 8.6	2.296	3.142	11.5	22.1	4 11	15 49.84	-16 35.6	1.596	2.466	14.4	21.1
4 21	15 43.77	-20 47.1	2.228	3.154	8.4	21.9	4 21	15 44.49	-16 1.1	1.512	2.452	10.6	20.8
5 1	15 35.79	-20 18.1	2.185	3.167	4.9	21.7	5 1	15 36.64	-15 19.4	1.451	2.438	6.2	20.5
5 11	15 26.85	-19 43.3	2.170	3.178	1.2	21.5	5 11	15 27.14	-14 34.0	1.416	2.423	2.0	20.2
5 21	15 17.78	-19 5.4	2.184	3.189	2.6	21.6	5 21	15 17.12	-13 49.4	1.406	2.409	4.4	20.3
5 31	15 9.42	-18 27.8	2.227	3.199	6.1	21.8	5 31	15 7.82	-13 10.9	1.423	2.394	9.1	20.6
6 10	15 2.50	-17 54.4	2.296	3.209	9.4	22.1	6 10	15 0.37	-12 43.2	1.463	2.378	13.5	20.8
6 20	14 57.46	-17 27.8	2.389	3.218	12.2	22.3	6 20	14 55.46	-12 29.4	1.523	2.363	17.3	21.0
470539	2008 <i>DP</i> ₅₄		5 14.0 12°44	12°8/20.8	16		337092	1998 <i>UV</i> ₉		5 14.0 236°08	1°5/13.0	17	
4 11	16 0.14	-51 57.7	2.052	2.756	17.3	20.1	4 11	15 47.10	-16 26.2	2.089	2.951	11.8	21.2
4 21	15 53.16	-53 52.7	1.983	2.758	15.7	19.9	4 21	15 41.89	-15 51.2	2.008	2.945	8.6	20.9
5 1	15 42.31	-55 24.1	1.932	2.761	14.3	19.8	5 1	15 34.85	-15 11.0	1.953	2.938	5.0	20.7
5 11	15 28.56	-56 24.1	1.902	2.764	13.2	19.8	5 11	15 26.68	-14 28.5	1.924	2.931	1.7	20.5
5 21	15 13.58	-56 47.9	1.893	2.767	12.8	19.8	5 21	15 18.23	-13 47.2	1.923	2.925	3.5	20.6
5 31	14 59.48	-56 36.3	1.906	2.771	13.2	19.8	5 31	15 10.39	-13 10.9	1.950	2.918	7.3	20.8
6 10	14 48.15	-55 55.6	1.939	2.775	14.3	19.9	6 10	15 3.95	-12 43.2	2.002	2.910	10.8	21.0
6 20	14 40.73	-54 55.4	1.992	2.780	15.7	20.0	6 20	14 59.44	-12 26.2	2.076	2.903	13.8	21.2
522913	2016 <i>PL</i> ₁₀₈		5 14.0 201°57	3°0/12.2	17		26030	6004 <i>P-L</i>					

EPHEMERIDES

5 14.0

5 14.0

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
349023	2006 <i>VD</i> ₁₁		5 14.0 84°52	0°2/13.8	18		286587	2002 <i>CF</i> ₂₆₀		5 14.0 35°71	0°1/14.1	17	
4 11	15 45.88	-20 47.8	2.272	3.126	11.3	20.9	4 11	15 45.97	-19 59.5	2.159	3.017	11.7	21.0
4 21	15 40.75	-20 2.1	2.207	3.138	8.2	20.7	4 21	15 41.01	-19 42.7	2.087	3.020	8.5	20.8
5 1	15 34.04	-19 8.6	2.167	3.151	4.8	20.5	5 1	15 34.31	-19 19.2	2.039	3.023	5.0	20.6
5 11	15 26.47	-18 10.1	2.155	3.164	1.1	20.2	5 11	15 26.58	-18 50.9	2.018	3.027	1.2	20.3
5 21	15 18.81	-17 10.3	2.171	3.176	2.7	20.4	5 21	15 18.63	-18 20.4	2.025	3.031	2.7	20.4
5 31	15 11.84	-16 13.7	2.216	3.189	6.2	20.6	5 31	15 11.33	-17 50.9	2.060	3.035	6.4	20.7
6 10	15 6.22	-15 24.0	2.287	3.201	9.4	20.8	6 10	15 5.41	-17 26.0	2.120	3.039	9.8	20.9
6 20	15 2.35	-14 44.1	2.381	3.213	12.1	21.0	6 20	15 1.34	-17 8.2	2.202	3.043	12.7	21.1
59281	1999 <i>CX</i> ₄₈		5 14.0 198°84	3°9/12.1	18		52768	1998 <i>OR</i> ₂		5 14.0 6°75	17°9/18.5	18	
4 11	15 51.76	-10 33.7	1.663	2.531	14.0	18.8	4 11	8 15.34	+31 55.7	0.099	1.020	77.0	13.5
4 21	15 45.63	-9 56.3	1.592	2.528	10.4	18.6	4 21	9 5.03	+15 12.2	0.059	1.020	73.6	12.3
5 1	15 37.17	-9 18.5	1.543	2.526	6.5	18.4	5 1	11 13.45	-31 3.8	0.043	1.037	46.5	10.8
5 11	15 27.27	-8 44.8	1.521	2.522	3.9	18.2	5 11	14 41.38	-55 34.2	0.073	1.068	35.7	11.7
5 21	15 17.01	-8 19.2	1.526	2.518	5.8	18.3	5 21	16 22.20	-54 37.7	0.120	1.112	31.4	12.8
5 31	15 7.56	-8 5.6	1.556	2.514	9.7	18.5	5 31	16 57.68	-51 29.8	0.173	1.167	25.7	13.5
6 10	14 59.93	-8 6.4	1.611	2.509	13.5	18.7	6 10	17 12.28	-48 29.7	0.233	1.230	20.8	14.1
6 20	14 54.72	-8 21.8	1.685	2.503	16.9	18.9	6 20	17 19.80	-45 42.5	0.302	1.299	18.1	14.7
505077	2011 <i>TJ</i> ₁₅		5 14.0 116°01	2°6/15.8	17		87444	2000 <i>QZ</i> ₁₁₁		5 14.0 216°73	6°6/8.7	18	
4 11	15 48.75	-27 17.9	2.426	3.256	11.5	21.6	4 11	15 47.26	-1 28.9	2.184	3.040	11.6	20.3
4 21	15 42.95	-27 30.5	2.352	3.264	8.7	21.4	4 21	15 41.87	-0 10.5	2.113	3.032	9.2	20.1
5 1	15 35.41	-27 33.1	2.303	3.272	5.8	21.2	5 1	15 34.79	+1 2.8	2.067	3.024	7.2	20.0
5 11	15 26.83	-27 25.5	2.281	3.280	3.1	21.1	5 11	15 26.70	+2 5.2	2.048	3.016	6.7	20.0
5 21	15 18.02	-27 8.9	2.287	3.288	3.2	21.1	5 21	15 18.36	+2 52.1	2.056	3.007	8.0	20.0
5 31	15 9.84	-26 45.8	2.322	3.295	5.9	21.3	5 31	15 10.59	+3 19.9	2.090	2.997	10.4	20.1
6 10	15 3.03	-26 19.9	2.383	3.303	8.8	21.5	6 10	15 4.12	+3 27.6	2.147	2.987	12.9	20.3
6 20	14 58.09	-25 54.8	2.467	3.310	11.4	21.7	6 20	14 59.42	+3 16.2	2.224	2.976	15.3	20.4
416513	2003 <i>YU</i> ₉₃		5 14.0 107°53	2°5/17.4	18		107860	2001 <i>FH</i> ₈₀		5 14.0 56°98	0°1/14.1	18	
4 11	15 40.79	-33 14.9	4.531	5.326	7.1	20.9	4 11	15 49.71	-22 29.3	1.310	2.182	16.8	18.9
4 21	15 36.57	-33 8.5	4.448	5.331	5.6	20.8	4 21	15 44.37	-21 37.9	1.262	2.202	12.3	18.7
5 1	15 31.47	-32 54.0	4.390	5.337	4.1	20.7	5 1	15 36.42	-20 32.8	1.236	2.222	7.1	18.4
5 11	15 25.88	-32 31.8	4.360	5.342	2.8	20.6	5 11	15 27.06	-19 18.5	1.233	2.242	1.7	18.1
5 21	15 20.19	-32 2.8	4.358	5.347	2.6	20.6	5 21	15 17.68	-18 1.8	1.256	2.263	3.7	18.3
5 31	15 14.83	-31 28.6	4.386	5.352	3.7	20.7	5 31	15 9.60	-16 50.7	1.304	2.283	8.8	18.7
6 10	15 10.17	-30 51.2	4.442	5.357	5.2	20.8	6 10	15 3.81	-15 51.8	1.375	2.304	13.2	19.0
6 20	15 6.49	-30 13.0	4.524	5.362	6.7	20.9	6 20	15 0.77	-15 9.1	1.466	2.325	16.9	19.3
215360	2001 <i>XJ</i> ₁₇₁		5 14.0 80°89	3°7/11.7	17		154585	2003 <i>KW</i> ₁₄		5 14.0 33°14	5°4/10.4	17	
4 11	15 46.71	-8 8.3	2.220	3.083	11.2	20.6	4 11	15 45.53	-10 5.4	1.498	2.381	14.4	19.4
4 21	15 41.32	-7 39.5	2.163	3.096	8.3	20.4	4 21	15 41.08	-8 30.5	1.444	2.388	10.7	19.2
5 1	15 34.38	-7 13.1	2.130	3.109	5.4	20.2	5 1	15 34.46	-6 54.5	1.413	2.395	7.1	19.0
5 11	15 26.57	-6 52.2	2.125	3.122	3.7	20.2	5 11	15 26.62	-5 25.2	1.407	2.402	5.4	18.9
5 21	15 18.65	-6 39.6	2.148	3.134	5.0	20.3	5 21	15 18.62	-4 10.2	1.427	2.410	7.4	19.0
5 31	15 11.38	-6 37.1	2.198	3.147	7.8	20.5	5 31	15 11.55	-3 15.4	1.471	2.419	11.0	19.2
6 10	15 5.43	-6 45.9	2.273	3.160	10.6	20.7	6 10	15 6.29	-2 43.8	1.537	2.427	14.5	19.5
6 20	15 1.21	-7 5.6	2.370	3.173	13.0	20.8	6 20	15 3.32	-2 34.8	1.622	2.436	17.6	19.7
483432	2001 <i>DF</i> ₄₇		5 14.0 181°90	23°9/3.9	17		115193	2003 <i>SA</i> ₁₀₇		5 14.0 239°20	0°4/14.3	18	
4 11	16 16.73	+16 12.6	0.820	1.651	27.9	22.2	4 11	15 47.74	-21 48.3	2.030	2.884	12.4	20.2
4 21	16 5.62	+19 51.3	0.789	1.660	25.4	22.1	4 21	15 42.48	-21 23.2	1.948	2.879	9.2	20.0
5 1	15 49.48	+22 51.0	0.774	1.665	24.0	22.0	5 1	15 35.26	-20 48.8	1.890	2.873	5.5	19.7
5 11	15 30.21	+24 46.3	0.777	1.666	24.4	22.0	5 11	15 26.83	-20 7.0	1.859	2.867	1.5	19.4
5 21	15 10.53	+25 23.9	0.796	1.663	26.3	22.1	5 21	15 18.09	-19 20.8	1.855	2.861	2.8	19.5
5 31	14 53.25	+24 45.0	0.830	1.656	29.1	22.3	5 31	15 10.02	-18 34.5	1.880	2.855	6.8	19.8
6 10	14 40.29	+23 4.2	0.875	1.645	32.0	22.4	6 10	15 3.44	-17 52.8	1.929	2.849	10.5	20.0
6 20	14 32.32	+20 39.5	0.928	1.630	34.8	22.6	6 20	14 58.93	-17 19.2	2.001	2.842	13.7	20.2
79473	1998 <i>BX</i> ₈		5 14.0 118°87	4°9/17.4	18		15053	Bochniček		5 14.0 15°93	2°3/12.9	18	
4 11	15 50.16	-34 5.1	2.295	3.101	12.8	18.9	4 11	15 49.31	-16 17.4	1.251	2.134	16.6	18.5
4 21	15 44.22	-34 28.4	2.219	3.107	10.3	18.7	4 21	15 44.41	-15 35.6	1.189	2.135	12.2	18.3
5 1	15 36.25	-34 37.0	2.165	3.112	7.6	18.6	5 1	15 36.67	-14 46.4	1.148	2.136	7.1	18.0
5 11	15 27.04	-34 29.4	2.138	3.118	5.4	18.5	5 11	15 27.19	-13 54.6	1.130	2.137	2.5	17.7
5 21	15 17.54	-34 6.2	2.137	3.123	5.1	18.4	5 21	15 17.33	-13 6.2	1.137	2.139	5.1	17.9
5 31	15 8.75	-33 30.4	2.164	3.128	6.9	18.6	5 31	15 8.57	-12 27.7	1.167	2.141	10.3	18.1
6 10	15 1.54	-32 46.7	2.217	3.133	9.5	18.7	6 10	15 2.09	-12 3.9	1.219	2.143	15.0	18.4
6 20	14 56.47	-32 0.7	2.292	3.138	12.0	18.9	6 20	14 58.55	-11 57.0	1.290	2.145	19.0	18.7
85420	1996 <i>XB</i> ₁₇		5 14.0 118°33	0°6/13.7	18		40332	1999 <i>NK</i>		5 14.0 271°67	5°1/17.1	18	
4 11	15 48.13	-17 22.4	2.486	3.337	10.5	19.8	4 11	15 50.71	-33 28.1	1.955	2.773	14.3	19.2
4 21	15 42.29	-17 14.4	2.420	3.351	7.6	19.6	4 21	15 45.13	-33 40.4	1.858	2.755	11.5	19.0
5 1	15 34.93	-17 2.6	2.380	3.364	4.4	19.4	5 1	15 37.06	-33 35.6	1.782	2.736	8.4	18.7
5 11	15 26.71	-16 48.4	2.368	3.377	1.1	19.2	5 11	15 27.30	-33 11.8	1.731	2.717	5.8	18.5
5 21	15 18.34	-16 33.8	2.385	3.389	2.6	19.3	5 21	15 16.95	-32 29.2	1.706	2.698	5.4	18.5
5 31	15 10.60	-16 21.0	2.431	3.402	5.9	19.6	5 31	15 7.26	-31 31.6	1.708	2.678	7.9	18.6
6 10	15 4.10	-16 12.3	2.504	3.414	8.8	19.8	6 10	14 59.36	-30 25.6	1.735	2.659	11.3	18.7
6 20	14 59.28	-16 9.4	2.600	3.425	11.4	20.0	6 20	14 53.97	-29 18.3	1.784	2.639	14.6	18.9
463101	2011 <i>UU</i> ₄₆		5 14.0 212°81	1°1/14.6	16		310662	2002 <i>EM</i> ₁₀₅		5 14.0 69°37	1°4/13.4	17	

EPHEMERIDES

5 14.0

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
167616	2004 <i>CH</i> ₁₅		5 14.0 176°97	0°4/13.7	18		243003	2006 <i>TY</i> ₁₂₀		5 14.0 66°60	6°6/ 9.2	18	
4 11	15 47.40	-18 35.8	2.327	3.181	11.1	20.9	4 11	15 45.01	-0 50.5	2.136	2.997	11.7	20.5
4 21	15 41.94	-18 15.6	2.251	3.182	8.1	20.7	4 21	15 40.15	+0 13.9	2.084	3.005	9.2	20.4
5 1	15 34.83	-17 49.9	2.199	3.183	4.7	20.5	5 1	15 33.75	+1 11.0	2.056	3.014	7.2	20.3
5 11	15 26.72	-17 20.5	2.175	3.184	1.1	20.3	5 11	15 26.47	+1 55.7	2.055	3.023	6.6	20.3
5 21	15 18.39	-16 50.0	2.180	3.184	2.7	20.4	5 21	15 19.08	+2 24.2	2.079	3.032	7.8	20.4
5 31	15 10.65	-16 21.5	2.213	3.184	6.3	20.6	5 31	15 12.35	+2 34.5	2.129	3.041	10.0	20.5
6 10	15 4.21	-15 58.0	2.272	3.184	9.5	20.8	6 10	15 6.91	+2 26.2	2.202	3.050	12.3	20.7
6 20	14 59.55	-15 42.0	2.354	3.183	12.3	21.0	6 20	15 3.18	+2 1.0	2.294	3.059	14.5	20.8
507988	2015 <i>BF</i> ₁₆₁		5 14.0 317°01	5°5/16.5	17		21647	Carlturner		5 14.1 263°77	3°9/11.3	18	
4 11	15 48.87	-30 52.2	1.497	2.342	16.5	20.7	4 11	15 46.54	-11 22.2	1.856	2.728	12.6	18.7
4 21	15 44.38	-31 23.2	1.409	2.324	13.2	20.4	4 21	15 41.66	-10 14.3	1.780	2.719	9.3	18.4
5 1	15 36.90	-31 37.5	1.341	2.306	9.4	20.2	5 1	15 34.81	-9 3.6	1.729	2.711	5.9	18.2
5 11	15 27.31	-31 32.1	1.296	2.289	6.2	19.9	5 11	15 26.77	-7 55.3	1.704	2.703	3.9	18.1
5 21	15 16.93	-31 6.6	1.275	2.272	6.0	19.9	5 21	15 18.42	-6 54.9	1.705	2.694	5.8	18.2
5 31	15 7.31	-30 24.8	1.279	2.256	9.2	20.0	5 31	15 10.74	-6 7.6	1.734	2.686	9.3	18.4
6 10	14 59.84	-29 34.0	1.306	2.240	13.3	20.2	6 10	15 4.56	-5 36.7	1.786	2.677	12.8	18.6
6 20	14 55.42	-28 42.3	1.352	2.225	17.2	20.4	6 20	15 0.44	-5 23.3	1.858	2.669	15.8	18.7
163717	2003 <i>HC</i> ₈		5 14.0 331°40	2°1/12.9	17		312105	2007 <i>TN</i> ₁₅₆		5 14.1 190°23	6°1/16.6	17	
4 11	15 46.46	-18 8.7	1.189	2.078	17.0	19.4	4 11	15 56.83	-32 17.8	1.679	2.501	16.1	21.0
4 21	15 42.54	-17 7.1	1.120	2.070	12.4	19.1	4 21	15 49.95	-33 13.8	1.601	2.500	12.9	20.8
5 1	15 35.70	-15 53.0	1.072	2.062	7.3	18.8	5 1	15 40.03	-33 54.2	1.545	2.499	9.5	20.6
5 11	15 26.99	-14 32.3	1.047	2.055	2.4	18.4	5 11	15 28.06	-34 14.7	1.514	2.498	6.7	20.4
5 21	15 17.79	-13 13.1	1.045	2.048	5.3	18.6	5 21	15 15.41	-34 13.7	1.509	2.497	6.5	20.4
5 31	15 9.63	-12 4.3	1.067	2.042	10.7	18.9	5 31	15 3.66	-33 53.8	1.529	2.495	9.1	20.5
6 10	15 3.76	-11 13.3	1.110	2.037	15.8	19.1	6 10	14 54.16	-33 21.6	1.574	2.492	12.5	20.7
6 20	15 0.87	-10 43.5	1.170	2.033	20.1	19.4	6 20	14 47.73	-32 44.6	1.640	2.489	15.9	20.9
380069	2013 <i>SK</i> ₂₇		5 14.0 8°38	3°1/11.9	17		106752	2000 <i>XS</i> ₄		5 14.1 282°91	4°3/17.0	18	
4 11	15 46.48	-16 6.6	1.553	2.430	14.3	19.8	4 11	15 48.04	-32 42.9	2.297	3.112	12.5	19.1
4 21	15 41.83	-14 36.3	1.487	2.430	10.4	19.6	4 21	15 42.81	-32 47.6	2.197	3.094	10.0	18.9
5 1	15 34.96	-12 57.1	1.444	2.431	6.2	19.3	5 1	15 35.55	-32 37.7	2.120	3.075	7.2	18.7
5 11	15 26.77	-11 15.8	1.427	2.432	3.1	19.1	5 11	15 26.96	-32 12.1	2.069	3.057	4.8	18.5
5 21	15 18.36	-9 40.5	1.436	2.432	5.5	19.3	5 21	15 17.93	-31 31.7	2.045	3.038	4.5	18.5
5 31	15 10.85	-8 19.0	1.472	2.434	9.7	19.5	5 31	15 9.45	-30 39.7	2.049	3.020	6.7	18.6
6 10	15 5.15	-7 16.6	1.530	2.435	13.7	19.7	6 10	15 2.42	-29 41.2	2.079	3.001	9.7	18.7
6 20	15 1.81	-6 35.8	1.608	2.436	17.1	20.0	6 20	14 57.47	-28 42.1	2.131	2.982	12.7	18.9
505190	2012 <i>TH</i> ₁₃₃		5 14.0 217°28	2°6/12.3	17		323425	2004 <i>FV</i> ₄		5 14.1 164°40	12°9/16.3	18	
4 11	15 47.35	-12 31.0	2.139	3.003	11.5	21.7	4 11	16 10.86	-38 26.8	1.241	2.044	21.7	20.7
4 21	15 42.02	-11 57.1	2.063	2.999	8.4	21.5	4 21	16 2.30	-41 7.4	1.175	2.047	18.5	20.5
5 1	15 34.93	-11 21.4	2.011	2.994	5.1	21.3	5 1	15 48.40	-43 28.6	1.129	2.051	15.3	20.3
5 11	15 26.76	-10 47.1	1.986	2.990	2.7	21.2	5 11	15 30.26	-45 15.0	1.104	2.053	13.2	20.1
5 21	15 18.33	-10 17.5	1.990	2.985	4.3	21.3	5 21	15 10.19	-46 15.4	1.103	2.055	13.1	20.1
5 31	15 10.50	-9 55.8	2.020	2.980	7.6	21.4	5 31	14 51.33	-46 28.9	1.125	2.057	15.1	20.3
6 10	15 4.02	-9 44.5	2.076	2.975	10.9	21.6	6 10	14 36.42	-46 6.5	1.168	2.058	18.1	20.4
6 20	14 59.40	-9 44.6	2.154	2.969	13.8	21.8	6 20	14 26.89	-45 23.9	1.228	2.058	21.2	20.7
193516	2000 <i>YL</i> ₅₇		5 14.0 236°85	5°1/17.8	18		278419	2007 <i>RH</i> ₁₅₇		5 14.1 165°36	1°4/13.1	17	
4 11	15 51.41	-35 55.5	2.276	3.073	13.2	20.5	4 11	15 47.57	-15 58.8	2.123	2.984	11.7	21.4
4 21	15 45.29	-35 54.0	2.178	3.060	10.7	20.3	4 21	15 42.18	-15 32.3	2.051	2.986	8.5	21.2
5 1	15 36.98	-35 34.7	2.103	3.046	8.0	20.1	5 1	15 35.03	-15 1.7	2.003	2.988	5.0	21.0
5 11	15 27.27	-34 56.3	2.053	3.032	5.7	19.9	5 11	15 26.82	-14 29.5	1.981	2.989	1.6	20.8
5 21	15 17.16	-33 59.7	2.031	3.017	5.2	19.9	5 21	15 18.38	-13 58.8	1.989	2.990	3.4	20.9
5 31	15 7.75	-32 48.7	2.036	3.002	7.2	20.0	5 31	15 10.58	-13 33.0	2.023	2.991	7.0	21.1
6 10	14 59.97	-31 29.8	2.068	2.987	10.0	20.1	6 10	15 4.19	-13 14.8	2.083	2.992	10.4	21.3
6 20	14 54.45	-30 9.7	2.124	2.970	12.9	20.3	6 20	14 59.69	-13 6.3	2.166	2.993	13.3	21.5
54589	2000 <i>QF</i> ₁₉₅		5 14.0 353°92	1°5/14.6	18		256564	2007 <i>RJ</i> ₂₉₀		5 14.1 135°51	2°2/12.8	17	
4 11	15 46.79	-21 43.2	1.259	2.139	16.8	18.0	4 11	15 50.07	-16 9.4	1.589	2.460	14.4	20.9
4 21	15 42.80	-21 55.9	1.190	2.133	12.5	17.8	4 21	15 44.42	-15 18.3	1.526	2.465	10.5	20.6
5 1	15 35.88	-21 58.3	1.143	2.129	7.6	17.5	5 1	15 36.47	-14 20.6	1.485	2.471	6.1	20.4
5 11	15 27.05	-21 50.9	1.117	2.125	2.5	17.2	5 11	15 27.16	-13 21.0	1.469	2.476	2.4	20.2
5 21	15 17.66	-21 36.0	1.116	2.123	3.9	17.2	5 21	15 17.63	-12 24.9	1.481	2.481	4.6	20.3
5 31	15 9.25	-21 17.9	1.138	2.122	9.1	17.5	5 31	15 9.05	-11 37.8	1.519	2.486	8.9	20.6
6 10	15 3.10	-21 2.2	1.182	2.122	13.9	17.8	6 10	15 2.36	-11 4.1	1.580	2.491	13.0	20.8
6 20	14 59.97	-20 53.3	1.245	2.123	18.1	18.0	6 20	14 58.11	-10 45.8	1.661	2.495	16.4	21.1
174870	2004 <i>BG</i> ₃₉		5 14.0 50°96	2°5/12.8	18		183931	2004 <i>DR</i> ₆		5 14.1 84°50	0°6/14.3	17	
4 11	15 49.31	-14 39.7	1.375	2.255	15.7	20.1	4 11	15 51.44	-21 7.2	1.572	2.434	15.0	21.3
4 21	15 44.07	-14 7.3	1.321	2.265	11.4	19.9	4 21	15 45.47	-20 57.6	1.514	2.448	11.0	21.1
5 1	15 36.31	-13 31.1	1.289	2.276	6.7	19.6	5 1	15 37.09	-20 38.7	1.478	2.462	6.5	20.9
5 11	15 27.10	-12 55.2	1.281	2.287	2.7	19.4	5 11	15 27.31	-20 12.0	1.467	2.476	1.7	20.6
5 21	15 17.68	-12 24.3	1.298	2.299	4.9	19.6	5 21	15 17.33	-19 40.8	1.483	2.489	3.3	20.8
5 31	15 9.34	-12 3.0	1.339	2.311	9.5	19.9	5 31	15 8.40	-19 9.7	1.525	2.503	7.9	21.1
6 10	15 3.10	-11 54.6	1.404	2.322	13.7	20.2	6 10	15 1.49	-18 43.5	1.591	2.516	12.0	21.3
6 20	14 59.52	-12 0.0	1.487	2.335	17.3	20.4	6 20	14 57.15	-18 25.7	1.678	2.529	15.5	21.6
407695	2011 <i>UG</i> ₁₀₂		5 14.0 179°36	1°0/14.6	16		12551	1998 <i>QQ</i> ₃₉		5 14.1 33			

EPHEMERIDES

5 14.1

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
359743	2011 <i>UA</i> ₅₈		5 14.1	4°16'	0°8'/13.8	16	376801	2000 <i>SG</i> ₃₂₆		5 14.1	159°50'	1°2'/14.8	17
4 11	15 50.32	-16 59.2	1.132	2.019	17.8	20.7	4 11	15 50.17	-22 46.0	1.916	2.767	13.2	21.7
4 21	15 45.53	-17 6.3	1.070	2.018	13.1	20.4	4 21	15 44.37	-22 43.6	1.842	2.769	9.8	21.5
5 1	15 37.54	-17 8.2	1.029	2.018	7.7	20.1	5 1	15 36.44	-22 32.0	1.791	2.772	6.0	21.2
5 11	15 27.48	-17 6.6	1.009	2.018	1.9	19.8	5 11	15 27.20	-22 12.0	1.767	2.774	2.0	21.0
5 21	15 16.88	-17 4.1	1.014	2.020	4.4	19.9	5 21	15 17.64	-21 45.6	1.770	2.775	3.0	21.1
5 31	15 7.43	-17 4.7	1.041	2.022	10.1	20.3	5 31	15 8.85	-21 16.6	1.800	2.777	7.0	21.3
6 10	15 0.50	-17 12.2	1.089	2.025	15.3	20.6	6 10	15 1.73	-20 49.3	1.856	2.778	10.7	21.5
6 20	14 56.85	-17 29.1	1.155	2.028	19.6	20.8	6 20	14 56.84	-20 27.4	1.934	2.779	14.0	21.7
230070	2000 <i>UX</i> ₃₃		5 14.1	137°53'	2°8'/14.9	18	382908	2004 <i>RY</i> ₁₅₈		5 14.1	240°93'	1°3'/13.1	18
4 11	15 56.91	-23 17.9	1.896	2.735	13.8	19.9	4 11	15 48.52	-17 7.0	2.172	3.029	11.6	21.8
4 21	15 49.50	-24 19.7	1.819	2.738	10.5	19.7	4 21	15 42.99	-16 27.4	2.081	3.014	8.5	21.6
5 1	15 39.57	-25 15.0	1.767	2.742	6.7	19.4	5 1	15 35.60	-15 41.5	2.014	2.999	5.0	21.3
5 11	15 27.95	-26 1.0	1.743	2.745	3.3	19.2	5 11	15 27.01	-14 51.9	1.976	2.983	1.6	21.1
5 21	15 15.79	-26 36.3	1.746	2.748	3.8	19.3	5 21	15 18.06	-14 2.5	1.965	2.967	3.4	21.2
5 31	15 4.35	-27 1.6	1.779	2.751	7.5	19.5	5 31	15 9.66	-13 17.2	1.983	2.950	7.2	21.4
6 10	14 54.74	-27 19.8	1.837	2.754	11.1	19.7	6 10	15 2.62	-12 40.2	2.027	2.933	10.8	21.5
6 20	14 47.70	-27 34.8	1.918	2.756	14.3	19.9	6 20	14 57.49	-12 14.1	2.093	2.915	13.9	21.7
322474	2011 <i>UF</i> ₁₉₂		5 14.1	287°85'	0°6'/14.4	18	315440	2007 <i>WX</i> ₁		5 14.1	206°08'	3°6'/11.8	16
4 11	15 47.12	-21 30.1	2.119	2.973	12.0	21.2	4 11	15 51.55	-9 50.4	2.124	2.980	11.9	21.9
4 21	15 42.12	-21 18.8	2.023	2.954	8.9	21.0	4 21	15 45.12	-9 9.3	2.043	2.973	8.8	21.7
5 1	15 35.16	-20 59.4	1.951	2.934	5.4	20.7	5 1	15 36.80	-8 27.9	1.987	2.966	5.6	21.5
5 11	15 26.89	-20 33.0	1.906	2.914	1.5	20.4	5 11	15 27.29	-7 50.0	1.959	2.957	3.6	21.4
5 21	15 18.18	-20 1.8	1.888	2.894	2.8	20.5	5 21	15 17.47	-7 19.1	1.959	2.948	5.2	21.4
5 31	15 9.97	-19 29.2	1.898	2.874	6.7	20.7	5 31	15 8.25	-6 58.7	1.988	2.937	8.4	21.6
6 10	15 3.14	-18 59.2	1.934	2.855	10.4	20.9	6 10	15 0.46	-6 50.8	2.042	2.926	11.7	21.8
6 20	14 58.30	-18 35.5	1.991	2.835	13.7	21.0	6 20	14 54.65	-6 56.2	2.117	2.914	14.6	22.0
335805	2007 <i>HA</i> ₈₂		5 14.1	227°77'	3°2'/12.1	18	435727	2008 <i>UU</i> ₇₈		5 14.1	120°59'	2°7'/12.0	17
4 11	15 48.80	-10 38.5	2.139	3.000	11.6	21.2	4 11	15 47.89	-12 42.2	2.223	3.083	11.3	21.5
4 21	15 43.13	-10 7.6	2.057	2.991	8.6	21.0	4 21	15 42.20	-11 50.4	2.164	3.098	8.2	21.3
5 1	15 35.63	-9 36.3	2.000	2.981	5.4	20.8	5 1	15 34.94	-10 56.8	2.130	3.113	5.0	21.1
5 11	15 26.99	-9 7.9	1.971	2.972	3.2	20.7	5 11	15 26.82	-10 5.0	2.125	3.127	2.8	21.0
5 21	15 18.02	-8 45.6	1.969	2.961	4.8	20.7	5 21	15 18.61	-9 18.9	2.148	3.141	4.3	21.1
5 31	15 9.62	-8 32.4	1.995	2.950	8.0	20.9	5 31	15 11.11	-8 42.1	2.199	3.154	7.4	21.3
6 10	15 2.56	-8 30.2	2.046	2.939	11.3	21.1	6 10	15 4.96	-8 16.8	2.275	3.167	10.4	21.6
6 20	14 57.41	-8 39.9	2.119	2.927	14.2	21.3	6 20	15 0.59	-8 4.1	2.374	3.180	12.9	21.7
104433	2000 <i>FP</i> ₆₆		5 14.1	7°50'	0°4'/14.3	17	469800	2005 <i>SZ</i> ₂₃		5 14.1	243°55'	1°7'/15.2	18
4 11	15 47.83	-20 42.8	1.944	2.802	12.7	20.8	4 11	15 48.71	-24 28.7	2.758	3.590	10.2	21.8
4 21	15 42.61	-20 35.7	1.870	2.803	9.4	20.6	4 21	15 42.92	-24 39.4	2.659	3.575	7.7	21.6
5 1	15 35.39	-20 21.2	1.819	2.803	5.6	20.4	5 1	15 35.49	-24 42.8	2.586	3.560	4.9	21.4
5 11	15 26.93	-20 0.5	1.795	2.803	1.5	20.1	5 11	15 26.99	-24 39.0	2.540	3.544	2.2	21.2
5 21	15 18.17	-19 36.0	1.798	2.804	2.9	20.2	5 21	15 18.12	-24 28.6	2.524	3.527	2.5	21.2
5 31	15 10.12	-19 11.1	1.828	2.804	6.9	20.5	5 31	15 9.66	-24 13.6	2.537	3.511	5.4	21.4
6 10	15 3.62	-18 49.8	1.883	2.805	10.6	20.7	6 10	15 2.30	-23 56.9	2.577	3.494	8.4	21.6
6 20	14 59.23	-18 34.9	1.960	2.806	13.8	20.9	6 20	14 56.58	-23 41.3	2.642	3.476	11.0	21.7
475435	2006 <i>QR</i> ₁₃₀		5 14.1	323°34'	12°6'/18.5	16	367874	2011 <i>DX</i> ₅₁		5 14.1	168°16'	2°5'/12.3	17
4 11	15 53.92	-45 29.5	1.681	2.450	18.2	20.6	4 11	15 49.41	-12 58.0	2.309	3.165	11.1	22.0
4 21	15 48.88	-47 15.3	1.590	2.427	16.3	20.4	4 21	15 43.34	-12 13.6	2.238	3.171	8.1	21.8
5 1	15 40.04	-48 40.4	1.517	2.404	14.4	20.2	5 1	15 35.64	-11 27.0	2.193	3.176	4.9	21.6
5 11	15 28.22	-49 36.0	1.465	2.383	12.9	20.1	5 11	15 27.00	-10 41.3	2.176	3.180	2.5	21.5
5 21	15 14.93	-49 56.1	1.434	2.362	12.6	20.0	5 21	15 18.19	-10 0.0	2.188	3.183	4.1	21.6
5 31	15 2.24	-49 39.9	1.425	2.341	13.6	20.0	5 31	15 10.02	-9 26.7	2.229	3.185	7.2	21.8
6 10	14 52.14	-48 53.5	1.436	2.322	15.6	20.1	6 10	15 3.18	-9 3.7	2.296	3.187	10.3	22.0
6 20	14 45.90	-47 47.1	1.466	2.303	18.0	20.2	6 20	14 58.12	-8 52.3	2.384	3.188	13.0	22.2
436993	2012 <i>TG</i> ₂₁₆		5 14.1	244°29'	1°1'/14.8	17	285445	1999 <i>VS</i> ₂₀₄		5 14.1	167°99'	0°2'/13.9	18
4 11	15 47.86	-23 37.8	2.070	2.919	12.4	21.2	4 11	15 48.60	-19 46.0	2.384	3.233	11.0	21.8
4 21	15 42.59	-23 16.8	1.986	2.912	9.3	21.0	4 21	15 42.79	-19 20.8	2.309	3.238	8.0	21.6
5 1	15 35.37	-22 45.3	1.926	2.906	5.7	20.8	5 1	15 35.35	-18 49.0	2.258	3.241	4.7	21.4
5 11	15 26.93	-22 4.8	1.892	2.899	1.9	20.5	5 11	15 26.93	-18 12.6	2.236	3.244	1.1	21.2
5 21	15 18.17	-21 18.0	1.886	2.892	2.8	20.6	5 21	15 18.33	-17 34.3	2.242	3.247	2.6	21.3
5 31	15 10.07	-20 29.2	1.908	2.885	6.6	20.8	5 31	15 10.34	-16 57.5	2.277	3.249	6.1	21.5
6 10	15 3.45	-19 43.2	1.956	2.878	10.3	21.0	6 10	15 3.67	-16 25.5	2.339	3.251	9.3	21.7
6 20	14 58.89	-19 4.2	2.026	2.871	13.5	21.2	6 20	14 58.77	-16 0.9	2.424	3.252	12.1	21.9
420719	2012 <i>PS</i> ₁₅		5 14.1	356°72'	11°8'/21.4	18	22828	Jaynethomp		5 14.1	322°11'	4°0'/11.7	18
4 11	15 49.00	-45 8.2	1.399	2.190	20.2	19.6	4 11	15 45.33	-12 7.3	1.494	2.377	14.4	17.9
4 21	15 45.04	-46 2.0	1.328	2.186	17.7	19.4	4 21	15 41.29	-11 11.7	1.417	2.362	10.7	17.6
5 1	15 37.47	-46 25.3	1.274	2.183	15.0	19.3	5 1	15 34.85	-10 12.3	1.362	2.348	6.7	17.3
5 11	15 27.50	-46 11.8	1.239	2.181	12.8	19.1	5 11	15 26.87	-9 14.8	1.331	2.333	4.0	17.1
5 21	15 16.88	-45 19.7	1.225	2.180	11.8	19.1	5 21	15 18.42	-8 25.3	1.325	2.320	6.2	17.2
5 31	15 7.57	-43 53.7	1.233	2.180	12.7	19.1	5 31	15 10.70	-7 49.5	1.344	2.307	10.4	17.4
6 10	15 1.14	-42 4.9	1.261	2.181	14.9	19.2	6 10	15 4.75	-7 31.4	1.385	2.294	14.5	17.6
6 20	14 58.38	-40 6.4	1.309	2.183	17.6	19.4	6 20	15 1.26	-7 31.9	1.444	2.283	18.2	17.8
174524	2003 <i>DO</i> ₁₉		5 14.1	143°97'	4°2'/17.0	18	309930	2009 <i>FY</i> ₅₂		5 14.1	78°9		

EPHEMERIDES

5 14.1

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
286130	2001 <i>TY</i> ₁₆₂		5 14.1 89°22	0°9/13.5	18		179759	2002 <i>RP</i> ₂₂₀		5 14.1 246°46	1°6/14.9	18	
4 11	15 46.36	-18 16.7	2.140	3.000	11.7	20.4	4 11	15 52.80	-23 11.7	1.902	2.748	13.5	20.9
4 21	15 41.28	-17 40.9	2.072	3.006	8.5	20.3	4 21	15 46.59	-23 19.5	1.807	2.731	10.2	20.6
5 1	15 34.51	-16 59.1	2.028	3.013	4.9	20.0	5 1	15 37.95	-23 18.1	1.736	2.714	6.3	20.4
5 11	15 26.74	-16 13.9	2.011	3.019	1.3	19.8	5 11	15 27.65	-23 7.3	1.691	2.697	2.4	20.1
5 21	15 18.81	-15 28.9	2.022	3.026	3.0	19.9	5 21	15 16.74	-22 48.3	1.673	2.679	3.2	20.1
5 31	15 11.56	-14 47.9	2.061	3.032	6.7	20.2	5 31	15 6.42	-22 24.1	1.684	2.660	7.4	20.3
6 10	15 5.69	-14 14.4	2.125	3.038	10.0	20.4	6 10	14 57.76	-21 59.5	1.720	2.640	11.5	20.5
6 20	15 1.67	-13 50.8	2.212	3.044	12.9	20.6	6 20	14 51.52	-21 38.9	1.777	2.620	15.1	20.7
22778	1999 <i>CN</i> ₆₃		5 14.1 186°20	2°1/12.4	18		98111	2000 <i>RX</i> ₉₃		5 14.1 331°89	1°7/13.4	18	
4 11	15 46.10	-15 8.0	2.235	3.097	11.1	18.8	4 11	15 48.34	-15 44.0	1.150	2.039	17.3	18.9
4 21	15 41.04	-14 11.7	2.161	3.097	8.1	18.6	4 21	15 44.19	-15 37.1	1.079	2.028	12.8	18.6
5 1	15 34.35	-13 10.7	2.112	3.097	4.8	18.4	5 1	15 36.88	-15 25.6	1.028	2.017	7.6	18.2
5 11	15 26.71	-12 8.9	2.091	3.096	2.2	18.2	5 11	15 27.43	-15 12.3	0.999	2.007	2.3	17.9
5 21	15 18.88	-11 10.4	2.098	3.096	3.9	18.3	5 21	15 17.28	-15 0.9	0.993	1.998	4.9	18.0
5 31	15 11.67	-10 19.5	2.134	3.095	7.2	18.5	5 31	15 8.07	-14 56.1	1.010	1.990	10.6	18.3
6 10	15 5.75	-9 39.5	2.194	3.094	10.4	18.7	6 10	15 1.25	-15 1.8	1.048	1.982	15.8	18.5
6 20	15 1.58	-9 12.3	2.277	3.092	13.1	18.9	6 20	14 57.65	-15 20.1	1.103	1.976	20.3	18.8
316911	2000 <i>UN</i> ₁₉		5 14.1 256°70	1°8/14.8	17		380640	2004 <i>XU</i> ₅₆		5 14.1 103°15	1°0/14.7	17	
4 11	15 54.63	-22 5.1	1.631	2.484	15.0	21.0	4 11	15 49.87	-22 37.1	2.004	2.854	12.8	21.8
4 21	15 48.31	-22 32.7	1.540	2.469	11.3	20.7	4 21	15 43.97	-22 29.9	1.939	2.866	9.4	21.6
5 1	15 39.14	-22 52.7	1.472	2.453	7.0	20.4	5 1	15 36.13	-22 13.8	1.898	2.879	5.7	21.4
5 11	15 27.95	-23 4.0	1.430	2.436	2.6	20.1	5 11	15 27.16	-21 50.0	1.884	2.891	1.8	21.2
5 21	15 15.96	-23 6.5	1.414	2.419	3.7	20.1	5 21	15 18.01	-21 20.8	1.898	2.903	2.8	21.3
5 31	15 4.61	-23 2.9	1.425	2.402	8.4	20.4	5 31	15 9.66	-20 50.0	1.939	2.915	6.6	21.6
6 10	14 55.22	-22 57.3	1.461	2.384	12.9	20.6	6 10	15 2.92	-20 21.6	2.006	2.927	10.1	21.8
6 20	14 48.65	-22 54.3	1.517	2.366	16.9	20.8	6 20	14 58.28	-19 58.9	2.095	2.938	13.1	22.0
63923	2001 <i>SV</i> ₄₁		5 14.1 60°15	2°3/11.3	18		255343	2005 <i>WY</i> ₆₅		5 14.1 282°59	1°9/15.7	18	
4 11	15 39.19	-8 16.0	4.094	4.951	6.6	19.1	4 11	15 46.39	-27 42.3	2.354	3.188	11.6	20.6
4 21	15 35.42	-7 46.0	4.027	4.956	4.9	19.0	4 21	15 41.43	-27 3.5	2.254	3.170	8.9	20.4
5 1	15 30.87	-7 17.1	3.986	4.962	3.2	18.9	5 1	15 34.69	-26 10.9	2.178	3.152	5.7	20.1
5 11	15 25.86	-6 51.1	3.974	4.968	2.3	18.8	5 11	15 26.84	-25 5.8	2.130	3.133	2.6	19.9
5 21	15 20.78	-6 29.6	3.991	4.974	3.1	18.9	5 21	15 18.67	-23 51.3	2.110	3.114	2.8	19.9
5 31	15 15.99	-6 14.1	4.037	4.979	4.8	19.0	5 31	15 11.06	-22 32.1	2.119	3.096	6.1	20.1
6 10	15 11.83	-6 5.5	4.110	4.985	6.5	19.2	6 10	15 4.78	-21 14.0	2.154	3.077	9.4	20.2
6 20	15 8.55	-6 4.2	4.206	4.991	8.1	19.3	6 20	15 0.35	-20 2.0	2.214	3.058	12.5	20.4
474291	2001 <i>WA</i> ₈₈		5 14.1 216°38	1°1/14.9	18		123289	2000 <i>UC</i> ₁₀₀		5 14.1 281°69	2°0/15.2	18	
4 11	15 46.78	-24 40.3	2.494	3.334	10.9	21.6	4 11	15 49.82	-25 10.3	1.854	2.702	13.7	20.2
4 21	15 41.51	-24 10.9	2.407	3.329	8.1	21.4	4 21	15 44.53	-25 4.8	1.753	2.677	10.5	19.9
5 1	15 34.63	-23 31.6	2.346	3.323	5.0	21.2	5 1	15 36.80	-24 47.1	1.674	2.652	6.6	19.6
5 11	15 26.79	-22 43.7	2.311	3.318	1.8	20.9	5 11	15 27.40	-24 17.2	1.621	2.626	2.8	19.3
5 21	15 18.71	-21 50.0	2.306	3.312	2.4	21.0	5 21	15 17.34	-23 36.8	1.595	2.600	3.4	19.3
5 31	15 11.20	-20 54.3	2.330	3.306	5.7	21.2	5 31	15 7.82	-22 50.2	1.596	2.574	7.6	19.5
6 10	15 4.94	-20 0.9	2.380	3.299	8.8	21.4	6 10	14 59.95	-22 3.2	1.622	2.548	11.8	19.7
6 20	15 0.40	-19 13.5	2.455	3.292	11.6	21.5	6 20	14 54.50	-21 21.2	1.669	2.521	15.5	19.9
315219	2007 <i>RX</i> ₁₃₇		5 14.1 215°72	1°4/13.2	16		182628	2001 <i>UK</i> ₁₂₆		5 14.1 141°83	3°8/10.8	17	
4 11	15 51.40	-17 6.4	1.779	2.640	13.6	22.1	4 11	15 45.84	-5 45.7	2.923	3.776	9.1	22.0
4 21	15 45.41	-16 30.5	1.698	2.633	10.0	21.9	4 21	15 40.43	-5 2.6	2.863	3.788	6.9	21.9
5 1	15 37.13	-15 47.6	1.640	2.626	5.8	21.6	5 1	15 33.85	-4 22.3	2.830	3.800	4.8	21.8
5 11	15 27.41	-15 0.9	1.610	2.618	1.8	21.3	5 11	15 26.61	-3 47.7	2.825	3.811	3.8	21.7
5 21	15 17.29	-14 14.4	1.606	2.609	3.9	21.5	5 21	15 19.28	-3 21.5	2.849	3.822	4.8	21.8
5 31	15 7.91	-13 33.1	1.630	2.599	8.3	21.7	5 31	15 12.45	-3 5.5	2.901	3.832	6.9	21.9
6 10	15 0.26	-13 1.4	1.678	2.589	12.4	21.9	6 10	15 6.61	-3 0.7	2.979	3.842	9.1	22.1
6 20	14 54.97	-12 42.2	1.748	2.578	15.9	22.1	6 20	15 2.12	-3 7.0	3.080	3.851	11.0	22.3
82787	2001 <i>QP</i> ₂₂		5 14.1 276°67	5°8/17.4	18		143454	2003 <i>BB</i> ₈₃		5 14.1 67°39	0°6/14.5	17	
4 11	15 51.03	-35 1.5	2.168	2.972	13.5	19.6	4 11	15 47.11	-21 38.8	2.128	2.982	12.0	20.2
4 21	15 45.24	-35 40.4	2.077	2.962	11.0	19.4	4 21	15 41.94	-21 25.2	2.055	2.985	8.8	20.0
5 1	15 37.12	-36 4.4	2.009	2.952	8.4	19.2	5 1	15 34.96	-21 3.6	2.006	2.989	5.3	19.8
5 11	15 27.43	-36 10.7	1.966	2.941	6.3	19.1	5 11	15 26.90	-20 35.6	1.984	2.992	1.5	19.6
5 21	15 17.20	-35 58.9	1.950	2.931	6.0	19.1	5 21	15 18.61	-20 3.6	1.990	2.996	2.6	19.7
5 31	15 7.57	-35 30.9	1.960	2.920	7.8	19.1	5 31	15 10.98	-19 31.1	2.023	3.000	6.4	19.9
6 10	14 59.59	-34 51.9	1.995	2.910	10.5	19.3	6 10	15 4.79	-19 2.0	2.082	3.003	9.8	20.1
6 20	14 53.97	-34 7.7	2.053	2.899	13.2	19.4	6 20	15 0.52	-18 39.2	2.164	3.007	12.8	20.3
270356	2001 <i>YU</i> ₄₉		5 14.1 116°54	1°7/15.9	18		241784	2001 <i>OU</i> ₉₀		5 14.1 308°11	5°0/11.3	18	
4 11	15 43.92	-27 28.6	3.674	4.495	8.1	21.2	4 11	15 47.02	-7 17.0	1.765	2.637	13.1	19.9
4 21	15 38.95	-27 18.3	3.603	4.510	6.1	21.0	4 21	15 42.37	-6 40.2	1.671	2.608	10.0	19.6
5 1	15 32.95	-27 0.6	3.557	4.525	4.0	20.9	5 1	15 35.49	-6 5.4	1.601	2.579	6.8	19.4
5 11	15 26.36	-26 36.2	3.540	4.540	2.1	20.8	5 11	15 27.09	-5 37.4	1.556	2.550	5.0	19.2
5 21	15 19.70	-26 6.3	3.553	4.554	2.1	20.8	5 21	15 18.08	-5 20.5	1.536	2.522	6.7	19.2
5 31	15 13.46	-25 33.2	3.595	4.568	4.0	20.9	5 31	15 9.55	-5 18.4	1.542	2.493	10.3	19.4
6 10	15 8.08	-24 59.2	3.665	4.582	6.1	21.1	6 10	15 2.51	-5 33.1	1.571	2.465	14.0	19.5
6 20	15 3.89	-24 26.6	3.761	4.596	8.0	21.3	6 20	14 57.66	-6 4.6	1.619	2.437	17.5	19.7
179530	2002 <i>CA</i> ₁₉₆		5 14.1 353°74	0°9/14.6	18		488468	1998 <i>QG</i> ₅₉		5 14.1 253°24	1°5/15.0</		

EPHEMERIDES

5 14.1

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
455288	2002 CG ₁₁₅		5 14.1 10°60	6°1/11.5 17			498669	2008 SV ₁₆₂		5 14.1 188°03	4°4/16.7 18		
4 11	15 48.24	- 7 51.8	1.183	2.073	16.9	20.7	4 11	15 53.42	-32 1.4	2.417	3.224	12.2	21.7
4 21	15 43.69	- 7 3.1	1.127	2.073	12.7	20.5	4 21	15 46.65	-32 34.7	2.332	3.223	9.7	21.5
5 1	15 36.34	- 6 17.9	1.092	2.075	8.5	20.3	5 1	15 37.81	-32 55.7	2.271	3.222	7.0	21.3
5 11	15 27.27	- 5 43.1	1.080	2.077	6.1	20.1	5 11	15 27.62	-33 2.4	2.236	3.220	4.8	21.2
5 21	15 17.84	- 5 24.7	1.091	2.080	8.1	20.2	5 21	15 17.03	-32 54.7	2.229	3.218	4.6	21.2
5 31	15 9.52	- 5 26.4	1.124	2.084	12.3	20.5	5 31	15 7.04	-32 34.7	2.251	3.215	6.7	21.3
6 10	15 3.44	- 5 49.2	1.178	2.088	16.5	20.7	6 10	14 58.55	-32 6.6	2.300	3.212	9.4	21.5
6 20	15 0.26	- 6 31.2	1.249	2.093	20.2	21.0	6 20	14 52.18	-31 35.2	2.372	3.208	12.0	21.6
417604	2006 VR ₁₃₈		5 14.1 135°43	1°2/13.5 16			105979	2000 SS ₂₆₆		5 14.1 178°58	5°6/ 9.4 18		
4 11	15 52.38	-15 39.8	1.851	2.710	13.2	22.0	4 11	15 45.52	+ 0 48.4	2.797	3.642	9.7	20.5
4 21	15 45.91	-15 35.2	1.785	2.719	9.7	21.8	4 21	15 40.31	+ 1 33.2	2.733	3.643	7.7	20.3
5 1	15 37.33	-15 27.3	1.743	2.728	5.6	21.5	5 1	15 33.84	+ 2 11.3	2.694	3.644	6.2	20.2
5 11	15 27.47	-15 17.9	1.728	2.736	1.6	21.3	5 11	15 26.65	+ 2 39.1	2.683	3.645	5.7	20.2
5 21	15 17.38	-15 9.3	1.741	2.744	3.5	21.4	5 21	15 19.31	+ 2 54.2	2.699	3.645	6.6	20.3
5 31	15 8.11	-15 4.2	1.782	2.752	7.6	21.7	5 31	15 12.44	+ 2 54.9	2.742	3.644	8.4	20.4
6 10	15 0.55	-15 5.2	1.847	2.759	11.3	21.9	6 10	15 6.57	+ 2 41.1	2.809	3.644	10.4	20.5
6 20	14 55.25	-15 13.9	1.934	2.766	14.5	22.2	6 20	15 2.09	+ 2 13.8	2.897	3.643	12.2	20.6
483137	2015 OL ₂₄		5 14.1 307°42	3°7/16.9 16			107091	2001 AW ₂₈		5 14.1 179°04	0°5/14.3 18		
4 11	15 46.61	-32 9.7	2.079	2.904	13.3	21.1	4 11	15 53.24	-20 44.6	1.904	2.754	13.3	20.4
4 21	15 41.97	-31 45.0	1.974	2.879	10.5	20.8	4 21	15 46.64	-20 39.0	1.828	2.756	9.9	20.2
5 1	15 35.18	-31 2.3	1.891	2.854	7.4	20.6	5 1	15 37.83	-20 25.6	1.775	2.757	5.9	19.9
5 11	15 27.00	-30 1.2	1.834	2.829	4.5	20.4	5 11	15 27.63	-20 5.2	1.750	2.758	1.6	19.6
5 21	15 18.35	-28 44.1	1.804	2.804	4.1	20.3	5 21	15 17.10	-19 40.2	1.752	2.758	3.0	19.7
5 31	15 10.32	-27 16.1	1.802	2.779	6.9	20.4	5 31	15 7.34	-19 14.2	1.782	2.757	7.2	20.0
6 10	15 3.84	-25 44.3	1.826	2.754	10.5	20.6	6 10	14 59.31	-18 51.3	1.838	2.755	11.1	20.2
6 20	14 59.54	-24 15.9	1.872	2.730	13.8	20.7	6 20	14 53.60	-18 35.0	1.916	2.753	14.4	20.4
88513	2001 QB ₁₅₅		5 14.1 65°74	1°6/15.1 18			366286	2013 AS ₁₃₀		5 14.1 163°25	4°2/17.1 16		
4 11	15 49.97	-25 17.5	1.517	2.375	15.7	18.8	4 11	15 49.70	-33 9.6	2.647	3.450	11.4	21.4
4 21	15 44.49	-24 46.3	1.460	2.390	11.7	18.6	4 21	15 43.74	-33 30.9	2.565	3.453	9.1	21.2
5 1	15 36.57	-24 0.2	1.425	2.406	7.2	18.4	5 1	15 36.01	-33 39.8	2.508	3.456	6.6	21.1
5 11	15 27.29	-23 1.6	1.415	2.421	2.6	18.2	5 11	15 27.19	-33 35.2	2.477	3.459	4.6	21.0
5 21	15 17.87	-21 55.4	1.431	2.437	3.4	18.2	5 21	15 18.08	-33 17.5	2.474	3.461	4.4	20.9
5 31	15 9.59	-20 48.4	1.472	2.452	7.8	18.5	5 31	15 9.56	-32 49.0	2.499	3.463	6.1	21.1
6 10	15 3.39	-19 47.4	1.538	2.468	12.0	18.8	6 10	15 2.37	-32 13.7	2.550	3.465	8.5	21.2
6 20	14 59.79	-18 57.6	1.625	2.484	15.5	19.1	6 20	14 57.04	-31 35.9	2.626	3.466	10.9	21.4
497164	2004 RR ₃₂₄		5 14.1 185°40	1°7/15.6 17			257565	1998 UH ₄₉		5 14.1 184°65	1°3/13.2 17		
4 11	15 50.04	-26 36.5	2.933	3.754	9.9	23.6	4 11	15 49.99	-17 11.0	2.170	3.024	11.7	21.1
4 21	15 43.68	-26 23.8	2.845	3.754	7.5	23.4	4 21	15 43.97	-16 28.2	2.092	3.025	8.6	20.9
5 1	15 35.84	-26 1.9	2.783	3.753	4.8	23.2	5 1	15 36.13	-15 39.3	2.040	3.024	5.0	20.7
5 11	15 27.11	-25 31.2	2.750	3.752	2.3	23.0	5 11	15 27.22	-14 47.3	2.016	3.023	1.6	20.4
5 21	15 18.18	-24 53.4	2.746	3.749	2.4	23.0	5 21	15 18.08	-13 56.1	2.020	3.022	3.4	20.6
5 31	15 9.78	-24 11.2	2.773	3.746	5.1	23.2	5 31	15 9.61	-13 9.8	2.053	3.019	7.1	20.8
6 10	15 2.52	-23 28.4	2.828	3.742	7.8	23.4	6 10	15 2.57	-12 32.1	2.112	3.016	10.5	21.0
6 20	14 56.87	-22 48.1	2.908	3.737	10.2	23.5	6 20	14 57.46	-12 5.5	2.194	3.012	13.4	21.2
501113	2013 TL ₁₀		5 14.1 287°13	5°7/10.5 17			25782	2000 CX ₃₈		5 14.1 232°19	0°6/13.7 18		
4 11	15 47.08	- 7 19.1	1.668	2.543	13.6	20.9	4 11	15 51.14	-18 15.4	1.971	2.827	12.7	19.5
4 21	15 42.24	- 6 9.7	1.600	2.537	10.3	20.7	4 21	15 45.15	-17 56.2	1.882	2.814	9.4	19.2
5 1	15 35.27	- 5 1.6	1.555	2.531	7.1	20.5	5 1	15 37.01	-17 30.5	1.817	2.802	5.5	19.0
5 11	15 27.00	- 4 1.2	1.535	2.526	5.7	20.4	5 11	15 27.47	-17 0.3	1.779	2.788	1.4	18.7
5 21	15 18.42	- 3 14.3	1.541	2.520	7.4	20.5	5 21	15 17.48	-16 28.2	1.770	2.774	3.3	18.8
5 31	15 10.59	- 2 45.5	1.572	2.515	10.8	20.7	5 31	15 8.10	-15 58.1	1.788	2.759	7.5	19.0
6 10	15 4.41	- 2 36.9	1.625	2.509	14.2	20.9	6 10	15 0.27	-15 34.1	1.831	2.744	11.4	19.2
6 20	15 0.45	- 2 48.0	1.698	2.504	17.3	21.1	6 20	14 54.62	-15 18.9	1.896	2.728	14.8	19.4
161403	2003 UH ₁₈₁		5 14.1 205°05	2°1/12.7 18			126427	2002 CV ₂		5 14.1 323°06	11°1/18.3 18		
4 11	15 47.72	-13 51.1	2.205	3.065	11.3	20.4	4 11	15 51.35	-40 46.4	1.474	2.279	18.7	18.3
4 21	15 42.30	-13 19.2	2.127	3.062	8.3	20.2	4 21	15 46.96	-42 11.1	1.385	2.258	16.2	18.0
5 1	15 35.15	-12 44.5	2.075	3.059	4.9	20.0	5 1	15 38.91	-43 14.7	1.314	2.237	13.6	17.8
5 11	15 26.96	-12 10.1	2.050	3.055	2.2	19.8	5 11	15 28.07	-43 49.3	1.264	2.216	11.6	17.6
5 21	15 18.52	-11 38.9	2.053	3.051	3.9	19.9	5 21	15 15.97	-43 50.0	1.236	2.196	11.2	17.6
5 31	15 10.66	-11 14.3	2.084	3.047	7.2	20.1	5 31	15 4.61	-43 17.3	1.230	2.177	12.7	17.6
6 10	15 4.13	-10 58.9	2.141	3.043	10.5	20.3	6 10	14 55.85	-42 19.0	1.244	2.159	15.4	17.7
6 20	14 59.42	-10 54.0	2.220	3.038	13.3	20.5	6 20	14 50.86	-41 5.8	1.278	2.142	18.6	17.8
20612	1999 RT ₂₃₇		5 14.1 282°06	5°3/10.3 18			255683	2006 QZ ₅₁		5 14.1 222°43	1°8/15.0 18		
4 11	15 45.37	- 3 23.1	2.306	3.166	10.9	18.0	4 11	15 53.72	-23 56.0	2.073	2.911	12.8	21.6
4 21	15 40.49	- 2 40.4	2.235	3.161	8.4	17.8	4 21	15 47.07	-24 5.9	1.980	2.900	9.7	21.3
5 1	15 34.05	- 2 2.7	2.189	3.156	6.2	17.7	5 1	15 38.17	-24 6.7	1.912	2.888	6.1	21.1
5 11	15 26.69	- 1 33.8	2.170	3.151	5.3	17.6	5 11	15 27.76	-23 58.0	1.871	2.876	2.5	20.8
5 21	15 19.11	- 1 17.1	2.178	3.146	6.5	17.7	5 21	15 16.84	-23 40.9	1.858	2.862	3.1	20.8
5 31	15 12.06	- 1 14.6	2.212	3.141	8.8	17.8	5 31	15 6.51	-23 18.1	1.873	2.848	6.9	21.1
6 10	15 6.20	- 1 27.1	2.270	3.136	11.4	18.0	6 10	14 57.77	-22 54.0	1.915	2.833	10.7	21.2
6 20	15 1.98	- 1 53.8	2.350	3.131	13.7	18.1	6 20	14 51.29	-22 32.8	1.980	2.817	14.0	21.4
340425	2006 FA ₂₇		5 14.1 78°69	0°7/14.4 17			203865	2002 WV ₂₇		5 14.1 330°34	0°4/13.6 18		
4 11	15 49.4												

EPHEMERIDES

5 14.1

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
37639	1993 VR ₁		5 14.1 158°46	1°1/14.6	18		505889	2015 DW ₁₄₉		5 14.1 330°94	3°8/16.5	17	
4 11	15 53.56	-22 2.8	1.718	2.570	14.4	18.5	4 11	15 48.82	-30 30.0	1.602	2.445	15.7	20.3
4 21	15 47.08	-22 4.0	1.647	2.576	10.7	18.3	4 21	15 43.94	-30 13.4	1.524	2.441	12.3	20.1
5 1	15 38.16	-21 55.7	1.599	2.580	6.5	18.1	5 1	15 36.46	-29 37.3	1.468	2.437	8.3	19.8
5 11	15 27.75	-21 38.7	1.577	2.585	2.1	17.8	5 11	15 27.38	-28 41.9	1.435	2.434	4.7	19.6
5 21	15 16.99	-21 15.1	1.583	2.589	3.2	17.9	5 21	15 17.91	-27 30.5	1.428	2.430	4.4	19.6
5 31	15 7.12	-20 48.8	1.615	2.592	7.6	18.2	5 31	15 9.38	-26 9.6	1.447	2.427	8.0	19.8
6 10	14 59.18	-20 24.7	1.672	2.594	11.7	18.4	6 10	15 2.89	-24 47.9	1.491	2.425	12.0	20.0
6 20	14 53.78	-20 6.6	1.751	2.597	15.2	18.6	6 20	14 59.08	-23 32.8	1.555	2.422	15.7	20.2
87261	2000 OQ ₅₅		5 14.1 254°82	2°6/12.5	18		478250	2011 UV ₃₆₅		5 14.1 229°71	0°7/13.6	18	
4 11	15 48.70	-13 45.1	1.922	2.787	12.5	20.0	4 11	15 46.83	-17 29.1	2.760	3.609	9.7	23.0
4 21	15 43.36	-13 5.5	1.836	2.773	9.2	19.7	4 21	15 41.46	-17 8.4	2.668	3.598	7.1	22.8
5 1	15 35.96	-12 22.1	1.774	2.758	5.6	19.5	5 1	15 34.64	-16 43.2	2.602	3.585	4.1	22.6
5 11	15 27.23	-11 38.4	1.738	2.743	2.6	19.3	5 11	15 26.91	-16 15.4	2.564	3.573	1.1	22.4
5 21	15 18.08	-10 58.4	1.730	2.728	4.5	19.4	5 21	15 18.91	-15 47.0	2.556	3.559	2.5	22.5
5 31	15 9.53	-10 26.4	1.749	2.712	8.4	19.6	5 31	15 11.34	-15 20.8	2.577	3.546	5.7	22.7
6 10	15 2.47	-10 5.8	1.792	2.695	12.1	19.7	6 10	15 4.81	-14 59.1	2.625	3.532	8.6	22.8
6 20	14 57.50	-9 58.4	1.857	2.679	15.4	19.9	6 20	14 59.79	-14 44.2	2.697	3.517	11.2	23.0
278819	2008 SS ₂₅₈		5 14.1 259°04	0°3/14.3	18		80971	2000 DX ₁₁₄		5 14.1 242°01	0°2/13.9	18	
4 11	15 48.34	-22 35.1	2.029	2.880	12.5	20.8	4 11	15 50.89	-19 39.8	1.904	2.759	13.1	21.0
4 21	15 43.07	-21 51.1	1.935	2.864	9.3	20.5	4 21	15 45.08	-19 18.5	1.813	2.745	9.7	20.7
5 1	15 35.77	-20 55.2	1.865	2.848	5.6	20.3	5 1	15 37.04	-18 49.1	1.746	2.730	5.7	20.4
5 11	15 27.18	-19 49.9	1.822	2.831	1.4	20.0	5 11	15 27.53	-18 13.3	1.706	2.715	1.4	20.1
5 21	15 18.20	-18 39.1	1.808	2.814	2.9	20.0	5 21	15 17.53	-17 34.2	1.694	2.699	3.2	20.2
5 31	15 9.84	-17 28.2	1.821	2.796	7.1	20.3	5 31	15 8.16	-16 56.1	1.709	2.683	7.6	20.5
6 10	15 2.97	-16 23.2	1.860	2.778	11.0	20.5	6 10	15 0.39	-16 23.4	1.750	2.666	11.6	20.7
6 20	14 58.18	-15 28.5	1.922	2.760	14.3	20.6	6 20	14 54.88	-15 59.9	1.812	2.648	15.1	20.8
474999	2005 TU ₁₅₄		5 14.1 192°58	4°5/ 9.4	18		199077	2005 XA ₆₈		5 14.1 144°82	8°0/19.1	17	
4 11	15 44.76	- 6 7.7	2.741	3.598	9.5	22.0	4 11	15 54.72	-41 11.5	2.047	2.822	15.2	20.0
4 21	15 39.80	- 4 40.8	2.670	3.596	7.2	21.8	4 21	15 48.18	-41 59.1	1.971	2.825	12.9	19.9
5 1	15 33.58	- 3 15.0	2.626	3.594	5.2	21.7	5 1	15 38.96	-42 26.6	1.916	2.829	10.5	19.7
5 11	15 26.62	- 1 54.8	2.612	3.592	4.5	21.7	5 11	15 27.99	-42 30.0	1.884	2.832	8.6	19.6
5 21	15 19.51	- 0 44.7	2.627	3.590	5.8	21.7	5 21	15 16.54	-42 8.3	1.877	2.836	8.1	19.6
5 31	15 12.88	+ 0 11.9	2.669	3.587	8.0	21.9	5 31	15 5.99	-41 24.4	1.896	2.839	9.2	19.7
6 10	15 7.26	+ 0 52.9	2.737	3.584	10.2	22.0	6 10	14 57.51	-40 25.0	1.939	2.841	11.4	19.8
6 20	15 3.04	+ 1 17.9	2.826	3.581	12.3	22.2	6 20	14 51.80	-39 17.8	2.004	2.844	13.7	20.0
316711	1997 GA ₅		5 14.1 152°66	2°1/14.3	17		471688	2012 TU ₂₂₁		5 14.1 257°04	2°2/12.6	17	
4 11	16 8.98	-17 10.2	1.134	1.992	19.8	20.8	4 11	15 46.95	-14 47.1	1.991	2.857	12.1	21.7
4 21	15 59.86	-18 54.5	1.067	1.998	14.9	20.5	4 21	15 41.95	-14 2.4	1.913	2.850	8.9	21.5
5 1	15 46.41	-20 40.9	1.021	2.003	9.0	20.2	5 1	15 35.07	-13 13.2	1.858	2.843	5.3	21.2
5 11	15 29.86	-22 22.4	1.001	2.008	3.1	19.8	5 11	15 27.03	-12 23.1	1.830	2.836	2.3	21.0
5 21	15 12.22	-23 51.7	1.007	2.012	5.0	20.0	5 21	15 18.69	-11 36.3	1.830	2.829	4.2	21.1
5 31	14 55.87	-25 5.9	1.040	2.015	11.0	20.3	5 31	15 10.97	-10 57.0	1.857	2.821	7.8	21.4
6 10	14 42.81	-26 7.2	1.096	2.018	16.5	20.6	6 10	15 4.70	-10 28.7	1.909	2.814	11.4	21.6
6 20	14 34.10	-27 0.8	1.172	2.020	20.9	20.9	6 20	15 0.39	-10 13.2	1.982	2.806	14.5	21.7
302391	2002 CR ₈₀		5 14.1 58°49	5°2/11.8	18		354721	2005 SU ₁₂₂		5 14.1 241°89	4°9/18.3	18	
4 11	15 50.66	- 9 26.3	1.235	2.120	16.7	20.5	4 11	15 48.84	-36 49.2	2.543	3.333	12.1	21.2
4 21	15 45.16	- 8 35.6	1.192	2.136	12.4	20.3	4 21	15 43.25	-36 43.6	2.449	3.325	9.9	21.0
5 1	15 37.04	- 7 47.1	1.170	2.153	7.9	20.1	5 1	15 35.80	-36 21.5	2.378	3.316	7.5	20.8
5 11	15 27.46	- 7 7.2	1.172	2.171	5.3	20.0	5 11	15 27.20	-35 42.0	2.332	3.307	5.5	20.7
5 21	15 17.79	- 6 41.4	1.197	2.188	7.2	20.1	5 21	15 18.31	-34 46.2	2.314	3.298	5.0	20.6
5 31	15 9.38	- 6 33.3	1.246	2.206	11.3	20.4	5 31	15 10.07	-33 37.8	2.324	3.288	6.5	20.7
6 10	15 3.24	- 6 44.0	1.317	2.224	15.3	20.7	6 10	15 3.27	-32 22.2	2.361	3.279	9.0	20.8
6 20	14 59.88	- 7 12.1	1.406	2.242	18.7	21.0	6 20	14 58.44	-31 5.2	2.422	3.269	11.5	21.0
53530	2000 AV ₂₀₀		5 14.1 191°24	17°9/ 4.9	18		474957	2005 TY ₃₃		5 14.1 183°89	3°1/11.5	17	
4 11	15 56.94	+20 50.7	1.390	2.186	20.1	18.3	4 11	15 45.04	-10 7.9	2.576	3.437	9.9	22.0
4 21	15 49.77	+22 28.7	1.350	2.186	18.7	18.2	4 21	15 40.12	- 9 21.5	2.504	3.437	7.3	21.8
5 1	15 39.78	+23 34.0	1.328	2.184	17.9	18.1	5 1	15 33.81	- 8 34.8	2.457	3.437	4.7	21.6
5 11	15 28.14	+23 56.3	1.325	2.183	18.0	18.1	5 11	15 26.70	- 7 51.2	2.438	3.436	3.1	21.5
5 21	15 16.27	+23 30.7	1.340	2.180	19.0	18.2	5 21	15 19.43	- 7 13.8	2.448	3.436	4.4	21.6
5 31	15 5.63	+22 18.2	1.372	2.177	20.6	18.3	5 31	15 12.65	- 6 45.6	2.486	3.435	7.0	21.8
6 10	14 57.35	+20 26.0	1.421	2.173	22.4	18.4	6 10	15 6.96	- 6 28.2	2.550	3.434	9.7	21.9
6 20	14 52.04	+18 3.6	1.484	2.168	24.2	18.6	6 20	15 2.76	- 6 22.6	2.635	3.433	12.0	22.1
349367	2007 VL ₂₃₅		5 14.1 239°36	0°7/13.6	18		312872	2011 UU ₁₆₃		5 14.1 141°57	0°4/14.3	16	
4 11	15 47.20	-18 10.0	2.237	3.094	11.3	21.7	4 11	15 53.06	-21 23.9	1.731	2.585	14.2	22.2
4 21	15 42.00	-17 45.6	2.154	3.087	8.3	21.5	4 21	15 46.58	-21 1.6	1.665	2.595	10.5	21.9
5 1	15 35.04	-17 15.5	2.095	3.080	4.8	21.3	5 1	15 37.80	-20 29.4	1.623	2.605	6.2	21.7
5 11	15 27.01	-16 41.7	2.064	3.072	1.2	21.0	5 11	15 27.68	-19 49.4	1.606	2.615	1.6	21.4
5 21	15 18.68	-16 7.2	2.060	3.065	2.9	21.1	5 21	15 17.34	-19 5.1	1.618	2.623	3.2	21.6
5 31	15 10.91	-15 35.1	2.085	3.057	6.6	21.3	5 31	15 7.95	-18 21.4	1.656	2.631	7.6	21.8
6 10	15 4.45	-15 9.1	2.136	3.049	10.0	21.5	6 10	15 0.47	-17 43.4	1.720	2.639	11.6	22.1
6 20	14 59.82	-14 51.4	2.209	3.040	12.9	21.7	6 20	14 55.45	-17 14.9	1.805	2.646	15.0	22.3
57038	2001 AX ₃₉		5 14.1 277°07	2°6/15.3	18		205495	2001 QF ₂₉₅		5 14.1 246°37	3°2/12.3	16	
4 11													

EPHEMERIDES

5 14.1

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
117689	2005 <i>EY</i> ₂₆₈		5 14.1 287°55	2°1/14.9	18		32317	2000 <i>QE</i> ₄₄		5 14.1 297°99	5°4/17.5	17	
4 11	15 52.21	-22 45.8	1.515	2.375	15.6	19.3	4 11	15 49.56	-34 29.6	2.134	2.944	13.5	19.1
4 21	15 46.70	-23 10.5	1.430	2.362	11.8	19.1	4 21	15 44.16	-34 54.4	2.048	2.937	10.9	18.9
5 1	15 38.30	-23 26.3	1.367	2.348	7.4	18.8	5 1	15 36.52	-35 3.5	1.983	2.930	8.2	18.7
5 11	15 27.90	-23 32.0	1.329	2.335	2.9	18.5	5 11	15 27.44	-34 55.1	1.944	2.924	5.9	18.5
5 21	15 16.74	-23 28.4	1.316	2.321	3.8	18.5	5 21	15 17.91	-34 29.3	1.931	2.917	5.5	18.5
5 31	15 6.31	-23 18.2	1.329	2.308	8.6	18.7	5 31	15 9.05	-33 49.1	1.945	2.910	7.5	18.6
6 10	14 57.93	-23 6.5	1.365	2.295	13.2	18.9	6 10	15 1.84	-32 59.9	1.983	2.904	10.2	18.8
6 20	14 52.45	-22 58.1	1.421	2.282	17.3	19.2	6 20	14 56.91	-32 7.7	2.045	2.897	13.0	18.9
8144	Hiragagennai		5 14.1 115°65	1°4/13.2	18		222275	2000 <i>RW</i> ₉₇		5 14.1 205°07	2°5/16.1	18	
4 11	15 47.48	-15 43.6	2.128	2.989	11.7	17.9	4 11	15 50.70	-29 5.0	2.498	3.318	11.5	20.5
4 21	15 42.17	-15 19.4	2.059	2.994	8.5	17.7	4 21	15 44.49	-28 46.5	2.406	3.312	8.9	20.3
5 1	15 35.12	-14 51.5	2.014	2.999	4.9	17.5	5 1	15 36.50	-28 15.3	2.339	3.305	5.9	20.1
5 11	15 27.04	-14 22.5	1.996	3.004	1.7	17.3	5 11	15 27.41	-27 31.6	2.299	3.298	3.1	19.9
5 21	15 18.75	-13 55.1	2.006	3.008	3.4	17.4	5 21	15 18.04	-26 37.7	2.288	3.289	3.1	19.9
5 31	15 11.12	-13 32.6	2.044	3.013	6.9	17.7	5 31	15 9.29	-25 37.2	2.307	3.281	5.9	20.1
6 10	15 4.88	-13 17.8	2.107	3.017	10.3	17.9	6 10	15 1.91	-24 35.2	2.353	3.271	8.9	20.2
6 20	15 0.51	-13 12.1	2.193	3.021	13.1	18.1	6 20	14 56.42	-23 36.5	2.423	3.261	11.7	20.4
352107	2007 <i>BF</i> ₂₀		5 14.1 63°26	8°8/ 8.4	18		479012	2012 <i>XK</i> ₁₅₁		5 14.1 239°32	5°8/10.6	17	
4 11	15 47.40	+ 9 41.9	2.350	3.174	12.0	20.1	4 11	15 47.40	- 1 4.1	2.273	3.127	11.3	21.2
4 21	15 41.87	+10 22.4	2.297	3.177	10.3	20.0	4 21	15 41.99	- 0 34.8	2.206	3.126	8.9	21.0
5 1	15 34.85	+10 48.3	2.268	3.181	9.1	19.9	5 1	15 34.99	- 0 12.9	2.164	3.125	6.7	20.9
5 11	15 26.97	+10 55.6	2.264	3.185	8.9	19.9	5 11	15 27.05	- 0 1.9	2.148	3.124	5.8	20.8
5 21	15 18.96	+10 41.8	2.284	3.189	9.7	19.9	5 21	15 18.89	- 0 4.5	2.159	3.122	6.9	20.9
5 31	15 11.58	+10 6.7	2.329	3.192	11.2	20.1	5 31	15 11.31	- 0 22.0	2.197	3.121	9.1	21.0
6 10	15 5.44	+ 9 11.9	2.396	3.196	13.0	20.2	6 10	15 4.97	- 0 54.2	2.259	3.120	11.6	21.2
6 20	15 0.97	+ 8 0.6	2.483	3.200	14.7	20.3	6 20	15 0.34	- 1 39.8	2.342	3.119	13.9	21.3
191680	2004 <i>RE</i> ₆₇		5 14.1 265°46	2°0/12.9	18		306147	2010 <i>KE</i> ₅₄		5 14.1 161°90	0°9/14.8	18	
4 11	15 49.12	-15 5.2	2.011	2.872	12.2	21.2	4 11	15 46.17	-23 40.5	2.448	3.292	10.9	20.6
4 21	15 43.70	-14 30.3	1.915	2.850	9.0	21.0	4 21	15 41.12	-23 13.3	2.369	3.293	8.1	20.4
5 1	15 36.22	-13 50.5	1.843	2.827	5.4	20.7	5 1	15 34.49	-22 37.1	2.315	3.295	4.9	20.2
5 11	15 27.36	-13 8.7	1.797	2.804	2.1	20.5	5 11	15 26.92	-21 53.4	2.289	3.296	1.6	20.0
5 21	15 18.01	-12 28.6	1.780	2.780	4.0	20.5	5 21	15 19.17	-21 4.9	2.291	3.297	2.4	20.1
5 31	15 9.16	-11 54.4	1.790	2.756	8.0	20.7	5 31	15 12.00	-20 15.4	2.322	3.298	5.7	20.3
6 10	15 1.72	-11 29.7	1.826	2.731	11.8	20.9	6 10	15 6.08	-19 28.8	2.379	3.298	8.8	20.5
6 20	14 56.33	-11 17.0	1.882	2.706	15.2	21.1	6 20	15 1.87	-18 48.4	2.460	3.299	11.5	20.7
178418	1998 <i>RD</i> ₇₈		5 14.1 233°29	1°6/13.2	17		338109	2002 <i>QJ</i> ₃₁		5 14.1 112°37	3°6/11.9	17	
4 11	15 50.65	-15 48.2	1.958	2.817	12.6	21.0	4 11	15 47.62	- 9 43.8	1.994	2.860	12.1	20.5
4 21	15 44.79	-15 20.7	1.871	2.805	9.3	20.7	4 21	15 42.35	- 9 8.8	1.927	2.863	9.0	20.3
5 1	15 36.83	-14 48.3	1.808	2.793	5.5	20.5	5 1	15 35.28	- 8 34.7	1.885	2.866	5.7	20.1
5 11	15 27.50	-14 13.7	1.772	2.779	1.9	20.2	5 11	15 27.12	- 8 5.0	1.869	2.868	3.7	20.0
5 21	15 17.75	-13 40.1	1.764	2.766	3.8	20.3	5 21	15 18.75	- 7 43.2	1.881	2.871	5.2	20.1
5 31	15 8.61	-13 11.6	1.784	2.751	7.8	20.5	5 31	15 11.06	- 7 32.1	1.919	2.873	8.3	20.3
6 10	15 0.99	-12 51.6	1.829	2.736	11.7	20.7	6 10	15 4.79	- 7 33.4	1.981	2.876	11.5	20.5
6 20	14 55.51	-12 42.4	1.895	2.721	15.0	20.9	6 20	15 0.46	- 7 47.3	2.065	2.878	14.4	20.7
241697	2000 <i>SG</i> ₁₃₉		5 14.1 261°51	0°8/13.7	17		281009	2006 <i>DN</i> ₂₀₈		5 14.1 184°98	1°0/14.7	17	
4 11	15 50.30	-19 50.0	1.581	2.447	14.7	20.4	4 11	15 49.11	-22 43.1	1.994	2.845	12.8	21.2
4 21	15 45.03	-19 6.2	1.494	2.431	10.9	20.1	4 21	15 43.61	-22 31.7	1.917	2.845	9.5	21.0
5 1	15 37.18	-18 10.9	1.429	2.415	6.4	19.8	5 1	15 36.10	-22 10.8	1.864	2.845	5.7	20.8
5 11	15 27.61	-17 7.1	1.389	2.398	1.6	19.4	5 11	15 27.34	-21 41.9	1.837	2.845	1.9	20.5
5 21	15 17.49	-15 59.8	1.376	2.381	3.9	19.5	5 21	15 18.29	-21 7.3	1.838	2.844	2.8	20.6
5 31	15 8.10	-14 55.9	1.389	2.363	8.9	19.8	5 31	15 9.94	-20 30.9	1.867	2.844	6.7	20.8
6 10	15 0.60	-14 1.9	1.425	2.345	13.5	20.0	6 10	15 3.15	-19 57.1	1.920	2.843	10.4	21.0
6 20	14 55.72	-13 22.4	1.482	2.327	17.5	20.2	6 20	14 58.49	-19 29.6	1.997	2.842	13.6	21.3
518971	2010 <i>HE</i> ₅₃		5 14.1 113°33	3°6/11.7	17		109266	2001 <i>QL</i> ₁₁₀		5 14.1 147°49	4°5/21.2	17	
4 11	15 48.33	-10 9.8	2.079	2.942	11.8	21.5	4 11	15 44.18	-46 54.8	5.225	5.925	7.4	21.5
4 21	15 42.67	- 9 19.5	2.022	2.956	8.7	21.4	4 21	15 39.19	-47 9.6	5.140	5.931	6.4	21.4
5 1	15 35.35	- 8 29.5	1.990	2.970	5.5	21.2	5 1	15 33.19	-47 13.8	5.078	5.936	5.5	21.3
5 11	15 27.10	- 7 43.8	1.986	2.984	3.6	21.1	5 11	15 26.61	-47 6.8	5.040	5.941	4.8	21.3
5 21	15 18.75	- 7 6.3	2.010	2.998	5.1	21.2	5 21	15 19.89	-46 48.7	5.029	5.946	4.5	21.3
5 31	15 11.13	- 6 40.2	2.060	3.011	8.1	21.4	5 31	15 13.52	-46 20.5	5.045	5.951	4.8	21.3
6 10	15 4.95	- 6 27.3	2.136	3.024	11.1	21.6	6 10	15 7.93	-45 44.2	5.087	5.956	5.5	21.4
6 20	15 0.62	- 6 27.9	2.233	3.036	13.7	21.8	6 20	15 3.44	-45 2.4	5.154	5.960	6.4	21.4
257916	2000 <i>VC</i> ₅₆		5 14.1 194°13	1°5/15.6	18		475633	2006 <i>UX</i> ₂₃₆		5 14.1 115°27	1°5/13.1	17	
4 11	15 46.71	-26 39.0	2.978	3.804	9.7	20.6	4 11	15 46.25	-15 55.0	2.190	3.052	11.3	21.7
4 21	15 41.29	-26 13.1	2.890	3.802	7.3	20.4	4 21	15 41.28	-15 22.6	2.117	3.053	8.3	21.5
5 1	15 34.50	-25 37.6	2.827	3.799	4.6	20.3	5 1	15 34.63	-14 45.9	2.068	3.054	4.8	21.3
5 11	15 26.91	-24 53.6	2.793	3.796	2.1	20.1	5 11	15 26.97	-14 7.9	2.047	3.054	1.7	21.1
5 21	15 19.14	-24 3.3	2.788	3.792	2.3	20.1	5 21	15 19.10	-13 31.8	2.054	3.055	3.4	21.2
5 31	15 11.87	-23 9.8	2.813	3.788	4.9	20.3	5 31	15 11.84	-13 0.8	2.088	3.055	6.9	21.4
6 10	15 5.67	-22 16.7	2.866	3.783	7.6	20.4	6 10	15 5.89	-12 38.1	2.147	3.056	10.1	21.6
6 20	15 0.96	-21 27.4	2.944	3.778	10.0	20.6	6 20	15 1.74	-12 25.3	2.229	3.057	13.0	21.8
462214	2007 <i>VK</i> ₂₂₀		5										

EPHEMERIDES

5 14.1

5 14.1

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
55025	2001 <i>QF</i> ₄₀		5 14.1 244°69	0°8/14.6	18	R	176435	2001 <i>WC</i> ₁₈		5 14.1 179°01	0°2/13.9	18	
4 11	15 48.09	-22 4.6	2.195	3.045	11.8	19.6	4 11	15 46.61	-20 9.5	2.694	3.541	10.0	20.7
4 21	15 42.76	-21 55.1	2.111	3.038	8.8	19.4	4 21	15 41.29	-19 33.9	2.614	3.542	7.3	20.6
5 1	15 35.58	-21 37.6	2.050	3.031	5.3	19.2	5 1	15 34.55	-18 51.8	2.560	3.543	4.2	20.4
5 11	15 27.22	-21 13.0	2.017	3.024	1.6	18.9	5 11	15 26.98	-18 5.3	2.535	3.544	1.0	20.1
5 21	15 18.54	-20 43.6	2.011	3.017	2.6	19.0	5 21	15 19.24	-17 17.1	2.539	3.544	2.3	20.2
5 31	15 10.43	-20 12.6	2.033	3.010	6.3	19.2	5 31	15 12.03	-16 30.6	2.572	3.543	5.5	20.4
6 10	15 3.71	-19 43.8	2.082	3.002	9.8	19.4	6 10	15 5.94	-15 49.0	2.632	3.542	8.5	20.6
6 20	14 58.92	-19 20.5	2.153	2.994	12.9	19.6	6 20	15 1.39	-15 14.8	2.716	3.541	11.0	20.8
309867	2009 <i>DE</i> ₈₀		5 14.1 161°97	3°4/12.2	18		507816	2014 <i>DK</i> ₅₉		5 14.1 93°46	7°4/8.2	17	
4 11	15 51.92	-11 40.0	1.805	2.668	13.3	21.2	4 11	15 45.18	+ 2 10.0	2.218	3.070	11.6	21.1
4 21	15 45.62	-10 55.0	1.739	2.674	9.8	21.0	4 21	15 40.39	+ 3 21.7	2.161	3.072	9.4	20.9
5 1	15 37.23	-10 8.6	1.698	2.680	6.1	20.8	5 1	15 34.07	+ 4 24.6	2.130	3.075	7.8	20.8
5 11	15 27.61	-9 24.8	1.683	2.685	3.5	20.6	5 11	15 26.86	+ 5 13.2	2.124	3.077	7.5	20.8
5 21	15 17.76	-8 48.2	1.695	2.689	5.2	20.7	5 21	15 19.50	+ 5 43.8	2.143	3.079	8.6	20.9
5 31	15 8.74	-8 22.5	1.735	2.692	8.9	20.9	5 31	15 12.73	+ 5 54.0	2.188	3.082	10.6	21.0
6 10	15 1.43	-8 10.4	1.799	2.695	12.5	21.2	6 10	15 7.19	+ 5 44.1	2.255	3.084	12.8	21.2
6 20	14 56.35	-8 12.5	1.884	2.697	15.6	21.4	6 20	15 3.33	+ 5 15.7	2.341	3.086	14.8	21.3
521188	2015 <i>FX</i> ₄₁₁		5 14.1 0°74	5°1/10.6	17		391354	2006 <i>UC</i> ₂₅₇		5 14.1 128°94	0°1/14.2	18	
4 11	15 45.41	- 7 34.0	1.856	2.729	12.6	21.2	4 11	15 47.02	-20 30.8	2.490	3.339	10.6	21.5
4 21	15 40.84	- 6 27.7	1.792	2.729	9.5	21.0	4 21	15 41.65	-20 6.8	2.420	3.348	7.8	21.3
5 1	15 34.44	- 5 22.9	1.752	2.728	6.5	20.8	5 1	15 34.78	-19 36.2	2.374	3.357	4.5	21.1
5 11	15 26.94	- 4 25.2	1.737	2.728	5.1	20.7	5 11	15 27.03	-19 1.0	2.357	3.365	1.1	20.9
5 21	15 19.22	- 3 39.7	1.749	2.728	6.7	20.8	5 21	15 19.14	-18 23.6	2.368	3.373	2.4	21.0
5 31	15 12.18	- 3 10.2	1.786	2.729	9.7	21.0	5 31	15 11.84	-17 47.3	2.408	3.381	5.7	21.2
6 10	15 6.62	- 2 58.6	1.847	2.730	12.8	21.2	6 10	15 5.78	-17 15.2	2.475	3.389	8.7	21.4
6 20	15 3.01	- 3 4.6	1.927	2.731	15.6	21.4	6 20	15 1.37	-16 49.8	2.565	3.396	11.4	21.6
150559	2000 <i>SA</i> ₂₃₆		5 14.1 339°49	1°7/14.9	17		23659	1997 <i>EH</i>		5 14.1 73°98	1°1/13.6	18	
4 11	15 47.48	-22 45.2	1.368	2.240	16.2	19.7	4 11	15 51.75	-16 52.4	1.464	2.335	15.4	18.3
4 21	15 43.32	-22 53.5	1.292	2.230	12.2	19.4	4 21	15 45.90	-16 39.4	1.408	2.348	11.2	18.1
5 1	15 36.34	-22 50.7	1.237	2.221	7.5	19.1	5 1	15 37.55	-16 21.1	1.374	2.361	6.5	17.9
5 11	15 27.47	-22 37.1	1.205	2.212	2.7	18.8	5 11	15 27.73	-15 59.9	1.365	2.374	1.8	17.6
5 21	15 17.99	-22 14.9	1.198	2.205	3.7	18.9	5 21	15 17.69	-15 39.3	1.382	2.387	3.9	17.8
5 31	15 9.37	-21 48.5	1.215	2.198	8.7	19.1	5 31	15 8.72	-15 23.3	1.425	2.400	8.6	18.1
6 10	15 2.87	-21 23.9	1.254	2.192	13.5	19.4	6 10	15 1.83	-15 15.4	1.491	2.412	12.9	18.3
6 20	14 59.26	-21 5.9	1.313	2.187	17.6	19.6	6 20	14 57.60	-15 17.8	1.577	2.425	16.4	18.6
359930	2011 <i>WN</i> ₁₅₂		5 14.1 44°92	3°5/16.7	17		221469	2006 <i>BW</i> ₁₄₁		5 14.1 301°38	5°9/8.9	16	
4 11	15 47.55	-30 39.9	2.320	3.143	12.2	20.6	4 11	15 43.65	- 0 21.3	2.544	3.398	10.2	20.4
4 21	15 42.70	-30 42.3	2.240	3.144	9.5	20.5	4 21	15 39.16	+ 0 38.6	2.479	3.396	8.1	20.3
5 1	15 35.40	-30 31.5	2.183	3.145	6.6	20.3	5 1	15 33.32	+ 1 32.4	2.439	3.393	6.5	20.2
5 11	15 27.18	-30 7.5	2.153	3.146	4.1	20.1	5 11	15 26.69	+ 2 15.9	2.426	3.391	6.0	20.1
5 21	15 18.69	-29 31.7	2.150	3.147	3.8	20.1	5 21	15 19.90	+ 2 45.6	2.440	3.388	7.0	20.2
5 31	15 10.85	-28 47.3	2.174	3.148	6.2	20.3	5 31	15 13.58	+ 2 59.3	2.480	3.386	9.0	20.3
6 10	15 4.44	-27 59.2	2.225	3.149	9.1	20.4	6 10	15 8.32	+ 2 56.6	2.543	3.384	11.1	20.5
6 20	14 59.98	-27 12.1	2.299	3.150	11.9	20.6	6 20	15 4.50	+ 2 38.3	2.627	3.382	13.1	20.6
42932	1999 <i>TF</i> ₁₉		5 14.1 260°11	0°4/13.9	18		264635	2001 <i>WD</i> ₅₅		5 14.1 184°61	0°1/14.1	17	
4 11	15 51.79	-16 55.4	2.033	2.888	12.4	19.7	4 11	15 50.44	-19 43.5	1.997	2.851	12.6	21.6
4 21	15 45.70	-17 7.6	1.941	2.872	9.2	19.4	4 21	15 44.56	-19 27.2	1.921	2.851	9.3	21.4
5 1	15 37.44	-17 16.9	1.873	2.857	5.4	19.2	5 1	15 36.66	-19 3.8	1.868	2.851	5.5	21.2
5 11	15 27.72	-17 23.7	1.832	2.841	1.3	18.9	5 11	15 27.53	-18 34.9	1.842	2.851	1.3	20.9
5 21	15 17.46	-17 29.3	1.819	2.824	3.1	19.0	5 21	15 18.09	-18 3.3	1.844	2.850	2.9	21.0
5 31	15 7.71	-17 35.6	1.835	2.808	7.2	19.2	5 31	15 9.36	-17 32.6	1.874	2.848	7.0	21.3
6 10	14 59.43	-17 45.0	1.876	2.791	11.0	19.4	6 10	15 2.18	-17 6.8	1.930	2.846	10.7	21.5
6 20	14 53.28	-17 59.4	1.939	2.774	14.4	19.6	6 20	14 57.12	-16 48.9	2.008	2.844	13.9	21.7
172529	2003 <i>TK</i> ₂₆		5 14.1 162°17	1°6/13.4	18		408148	2013 <i>CB</i> ₁₁₆		5 14.1 348°10	3°7/12.7	17	
4 11	15 53.17	-14 54.1	1.661	2.525	14.3	20.3	4 11	15 48.08	-12 41.3	1.078	1.973	17.8	20.6
4 21	15 46.83	-14 49.6	1.592	2.528	10.5	20.1	4 21	15 44.05	-12 14.2	1.016	1.967	13.2	20.4
5 1	15 38.09	-14 42.3	1.546	2.531	6.1	19.8	5 1	15 36.88	-11 45.1	0.973	1.962	8.0	20.0
5 11	15 27.86	-14 34.2	1.526	2.534	2.0	19.6	5 11	15 27.64	-11 19.2	0.952	1.958	3.9	19.7
5 21	15 17.27	-14 27.8	1.533	2.536	4.0	19.7	5 21	15 17.84	-11 1.8	0.954	1.955	6.3	19.8
5 31	15 7.54	-14 26.0	1.567	2.538	8.4	20.0	5 31	15 9.12	-10 57.8	0.978	1.952	11.6	20.1
6 10	14 59.68	-14 31.4	1.625	2.539	12.5	20.2	6 10	15 2.84	-11 10.3	1.021	1.951	16.6	20.4
6 20	14 54.32	-14 45.7	1.704	2.540	15.9	20.4	6 20	14 59.79	-11 39.4	1.082	1.951	20.9	20.6
17111	1999 <i>JH</i> ₅₂		5 14.1 261°41	2°1/15.7	18		275361	2011 <i>AC</i> ₃₃		5 14.1 241°39	0°1/14.2	17	
4 11	15 47.34	-27 6.8	2.324	3.159	11.7	17.4	4 11	15 50.45	-19 32.0	1.667	2.530	14.2	21.2
4 21	15 42.21	-26 49.2	2.232	3.148	8.9	17.2	4 21	15 44.92	-19 25.5	1.594	2.530	10.5	21.0
5 1	15 35.26	-26 19.8	2.163	3.136	5.8	17.0	5 1	15 37.02	-19 11.5	1.544	2.529	6.2	20.7
5 11	15 27.17	-25 39.1	2.122	3.125	2.7	16.8	5 11	15 27.64	-18 51.7	1.520	2.529	1.5	20.4
5 21	15 18.76	-24 49.5	2.109	3.113	2.9	16.8	5 21	15 17.87	-18 28.7	1.522	2.528	3.3	20.5
5 31	15 10.92	-23 54.8	2.124	3.101	6.1	17.0	5 31	15 8.91	-18 6.4	1.551	2.528	7.9	20.8
6 10	15 4.42	-22 59.8	2.165	3.089	9.4	17.1	6 10	15 1.78	-17 49.0	1.603	2.527	12.0	21.1
6 20	14 59.81	-22 9.1	2.230	3.077	12.3	17.3	6 20	14 57.12	-17 39.6	1.677	2.526	15.6	21.3
350334	2012 <i>UZ</i> ₉₇		5 14.1 306°32	4°9/17.2	18		192672	1999 <i>RW</i> ₂₁₉					

EPHEMERIDES

5 14.1

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
285805	2000 YV ₂₇		5 14.1 177°25	1°6/13.2	17		356769	2011 UR ₂₇₅		5 14.1 74°81	1°0/14.9	17	
4 11	15 49.13	-15 7.7	2.087	2.947	11.9	21.5	4 11	15 46.68	-23 16.6	2.298	3.145	11.4	21.3
4 21	15 43.47	-14 45.6	2.014	2.948	8.7	21.3	4 21	15 41.58	-22 59.9	2.227	3.153	8.5	21.1
5 1	15 35.97	-14 20.2	1.965	2.949	5.1	21.0	5 1	15 34.82	-22 34.6	2.181	3.161	5.1	20.9
5 11	15 27.36	-13 53.9	1.942	2.950	1.8	20.8	5 11	15 27.10	-22 2.0	2.162	3.169	1.7	20.7
5 21	15 18.49	-13 29.6	1.949	2.950	3.6	20.9	5 21	15 19.19	-21 24.7	2.171	3.177	2.5	20.8
5 31	15 10.27	-13 10.5	1.982	2.950	7.2	21.2	5 31	15 11.93	-20 46.1	2.208	3.185	5.9	21.0
6 10	15 3.48	-12 59.1	2.042	2.949	10.6	21.4	6 10	15 6.01	-20 10.0	2.271	3.193	9.1	21.2
6 20	14 58.64	-12 57.1	2.123	2.949	13.6	21.6	6 20	15 1.88	-19 39.5	2.357	3.200	11.8	21.4
38886	2000 SW ₁₂₆		5 14.1 236°76	2°9/11.8	18		414179	2008 CA ₄		5 14.2 114°34	1°0/13.6	17	
4 11	15 45.82	-10 31.5	2.635	3.493	9.8	19.9	4 11	15 52.59	-17 13.4	1.714	2.575	14.0	21.7
4 21	15 40.78	-9 53.2	2.550	3.482	7.2	19.7	4 21	15 46.23	-16 56.3	1.654	2.589	10.2	21.5
5 1	15 34.31	-9 14.2	2.491	3.471	4.6	19.5	5 1	15 37.65	-16 33.8	1.618	2.603	5.9	21.3
5 11	15 26.95	-8 37.7	2.460	3.459	2.9	19.3	5 11	15 27.79	-16 8.3	1.608	2.616	1.6	21.0
5 21	15 19.35	-8 6.4	2.457	3.447	4.2	19.4	5 21	15 17.76	-15 42.9	1.626	2.630	3.5	21.2
5 31	15 12.19	-7 43.0	2.483	3.434	6.9	19.6	5 31	15 8.67	-15 21.4	1.670	2.642	7.8	21.5
6 10	15 6.07	-7 29.7	2.535	3.422	9.6	19.7	6 10	15 1.43	-15 7.3	1.739	2.655	11.7	21.7
6 20	15 1.44	-7 27.2	2.609	3.409	12.1	19.9	6 20	14 56.58	-15 2.6	1.830	2.666	15.0	22.0
522981	2016 PJ ₁₁₈		5 14.1 139°96	0°4/14.4	17		478071	2011 UJ ₉		5 14.2 217°90	0°7/14.6	18	
4 11	15 49.79	-19 38.6	2.252	3.101	11.5	21.5	4 11	15 49.25	-20 54.4	2.752	3.591	10.0	21.9
4 21	15 43.91	-19 49.2	2.176	3.105	8.5	21.3	4 21	15 43.34	-21 5.1	2.662	3.584	7.4	21.7
5 1	15 36.23	-19 54.7	2.126	3.108	5.0	21.1	5 1	15 35.86	-21 10.8	2.597	3.577	4.5	21.5
5 11	15 27.43	-19 55.7	2.103	3.111	1.3	20.9	5 11	15 27.38	-21 11.7	2.561	3.568	1.4	21.3
5 21	15 18.34	-19 53.3	2.109	3.114	2.5	21.0	5 21	15 18.58	-21 8.8	2.555	3.560	2.2	21.3
5 31	15 9.86	-19 49.8	2.142	3.117	6.2	21.2	5 31	15 10.21	-21 3.8	2.578	3.551	5.4	21.5
6 10	15 2.76	-19 47.7	2.203	3.120	9.5	21.4	6 10	15 2.95	-20 59.0	2.628	3.542	8.3	21.7
6 20	14 57.56	-19 49.2	2.286	3.123	12.4	21.6	6 20	14 57.28	-20 56.5	2.703	3.533	10.9	21.9
25193	Taliagreene		5 14.1 167°77	2°4/12.7	18		93981	2000 XU ₁₁		5 14.2 215°21	7°1/18.4	18	
4 11	15 48.39	-12 42.8	2.067	2.930	11.9	18.9	4 11	15 53.32	-38 5.6	1.962	2.756	15.1	18.6
4 21	15 42.93	-12 18.4	1.996	2.931	8.7	18.7	4 21	15 47.24	-38 43.8	1.881	2.754	12.6	18.4
5 1	15 35.66	-11 52.7	1.949	2.933	5.2	18.5	5 1	15 38.51	-39 3.0	1.821	2.752	9.9	18.2
5 11	15 27.29	-11 28.5	1.929	2.934	2.5	18.3	5 11	15 28.07	-38 59.9	1.785	2.750	7.7	18.1
5 21	15 18.67	-11 8.6	1.937	2.934	4.1	18.4	5 21	15 17.10	-38 33.8	1.774	2.747	7.2	18.1
5 31	15 10.70	-10 56.0	1.972	2.935	7.6	18.7	5 31	15 6.98	-37 48.0	1.789	2.745	8.7	18.2
6 10	15 4.15	-10 52.8	2.033	2.936	10.9	18.9	6 10	14 58.83	-36 48.9	1.828	2.742	11.3	18.3
6 20	14 59.51	-10 59.9	2.115	2.936	13.8	19.1	6 20	14 53.39	-35 44.3	1.890	2.740	14.1	18.5
309196	2007 EY ₁₂₉		5 14.1 237°68	3°5/16.1	18		54312	2000 JZ ₇₃		5 14.2 31°46	2°6/12.9	18	
4 11	15 52.39	-28 45.9	2.046	2.874	13.4	20.9	4 11	15 49.02	-14 8.7	1.490	2.367	14.9	18.8
4 21	15 46.28	-29 1.7	1.953	2.862	10.4	20.7	4 21	15 43.95	-13 39.3	1.428	2.370	10.9	18.5
5 1	15 37.85	-29 5.0	1.884	2.850	7.1	20.5	5 1	15 36.47	-13 6.7	1.388	2.374	6.5	18.3
5 11	15 27.87	-28 54.5	1.840	2.837	4.1	20.3	5 11	15 27.54	-12 34.6	1.372	2.379	2.7	18.1
5 21	15 17.35	-28 30.8	1.824	2.824	4.1	20.2	5 21	15 18.31	-12 7.4	1.382	2.383	4.8	18.2
5 31	15 7.45	-27 56.9	1.836	2.810	7.1	20.4	5 31	15 10.00	-11 49.2	1.418	2.388	9.2	18.5
6 10	14 59.19	-27 17.9	1.874	2.796	10.7	20.6	6 10	15 3.61	-11 43.1	1.476	2.393	13.3	18.7
6 20	14 53.27	-26 39.3	1.934	2.781	13.9	20.7	6 20	14 59.74	-11 50.3	1.554	2.398	16.8	19.0
381144	2007 EU ₂₁₉		5 14.1 309°70	3°1/17.2	18		61627	2000 QD ₁₀₂		5 14.2 281°48	5°4/10.4	18	
4 11	15 44.95	-33 37.1	4.340	5.128	7.5	20.8	4 11	15 45.80	-4 10.1	2.187	3.049	11.3	18.7
4 21	15 39.85	-34 7.7	4.248	5.124	6.1	20.7	4 21	15 40.98	-3 20.9	2.115	3.042	8.7	18.5
5 1	15 33.67	-34 30.7	4.181	5.120	4.5	20.5	5 1	15 34.51	-2 35.9	2.067	3.035	6.4	18.4
5 11	15 26.80	-34 45.5	4.142	5.116	3.3	20.5	5 11	15 27.05	-1 59.5	2.045	3.028	5.4	18.3
5 21	15 19.70	-34 52.0	4.133	5.112	3.2	20.4	5 21	15 19.34	-1 35.4	2.051	3.021	6.6	18.4
5 31	15 12.86	-34 51.2	4.152	5.108	4.2	20.5	5 31	15 12.17	-1 26.3	2.083	3.014	9.2	18.5
6 10	15 6.74	-34 44.6	4.199	5.104	5.7	20.6	6 10	15 6.24	-1 33.1	2.138	3.007	11.9	18.7
6 20	15 1.70	-34 34.3	4.272	5.100	7.2	20.7	6 20	15 2.04	-1 55.2	2.214	3.000	14.4	18.8
377807	2006 AG ₈₂		5 14.1 231°58	6°9/ 9.7	18		507551	2012 XK ₁₄₈		5 14.2 357°32	4°4/11.7	17	
4 11	15 49.58	+ 0 3.2	2.100	2.951	12.2	20.9	4 11	15 47.70	- 6 39.4	2.030	2.894	12.0	20.8
4 21	15 43.80	+ 0 54.7	2.025	2.940	9.8	20.7	4 21	15 42.44	- 6 15.0	1.962	2.894	9.0	20.6
5 1	15 36.19	+ 1 38.6	1.973	2.928	7.7	20.6	5 1	15 35.40	- 5 54.4	1.918	2.894	6.1	20.4
5 11	15 27.43	+ 2 10.1	1.948	2.916	6.9	20.5	5 11	15 27.27	- 5 41.0	1.900	2.893	4.4	20.3
5 21	15 18.35	+ 2 25.0	1.950	2.904	8.2	20.5	5 21	15 18.89	- 5 37.6	1.909	2.893	5.7	20.4
5 31	15 9.84	+ 2 21.1	1.977	2.891	10.6	20.7	5 31	15 11.15	- 5 46.2	1.945	2.893	8.6	20.5
6 10	15 2.68	+ 1 58.1	2.028	2.877	13.2	20.8	6 10	15 4.79	- 6 7.4	2.005	2.893	11.7	20.7
6 20	14 57.42	+ 1 17.6	2.099	2.863	15.7	21.0	6 20	15 0.32	- 6 40.7	2.086	2.894	14.4	20.9
366565	2002 RR ₂₅₄		5 14.1 299°94	1°3/13.5	17		209987	2006 HG ₈₄		5 14.2 267°14	3°6/12.8	17	
4 11	15 48.48	-17 50.0	1.427	2.304	15.4	21.4	4 11	15 52.84	-10 27.6	1.449	2.321	15.4	20.3
4 21	15 44.03	-17 19.2	1.338	2.281	11.4	21.1	4 21	15 46.92	-10 19.8	1.379	2.319	11.5	20.0
5 1	15 36.82	-16 39.1	1.270	2.258	6.8	20.8	5 1	15 38.33	-10 13.9	1.332	2.316	7.1	19.8
5 11	15 27.67	-15 53.0	1.227	2.235	1.9	20.4	5 11	15 28.03	-10 13.1	1.310	2.313	3.7	19.6
5 21	15 17.78	-15 5.4	1.208	2.213	4.4	20.5	5 21	15 17.25	-10 20.2	1.313	2.311	5.6	19.7
5 31	15 8.55	-14 22.6	1.214	2.190	9.7	20.8	5 31	15 7.35	-10 37.6	1.342	2.308	10.0	19.9
6 10	15 1.28	-13 50.4	1.242	2.168	14.6	21.0	6 10	14 59.50	-11 6.6	1.393	2.305	14.3	20.1
6 20	14 56.80	-13 32.8	1.290	2.146	18.9	21.2	6 20	14 54.39	-11 47.0	1.464	2.303	18.0	20.4
51671	2001 KP ₆		5 14.1 43°53	1°4/13.4	18		512936	2017 BE ₆		5 14.2 322°99	4°0/10.2	18	
4 11	15 49.14	-17 39.2	1.308										

EPHEMERIDES

5 14.2

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
203217	2001 FX ₉		5 14.2 77°85	2°6/13.1	17		434264	2003 UA ₃₀₁		5 14.2 180°26	1°3/13.1	17	
4 11	16 2.31	-16 39.7	1.009	1.885	20.3	21.0	4 11	15 47.52	-18 2.0	2.151	3.009	11.7	21.2
4 21	15 53.65	-15 42.2	0.984	1.927	14.6	20.8	4 21	15 42.26	-17 5.9	2.076	3.010	8.5	21.0
5 1	15 41.89	-14 38.3	0.980	1.967	8.4	20.6	5 1	15 35.26	-16 2.7	2.025	3.010	4.9	20.7
5 11	15 28.76	-13 34.5	1.000	2.007	2.9	20.4	5 11	15 27.25	-14 55.8	2.002	3.010	1.6	20.5
5 21	15 16.12	-12 38.4	1.044	2.046	5.6	20.7	5 21	15 19.04	-13 49.8	2.008	3.010	3.4	20.6
5 31	15 5.60	-11 56.6	1.112	2.083	10.9	21.1	5 31	15 11.49	-12 49.3	2.042	3.010	7.0	20.9
6 10	14 58.22	-11 33.0	1.201	2.119	15.6	21.5	6 10	15 5.32	-11 58.7	2.102	3.009	10.4	21.1
6 20	14 54.27	-11 27.8	1.309	2.154	19.3	21.8	6 20	15 1.02	-11 20.5	2.184	3.008	13.3	21.3
237256	2008 WZ ₇₈		5 14.2 128°83	2°2/12.8	17		217114	2001 YH ₁₁₅		5 14.2 166°87	2°1/15.7	17	
4 11	15 47.50	-14 34.0	1.936	2.802	12.4	21.3	4 11	15 51.84	-26 57.9	2.566	3.389	11.1	20.7
4 21	15 42.41	-13 56.0	1.865	2.803	9.1	21.1	4 21	15 45.25	-26 53.0	2.486	3.396	8.5	20.5
5 1	15 35.42	-13 14.4	1.818	2.803	5.4	20.9	5 1	15 36.96	-26 37.8	2.432	3.401	5.5	20.3
5 11	15 27.29	-12 32.5	1.798	2.804	2.3	20.7	5 11	15 27.66	-26 12.6	2.405	3.406	2.7	20.2
5 21	15 18.91	-11 54.2	1.805	2.805	4.1	20.8	5 21	15 18.15	-25 39.0	2.408	3.410	2.8	20.2
5 31	15 11.23	-11 23.5	1.839	2.805	7.8	21.0	5 31	15 9.26	-25 0.2	2.440	3.413	5.6	20.4
6 10	15 5.03	-11 3.3	1.898	2.806	11.3	21.2	6 10	15 1.73	-24 20.0	2.500	3.416	8.6	20.5
6 20	15 0.84	-10 55.2	1.978	2.806	14.4	21.4	6 20	14 56.03	-23 42.4	2.584	3.418	11.2	20.7
205563	2001 SS ₂₉₅		5 14.2 274°82	0°3/14.4	18		33861	Boucvalt		5 14.2 273°27	1°0/14.7	18	
4 11	15 47.53	-20 53.5	2.113	2.967	12.0	20.5	4 11	15 50.00	-22 36.0	1.766	2.622	13.9	19.4
4 21	15 42.47	-20 37.4	2.025	2.956	8.9	20.3	4 21	15 44.74	-22 22.8	1.674	2.604	10.4	19.2
5 1	15 35.51	-20 13.4	1.962	2.945	5.3	20.0	5 1	15 37.06	-21 58.8	1.604	2.586	6.4	18.9
5 11	15 27.33	-19 43.2	1.926	2.934	1.4	19.7	5 11	15 27.75	-21 24.9	1.560	2.568	2.0	18.6
5 21	15 18.78	-19 9.1	1.917	2.923	2.7	19.8	5 21	15 17.87	-20 44.0	1.543	2.550	3.2	18.6
5 31	15 10.80	-18 34.9	1.936	2.912	6.6	20.1	5 31	15 8.61	-20 0.4	1.553	2.531	7.7	18.8
6 10	15 4.22	-18 4.4	1.981	2.901	10.3	20.3	6 10	15 1.06	-19 19.8	1.587	2.512	12.0	19.0
6 20	14 59.60	-17 40.9	2.048	2.890	13.4	20.4	6 20	14 55.95	-18 46.8	1.642	2.493	15.8	19.2
504684	2009 FT ₃₅		5 14.2 95°23	2°8/15.7	17		300933	2008 CG ₁₁₈		5 14.2 203°81	3°8/10.9	18	
4 11	15 50.43	-26 30.8	2.167	3.002	12.5	21.2	4 11	15 45.56	- 8 1.2	2.538	3.398	10.1	20.9
4 21	15 44.56	-26 53.6	2.092	3.007	9.5	21.0	4 21	15 40.59	- 7 9.0	2.464	3.395	7.5	20.8
5 1	15 36.71	-27 6.6	2.042	3.012	6.2	20.8	5 1	15 34.21	- 6 17.8	2.416	3.391	5.1	20.6
5 11	15 27.61	-27 8.9	2.017	3.017	3.3	20.6	5 11	15 26.99	- 5 31.1	2.396	3.388	3.8	20.5
5 21	15 18.20	-27 1.4	2.021	3.022	3.4	20.7	5 21	15 19.59	- 4 52.4	2.404	3.384	5.1	20.6
5 31	15 9.45	-26 46.5	2.052	3.027	6.4	20.9	5 31	15 12.67	- 4 24.6	2.440	3.380	7.6	20.7
6 10	15 2.22	-26 28.0	2.110	3.032	9.6	21.1	6 10	15 6.84	- 4 9.4	2.500	3.375	10.2	20.9
6 20	14 57.08	-26 9.8	2.190	3.037	12.5	21.3	6 20	15 2.53	- 4 7.3	2.583	3.371	12.5	21.0
131779	2002 AO ₂₃		5 14.2 84°87	1°0/14.7	18		471439	2011 UA ₁₁₀		5 14.2 202°85	4°2/17.1	16	
4 11	15 51.97	-23 41.7	1.397	2.260	16.5	19.4	4 11	15 49.81	-32 54.6	2.531	3.337	11.7	21.3
4 21	15 46.23	-23 9.7	1.339	2.273	12.2	19.2	4 21	15 44.02	-33 13.2	2.445	3.335	9.4	21.2
5 1	15 37.82	-22 23.4	1.304	2.287	7.3	18.9	5 1	15 36.37	-33 19.0	2.382	3.332	6.8	21.0
5 11	15 27.87	-21 25.4	1.292	2.300	2.2	18.6	5 11	15 27.54	-33 10.8	2.346	3.330	4.7	20.9
5 21	15 17.75	-20 21.1	1.306	2.313	3.5	18.7	5 21	15 18.38	-32 49.1	2.338	3.327	4.4	20.8
5 31	15 8.82	-19 17.4	1.346	2.326	8.4	19.1	5 31	15 9.80	-32 16.4	2.357	3.323	6.3	21.0
6 10	15 2.16	-18 21.5	1.409	2.339	12.9	19.3	6 10	15 2.59	-31 36.9	2.403	3.320	8.8	21.1
6 20	14 58.30	-17 38.2	1.493	2.351	16.7	19.6	6 20	14 57.30	-30 55.2	2.472	3.316	11.4	21.3
12287	Langres		5 14.2 318°95	0°8/13.6	18	R	391360	2006 UQ ₃₃₃		5 14.2 320°05	5°4/10.2	18	
4 11	15 45.14	-18 20.9	2.062	2.926	11.9	18.5	4 11	15 45.34	- 5 17.3	2.060	2.927	11.8	20.6
4 21	15 40.72	-17 49.2	1.978	2.915	8.7	18.3	4 21	15 40.71	- 4 16.1	1.992	2.923	9.0	20.4
5 1	15 34.47	-17 10.9	1.918	2.904	5.1	18.1	5 1	15 34.38	- 3 18.2	1.949	2.920	6.5	20.3
5 11	15 27.07	-16 28.5	1.885	2.893	1.3	17.8	5 11	15 27.05	- 2 28.5	1.932	2.917	5.4	20.2
5 21	15 19.35	-15 45.3	1.879	2.883	3.1	17.9	5 21	15 19.48	- 1 51.4	1.942	2.914	6.8	20.3
5 31	15 12.20	-15 5.6	1.900	2.873	7.0	18.1	5 31	15 12.51	- 1 30.2	1.977	2.911	9.5	20.4
6 10	15 6.40	-14 33.0	1.946	2.863	10.6	18.3	6 10	15 6.86	- 1 26.2	2.036	2.908	12.3	20.6
6 20	15 2.50	-14 10.3	2.014	2.854	13.7	18.5	6 20	15 3.00	- 1 38.9	2.115	2.905	14.8	20.8
395532	2011 UW ₁₄₈		5 14.2 191°71	0°8/13.5	18		215689	2003 YT ₅₁		5 14.2 238°41	2°8/12.8	18	
4 11	15 45.68	-18 40.3	2.505	3.359	10.4	21.1	4 11	15 51.74	-12 30.1	1.781	2.644	13.4	20.6
4 21	15 40.73	-17 54.9	2.426	3.358	7.6	20.9	4 21	15 45.81	-12 8.3	1.698	2.634	9.9	20.4
5 1	15 34.31	-17 3.2	2.373	3.358	4.4	20.7	5 1	15 37.59	-11 44.9	1.638	2.622	6.0	20.1
5 11	15 27.01	-16 8.0	2.348	3.357	1.2	20.5	5 11	15 27.87	-11 23.1	1.605	2.610	2.9	19.9
5 21	15 19.53	-15 12.5	2.352	3.355	2.8	20.6	5 21	15 17.67	-11 6.0	1.600	2.598	4.7	20.0
5 31	15 12.60	-14 20.6	2.385	3.354	6.0	20.8	5 31	15 8.12	-10 57.1	1.621	2.585	8.8	20.2
6 10	15 6.83	-13 35.8	2.444	3.352	9.1	21.0	6 10	15 0.23	-10 58.8	1.666	2.572	12.7	20.4
6 20	15 2.67	-13 0.5	2.526	3.350	11.7	21.2	6 20	14 54.66	-11 12.6	1.732	2.558	16.2	20.6
498009	2007 EU ₁₂₁		5 14.2 125°37	2°3/12.9	17		101718	1999 EB		5 14.2 100°47	4°6/16.6	18	
4 11	15 50.78	-13 19.5	1.803	2.668	13.3	21.8	4 11	15 54.08	-30 37.7	1.786	2.614	15.0	18.8
4 21	15 44.88	-13 1.3	1.738	2.674	9.7	21.6	4 21	15 47.59	-31 5.6	1.721	2.627	11.8	18.6
5 1	15 36.89	-12 41.4	1.696	2.680	5.8	21.3	5 1	15 38.61	-31 18.2	1.678	2.640	8.2	18.4
5 11	15 27.65	-12 22.6	1.681	2.686	2.5	21.1	5 11	15 28.09	-31 13.6	1.661	2.652	5.2	18.3
5 21	15 18.17	-12 7.9	1.693	2.692	4.3	21.3	5 21	15 17.28	-30 52.8	1.669	2.665	5.0	18.3
5 31	15 9.48	-12 0.3	1.732	2.698	8.1	21.5	5 31	15 7.43	-30 19.5	1.705	2.677	7.7	18.4
6 10	15 2.46	-12 1.9	1.795	2.704	11.8	21.7	6 10	14 59.61	-29 39.8	1.765	2.689	11.1	18.7
6 20	14 57.66	-12 13.8	1.880	2.709	15.0	22.0	6 20	14 54.43	-29 0.0	1.847	2.701	14.2	18.9
25368	Gailcolwell		5 14.2 165°23	4°1/11.9	18	R	358333	2006 VY ₆₇		5 14.2 184°28	0°3/13.9	17	
4 11	15 50.69	-10 3.0	1.673	2.542	13.9								

EPHEMERIDES

5 14.2

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
392675	2011 <i>UT</i> ₃₃₉		5 14.2 195°74	1°1/13.5	17		206161	2002 <i>TF</i> ₁₉₂		5 14.2 173°15	5°1/18.1	18	
4 11	15 48.64	-15 15.0	2.400	3.255	10.8	21.2	4 11	15 51.50	-36 46.6	2.615	3.400	12.0	20.3
4 21	15 42.99	-15 14.5	2.322	3.254	7.9	21.0	4 21	15 45.23	-37 2.8	2.531	3.403	9.8	20.1
5 1	15 35.69	-15 11.9	2.269	3.253	4.6	20.8	5 1	15 37.06	-37 3.9	2.471	3.405	7.5	20.0
5 11	15 27.38	-15 8.5	2.243	3.251	1.4	20.6	5 11	15 27.74	-36 48.5	2.437	3.406	5.6	19.8
5 21	15 18.79	-15 5.8	2.247	3.250	2.9	20.7	5 21	15 18.14	-36 17.2	2.430	3.408	5.2	19.8
5 31	15 10.74	-15 6.0	2.279	3.248	6.3	20.9	5 31	15 9.18	-35 32.6	2.451	3.409	6.6	19.9
6 10	15 3.91	-15 10.7	2.337	3.246	9.4	21.1	6 10	15 1.68	-34 39.5	2.498	3.409	8.8	20.0
6 20	14 58.80	-15 21.4	2.419	3.244	12.1	21.3	6 20	14 56.17	-33 43.2	2.570	3.409	11.1	20.2
515455	2013 <i>WH</i> ₁₁₀		5 14.2 209°01	1°2/12.5	18		64773	2001 <i>XS</i> ₁₈₂		5 14.2 291°13	3°3/16.5	18	
4 11	15 39.19	-12 23.6	4.876	5.728	5.7	21.9	4 11	15 47.55	-30 8.9	2.191	3.019	12.6	19.3
4 21	15 35.46	-12 5.6	4.795	5.725	4.2	21.8	4 21	15 42.58	-30 1.9	2.100	3.008	9.8	19.0
5 1	15 31.04	-11 47.1	4.740	5.722	2.5	21.6	5 1	15 35.62	-29 40.7	2.032	2.997	6.7	18.8
5 11	15 26.22	-11 29.3	4.715	5.719	1.3	21.5	5 11	15 27.41	-29 5.4	1.990	2.986	3.9	18.6
5 21	15 21.30	-11 13.5	4.720	5.715	2.0	21.6	5 21	15 18.84	-28 17.8	1.976	2.975	3.7	18.6
5 31	15 16.61	-11 0.8	4.754	5.712	3.7	21.7	5 31	15 10.87	-27 21.6	1.988	2.964	6.5	18.7
6 10	15 12.43	-10 52.1	4.816	5.708	5.3	21.8	6 10	15 4.38	-26 22.4	2.027	2.954	9.7	18.9
6 20	15 9.01	-10 48.2	4.903	5.705	6.8	21.9	6 20	14 59.93	-25 25.3	2.089	2.943	12.8	19.1
251936	1999 <i>VM</i> ₂₂₅		5 14.2 204°25	6°3/13.1	18		507018	2008 <i>UL</i> ₃₈		5 14.2 259°45	0°6/14.6	17	
4 11	16 3.91	-2 53.0	1.289	2.145	18.0	20.3	4 11	15 48.71	-22 40.2	2.033	2.884	12.6	21.7
4 21	15 55.47	-3 17.7	1.217	2.143	13.9	20.1	4 21	15 43.47	-22 13.0	1.942	2.870	9.4	21.5
5 1	15 43.60	-3 56.5	1.166	2.139	9.5	19.8	5 1	15 36.18	-21 35.3	1.874	2.855	5.7	21.2
5 11	15 29.40	-4 52.6	1.141	2.135	6.4	19.6	5 11	15 27.58	-20 48.8	1.832	2.840	1.7	20.9
5 21	15 14.45	-6 6.2	1.142	2.131	7.9	19.7	5 21	15 18.57	-19 56.4	1.819	2.825	2.8	20.9
5 31	15 0.56	-7 35.1	1.169	2.126	12.2	19.9	5 31	15 10.15	-19 2.8	1.833	2.810	6.9	21.2
6 10	14 49.25	-9 15.6	1.220	2.120	16.8	20.2	6 10	15 3.22	-18 13.2	1.873	2.794	10.7	21.4
6 20	14 41.39	-11 3.6	1.291	2.113	20.8	20.4	6 20	14 58.37	-17 31.6	1.935	2.778	14.1	21.6
224513	2005 <i>WS</i> ₄₈		5 14.2 244°97	0°1/14.2	17		468584	2007 <i>LN</i> ₁₁		5 14.2 304°05	1°0/13.6	16	
4 11	15 50.20	-20 2.8	1.889	2.746	13.1	20.8	4 11	15 47.62	-19 2.8	1.649	2.518	14.1	21.4
4 21	15 44.63	-19 51.8	1.805	2.737	9.7	20.6	4 21	15 43.23	-18 24.1	1.546	2.485	10.5	21.1
5 1	15 36.88	-19 33.1	1.744	2.727	5.8	20.3	5 1	15 36.34	-17 34.6	1.466	2.452	6.2	20.8
5 11	15 27.70	-19 8.3	1.709	2.718	1.4	20.0	5 11	15 27.68	-16 37.1	1.411	2.419	1.6	20.4
5 21	15 18.09	-18 39.9	1.702	2.708	3.0	20.1	5 21	15 18.28	-15 36.0	1.382	2.386	3.9	20.4
5 31	15 9.13	-18 11.6	1.722	2.698	7.3	20.4	5 31	15 9.37	-14 37.6	1.378	2.353	8.9	20.7
6 10	15 1.78	-17 47.5	1.767	2.687	11.3	20.6	6 10	15 2.12	-13 48.0	1.399	2.320	13.6	20.8
6 20	14 56.66	-17 31.0	1.834	2.677	14.7	20.8	6 20	14 57.35	-13 12.2	1.439	2.288	17.7	21.0
434287	2003 <i>YX</i> ₁₇₁		5 14.2 169°17	4°5/11.2	18		44944	1999 <i>VS</i> ₅₈		5 14.2 274°15	0°4/14.3	18	
4 11	15 49.32	-3 40.2	2.624	3.471	10.2	21.9	4 11	15 52.30	-19 24.7	1.569	2.432	15.0	18.8
4 21	15 43.23	-3 16.8	2.556	3.476	7.8	21.7	4 21	15 46.68	-19 34.0	1.484	2.420	11.1	18.6
5 1	15 35.72	-2 58.2	2.513	3.479	5.6	21.6	5 1	15 38.35	-19 36.8	1.422	2.407	6.7	18.3
5 11	15 27.37	-2 47.3	2.499	3.482	4.5	21.5	5 11	15 28.16	-19 33.6	1.385	2.394	1.7	17.9
5 21	15 18.86	-2 46.2	2.513	3.485	5.5	21.6	5 21	15 17.30	-19 25.9	1.374	2.381	3.5	18.0
5 31	15 10.87	-2 56.2	2.556	3.487	7.7	21.7	5 31	15 7.15	-19 17.1	1.390	2.368	8.5	18.3
6 10	15 4.02	-3 17.7	2.624	3.489	10.1	21.9	6 10	14 58.93	-19 11.2	1.428	2.354	13.0	18.5
6 20	14 58.72	-3 50.0	2.715	3.490	12.3	22.0	6 20	14 53.42	-19 11.8	1.488	2.341	17.0	18.7
171931	2001 <i>SP</i> ₁₇₄		5 14.2 282°10	1°8/13.0	18		498328	2007 <i>VT</i> ₂₀₅		5 14.2 286°49	0°9/13.7	17	
4 11	15 47.45	-14 59.4	2.123	2.985	11.7	21.0	4 11	15 50.04	-19 44.4	1.449	2.320	15.5	21.9
4 21	15 42.44	-14 32.5	2.028	2.964	8.6	20.8	4 21	15 45.28	-19 0.4	1.353	2.293	11.6	21.6
5 1	15 35.54	-14 1.6	1.958	2.942	5.1	20.5	5 1	15 37.67	-18 3.3	1.279	2.266	6.9	21.2
5 11	15 27.38	-13 29.4	1.914	2.921	2.0	20.3	5 11	15 28.03	-16 56.1	1.230	2.238	1.8	20.8
5 21	15 18.78	-12 59.0	1.898	2.899	3.7	20.4	5 21	15 17.56	-15 44.0	1.206	2.210	4.2	20.9
5 31	15 10.65	-12 33.8	1.910	2.877	7.5	20.5	5 31	15 7.73	-14 34.7	1.207	2.182	9.7	21.1
6 10	15 3.82	-12 17.1	1.947	2.855	11.0	20.7	6 10	14 59.87	-13 35.9	1.230	2.154	14.9	21.3
6 20	14 58.90	-12 10.7	2.005	2.833	14.2	20.9	6 20	14 54.85	-12 53.4	1.273	2.126	19.4	21.5
221254	2005 <i>UJ</i> ₂₇₄		5 14.2 119°93	8°2/20.5	17		263350	2008 <i>CN</i> ₁₂₁		5 14.2 337°25	5°7/10.3	17	
4 11	15 55.99	-43 47.8	2.004	2.765	15.9	20.2	4 11	15 45.72	-3 23.1	2.095	2.958	11.7	20.6
4 21	15 49.07	-44 6.5	1.934	2.777	13.6	20.0	4 21	15 40.99	-2 34.1	2.028	2.955	9.1	20.4
5 1	15 39.48	-44 1.1	1.884	2.789	11.1	19.9	5 1	15 34.58	-1 50.5	1.986	2.953	6.7	20.2
5 11	15 28.32	-43 28.4	1.857	2.801	9.0	19.8	5 11	15 27.17	-1 16.6	1.970	2.950	5.7	20.2
5 21	15 16.94	-42 29.0	1.854	2.812	8.2	19.8	5 21	15 19.53	-0 56.3	1.980	2.948	7.0	20.2
5 31	15 6.73	-41 7.7	1.878	2.823	9.2	19.8	5 31	15 12.48	-0 52.0	2.016	2.946	9.5	20.4
6 10	14 58.78	-39 32.9	1.927	2.833	11.2	20.0	6 10	15 6.73	-1 4.3	2.075	2.944	12.2	20.6
6 20	14 53.66	-37 53.6	1.998	2.843	13.6	20.2	6 20	15 2.75	-1 32.2	2.155	2.942	14.7	20.7
132576	2002 <i>JJ</i> ₁₁₁		5 14.2 289°09	4°3/17.5	17		29567	1998 <i>FT</i> ₁₃		5 14.2 212°82	1°0/14.8	18	R
4 11	15 50.48	-34 37.9	1.932	2.746	14.6	18.9	4 11	15 49.48	-21 53.0	2.472	3.314	10.9	17.8
4 21	15 45.09	-33 54.1	1.824	2.721	11.7	18.7	4 21	15 43.69	-22 2.2	2.387	3.310	8.1	17.7
5 1	15 37.25	-32 46.6	1.738	2.695	8.4	18.4	5 1	15 36.18	-22 5.2	2.326	3.305	4.9	17.4
5 11	15 27.82	-31 15.0	1.678	2.669	5.2	18.2	5 11	15 27.58	-22 2.2	2.293	3.300	1.7	17.2
5 21	15 17.91	-29 22.1	1.645	2.643	4.6	18.1	5 21	15 18.65	-21 54.4	2.290	3.295	2.4	17.3
5 31	15 8.76	-27 15.3	1.640	2.617	7.5	18.2	5 31	15 10.22	-21 43.8	2.314	3.290	5.8	17.5
6 10	15 1.42	-25 4.4	1.662	2.591	11.3	18.4	6 10	15 3.04	-21 33.2	2.366	3.284	8.9	17.7
6 20	14 56.57	-22 59.1	1.708	2.565	15.0	18.5	6 20	14 57.63	-21 25.4	2.441	3.278	11.7	17.8
236852	2007 <i>RV</i> ₁₄₀		5 14.2 177°72	0°5/13.6	18		338227	2002 <i>TR</i> ₆₂					

EPHEMERIDES

5 14.2

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
506476	2003 FZ ₁₂₃		5 14.2 42°03	1.3/15.0	17		238324	2003 YH ₁₆₄		5 14.2 185°54	0.2/14.1	18	
4 11	15 48.01	-23 12.6	2.065	2.915	12.4	21.3	4 11	15 49.03	-19 10.5	2.186	3.039	11.7	21.0
4 21	15 42.82	-23 12.5	1.993	2.920	9.3	21.1	4 21	15 43.46	-18 59.2	2.109	3.039	8.6	20.8
5 1	15 35.72	-23 3.6	1.945	2.925	5.7	20.9	5 1	15 36.08	-18 42.1	2.056	3.039	5.0	20.6
5 11	15 27.47	-22 46.9	1.924	2.930	2.1	20.7	5 11	15 27.58	-18 20.7	2.030	3.039	1.2	20.3
5 21	15 18.95	-22 24.2	1.930	2.935	2.7	20.8	5 21	15 18.81	-17 57.1	2.033	3.038	2.7	20.4
5 31	15 11.12	-21 58.6	1.963	2.941	6.4	21.0	5 31	15 10.64	-17 34.4	2.063	3.037	6.5	20.7
6 10	15 4.78	-21 34.1	2.022	2.947	9.8	21.2	6 10	15 3.86	-17 15.9	2.119	3.036	9.9	20.9
6 20	15 0.46	-21 14.1	2.103	2.953	12.9	21.4	6 20	14 58.99	-17 4.0	2.199	3.034	12.9	21.1
389623	2011 HM ₉₁		5 14.2 296°76	0.5/13.9	17		88757	2001 SS ₆₁		5 14.2 223°12	1°1/14.7	18	
4 11	15 48.94	-18 16.6	1.724	2.590	13.7	20.8	4 11	15 54.15	-22 5.6	1.658	2.511	14.8	20.9
4 21	15 44.03	-18 6.3	1.631	2.568	10.2	20.6	4 21	15 47.91	-22 4.8	1.574	2.503	11.1	20.7
5 1	15 36.73	-17 49.5	1.562	2.547	6.0	20.3	5 1	15 39.02	-21 54.2	1.513	2.494	6.8	20.4
5 11	15 27.78	-17 27.9	1.517	2.526	1.5	19.9	5 11	15 28.36	-21 34.1	1.478	2.485	2.2	20.1
5 21	15 18.20	-17 4.3	1.499	2.504	3.4	20.0	5 21	15 17.13	-21 6.7	1.469	2.475	3.3	20.1
5 31	15 9.19	-16 42.3	1.507	2.483	8.1	20.2	5 31	15 6.67	-20 36.0	1.487	2.465	8.1	20.4
6 10	15 1.82	-16 26.3	1.540	2.462	12.5	20.4	6 10	14 58.15	-20 7.4	1.530	2.454	12.5	20.6
6 20	14 56.85	-16 19.3	1.592	2.442	16.3	20.6	6 20	14 52.31	-19 45.6	1.594	2.442	16.3	20.8
501744	2014 UZ ₁₁₈		5 14.2 141°62	0.7/14.6	17		1605	Milankovitch		5 14.2 135°78	4.1/11.0	18	
4 11	15 52.32	-21 49.8	1.736	2.591	14.2	22.1	4 11	15 46.13	- 8 5.4	2.308	3.171	10.8	15.2
4 21	15 46.20	-21 34.6	1.668	2.598	10.5	21.9	4 21	15 41.12	- 7 9.6	2.244	3.176	8.1	15.0
5 1	15 37.78	-21 9.5	1.623	2.605	6.3	21.6	5 1	15 34.60	- 6 15.0	2.205	3.181	5.4	14.9
5 11	15 27.98	-20 36.2	1.604	2.612	1.8	21.3	5 11	15 27.21	- 5 25.8	2.193	3.186	4.1	14.8
5 21	15 17.91	-19 57.8	1.612	2.618	3.1	21.4	5 21	15 19.66	- 4 45.7	2.210	3.190	5.4	14.9
5 31	15 8.73	-19 18.8	1.647	2.624	7.5	21.7	5 31	15 12.70	- 4 17.8	2.253	3.195	8.0	15.1
6 10	15 1.41	-18 44.3	1.707	2.629	11.5	22.0	6 10	15 6.96	- 4 3.7	2.321	3.199	10.7	15.2
6 20	14 56.53	-18 18.1	1.788	2.634	14.9	22.2	6 20	15 2.86	- 4 3.5	2.411	3.203	13.1	15.4
326944	2004 DP ₁₉		5 14.2 135°69	3.9/16.9	16		491157	2011 SE ₂₁₆		5 14.2 270°75	6.3/22.5	18	
4 11	15 54.09	-31 54.1	2.012	2.829	14.0	22.0	4 11	15 48.76	-53 4.1	4.594	5.246	8.9	21.3
4 21	15 47.30	-31 42.2	1.943	2.843	10.9	21.8	4 21	15 42.99	-53 41.3	4.503	5.241	8.1	21.2
5 1	15 38.32	-31 13.4	1.896	2.856	7.6	21.6	5 1	15 35.72	-54 5.4	4.433	5.236	7.2	21.2
5 11	15 28.09	-30 27.7	1.876	2.869	4.6	21.5	5 11	15 27.50	-54 14.7	4.385	5.231	6.6	21.1
5 21	15 17.72	-29 27.7	1.883	2.881	4.2	21.4	5 21	15 18.97	-54 8.6	4.361	5.226	6.3	21.1
5 31	15 8.30	-28 18.5	1.918	2.892	6.9	21.6	5 31	15 10.82	-53 47.7	4.362	5.222	6.5	21.1
6 10	15 0.74	-27 6.9	1.980	2.903	10.1	21.9	6 10	15 3.70	-53 14.5	4.388	5.217	7.0	21.1
6 20	14 55.56	-25 59.2	2.065	2.912	13.1	22.1	6 20	14 58.10	-52 32.0	4.436	5.212	7.8	21.2
60943	2000 JV ₅₅		5 14.2 149°00	1.8/13.2	18		16107	Chanmugam		5 14.2 275°52	1°5/13.2	18	
4 11	15 52.89	-16 22.0	1.591	2.456	14.7	18.9	4 11	15 47.76	-16 52.7	1.866	2.732	12.8	18.8
4 21	15 46.69	-15 46.2	1.526	2.463	10.7	18.7	4 21	15 42.78	-16 14.8	1.790	2.727	9.4	18.6
5 1	15 38.09	-15 4.4	1.484	2.470	6.3	18.4	5 1	15 35.78	-15 30.8	1.737	2.722	5.5	18.3
5 11	15 28.06	-14 20.2	1.468	2.476	2.1	18.1	5 11	15 27.53	-14 43.8	1.710	2.718	1.8	18.1
5 21	15 17.76	-13 38.0	1.479	2.482	4.2	18.3	5 21	15 18.97	-13 58.0	1.710	2.713	3.7	18.2
5 31	15 8.43	-13 2.9	1.517	2.487	8.7	18.6	5 31	15 11.08	-13 17.8	1.738	2.708	7.8	18.4
6 10	15 1.05	-12 38.8	1.578	2.491	12.9	18.8	6 10	15 4.75	-12 47.3	1.789	2.703	11.5	18.6
6 20	14 56.21	-12 28.0	1.660	2.495	16.4	19.1	6 20	15 0.52	-12 28.8	1.863	2.698	14.8	18.8
431304	2006 VQ ₆₀		5 14.2 289°63	0.2/14.3	18		455284	2002 AG ₃₇		5 14.2 130°02	12.6/ 8.7	18	
4 11	15 48.24	-19 56.4	2.110	2.965	12.0	21.2	4 11	15 55.94	+14 16.0	1.724	2.533	16.3	21.3
4 21	15 43.14	-19 52.4	2.013	2.944	8.9	21.0	4 21	15 48.52	+15 13.5	1.685	2.547	14.3	21.2
5 1	15 36.04	-19 42.0	1.940	2.923	5.3	20.7	5 1	15 38.97	+15 47.6	1.667	2.560	13.0	21.1
5 11	15 27.60	-19 26.2	1.894	2.902	1.4	20.4	5 11	15 28.27	+15 52.0	1.672	2.572	12.7	21.1
5 21	15 18.65	-19 6.9	1.875	2.881	2.8	20.5	5 21	15 17.53	+15 24.0	1.699	2.584	13.5	21.2
5 31	15 10.17	-18 47.0	1.884	2.860	6.8	20.7	5 31	15 7.85	+14 24.5	1.749	2.595	15.1	21.3
6 10	15 3.04	-18 30.0	1.918	2.838	10.5	20.8	6 10	15 0.09	+12 58.5	1.820	2.605	17.0	21.5
6 20	14 57.91	-18 19.0	1.975	2.817	13.8	21.0	6 20	14 54.71	+11 12.2	1.908	2.615	18.8	21.7
371131	2005 WW ₇₈		5 14.2 125°58	1.6/15.3	17		506390	2017 RQ ₁₂		5 14.2 241°40	0.6/14.5	17	
4 11	15 50.87	-24 58.8	1.975	2.818	13.2	21.3	4 11	15 52.57	-20 28.4	1.856	2.708	13.5	21.3
4 21	15 44.92	-24 44.1	1.906	2.828	9.9	21.1	4 21	15 46.53	-20 34.7	1.768	2.697	10.1	21.0
5 1	15 36.95	-24 18.1	1.861	2.838	6.1	20.9	5 1	15 38.13	-20 34.1	1.704	2.686	6.0	20.8
5 11	15 27.78	-23 41.8	1.842	2.847	2.4	20.7	5 11	15 28.15	-20 26.9	1.666	2.674	1.7	20.5
5 21	15 18.40	-22 58.1	1.851	2.857	2.9	20.7	5 21	15 17.62	-20 14.8	1.656	2.662	3.0	20.5
5 31	15 9.85	-22 11.3	1.888	2.866	6.6	21.0	5 31	15 7.72	-20 0.5	1.673	2.649	7.5	20.8
6 10	15 2.97	-21 26.5	1.951	2.874	10.2	21.2	6 10	14 59.48	-19 48.0	1.715	2.636	11.5	21.0
6 20	14 58.27	-20 47.8	2.036	2.882	13.3	21.4	6 20	14 53.62	-19 40.9	1.779	2.622	15.1	21.2
308448	2005 SG ₂₂₉		5 14.2 264°00	1.6/12.9	18		508264	2015 HP ₁₄₁		5 14.2 333°82	0.6/13.9	17	
4 11	15 46.13	-15 22.8	2.376	3.236	10.7	21.5	4 11	15 50.75	-16 14.2	1.830	2.692	13.2	21.0
4 21	15 41.26	-14 47.7	2.288	3.223	7.8	21.3	4 21	15 45.10	-16 32.8	1.752	2.687	9.7	20.8
5 1	15 34.76	-14 8.6	2.226	3.210	4.6	21.1	5 1	15 37.22	-16 49.0	1.698	2.683	5.7	20.6
5 11	15 27.25	-13 28.0	2.190	3.197	1.8	20.8	5 11	15 27.91	-17 3.5	1.671	2.679	1.4	20.2
5 21	15 19.45	-12 49.1	2.183	3.184	3.4	20.9	5 21	15 18.15	-17 17.4	1.670	2.676	3.2	20.4
5 31	15 12.12	-12 15.3	2.205	3.170	6.7	21.1	5 31	15 9.05	-17 32.4	1.697	2.672	7.5	20.6
6 10	15 5.97	-11 49.6	2.251	3.157	9.9	21.3	6 10	15 1.57	-17 50.5	1.749	2.669	11.4	20.8
6 20	15 1.49	-11 33.9	2.321	3.143	12.7	21.5	6 20	14 56.36	-18 13.5	1.822	2.666	14.7	21.1
523555	2017 XV ₁₇		5 14.2 41°28	1.1/14.9	17		179365	2001 XZ ₂₀₆		5 14.2 123°92	4.7/11.1	18	
4 11	15 47.95	-22 46.9											

EPHEMERIDES

5 14.2

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
21801	Ančeri		5 14.2 157°05	0°7/13.9	18		320739	2008 EA ₃₇		5 14.2 27°69	1°4/13.5	17	
4 11	15 52.81	-17 27.0	1.727	2.587	14.0	18.3	4 11	15 49.09	-17 17.2	1.340	2.219	16.0	20.8
4 21	15 46.59	-17 19.5	1.658	2.592	10.3	18.1	4 21	15 44.31	-16 48.6	1.280	2.224	11.7	20.6
5 1	15 38.07	-17 6.7	1.611	2.596	6.0	17.9	5 1	15 36.89	-16 12.9	1.241	2.229	6.8	20.3
5 11	15 28.11	-16 50.4	1.591	2.599	1.5	17.6	5 11	15 27.86	-15 33.8	1.226	2.234	2.0	20.0
5 21	15 17.82	-16 33.1	1.598	2.603	3.4	17.7	5 21	15 18.51	-14 56.0	1.236	2.241	4.3	20.2
5 31	15 8.37	-16 18.3	1.632	2.605	7.9	18.0	5 31	15 10.19	-14 25.0	1.270	2.247	9.3	20.5
6 10	15 0.73	-16 9.4	1.690	2.608	11.9	18.2	6 10	15 4.00	-14 5.1	1.327	2.254	13.8	20.8
6 20	14 55.51	-16 8.9	1.770	2.610	15.3	18.5	6 20	15 0.55	-13 58.7	1.403	2.261	17.6	21.0
80815	2000 CD ₁₂₂		5 14.2 182°16	1°8/13.2	17		325149	2008 EP ₁₆₆		5 14.2 336°18	2°3/13.6	18	
4 11	15 51.16	-15 27.7	1.880	2.741	13.0	20.5	4 11	15 54.31	-11 29.8	1.422	2.293	15.8	19.6
4 21	15 45.22	-14 59.2	1.807	2.742	9.5	20.3	4 21	15 48.27	-12 1.7	1.348	2.287	11.7	19.4
5 1	15 37.19	-14 26.4	1.758	2.742	5.6	20.1	5 1	15 39.36	-12 37.3	1.297	2.282	7.1	19.1
5 11	15 27.89	-13 52.1	1.735	2.742	2.0	19.8	5 11	15 28.52	-13 17.5	1.270	2.277	2.7	18.8
5 21	15 18.29	-13 20.0	1.740	2.741	3.9	20.0	5 21	15 17.04	-14 2.4	1.269	2.272	4.6	18.9
5 31	15 9.43	-12 53.7	1.772	2.740	7.9	20.2	5 31	15 6.38	-14 52.2	1.295	2.268	9.4	19.2
6 10	15 2.18	-12 36.5	1.830	2.738	11.6	20.4	6 10	14 57.81	-15 47.2	1.343	2.265	14.0	19.4
6 20	14 57.12	-12 30.4	1.908	2.736	14.8	20.6	6 20	14 52.14	-16 47.3	1.412	2.262	17.9	19.7
429189	2009 WN ₃₉		5 14.2 229°74	0°5/14.5	17		466652	2014 WE ₆₈		5 14.2 85°04	0°5/14.5	17	
4 11	15 50.73	-21 12.0	2.097	2.946	12.3	22.2	4 11	15 50.25	-22 36.9	1.533	2.396	15.3	20.8
4 21	15 44.90	-20 59.4	2.008	2.936	9.1	22.0	4 21	15 44.94	-22 0.7	1.467	2.402	11.3	20.5
5 1	15 37.05	-20 38.8	1.943	2.925	5.5	21.7	5 1	15 37.17	-21 11.6	1.424	2.407	6.7	20.3
5 11	15 27.87	-20 11.2	1.905	2.913	1.5	21.4	5 11	15 27.92	-20 12.7	1.405	2.413	1.8	20.0
5 21	15 18.29	-19 39.0	1.895	2.901	2.7	21.5	5 21	15 18.41	-19 8.7	1.412	2.419	3.3	20.1
5 31	15 9.29	-19 5.8	1.914	2.889	6.8	21.7	5 31	15 9.88	-18 6.3	1.445	2.424	8.1	20.4
6 10	15 1.76	-18 35.7	1.958	2.876	10.5	21.9	6 10	15 3.37	-17 11.7	1.503	2.430	12.4	20.7
6 20	14 56.30	-18 12.1	2.025	2.863	13.7	22.1	6 20	14 59.43	-16 29.6	1.580	2.435	16.1	20.9
267437	2002 CZ ₁₇₇		5 14.2 317°05	2°2/13.0	17		182992	2002 OM ₂₈		5 14.2 251°24	3°0/15.6	18	
4 11	15 48.39	-14 52.3	1.666	2.537	13.8	20.4	4 11	15 53.63	-26 4.1	1.756	2.599	14.6	20.7
4 21	15 43.45	-14 22.8	1.592	2.532	10.1	20.2	4 21	15 47.61	-26 25.1	1.666	2.586	11.2	20.5
5 1	15 36.27	-13 49.1	1.541	2.528	6.0	19.9	5 1	15 38.93	-26 34.7	1.599	2.572	7.4	20.2
5 11	15 27.68	-13 14.8	1.516	2.523	2.4	19.7	5 11	15 28.42	-26 31.5	1.556	2.558	3.7	19.9
5 21	15 18.72	-12 43.6	1.517	2.519	4.3	19.8	5 21	15 17.22	-26 16.0	1.541	2.543	4.0	19.9
5 31	15 10.50	-12 19.9	1.544	2.514	8.6	20.0	5 31	15 6.69	-25 51.2	1.552	2.529	7.9	20.1
6 10	15 3.98	-12 7.1	1.595	2.510	12.6	20.3	6 10	14 58.01	-25 22.5	1.588	2.514	12.0	20.3
6 20	14 59.79	-12 6.8	1.666	2.507	16.1	20.5	6 20	14 51.98	-24 55.5	1.645	2.498	15.7	20.5
332361	2007 EL ₆₀		5 14.2 253°43	8°2/ 8.3	17		147942	1058 T ₋₃		5 14.2 252°05	4°4/17.4	18	
4 11	15 47.57	+ 0 4.3	1.837	2.698	13.2	20.8	4 11	15 49.49	-33 53.0	2.590	3.391	11.6	20.5
4 21	15 42.60	+ 1 33.0	1.769	2.688	10.7	20.7	4 21	15 43.90	-34 8.5	2.493	3.379	9.4	20.3
5 1	15 35.67	+ 2 54.7	1.725	2.679	8.7	20.5	5 1	15 36.43	-34 10.8	2.420	3.366	6.9	20.2
5 11	15 27.53	+ 4 2.1	1.706	2.669	8.2	20.5	5 11	15 27.75	-33 58.7	2.373	3.354	4.9	20.0
5 21	15 19.06	+ 4 49.3	1.713	2.659	9.7	20.5	5 21	15 18.68	-33 32.4	2.353	3.340	4.6	20.0
5 31	15 11.24	+ 5 12.5	1.744	2.648	12.2	20.7	5 31	15 10.10	-32 54.4	2.362	3.327	6.3	20.1
6 10	15 4.90	+ 5 10.9	1.796	2.638	15.0	20.8	6 10	15 2.85	-32 8.9	2.397	3.314	8.9	20.2
6 20	15 0.60	+ 4 46.4	1.866	2.627	17.5	21.0	6 20	14 57.50	-31 20.7	2.455	3.300	11.4	20.3
242706	2005 TN ₁₆₂		5 14.2 291°95	3°7/16.2	18		248650	2006 HC ₄₇		5 14.2 333°74	2°7/13.0	17	
4 11	15 50.17	-28 44.9	2.223	3.050	12.5	20.5	4 11	15 47.03	-15 23.0	1.148	2.040	17.2	20.2
4 21	15 44.62	-29 17.3	2.131	3.038	9.7	20.3	4 21	15 43.34	-14 48.5	1.078	2.029	12.7	19.9
5 1	15 36.95	-29 39.4	2.062	3.026	6.7	20.1	5 1	15 36.61	-14 7.2	1.028	2.018	7.6	19.5
5 11	15 27.87	-29 49.5	2.020	3.014	4.2	19.9	5 11	15 27.86	-13 24.2	1.000	2.008	2.9	19.2
5 21	15 18.27	-29 47.6	2.005	3.002	4.1	19.9	5 21	15 18.46	-12 45.2	0.996	1.999	5.5	19.3
5 31	15 9.17	-29 35.6	2.018	2.990	6.7	20.0	5 31	15 10.02	-12 16.8	1.014	1.991	10.9	19.6
6 10	15 1.52	-29 17.1	2.056	2.978	9.9	20.2	6 10	15 3.87	-12 3.9	1.052	1.983	16.0	19.9
6 20	14 55.97	-28 56.6	2.117	2.966	12.8	20.3	6 20	15 0.82	-12 8.6	1.107	1.977	20.4	20.1
62475	2000 SB ₂₁₉		5 14.2 200°27	6°7/ 7.6	18		97202	1999 XJ ₁₁		5 14.2 167°23	2°8/16.2	18	
4 11	15 44.85	+ 1 10.0	2.536	3.385	10.4	18.9	4 11	15 50.10	-28 33.6	2.147	2.977	12.7	20.0
4 21	15 40.11	+ 2 37.5	2.474	3.383	8.5	18.8	4 21	15 44.38	-28 23.5	2.069	2.980	9.8	19.8
5 1	15 34.00	+ 3 58.7	2.437	3.381	7.0	18.7	5 1	15 36.69	-28 0.2	2.013	2.982	6.5	19.6
5 11	15 27.09	+ 5 8.1	2.427	3.379	6.8	18.7	5 11	15 27.80	-27 23.9	1.984	2.984	3.4	19.4
5 21	15 20.01	+ 6 1.6	2.445	3.376	7.9	18.7	5 21	15 18.65	-26 37.0	1.983	2.985	3.4	19.4
5 31	15 13.42	+ 6 36.4	2.488	3.373	9.8	18.9	5 31	15 10.21	-25 43.6	2.010	2.987	6.4	19.6
6 10	15 7.89	+ 6 51.7	2.554	3.370	11.8	19.0	6 10	15 3.34	-24 48.9	2.063	2.988	9.7	19.8
6 20	15 3.85	+ 6 48.5	2.640	3.367	13.7	19.1	6 20	14 58.56	-23 57.9	2.140	2.988	12.7	20.0
354704	2005 RK ₂₂		5 14.2 279°08	5°8/17.9	18		145396	2005 NE ₅₃		5 14.2 290°79	0°3/13.9	18	
4 11	15 50.36	-36 35.4	2.327	3.121	13.0	20.8	4 11	15 43.35	-19 0.5	3.074	3.924	8.8	20.4
4 21	15 44.84	-37 1.8	2.229	3.105	10.7	20.6	4 21	15 38.99	-18 38.2	2.976	3.906	6.4	20.2
5 1	15 37.12	-37 12.5	2.153	3.089	8.3	20.4	5 1	15 33.38	-18 11.2	2.905	3.888	3.8	20.0
5 11	15 27.93	-37 5.3	2.102	3.073	6.3	20.2	5 11	15 26.98	-17 40.9	2.862	3.870	0.9	19.8
5 21	15 18.21	-36 39.8	2.078	3.057	5.9	20.2	5 21	15 20.33	-17 9.3	2.847	3.852	2.1	19.8
5 31	15 9.05	-35 58.4	2.081	3.040	7.5	20.2	5 31	15 14.03	-16 38.8	2.862	3.834	5.0	20.0
6 10	15 1.42	-35 6.2	2.109	3.024	10.0	20.4	6 10	15 8.61	-16 11.8	2.904	3.816	7.7	20.2
6 20	14 56.00	-34 9.1	2.160	3.007	12.6	20.5	6 20	15 4.48	-15 50.5	2.970	3.798	10.1	20.3
354801	2005 UH ₅₂₄		5 14.2 332°69	6°1/10.2	16		76260	2000 ES ₁₀₂		5 14.2 236°26	0°2/14.3	18	
4 11	15 45.12	- 3 21.3											

EPHEMERIDES

5 14.2

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
34706	2001 <i>OP</i> ₈₃		5 14.2 81°29	1°5/13.7	18		94080	2000 <i>YC</i> ₄₇		5 14.2 216°17	0°2/14.4	18	
4 11	16 1.20	-15 27.5	1.463	2.320	16.2	18.4	4 11	15 50.27	-20 30.8	2.382	3.227	11.2	20.9
4 21	15 52.43	-15 23.8	1.429	2.362	11.7	18.3	4 21	15 44.35	-20 16.9	2.293	3.218	8.3	20.7
5 1	15 41.24	-15 16.4	1.419	2.403	6.8	18.1	5 1	15 36.65	-19 56.1	2.228	3.209	4.9	20.5
5 11	15 28.86	-15 7.3	1.435	2.443	2.0	17.9	5 11	15 27.82	-19 29.8	2.191	3.199	1.3	20.2
5 21	15 16.69	-14 59.0	1.478	2.482	4.0	18.1	5 21	15 18.65	-19 0.0	2.183	3.189	2.5	20.3
5 31	15 6.01	-14 54.9	1.549	2.520	8.5	18.4	5 31	15 10.01	-18 29.8	2.205	3.178	6.1	20.5
6 10	14 57.75	-14 57.7	1.644	2.556	12.5	18.8	6 10	15 2.66	-18 2.6	2.252	3.166	9.5	20.7
6 20	14 52.32	-15 8.7	1.761	2.592	15.7	19.1	6 20	14 57.13	-17 41.4	2.324	3.154	12.4	20.9
216757	<i>Vasari</i>		5 14.2 269°66	1°2/13.2	17		338357	2002 <i>XA</i> ₃₉		5 14.2 124°46	4°0/11.2	18	
4 11	15 45.72	-17 41.7	2.310	3.169	11.0	20.4	4 11	15 48.13	-4 42.4	2.851	3.699	9.4	21.1
4 21	15 41.00	-16 53.8	2.226	3.160	8.0	20.2	4 21	15 42.25	-4 10.4	2.797	3.718	7.2	21.0
5 1	15 34.65	-15 59.6	2.167	3.152	4.7	20.0	5 1	15 35.16	-3 42.2	2.769	3.737	5.0	20.9
5 11	15 27.30	-15 1.9	2.135	3.143	1.5	19.7	5 11	15 27.41	-3 20.6	2.770	3.755	4.0	20.9
5 21	15 19.71	-14 4.6	2.132	3.134	3.1	19.8	5 21	15 19.60	-3 7.7	2.800	3.772	5.0	20.9
5 31	15 12.64	-13 11.9	2.157	3.126	6.6	20.0	5 31	15 12.32	-3 5.1	2.858	3.789	7.0	21.1
6 10	15 6.81	-12 27.5	2.208	3.117	9.9	20.2	6 10	15 6.10	-3 13.1	2.942	3.805	9.2	21.3
6 20	15 2.68	-11 54.0	2.282	3.108	12.8	20.4	6 20	15 1.29	-3 31.4	3.049	3.821	11.1	21.4
303751	2005 <i>QV</i> ₁₀₅		5 14.2 254°44	2°5/12.4	18		323397	2004 <i>AU</i> ₁₂		5 14.2 10°53	4°4/12.4	17	
4 11	15 46.81	-11 52.5	2.479	3.338	10.3	21.0	4 11	15 50.40	-9 31.4	1.388	2.267	15.6	19.9
4 21	15 41.72	-11 23.2	2.391	3.324	7.6	20.8	4 21	15 45.21	-9 9.0	1.326	2.268	11.6	19.7
5 1	15 35.06	-10 52.8	2.328	3.309	4.7	20.6	5 1	15 37.43	-8 48.9	1.285	2.269	7.4	19.5
5 11	15 27.41	-10 23.8	2.292	3.295	2.5	20.5	5 11	15 28.03	-8 35.5	1.269	2.270	4.5	19.3
5 21	15 19.46	-9 59.1	2.286	3.280	3.9	20.5	5 21	15 18.26	-8 32.5	1.277	2.272	6.3	19.4
5 31	15 11.95	-9 41.3	2.307	3.265	6.9	20.7	5 31	15 9.42	-8 42.8	1.310	2.274	10.4	19.6
6 10	15 5.55	-9 32.5	2.354	3.250	9.9	20.9	6 10	15 2.61	-9 7.6	1.364	2.276	14.5	19.9
6 20	15 0.75	-9 33.9	2.424	3.235	12.6	21.0	6 20	14 58.48	-9 46.2	1.438	2.279	18.1	20.1
506778	2006 <i>XE</i> ₆₁		5 14.2 145°83	0°4/13.9	17		142038	2002 <i>QS</i> ₁₃		5 14.2 175°21	0°8/13.7	17	
4 11	15 46.85	-18 36.5	2.896	3.742	9.4	23.2	4 11	15 51.28	-18 38.7	1.989	2.844	12.6	21.0
4 21	15 41.44	-18 12.4	2.824	3.752	6.8	23.0	4 21	15 45.23	-18 4.5	1.915	2.846	9.3	20.8
5 1	15 34.74	-17 43.7	2.779	3.761	4.0	22.9	5 1	15 37.19	-17 23.1	1.864	2.848	5.4	20.6
5 11	15 27.31	-17 12.1	2.761	3.770	1.0	22.6	5 11	15 27.95	-16 37.2	1.841	2.850	1.4	20.3
5 21	15 19.75	-16 39.8	2.774	3.778	2.2	22.8	5 21	15 18.45	-15 50.4	1.847	2.851	3.2	20.4
5 31	15 12.68	-16 9.4	2.816	3.786	5.2	23.0	5 31	15 9.69	-15 7.0	1.880	2.851	7.2	20.7
6 10	15 6.66	-15 43.4	2.885	3.794	7.9	23.2	6 10	15 2.50	-14 31.3	1.939	2.850	10.9	20.9
6 20	15 2.07	-15 23.6	2.979	3.801	10.2	23.3	6 20	14 57.42	-14 5.9	2.020	2.849	14.0	21.1
262099	2006 <i>RD</i> ₉₂		5 14.2 305°48	1°8/13.3	17		472465	2015 <i>BW</i> ₄₂₂		5 14.2 234°55	1°8/13.2	17	
4 11	15 48.03	-17 9.0	1.360	2.240	15.8	20.9	4 11	15 49.26	-15 46.1	1.814	2.680	13.2	21.7
4 21	15 43.88	-16 31.1	1.274	2.218	11.7	20.6	4 21	15 43.96	-15 14.3	1.738	2.676	9.6	21.5
5 1	15 36.90	-15 43.8	1.208	2.196	6.9	20.2	5 1	15 36.54	-14 37.7	1.686	2.672	5.7	21.2
5 11	15 27.95	-14 51.1	1.167	2.175	2.2	19.9	5 11	15 27.81	-13 59.3	1.660	2.667	2.0	21.0
5 21	15 18.26	-13 58.3	1.150	2.153	4.7	20.0	5 21	15 18.74	-13 22.8	1.661	2.663	3.9	21.1
5 31	15 9.27	-13 12.1	1.157	2.132	10.1	20.2	5 31	15 10.37	-12 52.6	1.689	2.659	8.0	21.3
6 10	15 2.29	-12 38.8	1.185	2.112	15.1	20.4	6 10	15 3.61	-12 32.2	1.741	2.654	11.9	21.5
6 20	14 58.15	-12 22.1	1.233	2.092	19.5	20.6	6 20	14 59.05	-12 23.5	1.815	2.649	15.2	21.8
71210	1999 <i>XE</i> ₂₅₆		5 14.2 186°25	1°7/13.0	18		192178	<i>Lijeshou</i>		5 14.2 345°08	3°7/12.3	17	
4 11	15 47.97	-15 59.3	2.064	2.926	12.0	19.7	4 11	15 45.14	-13 29.1	1.328	2.217	15.5	20.0
4 21	15 42.74	-15 18.5	1.990	2.926	8.7	19.5	4 21	15 41.53	-12 35.9	1.260	2.208	11.4	19.7
5 1	15 35.70	-14 32.8	1.940	2.925	5.1	19.3	5 1	15 35.35	-11 37.9	1.213	2.200	7.0	19.4
5 11	15 27.57	-13 45.4	1.918	2.925	1.9	19.1	5 11	15 27.55	-10 41.0	1.189	2.193	3.7	19.2
5 21	15 19.20	-13 0.1	1.923	2.924	3.7	19.2	5 21	15 19.29	-9 51.5	1.189	2.187	6.0	19.3
5 31	15 11.47	-12 20.9	1.956	2.923	7.3	19.4	5 31	15 11.90	-9 15.7	1.213	2.182	10.5	19.6
6 10	15 5.17	-11 51.2	2.014	2.922	10.8	19.6	6 10	15 6.47	-8 57.6	1.259	2.179	14.9	19.8
6 20	15 0.78	-11 33.1	2.094	2.921	13.7	19.8	6 20	15 3.65	-8 58.4	1.322	2.176	18.7	20.1
377749	2005 <i>YV</i> ₅		5 14.2 242°26	1°4/13.4	18		18817	1999 <i>LF</i> ₃₂		5 14.2 135°84	1°5/13.4	18	R
4 11	15 51.30	-15 39.4	2.176	3.029	11.7	21.8	4 11	15 53.02	-16 16.4	1.778	2.637	13.7	19.0
4 21	15 45.29	-15 22.6	2.081	3.012	8.7	21.6	4 21	15 46.59	-15 50.3	1.715	2.649	10.0	18.8
5 1	15 37.30	-15 1.9	2.011	2.994	5.1	21.3	5 1	15 38.00	-15 19.5	1.676	2.660	5.8	18.6
5 11	15 28.00	-14 39.3	1.968	2.975	1.7	21.1	5 11	15 28.16	-14 46.5	1.663	2.671	1.9	18.4
5 21	15 18.23	-14 17.3	1.954	2.956	3.4	21.1	5 21	15 18.12	-14 15.1	1.678	2.681	3.8	18.5
5 31	15 8.95	-13 59.0	1.968	2.936	7.2	21.3	5 31	15 8.97	-13 49.0	1.721	2.691	7.9	18.8
6 10	15 1.01	-13 47.2	2.008	2.915	10.8	21.5	6 10	15 1.60	-13 31.7	1.788	2.699	11.7	19.0
6 20	14 55.04	-13 44.2	2.071	2.894	14.0	21.7	6 20	14 56.54	-13 25.2	1.877	2.708	14.9	19.3
353540	2011 <i>SY</i> ₁₇₄		5 14.2 141°72	2°8/11.9	17		501100	2013 <i>SV</i> ₈₁		5 14.2 223°98	0°6/14.6	17	
4 11	15 45.87	-11 31.7	2.487	3.347	10.2	21.8	4 11	15 52.04	-20 45.3	2.184	3.029	12.0	21.6
4 21	15 40.88	-10 41.7	2.419	3.353	7.5	21.6	4 21	15 45.85	-20 49.3	2.094	3.020	8.9	21.4
5 1	15 34.47	-9 50.6	2.377	3.358	4.7	21.4	5 1	15 37.64	-20 46.8	2.029	3.010	5.4	21.2
5 11	15 27.25	-9 1.7	2.363	3.363	2.9	21.3	5 11	15 28.11	-20 38.3	1.991	2.999	1.6	20.9
5 21	15 19.89	-8 18.6	2.378	3.368	4.2	21.4	5 21	15 18.14	-20 25.2	1.982	2.988	2.7	20.9
5 31	15 13.07	-7 44.3	2.420	3.373	7.0	21.6	5 31	15 8.71	-20 10.1	2.001	2.976	6.6	21.2
6 10	15 7.39	-7 20.9	2.488	3.377	9.7	21.8	6 10	15 0.70	-19 56.3	2.047	2.964	10.2	21.4
6 20	15 3.26	-7 9.4	2.579	3.381	12.1	21.9	6 20	14 54.73	-19 46.8	2.115	2.951	13.3	21.5
253651	2003 <i>UU</i> ₁₄₃		5 14.2 270°81	3°0/15.5	17		90868	1996 <i>SX</i> ₇		5 14.2 142°54	3°0/12.1	18	</

EPHEMERIDES

5 14.2

5 14.2

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
276504	2003 <i>QW</i> ₆₇		5 14.2 319°22	3°8/11.8	17		390720	2003 <i>GM</i> ₇		5 14.2 346°37	7°4/16.8	16	
4 11	15 44.90	-13 51.0	1.455	2.339	14.7	19.9	4 11	15 52.38	-33 59.2	1.734	2.555	15.7	20.2
4 21	15 41.35	-12 40.7	1.368	2.314	10.9	19.6	4 21	15 47.07	-35 23.3	1.653	2.546	12.9	20.0
5 1	15 35.31	-11 22.5	1.303	2.290	6.7	19.3	5 1	15 38.85	-36 33.5	1.593	2.538	10.0	19.8
5 11	15 27.58	-10 2.4	1.263	2.266	3.9	19.0	5 11	15 28.53	-37 24.6	1.557	2.530	7.8	19.6
5 21	15 19.24	-8 47.7	1.247	2.243	6.2	19.1	5 21	15 17.35	-37 53.6	1.546	2.524	7.6	19.6
5 31	15 11.55	-7 46.3	1.256	2.220	10.7	19.3	5 31	15 6.81	-38 0.9	1.560	2.518	9.6	19.7
6 10	15 5.63	-7 3.9	1.286	2.199	15.2	19.5	6 10	14 58.28	-37 51.5	1.597	2.513	12.5	19.9
6 20	15 2.23	-6 43.1	1.335	2.178	19.2	19.7	6 20	14 52.66	-37 32.0	1.655	2.510	15.5	20.0
135214	2001 <i>RE</i> ₈₅		5 14.2 149°44	2°5/12.3	18		488786	2004 <i>XV</i> ₃		5 14.2 221°99	4°2/17.3	18	
4 11	15 46.72	-12 49.3	2.367	3.227	10.7	20.1	4 11	15 52.68	-33 33.5	2.583	3.381	11.8	23.0
4 21	15 41.59	-12 3.3	2.298	3.232	7.8	19.9	4 21	15 46.24	-33 40.5	2.484	3.369	9.4	22.8
5 1	15 34.94	-11 15.2	2.254	3.236	4.7	19.7	5 1	15 37.85	-33 33.5	2.408	3.356	6.9	22.7
5 11	15 27.41	-10 28.4	2.238	3.241	2.6	19.6	5 11	15 28.20	-33 11.5	2.359	3.343	4.7	22.5
5 21	15 19.71	-9 46.3	2.250	3.245	4.0	19.7	5 21	15 18.15	-32 35.1	2.339	3.329	4.4	22.4
5 31	15 12.59	-9 12.2	2.291	3.248	7.0	19.9	5 31	15 8.64	-31 46.9	2.347	3.313	6.3	22.5
6 10	15 6.68	-8 48.6	2.357	3.252	9.9	20.1	6 10	15 0.52	-30 51.8	2.383	3.298	9.0	22.7
6 20	15 2.42	-8 36.6	2.445	3.255	12.5	20.2	6 20	14 54.38	-29 55.1	2.442	3.281	11.6	22.8
411317	2010 <i>TN</i> ₁₇₈		5 14.2 150°36	0°6/14.6	16		148409	2000 <i>WF</i> ₂₀		5 14.2 239°22	0°1/14.3	18	
4 11	15 53.13	-21 29.4	1.967	2.814	13.1	22.8	4 11	15 47.40	-20 4.7	2.643	3.490	10.1	21.6
4 21	15 46.63	-21 19.7	1.896	2.823	9.7	22.6	4 21	15 42.15	-19 49.6	2.551	3.478	7.5	21.4
5 1	15 38.03	-21 1.6	1.850	2.831	5.8	22.4	5 1	15 35.34	-19 28.6	2.484	3.466	4.4	21.2
5 11	15 28.19	-20 36.2	1.831	2.839	1.7	22.1	5 11	15 27.57	-19 3.1	2.445	3.453	1.1	20.9
5 21	15 18.11	-20 6.2	1.840	2.846	2.8	22.2	5 21	15 19.49	-18 34.9	2.435	3.441	2.3	21.0
5 31	15 8.82	-19 35.1	1.877	2.853	6.9	22.5	5 31	15 11.84	-18 6.8	2.454	3.427	5.6	21.2
6 10	15 1.21	-19 7.3	1.940	2.859	10.6	22.7	6 10	15 5.30	-17 41.8	2.500	3.414	8.7	21.3
6 20	14 55.83	-18 46.0	2.026	2.864	13.7	22.9	6 20	15 0.35	-17 22.2	2.569	3.400	11.4	21.5
292622	2006 <i>UN</i> ₇		5 14.2 293°88	1°3/13.7	18		248649	2006 <i>HW</i> ₄₁		5 14.2 289°63	6°6/11.2	18	
4 11	15 51.54	-15 35.6	1.503	2.374	15.1	20.2	4 11	15 50.59	-5 40.8	1.419	2.294	15.5	20.0
4 21	15 46.20	-15 36.6	1.423	2.363	11.2	19.9	4 21	15 45.57	-4 55.1	1.339	2.276	12.0	19.7
5 1	15 38.16	-15 34.5	1.365	2.351	6.6	19.6	5 1	15 37.84	-4 13.5	1.281	2.257	8.4	19.5
5 11	15 28.30	-15 31.0	1.331	2.339	1.9	19.3	5 11	15 28.26	-3 42.5	1.246	2.238	6.6	19.3
5 21	15 17.80	-15 28.5	1.323	2.327	4.1	19.4	5 21	15 18.01	-3 27.7	1.237	2.219	8.4	19.4
5 31	15 8.03	-15 29.9	1.341	2.316	9.0	19.7	5 31	15 8.45	-3 33.3	1.250	2.201	12.2	19.5
6 10	15 0.19	-15 38.5	1.381	2.305	13.6	19.9	6 10	15 0.80	-4 0.5	1.286	2.182	16.4	19.7
6 20	14 55.06	-15 56.2	1.442	2.294	17.5	20.1	6 20	14 55.86	-4 47.8	1.339	2.163	20.1	19.9
523033	2016 <i>PW</i> ₁₂₅		5 14.2 155°14	0°3/13.9	17		5019	Erfjord		5 14.2 67°54	0°7/14.6	18	
4 11	15 46.81	-20 4.6	2.683	3.530	10.0	21.8	4 11	15 50.32	-23 2.2	1.481	2.345	15.7	16.7
4 21	15 41.54	-19 27.0	2.608	3.536	7.3	21.7	4 21	15 45.08	-22 28.3	1.418	2.352	11.6	16.4
5 1	15 34.88	-18 43.1	2.559	3.541	4.3	21.5	5 1	15 37.32	-21 41.2	1.377	2.360	7.0	16.2
5 11	15 27.41	-17 54.9	2.538	3.546	1.0	21.2	5 11	15 28.07	-20 43.6	1.360	2.368	2.0	15.9
5 21	15 19.80	-17 5.5	2.546	3.551	2.3	21.3	5 21	15 18.56	-19 40.4	1.369	2.376	3.3	16.0
5 31	15 12.72	-16 18.0	2.584	3.556	5.5	21.6	5 31	15 10.09	-18 38.3	1.405	2.384	8.2	16.3
6 10	15 6.78	-15 35.7	2.649	3.560	8.4	21.8	6 10	15 3.69	-17 44.0	1.463	2.392	12.6	16.6
6 20	15 2.37	-15 1.2	2.738	3.563	10.9	21.9	6 20	14 59.93	-17 1.9	1.542	2.401	16.3	16.8
130456	2000 <i>QE</i> ₆₃		5 14.2 222°49	0°2/14.2	18		185047	2006 <i>RQ</i> ₄		5 14.2 230°37	1°3/14.9	17	
4 11	15 54.11	-18 25.4	1.690	2.547	14.3	19.8	4 11	15 52.86	-23 1.8	1.949	2.794	13.3	21.4
4 21	15 47.84	-18 27.1	1.608	2.540	10.6	19.5	4 21	15 46.73	-22 58.1	1.859	2.783	10.0	21.1
5 1	15 39.02	-18 23.0	1.549	2.533	6.3	19.3	5 1	15 38.30	-22 44.9	1.792	2.771	6.1	20.9
5 11	15 28.51	-18 14.0	1.516	2.525	1.6	18.9	5 11	15 28.34	-22 22.3	1.751	2.758	2.2	20.6
5 21	15 17.46	-18 2.1	1.511	2.516	3.4	19.0	5 21	15 17.88	-21 52.4	1.738	2.744	3.0	20.6
5 31	15 7.13	-17 50.6	1.532	2.507	8.1	19.3	5 31	15 8.04	-21 18.8	1.753	2.730	7.2	20.8
6 10	14 58.66	-17 43.2	1.578	2.498	12.4	19.5	6 10	14 59.83	-20 46.3	1.794	2.715	11.1	21.0
6 20	14 52.75	-17 43.1	1.645	2.488	16.1	19.7	6 20	14 53.92	-20 19.1	1.857	2.700	14.6	21.2
213008	1995 <i>DB</i> ₃		5 14.2 101°81	3°0/12.2	18		181247	2005 <i>UP</i> ₆₆		5 14.2 273°06	1°0/13.7	18	
4 11	15 54.27	-21 7.8	1.113	1.991	18.7	19.5	4 11	15 47.66	-16 12.3	2.305	3.162	11.0	20.3
4 21	15 48.24	-18 40.9	1.061	2.005	13.6	19.2	4 21	15 42.47	-16 4.6	2.224	3.157	8.1	20.1
5 1	15 39.17	-15 53.9	1.030	2.019	7.8	18.9	5 1	15 35.58	-15 53.6	2.168	3.152	4.7	19.9
5 11	15 28.48	-12 59.2	1.025	2.032	3.1	18.7	5 11	15 27.64	-15 41.0	2.139	3.147	1.4	19.6
5 21	15 17.79	-10 12.5	1.046	2.045	6.3	18.9	5 21	15 19.39	-15 28.9	2.139	3.143	2.9	19.7
5 31	15 8.66	-7 49.0	1.092	2.058	11.8	19.3	5 31	15 11.67	-15 19.5	2.167	3.138	6.4	20.0
6 10	15 2.20	-5 58.0	1.161	2.070	16.7	19.6	6 10	15 5.20	-15 15.3	2.220	3.133	9.7	20.1
6 20	14 58.88	-4 42.0	1.247	2.082	20.7	19.9	6 20	15 0.48	-15 17.9	2.296	3.128	12.5	20.3
114545	2003 <i>BS</i> ₂₉		5 14.2 10°34	6°8/10.2	18		226031	2002 <i>FX</i> ₈		5 14.2 86°90	7°4/18.9	17	
4 11	15 46.26	-1 40.3	1.831	2.697	13.0	19.1	4 11	15 56.35	-39 1.7	1.904	2.691	15.7	20.6
4 21	15 41.61	-0 50.9	1.773	2.699	10.2	19.0	4 21	15 49.41	-39 41.8	1.845	2.712	13.0	20.5
5 1	15 35.10	-0 9.3	1.737	2.701	7.8	18.8	5 1	15 39.84	-40 0.9	1.806	2.733	10.2	20.3
5 11	15 27.49	+0 19.2	1.727	2.703	6.8	18.8	5 11	15 28.70	-39 56.1	1.792	2.753	8.0	20.2
5 21	15 19.66	+0 30.8	1.741	2.706	8.1	18.8	5 21	15 17.31	-39 27.6	1.803	2.773	7.4	20.2
5 31	15 12.53	+0 23.4	1.781	2.709	10.6	19.0	5 31	15 7.03	-38 39.5	1.840	2.793	8.7	20.3
6 10	15 6.88	-0 2.9	1.843	2.713	13.4	19.2	6 10	14 58.94	-37 39.0	1.901	2.813	11.1	20.5
6 20	15 3.20	-0 46.1	1.925	2.717	16.0	19.4	6 20	14 53.64	-36 34.0	1.985	2.832	13.6	20.7
320546	2008 <i>AC</i> ₁₇		5 14.2 58°24	1°7/15.1	17		62400	2000 <i>SA</i> ₁₇₁		5 14.2 292°70	1°3/13.4		

EPHEMERIDES

5 14.2

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
351965	2006 <i>UV</i> ₂		5 14.2 95°24	0.7/13.7	17		95238	2002 <i>CH</i> ₄₃		5 14.3 37°38	9.0/8.7	18	
4 11	15 47.75	-17 39.3	2.355	3.209	10.9	21.8	4 11	15 47.48	+ 8 1.6	2.143	2.977	12.6	18.8
4 21	15 42.35	-17 17.3	2.292	3.224	7.9	21.6	4 21	15 42.23	+ 8 47.3	2.093	2.983	10.7	18.7
5 1	15 35.41	-16 50.8	2.254	3.238	4.6	21.4	5 1	15 35.38	+ 9 18.4	2.066	2.989	9.3	18.6
5 11	15 27.59	-16 21.8	2.244	3.252	1.2	21.2	5 11	15 27.61	+ 9 30.5	2.064	2.995	9.0	18.6
5 21	15 19.64	-15 53.0	2.263	3.267	2.7	21.3	5 21	15 19.70	+ 9 20.8	2.085	3.001	9.9	18.6
5 31	15 12.33	-15 27.2	2.310	3.281	6.1	21.6	5 31	15 12.45	+ 8 48.9	2.131	3.008	11.5	18.7
6 10	15 6.30	-15 7.2	2.383	3.295	9.1	21.8	6 10	15 6.54	+ 7 56.4	2.199	3.015	13.5	18.9
6 20	15 1.98	-14 54.7	2.479	3.308	11.8	22.0	6 20	15 2.39	+ 6 46.8	2.286	3.022	15.3	19.0
137524	1999 <i>VM</i> ₄₉		5 14.2 223°13	0.3/14.4	17		16747	1996 <i>PS</i> ₈		5 14.3 46°78	2.4/15.5	18	
4 11	15 51.98	-21 44.5	2.041	2.888	12.7	21.6	4 11	15 50.68	-25 15.2	1.519	2.376	15.7	18.3
4 21	15 45.91	-21 13.6	1.950	2.877	9.4	21.4	4 21	15 45.42	-25 16.2	1.456	2.385	11.8	18.1
5 1	15 37.74	-20 32.7	1.884	2.865	5.6	21.1	5 1	15 37.58	-25 4.0	1.415	2.394	7.5	17.9
5 11	15 28.22	-19 43.4	1.844	2.852	1.5	20.8	5 11	15 28.19	-24 38.9	1.399	2.403	3.2	17.7
5 21	15 18.28	-18 49.1	1.833	2.839	2.9	20.9	5 21	15 18.50	-24 3.8	1.408	2.413	3.6	17.7
5 31	15 8.97	-17 54.6	1.851	2.825	7.0	21.1	5 31	15 9.81	-23 23.6	1.442	2.423	7.9	18.0
6 10	15 1.21	-17 4.8	1.894	2.810	10.9	21.3	6 10	15 3.20	-22 44.4	1.500	2.434	12.0	18.2
6 20	14 55.60	-16 24.0	1.960	2.794	14.2	21.5	6 20	14 59.27	-22 11.5	1.579	2.444	15.6	18.5
206853	2004 <i>FS</i> ₂₈		5 14.2 155°41	5.9/15.1	18		342497	2008 <i>UL</i> ₁₇₂		5 14.3 302°18	0.1/14.3	17	
4 11	16 9.64	-25 13.1	1.236	2.077	19.6	20.0	4 11	15 48.05	-21 13.2	1.857	2.716	13.2	21.3
4 21	16 0.68	-27 12.9	1.167	2.083	15.3	19.8	4 21	15 43.11	-20 38.7	1.781	2.714	9.7	21.1
5 1	15 47.33	-29 5.6	1.120	2.088	10.4	19.5	5 1	15 36.10	-19 54.4	1.727	2.711	5.8	20.8
5 11	15 30.75	-30 41.3	1.098	2.093	6.5	19.3	5 11	15 27.82	-19 2.8	1.700	2.709	1.4	20.5
5 21	15 12.92	-31 52.3	1.102	2.097	7.0	19.3	5 21	15 19.23	-18 7.7	1.700	2.706	3.0	20.6
5 31	14 56.26	-32 37.3	1.133	2.101	11.2	19.6	5 31	15 11.37	-17 14.3	1.727	2.704	7.2	20.9
6 10	14 42.82	-33 2.1	1.187	2.104	15.9	19.9	6 10	15 5.11	-16 27.6	1.779	2.701	11.1	21.1
6 20	14 33.75	-33 15.8	1.260	2.106	19.9	20.1	6 20	15 1.01	-15 51.3	1.853	2.699	14.4	21.3
510361	2011 <i>ST</i> ₂₄₈		5 14.3 225°95	2.3/15.9	18		70688	1999 <i>UZ</i> ₁₅		5 14.3 271°89	0.8/13.8	18	
4 11	15 49.15	-27 5.5	2.655	3.481	10.7	22.2	4 11	15 49.14	-17 38.8	1.889	2.750	12.9	19.5
4 21	15 43.52	-27 10.0	2.562	3.472	8.2	22.0	4 21	15 43.94	-17 22.2	1.806	2.742	9.5	19.3
5 1	15 36.21	-27 5.0	2.494	3.463	5.4	21.8	5 1	15 36.64	-16 59.9	1.748	2.733	5.6	19.0
5 11	15 27.82	-26 50.6	2.453	3.453	2.8	21.6	5 11	15 27.98	-16 34.0	1.715	2.724	1.5	18.7
5 21	15 19.11	-26 27.7	2.441	3.443	2.9	21.6	5 21	15 18.90	-16 7.4	1.710	2.715	3.3	18.9
5 31	15 10.87	-25 58.9	2.458	3.432	5.5	21.8	5 31	15 10.45	-15 43.6	1.732	2.705	7.5	19.1
6 10	15 3.81	-25 27.5	2.502	3.422	8.4	21.9	6 10	15 3.55	-15 26.3	1.778	2.696	11.4	19.3
6 20	14 58.47	-24 57.2	2.570	3.410	11.1	22.1	6 20	14 58.80	-15 18.1	1.846	2.687	14.7	19.5
370090	2001 <i>SF</i> ₂₄₁		5 14.3 208°05	0.2/14.1	17		172047	2001 <i>XY</i> ₇₁		5 14.3 36°14	5.4/13.1	17	
4 11	15 51.28	-19 10.5	2.065	2.917	12.4	22.1	4 11	15 56.45	- 1 50.6	1.686	2.539	14.6	18.6
4 21	15 45.33	-18 56.6	1.982	2.912	9.1	21.9	4 21	15 49.05	- 2 25.5	1.636	2.558	11.2	18.4
5 1	15 37.37	-18 36.3	1.923	2.906	5.4	21.7	5 1	15 39.46	- 3 11.7	1.609	2.578	7.7	18.2
5 11	15 28.13	-18 11.1	1.892	2.900	1.3	21.4	5 11	15 28.63	- 4 10.6	1.609	2.599	5.5	18.2
5 21	15 18.53	-17 43.4	1.889	2.894	2.9	21.5	5 21	15 17.68	- 5 21.4	1.636	2.621	6.5	18.3
5 31	15 9.55	-17 16.6	1.914	2.887	6.9	21.7	5 31	15 7.74	- 6 42.3	1.691	2.643	9.5	18.5
6 10	15 2.07	-16 54.4	1.964	2.880	10.6	21.9	6 10	14 59.71	- 8 10.6	1.772	2.665	12.7	18.7
6 20	14 56.65	-16 39.6	2.037	2.872	13.8	22.1	6 20	14 54.09	- 9 43.6	1.874	2.688	15.6	19.0
471813	2012 <i>WX</i> ₁₁		5 14.3 261°72	0.1/14.2	17		363403	2003 <i>OY</i> ₇		5 14.3 285°01	2.0/13.2	17	
4 11	15 47.23	-21 31.9	2.098	2.952	12.1	21.2	4 11	15 51.01	-16 46.0	1.526	2.397	14.9	21.5
4 21	15 42.31	-20 47.4	2.016	2.947	8.9	21.0	4 21	15 46.01	-16 3.8	1.427	2.366	11.1	21.2
5 1	15 35.55	-19 53.0	1.958	2.941	5.3	20.7	5 1	15 38.24	-15 12.3	1.349	2.335	6.7	20.9
5 11	15 27.67	-18 51.3	1.926	2.935	1.3	20.4	5 11	15 28.45	-14 14.9	1.296	2.304	2.3	20.5
5 21	15 19.51	-17 46.4	1.923	2.929	2.8	20.5	5 21	15 17.81	-13 16.8	1.270	2.272	4.7	20.6
5 31	15 11.99	-16 43.3	1.948	2.923	6.7	20.8	5 31	15 7.67	-12 24.4	1.268	2.240	9.9	20.8
6 10	15 5.88	-15 46.8	1.999	2.917	10.3	21.0	6 10	14 59.36	-11 44.2	1.290	2.207	14.8	21.0
6 20	15 1.70	-15 0.6	2.072	2.911	13.4	21.2	6 20	14 53.77	-11 20.3	1.331	2.174	19.2	21.2
44719	1999 <i>TP</i> ₉		5 14.3 261°78	0.9/14.7	18		349400	2007 <i>YK</i> ₃		5 14.3 18°97	4.1/12.0	17	
4 11	15 52.66	-21 51.1	1.749	2.602	14.2	19.7	4 11	15 48.32	- 7 34.9	1.977	2.842	12.3	20.4
4 21	15 46.92	-21 45.9	1.653	2.582	10.6	19.4	4 21	15 43.07	- 7 13.5	1.910	2.843	9.2	20.2
5 1	15 38.60	-21 31.1	1.580	2.561	6.5	19.1	5 1	15 35.99	- 6 55.4	1.867	2.845	6.1	20.0
5 11	15 28.50	-21 7.2	1.532	2.540	2.0	18.8	5 11	15 27.79	- 6 43.7	1.850	2.846	4.2	19.9
5 21	15 17.70	-20 36.3	1.512	2.518	3.2	18.8	5 21	15 19.34	- 6 41.4	1.860	2.848	5.5	20.0
5 31	15 7.48	-20 2.5	1.518	2.496	7.9	19.1	5 31	15 11.54	- 6 50.2	1.897	2.850	8.5	20.2
6 10	14 59.00	-19 30.9	1.550	2.473	12.4	19.3	6 10	15 5.17	- 7 11.2	1.958	2.853	11.7	20.3
6 20	14 53.05	-19 6.3	1.602	2.450	16.3	19.4	6 20	15 0.74	- 7 43.7	2.041	2.855	14.5	20.5
473270	2015 <i>MM</i> ₄₄		5 14.3 104°78	6.0/10.1	17		496941	2001 <i>WC</i> ₆₆		5 14.3 188°56	1.1/13.4	17	
4 11	15 47.56	- 0 18.1	2.382	3.232	11.0	21.1	4 11	15 50.01	-18 12.9	2.280	3.131	11.4	22.6
4 21	15 42.10	+ 0 27.4	2.331	3.246	8.7	21.0	4 21	15 44.14	-17 24.9	2.200	3.130	8.3	22.4
5 1	15 35.22	+ 1 5.5	2.306	3.261	6.7	20.9	5 1	15 36.55	-16 30.0	2.146	3.129	4.8	22.1
5 11	15 27.55	+ 1 32.2	2.307	3.275	6.0	20.9	5 11	15 27.93	-15 31.1	2.119	3.127	1.4	21.9
5 21	15 19.80	+ 1 44.8	2.335	3.289	7.0	20.9	5 21	15 19.08	-14 32.2	2.122	3.124	3.1	22.0
5 31	15 12.66	+ 1 41.8	2.389	3.303	9.0	21.1	5 31	15 10.85	-13 37.5	2.153	3.121	6.7	22.2
6 10	15 6.73	+ 1 23.3	2.468	3.316	11.2	21.3	6 10	15 3.98	-12 51.1	2.211	3.117	10.0	22.4
6 20	15 2.41	+ 0 50.9	2.567	3.329	13.2	21.4	6 20	14 58.93	-12 15.5	2.292	3.112	12.9	22.6
499356	2009 <i>XN</i> ₁₈		5 14.3 214°33	4.2/17.4	17		135965	2002 <i>TC</i> ₂₆₈					

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
364171	2006 JZ ₈₁		5 14.3 10°93	0°0/14.6 15			129045	2004 VR ₄		5 14.3 153°97	5°9/17.9 18		
4 11	15 27.64	-19 57.6	40.378	41.219	0.8	22.9	4 11	15 53.78	-35 45.6	2.097	2.897	14.1	20.1
4 21	15 26.92	-19 55.3	40.295	41.220	0.6	22.9	4 21	15 47.44	-36 16.5	2.020	2.901	11.5	19.9
5 1	15 26.13	-19 52.7	40.240	41.220	0.3	22.9	5 1	15 38.73	-36 30.5	1.965	2.905	8.7	19.8
5 11	15 25.31	-19 49.9	40.213	41.221	0.1	22.8	5 11	15 28.52	-36 25.4	1.934	2.908	6.5	19.6
5 21	15 24.47	-19 47.0	40.216	41.221	0.2	22.8	5 21	15 17.90	-36 1.1	1.930	2.912	6.0	19.6
5 31	15 23.66	-19 44.1	40.247	41.222	0.4	22.9	5 31	15 8.08	-35 20.8	1.953	2.915	7.7	19.7
6 10	15 22.89	-19 41.4	40.307	41.222	0.6	22.9	6 10	15 0.07	-34 30.3	2.002	2.918	10.4	19.9
6 20	15 22.20	-19 38.8	40.393	41.223	0.8	22.9	6 20	14 54.51	-33 36.1	2.073	2.920	13.1	20.1
103141	1999 XF ₂₀₆		5 14.3 144°99	1°7/15.4 18			75219	1999 VV ₂₁₉		5 14.3 83°24	5°1/11.4 18		
4 11	15 51.66	-24 30.4	2.391	3.224	11.5	20.2	4 11	15 50.94	- 9 13.3	1.527	2.400	14.8	19.1
4 21	15 45.35	-24 39.3	2.317	3.234	8.6	20.1	4 21	15 45.18	- 8 6.9	1.481	2.419	10.9	19.0
5 1	15 37.27	-24 39.8	2.268	3.242	5.4	19.9	5 1	15 37.23	- 7 2.0	1.459	2.438	7.2	18.8
5 11	15 28.11	-24 31.9	2.247	3.251	2.4	19.7	5 11	15 28.10	- 6 4.8	1.461	2.457	5.1	18.7
5 21	15 18.71	-24 16.9	2.254	3.259	2.7	19.7	5 21	15 18.89	- 5 20.9	1.490	2.476	6.8	18.8
5 31	15 9.95	-23 57.3	2.291	3.266	5.8	19.9	5 31	15 10.73	- 4 54.3	1.543	2.494	10.3	19.1
6 10	15 2.57	-23 36.5	2.354	3.273	8.9	20.1	6 10	15 4.48	- 4 46.4	1.620	2.512	13.8	19.3
6 20	14 57.09	-23 17.9	2.441	3.279	11.6	20.3	6 20	15 0.60	- 4 56.6	1.715	2.530	16.8	19.6
299288	2005 PJ ₁₁		5 14.3 315°31	0°8/13.8 16			266280	2007 BE ₄		5 14.3 41°69	7°0/18.5 17		
4 11	15 46.77	-17 56.4	1.944	2.808	12.5	20.9	4 11	15 51.94	-36 29.8	1.536	2.356	17.4	20.0
4 21	15 42.17	-17 36.2	1.860	2.796	9.2	20.7	4 21	15 46.66	-36 48.8	1.471	2.364	14.2	19.8
5 1	15 35.58	-17 10.1	1.800	2.785	5.4	20.4	5 1	15 38.46	-36 44.5	1.425	2.372	10.8	19.6
5 11	15 27.72	-16 40.2	1.765	2.774	1.4	20.1	5 11	15 28.46	-36 14.7	1.401	2.380	7.8	19.5
5 21	15 19.47	-16 9.6	1.758	2.763	3.2	20.2	5 21	15 18.11	-35 20.5	1.402	2.389	7.1	19.4
5 31	15 11.79	-15 41.9	1.778	2.752	7.2	20.5	5 31	15 8.91	-34 7.8	1.427	2.398	9.1	19.6
6 10	15 5.56	-15 20.8	1.822	2.742	11.0	20.7	6 10	15 2.07	-32 46.1	1.476	2.407	12.4	19.8
6 20	15 1.37	-15 8.8	1.888	2.732	14.3	20.9	6 20	14 58.23	-31 24.4	1.546	2.416	15.6	20.0
477168	2009 EM ₂₈		5 14.3 346°98	3°9/11.5 17			392100	2009 DW ₁₃₁		5 14.3 10°24	5°2/10.6 17		
4 11	15 44.40	-11 27.1	1.779	2.656	12.8	20.2	4 11	15 45.21	- 7 45.6	1.845	2.719	12.6	20.8
4 21	15 40.43	-10 23.4	1.708	2.650	9.5	20.0	4 21	15 40.88	- 6 34.2	1.783	2.720	9.5	20.7
5 1	15 34.53	- 9 17.2	1.661	2.644	6.0	19.8	5 1	15 34.73	- 5 24.1	1.745	2.721	6.5	20.5
5 11	15 27.45	- 8 14.1	1.640	2.639	3.9	19.6	5 11	15 27.50	- 4 21.1	1.733	2.723	5.2	20.4
5 21	15 20.07	- 7 19.3	1.644	2.635	5.7	19.7	5 21	15 20.06	- 3 30.5	1.746	2.726	6.7	20.5
5 31	15 13.37	- 6 37.8	1.675	2.632	9.2	19.9	5 31	15 13.31	- 2 56.3	1.786	2.728	9.7	20.7
6 10	15 8.14	- 6 12.6	1.728	2.629	12.6	20.1	6 10	15 8.00	- 2 40.6	1.848	2.732	12.8	20.9
6 20	15 4.94	- 6 4.6	1.802	2.626	15.7	20.3	6 20	15 4.63	- 2 43.0	1.930	2.735	15.5	21.1
84156	2002 RX ₈₂		5 14.3 143°56	0°9/14.9 18			178207	2006 VC ₃₃		5 14.3 57°42	0°3/14.5 17		
4 11	15 49.14	-22 40.4	2.233	3.079	11.8	19.9	4 11	15 46.75	-22 14.6	2.136	2.989	12.0	19.8
4 21	15 43.59	-22 27.7	2.159	3.084	8.7	19.7	4 21	15 41.88	-21 35.3	2.064	2.994	8.8	19.7
5 1	15 36.26	-22 6.7	2.109	3.089	5.3	19.5	5 1	15 35.26	-20 46.6	2.016	2.999	5.2	19.4
5 11	15 27.87	-21 38.5	2.087	3.094	1.7	19.3	5 11	15 27.63	-19 50.9	1.996	3.004	1.4	19.2
5 21	15 19.24	-21 5.4	2.092	3.098	2.5	19.3	5 21	15 19.82	-18 51.9	2.003	3.009	2.6	19.3
5 31	15 11.26	-20 30.8	2.126	3.102	6.1	19.6	5 31	15 12.68	-17 54.3	2.038	3.014	6.3	19.5
6 10	15 4.69	-19 58.6	2.186	3.106	9.4	19.8	6 10	15 6.95	-17 2.5	2.099	3.020	9.8	19.7
6 20	15 0.00	-19 32.0	2.269	3.110	12.3	20.0	6 20	15 3.09	-16 19.9	2.183	3.025	12.7	19.9
317662	2003 FY ₁₂₂		5 14.3 14°59	2°6/12.2 17			231324	2006 DQ ₃		5 14.3 173°41	1°4/13.4 18		
4 11	15 45.55	-13 25.0	2.225	3.089	11.1	20.7	4 11	15 49.11	-16 50.8	2.001	2.861	12.3	20.8
4 21	15 40.89	-12 29.0	2.153	3.090	8.1	20.5	4 21	15 43.70	-16 16.8	1.927	2.862	9.0	20.6
5 1	15 34.65	-11 29.8	2.107	3.090	4.9	20.3	5 1	15 36.39	-15 37.4	1.878	2.863	5.3	20.4
5 11	15 27.46	-10 31.5	2.087	3.090	2.7	20.1	5 11	15 27.93	-14 55.4	1.856	2.864	1.7	20.1
5 21	15 20.08	- 9 38.1	2.096	3.091	4.2	20.2	5 21	15 19.21	-14 14.5	1.862	2.864	3.4	20.3
5 31	15 13.28	- 8 53.6	2.132	3.091	7.4	20.4	5 31	15 11.18	-13 38.7	1.895	2.865	7.3	20.5
6 10	15 7.73	- 8 20.8	2.194	3.092	10.4	20.6	6 10	15 4.63	-13 11.3	1.953	2.865	10.8	20.7
6 20	15 3.89	- 8 1.3	2.277	3.092	13.1	20.8	6 20	15 0.08	-12 54.7	2.034	2.865	13.9	20.9
156411	2002 AM ₅₅		5 14.3 335°20	1°6/15.1 18			371102	2005 VH ₇		5 14.3 190°64	4°1/11.8 18		
4 11	15 48.94	-23 48.8	1.592	2.452	14.9	19.8	4 11	15 50.72	- 7 32.3	2.194	3.049	11.6	21.7
4 21	15 44.18	-23 40.2	1.516	2.447	11.2	19.5	4 21	15 44.70	- 7 0.1	2.120	3.048	8.7	21.5
5 1	15 36.93	-23 19.5	1.462	2.443	7.0	19.3	5 1	15 36.92	- 6 30.1	2.071	3.046	5.8	21.4
5 11	15 28.08	-22 47.6	1.432	2.439	2.6	19.0	5 11	15 28.06	- 6 5.9	2.050	3.044	4.1	21.2
5 21	15 18.78	-22 7.6	1.428	2.435	3.3	19.0	5 21	15 18.94	- 5 50.3	2.057	3.041	5.4	21.3
5 31	15 10.31	-21 24.3	1.450	2.431	7.8	19.3	5 31	15 10.41	- 5 45.9	2.091	3.038	8.3	21.5
6 10	15 3.72	-20 43.6	1.496	2.428	12.1	19.5	6 10	15 3.23	- 5 53.9	2.151	3.034	11.3	21.7
6 20	14 59.69	-20 10.5	1.563	2.425	15.8	19.8	6 20	14 57.90	- 6 14.2	2.232	3.029	13.9	21.8
204332	2004 RJ ₂₁₁		5 14.3 305°12	7°9/17.6 17			136963	1998 RR ₃₁		5 14.3 209°16	0°2/14.1 18		
4 11	15 51.03	-34 32.9	1.250	2.092	19.3	20.3	4 11	15 50.85	-20 38.9	1.873	2.727	13.3	20.2
4 21	15 47.07	-35 9.0	1.157	2.066	15.9	20.0	4 21	15 45.18	-20 3.6	1.792	2.723	9.8	20.0
5 1	15 39.37	-35 22.3	1.083	2.041	12.1	19.7	5 1	15 37.36	-19 18.7	1.735	2.719	5.8	19.7
5 11	15 28.83	-35 6.8	1.030	2.015	8.7	19.4	5 11	15 28.19	-18 26.5	1.705	2.713	1.4	19.4
5 21	15 17.03	-34 20.3	0.998	1.990	8.1	19.3	5 21	15 18.67	-17 31.1	1.702	2.708	3.1	19.5
5 31	15 6.02	-33 7.0	0.989	1.966	11.2	19.3	5 31	15 9.89	-16 37.5	1.727	2.702	7.4	19.8
6 10	14 57.66	-31 37.6	1.001	1.942	15.7	19.5	6 10	15 2.74	-15 50.9	1.777	2.695	11.4	20.0
6 20	14 53.11	-30 4.9	1.031	1.918	20.3	19.7	6 20	14 57.84	-15 14.9	1.849	2.688	14.8	20.2
118139	4041 T- ₃		5 14.3 162°65	2°4/12.1 18			353705	2011 UL ₄₀₀		5 14.3 232°74	5°5/18.5 17		
4 11													

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
477206	2009 <i>HR</i> ₉₇		5 14.3 335°31	3°8/12.9 17			20916	4628 <i>P-L</i>		5 14.3 202°26	1°4/15.3 18		
4 11	15 50.22	- 7 39.2	1.749	2.616	13.5	19.5	4 11	15 48.35	-24 16.5	2.768	3.601	10.1	20.1
4 21	15 44.89	- 7 52.0	1.668	2.603	10.2	19.2	4 21	15 42.83	-24 17.5	2.681	3.598	7.6	20.0
5 1	15 37.30	- 8 10.4	1.610	2.591	6.5	19.0	5 1	15 35.79	-24 11.0	2.620	3.594	4.8	19.8
5 11	15 28.21	- 8 36.8	1.578	2.579	3.9	18.8	5 11	15 27.80	-23 57.4	2.586	3.590	2.0	19.6
5 21	15 18.60	- 9 12.4	1.573	2.568	5.3	18.9	5 21	15 19.55	-23 38.1	2.581	3.586	2.3	19.6
5 31	15 9.58	- 9 58.0	1.594	2.557	9.0	19.1	5 31	15 11.76	-23 15.3	2.606	3.581	5.2	19.8
6 10	15 2.14	-10 53.4	1.639	2.548	12.7	19.3	6 10	15 5.08	-22 51.9	2.658	3.576	8.0	20.0
6 20	14 56.98	-11 57.4	1.706	2.539	16.1	19.5	6 20	14 59.98	-22 30.7	2.734	3.571	10.6	20.1
250465	2004 <i>BY</i> ₁₂₁		5 14.3 319°70	15°4/14.9 18			215864	2005 <i>EC</i> ₁₄₂		5 14.3 19°80	0°8/14.7 17		
4 11	16 7.65	-37 12.0	0.995	1.825	24.0	19.4	4 11	15 50.40	-22 56.0	1.443	2.308	15.9	20.2
4 21	16 1.40	-40 36.1	0.930	1.819	20.7	19.2	4 21	15 45.37	-22 28.0	1.374	2.309	11.9	19.9
5 1	15 49.14	-43 46.1	0.883	1.813	17.6	18.9	5 1	15 37.66	-21 46.6	1.326	2.309	7.2	19.7
5 11	15 31.60	-46 22.0	0.856	1.808	15.6	18.8	5 11	15 28.31	-20 54.1	1.302	2.310	2.1	19.3
5 21	15 11.09	-48 5.9	0.850	1.803	15.9	18.8	5 21	15 18.57	-19 55.0	1.304	2.311	3.4	19.4
5 31	14 51.34	-48 52.3	0.864	1.798	18.2	18.9	5 31	15 9.81	-18 56.0	1.332	2.312	8.4	19.7
6 10	14 35.98	-48 51.6	0.895	1.794	21.5	19.1	6 10	15 3.16	-18 3.9	1.383	2.314	13.0	20.0
6 20	14 27.01	-48 22.2	0.941	1.790	24.8	19.3	6 20	14 59.24	-17 23.6	1.453	2.315	16.9	20.2
235341	2003 <i>UB</i> ₂₃₈		5 14.3 255°52	1°3/13.5 17			292403	2006 <i>SS</i> ₂₈₄		5 14.3 230°12	4°1/10.8 17		
4 11	15 49.93	-15 53.0	2.259	3.113	11.3	21.1	4 11	15 46.47	- 6 56.4	2.607	3.463	9.9	21.8
4 21	15 44.31	-15 36.3	2.163	3.094	8.4	20.9	4 21	15 41.42	- 6 2.2	2.525	3.452	7.5	21.6
5 1	15 36.81	-15 15.8	2.091	3.074	4.9	20.7	5 1	15 34.95	- 5 9.1	2.469	3.441	5.2	21.5
5 11	15 28.07	-14 53.3	2.046	3.054	1.6	20.4	5 11	15 27.59	- 4 21.0	2.441	3.429	4.1	21.4
5 21	15 18.88	-14 31.3	2.030	3.033	3.2	20.5	5 21	15 19.99	- 3 41.3	2.441	3.417	5.3	21.4
5 31	15 10.13	-14 12.7	2.043	3.012	6.9	20.7	5 31	15 12.83	- 3 13.0	2.469	3.405	7.7	21.6
6 10	15 2.65	-14 0.3	2.081	2.990	10.4	20.8	6 10	15 6.71	- 2 57.8	2.523	3.392	10.3	21.7
6 20	14 57.02	-13 56.3	2.142	2.967	13.5	21.0	6 20	15 2.08	- 2 56.1	2.598	3.378	12.6	21.9
241906	2001 <i>YR</i> ₈₆		5 14.3 1°69	14°3/ 7.1 17			389288	2009 <i>HQ</i> ₉₉		5 14.3 83°25	2°6/12.1 14 C		
4 11	15 48.81	+18 51.3	1.711	2.513	16.6	19.0	4 11	15 47.45	-13 56.1	2.229	3.090	11.2	21.4
4 21	15 43.63	+19 42.0	1.667	2.512	15.3	18.9	4 21	15 42.11	-12 48.0	2.177	3.112	8.1	21.2
5 1	15 36.37	+20 6.1	1.642	2.511	14.4	18.8	5 1	15 35.28	-11 37.2	2.151	3.134	4.9	21.1
5 11	15 27.92	+19 57.0	1.638	2.512	14.3	18.8	5 11	15 27.65	-10 27.9	2.152	3.155	2.6	20.9
5 21	15 19.31	+19 12.2	1.654	2.513	15.1	18.8	5 21	15 19.99	- 9 24.6	2.183	3.177	4.2	21.1
5 31	15 11.57	+17 52.7	1.689	2.516	16.4	18.9	5 31	15 13.05	- 8 31.3	2.241	3.198	7.2	21.3
6 10	15 5.55	+16 3.4	1.744	2.519	18.0	19.0	6 10	15 7.44	- 7 50.9	2.325	3.219	10.1	21.5
6 20	15 1.74	+13 51.4	1.815	2.523	19.6	19.2	6 20	15 3.54	- 7 24.3	2.432	3.239	12.6	21.7
18281	<i>Tros</i>		5 14.3 262°32	1°9/11.7 18			323037	2002 <i>RS</i> ₁₃		5 14.3 249°11	2°4/15.5 17		
4 11	15 39.53	- 9 37.6	4.495	5.349	6.1	19.8	4 11	15 53.30	-25 17.6	1.846	2.688	14.0	21.4
4 21	15 35.90	- 9 9.0	4.412	5.341	4.5	19.7	4 21	15 47.33	-25 26.9	1.753	2.673	10.7	21.1
5 1	15 31.52	- 8 40.7	4.356	5.334	2.9	19.5	5 1	15 38.85	-25 25.2	1.683	2.658	6.9	20.9
5 11	15 26.70	- 8 14.4	4.330	5.327	1.9	19.4	5 11	15 28.65	-25 11.7	1.638	2.642	3.1	20.6
5 21	15 21.77	- 7 51.6	4.333	5.319	2.7	19.5	5 21	15 17.81	-24 47.5	1.621	2.625	3.5	20.6
5 31	15 17.06	- 7 33.5	4.365	5.312	4.3	19.6	5 31	15 7.58	-24 16.0	1.630	2.608	7.5	20.8
6 10	15 12.92	- 7 21.3	4.423	5.305	6.0	19.7	6 10	14 59.08	-23 42.4	1.665	2.590	11.6	21.0
6 20	15 9.57	- 7 15.6	4.507	5.297	7.5	19.8	6 20	14 53.07	-23 11.9	1.722	2.572	15.2	21.2
207777	2007 <i>TY</i> ₇₆		5 14.3 302°26	0°8/13.8 17			17121	<i>Fernandonido</i>		5 14.3 237°83	2°9/12.7 18		
4 11	15 47.90	-18 1.2	1.958	2.820	12.5	20.5	4 11	15 49.96	-12 1.1	1.930	2.794	12.6	18.4
4 21	15 42.92	-17 36.3	1.881	2.817	9.2	20.2	4 21	15 44.46	-11 33.8	1.851	2.786	9.3	18.2
5 1	15 35.99	-17 5.2	1.828	2.813	5.4	20.0	5 1	15 36.93	-11 5.3	1.796	2.778	5.7	17.9
5 11	15 27.85	-16 30.4	1.802	2.810	1.4	19.7	5 11	15 28.13	-10 38.7	1.767	2.770	3.0	17.8
5 21	15 19.40	-15 55.1	1.802	2.807	3.2	19.8	5 21	15 18.94	-10 17.5	1.766	2.762	4.6	17.8
5 31	15 11.60	-15 23.2	1.830	2.804	7.2	20.1	5 31	15 10.37	-10 4.7	1.791	2.754	8.2	18.0
6 10	15 5.29	-14 58.4	1.883	2.801	10.8	20.3	6 10	15 3.30	-10 2.8	1.842	2.745	11.8	18.2
6 20	15 1.00	-14 43.0	1.958	2.798	14.0	20.5	6 20	14 58.29	-10 12.8	1.913	2.736	15.0	18.4
297626	2001 <i>TB</i> ₇₀		5 14.3 196°25	0°9/13.6 18			318987	2005 <i>UJ</i> ₃₇₂		5 14.3 334°79	2°3/15.3 17		
4 11	15 47.26	-17 21.5	2.776	3.625	9.6	22.2	4 11	15 50.35	-24 8.8	1.536	2.396	15.4	20.7
4 21	15 41.93	-16 51.5	2.693	3.622	7.0	22.1	4 21	15 45.39	-24 22.3	1.460	2.390	11.7	20.4
5 1	15 35.20	-16 17.1	2.636	3.619	4.1	21.9	5 1	15 37.76	-24 24.6	1.406	2.385	7.4	20.2
5 11	15 27.64	-15 40.2	2.607	3.615	1.2	21.6	5 11	15 28.37	-24 15.3	1.375	2.380	3.1	19.9
5 21	15 19.87	-15 3.3	2.608	3.611	2.6	21.7	5 21	15 18.43	-23 56.1	1.371	2.376	3.7	19.9
5 31	15 12.56	-14 29.4	2.638	3.606	5.6	21.9	5 31	15 9.31	-23 30.8	1.391	2.372	8.1	20.2
6 10	15 6.31	-14 0.9	2.695	3.601	8.4	22.1	6 10	15 2.19	-23 5.0	1.435	2.369	12.4	20.4
6 20	15 1.53	-13 39.9	2.776	3.595	10.9	22.3	6 20	14 57.78	-22 43.5	1.500	2.366	16.2	20.6
141272	2001 <i>YJ</i> ₄₂		5 14.3 113°98	0°1/14.3 18			31754	1999 <i>JT</i> ₉₅		5 14.3 164°84	4°3/10.9 18		
4 11	15 48.98	-19 19.6	2.391	3.240	11.0	20.4	4 11	15 46.48	- 6 51.6	2.355	3.216	10.7	19.1
4 21	15 43.35	-19 17.6	2.321	3.249	8.0	20.3	4 21	15 41.49	- 5 59.6	2.288	3.218	8.1	18.9
5 1	15 36.09	-19 10.5	2.276	3.258	4.7	20.1	5 1	15 34.99	- 5 9.8	2.246	3.219	5.6	18.7
5 11	15 27.87	-18 59.5	2.259	3.267	1.2	19.8	5 11	15 27.61	- 4 26.0	2.232	3.221	4.3	18.7
5 21	15 19.44	-18 46.2	2.270	3.276	2.4	19.9	5 21	15 20.05	- 3 51.9	2.245	3.222	5.6	18.7
5 31	15 11.61	-18 33.0	2.310	3.285	5.8	20.2	5 31	15 13.04	- 3 30.2	2.285	3.224	8.1	18.9
6 10	15 5.06	-18 22.6	2.376	3.293	9.0	20.4	6 10	15 7.21	- 3 22.3	2.350	3.225	10.7	19.1
6 20	15 0.25	-18 17.0	2.466	3.301	11.7	20.6	6 20	15 2.99	- 3 28.3	2.436	3.226	13.1	19.2
255815	2006 <i>SP</i> ₅₁		5 14.3 310°03	5°4/12.2 17			143606	2003 <i>FZ</i> ₉₂		5 14.3			

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
190034	2004 <i>RZ</i> ₆₁		5 14.3 237°92	0°2/14.2	18		309990	2009 <i>HC</i> ₉₄		5 14.3 301°95	0°5/14.0	17	
4 11	15 50.23	-19 47.0	2.090	2.942	12.2	21.8	4 11	15 49.01	-16 56.6	2.167	3.023	11.7	20.1
4 21	15 44.64	-19 27.0	2.001	2.931	9.0	21.5	4 21	15 43.68	-17 3.9	2.082	3.015	8.6	19.9
5 1	15 37.05	-18 59.6	1.936	2.919	5.4	21.3	5 1	15 36.47	-17 8.1	2.022	3.006	5.1	19.6
5 11	15 28.17	-18 26.4	1.898	2.906	1.3	21.0	5 11	15 28.04	-17 10.1	1.989	2.997	1.3	19.4
5 21	15 18.88	-17 50.4	1.888	2.893	2.8	21.1	5 21	15 19.22	-17 11.4	1.983	2.989	2.8	19.5
5 31	15 10.16	-17 15.0	1.906	2.880	6.9	21.3	5 31	15 10.91	-17 13.9	2.006	2.980	6.6	19.7
6 10	15 2.87	-16 44.5	1.949	2.866	10.6	21.5	6 10	15 3.93	-17 19.9	2.054	2.972	10.1	19.9
6 20	14 57.61	-16 21.9	2.016	2.852	13.8	21.7	6 20	14 58.85	-17 31.1	2.125	2.964	13.1	20.1
176056	2000 <i>TC</i> ₅₂		5 14.3 246°50	2°9/16.0	16		315309	2007 <i>TF</i> ₂₃₃		5 14.3 171°32	0°3/14.2	16	
4 11	15 50.12	-27 26.7	2.373	3.202	11.7	20.6	4 11	15 53.75	-19 2.9	1.879	2.731	13.4	21.7
4 21	15 44.47	-27 47.7	2.286	3.196	9.0	20.4	4 21	15 47.28	-18 50.8	1.805	2.735	9.9	21.5
5 1	15 36.91	-27 59.0	2.222	3.190	6.1	20.2	5 1	15 38.60	-18 32.0	1.755	2.738	5.8	21.3
5 11	15 28.13	-27 59.8	2.186	3.184	3.4	20.0	5 11	15 28.57	-18 8.1	1.732	2.740	1.4	21.0
5 21	15 18.95	-27 50.7	2.177	3.177	3.4	20.0	5 21	15 18.21	-17 41.6	1.737	2.742	3.1	21.1
5 31	15 10.29	-27 33.9	2.197	3.171	6.1	20.2	5 31	15 8.64	-17 16.2	1.769	2.743	7.3	21.4
6 10	15 2.98	-27 12.9	2.243	3.165	9.2	20.4	6 10	15 0.76	-16 55.9	1.827	2.744	11.2	21.6
6 20	14 57.59	-26 51.5	2.312	3.158	12.0	20.5	6 20	14 55.19	-16 43.5	1.908	2.743	14.5	21.8
35909	1999 <i>JY</i> ₉₃		5 14.3 181°44	4°8/11.8	18		258427	2001 <i>XL</i> ₁₉₈		5 14.3 38°32	3°5/12.7	18	
4 11	15 51.97	- 8 42.9	1.656	2.523	14.1	18.4	4 11	15 49.89	-13 36.0	1.173	2.060	17.2	19.6
4 21	15 46.08	- 7 56.6	1.589	2.524	10.6	18.2	4 21	15 45.15	-12 53.3	1.122	2.069	12.6	19.4
5 1	15 37.93	- 7 11.6	1.545	2.524	6.9	18.0	5 1	15 37.58	-12 7.3	1.092	2.079	7.6	19.1
5 11	15 28.38	- 6 32.9	1.527	2.524	4.8	17.8	5 11	15 28.33	-11 23.6	1.084	2.089	3.6	18.9
5 21	15 18.51	- 6 5.1	1.536	2.524	6.4	17.9	5 21	15 18.81	-10 48.1	1.100	2.100	5.9	19.1
5 31	15 9.47	- 5 51.9	1.570	2.523	10.0	18.1	5 31	15 10.49	-10 26.2	1.140	2.112	10.7	19.4
6 10	15 2.19	- 5 55.1	1.628	2.521	13.7	18.4	6 10	15 4.50	-10 20.9	1.200	2.124	15.2	19.7
6 20	14 57.28	- 6 14.4	1.705	2.520	16.9	18.6	6 20	15 1.43	-10 32.6	1.279	2.136	19.0	20.0
349493	2008 <i>GN</i> ₃₉		5 14.3 117°29	3°7/11.2	17		457632	2009 <i>BY</i> ₁₃₅		5 14.3 66°76	0°2/14.2	16	
4 11	15 46.79	- 7 14.5	2.752	3.606	9.6	22.2	4 11	15 53.14	-20 8.8	1.282	2.154	17.1	21.8
4 21	15 41.43	- 6 27.2	2.697	3.624	7.1	22.1	4 21	15 47.30	-19 44.0	1.235	2.174	12.5	21.6
5 1	15 34.83	- 5 42.1	2.669	3.642	4.8	21.9	5 1	15 38.71	-19 9.2	1.209	2.195	7.3	21.4
5 11	15 27.56	- 5 2.2	2.669	3.659	3.7	21.9	5 11	15 28.58	-18 27.4	1.206	2.215	1.8	21.1
5 21	15 20.22	- 4 30.5	2.698	3.676	4.7	22.0	5 21	15 18.34	-17 43.5	1.229	2.235	3.7	21.2
5 31	15 13.43	- 4 9.1	2.755	3.692	6.9	22.2	5 31	15 9.41	-17 3.5	1.277	2.256	8.9	21.6
6 10	15 7.69	- 3 59.1	2.837	3.708	9.2	22.3	6 10	15 2.85	-16 32.9	1.347	2.276	13.4	21.9
6 20	15 3.36	- 4 0.5	2.943	3.724	11.3	22.5	6 20	14 59.18	-16 14.8	1.437	2.296	17.2	22.2
120738	1997 <i>TO</i> ₁₇		5 14.3 211°21	4°0/12.1	16		463564	2013 <i>RC</i> ₇₅		5 14.3 329°62	1°7/15.0	17	
4 11	15 51.51	-11 31.0	1.606	2.476	14.3	20.3	4 11	15 47.17	-22 51.2	1.214	2.094	17.3	20.6
4 21	15 45.87	-10 37.3	1.534	2.472	10.6	20.1	4 21	15 43.71	-22 54.9	1.134	2.076	13.1	20.3
5 1	15 37.87	- 9 41.3	1.485	2.468	6.7	19.8	5 1	15 37.11	-22 45.9	1.074	2.059	8.2	20.0
5 11	15 28.39	- 8 48.2	1.462	2.463	4.0	19.6	5 11	15 28.31	-22 24.4	1.036	2.043	2.9	19.6
5 21	15 18.51	- 8 3.2	1.465	2.458	5.9	19.7	5 21	15 18.68	-21 53.1	1.020	2.028	3.9	19.6
5 31	15 9.44	- 7 31.5	1.494	2.452	9.9	20.0	5 31	15 9.86	-21 17.3	1.028	2.014	9.5	19.9
6 10	15 2.18	- 7 16.1	1.546	2.446	13.9	20.2	6 10	15 3.33	-20 44.2	1.057	2.001	14.8	20.2
6 20	14 57.37	- 7 17.9	1.617	2.440	17.3	20.4	6 20	15 0.00	-20 19.8	1.104	1.989	19.4	20.4
425693	2011 <i>AL</i> ₆₅		5 14.3 221°36	0°7/14.7	17		62311	2000 <i>SF</i> ₁₁₉		5 14.3 221°37	2°8/11.9	18	
4 11	15 52.03	-21 48.1	2.043	2.889	12.7	22.3	4 11	15 46.00	-11 53.0	2.550	3.409	10.0	19.6
4 21	15 46.02	-21 36.9	1.955	2.880	9.5	22.1	4 21	15 41.12	-11 1.8	2.470	3.403	7.4	19.5
5 1	15 37.90	-21 17.1	1.890	2.871	5.7	21.8	5 1	15 34.80	-10 8.6	2.416	3.397	4.6	19.3
5 11	15 28.40	-20 49.6	1.853	2.861	1.7	21.5	5 11	15 27.61	- 9 17.0	2.390	3.390	2.8	19.1
5 21	15 18.47	-20 16.6	1.844	2.850	2.8	21.6	5 21	15 20.20	- 8 30.3	2.393	3.384	4.1	19.2
5 31	15 9.15	-19 42.0	1.863	2.839	6.9	21.8	5 31	15 13.27	- 7 51.9	2.424	3.377	6.9	19.4
6 10	15 1.36	-19 9.9	1.908	2.827	10.7	22.0	6 10	15 7.43	- 7 24.2	2.480	3.370	9.7	19.5
6 20	14 55.73	-18 44.2	1.975	2.814	14.0	22.2	6 20	15 3.11	- 7 8.4	2.559	3.362	12.2	19.7
513011	2017 <i>UO</i> ₄₇		5 14.3 275°89	4°2/12.1	18		47143	1999 <i>LL</i> ₃₁		5 14.3 177°21	18°4/ 2.3	18	
4 11	15 51.64	- 9 49.9	1.736	2.602	13.6	21.6	4 11	15 55.09	+19 44.4	1.326	2.134	20.3	17.9
4 21	15 46.12	- 9 14.9	1.640	2.575	10.3	21.3	4 21	15 48.76	+22 4.7	1.295	2.137	19.0	17.8
5 1	15 38.17	- 8 39.4	1.567	2.548	6.7	21.0	5 1	15 39.63	+23 52.3	1.281	2.138	18.4	17.7
5 11	15 28.52	- 8 7.7	1.520	2.520	4.2	20.8	5 11	15 28.84	+24 55.5	1.286	2.139	18.8	17.8
5 21	15 18.16	- 7 44.1	1.500	2.492	6.0	20.8	5 21	15 17.82	+25 8.5	1.309	2.139	19.9	17.8
5 31	15 8.28	- 7 32.6	1.505	2.463	10.0	21.0	5 31	15 8.01	+24 31.6	1.348	2.139	21.5	17.9
6 10	14 59.99	- 7 36.1	1.535	2.434	14.0	21.2	6 10	15 0.51	+23 11.3	1.401	2.137	23.3	18.1
6 20	14 54.04	- 7 55.3	1.584	2.404	17.7	21.3	6 20	14 55.93	+21 17.1	1.466	2.135	25.0	18.2
183211	2002 <i>TZ</i> ₃₀		5 14.3 217°10	0°8/13.8	18		386278	2008 <i>QN</i> ₁₀		5 14.3 237°33	3°0/16.2	17	
4 11	15 51.37	-18 21.3	1.993	2.847	12.6	21.1	4 11	15 52.07	-28 24.5	2.289	3.113	12.3	22.3
4 21	15 45.50	-17 52.8	1.908	2.840	9.3	20.9	4 21	15 46.04	-28 31.0	2.191	3.099	9.5	22.1
5 1	15 37.57	-17 17.4	1.848	2.831	5.5	20.6	5 1	15 37.93	-28 25.7	2.118	3.084	6.4	21.9
5 11	15 28.31	-16 37.3	1.814	2.823	1.4	20.3	5 11	15 28.45	-28 8.0	2.071	3.068	3.6	21.7
5 21	15 18.68	-15 55.9	1.809	2.813	3.2	20.5	5 21	15 18.49	-27 38.9	2.052	3.052	3.5	21.6
5 31	15 9.67	-15 17.4	1.831	2.803	7.3	20.7	5 31	15 9.06	-27 1.3	2.061	3.036	6.4	21.8
6 10	15 2.20	-14 45.7	1.880	2.793	11.1	20.9	6 10	15 1.06	-26 19.7	2.097	3.018	9.7	21.9
6 20	14 56.84	-14 24.0	1.950	2.781	14.4	21.1	6 20	14 55.12	-25 39.1	2.157	3.001	12.8	22.1
480818	1998 <i>SJ</i> ₆₀		5 14.3 257°68	1°4/15.4	18		93599	2000 <i>UA</i>					

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
498340	2007 VW ₂₄₃		5 14.3 120°68	1°4/15.6	17		504745	2009 WG ₂₄		5 14.3 206°38	6°8/11.4	18	
4 11	15 49.28	-26 32.2	2.663	3.490	10.6	21.4	4 11	15 56.78	+ 2 59.5	2.247	3.075	12.3	21.2
4 21	15 43.39	-25 55.0	2.595	3.508	8.0	21.3	4 21	15 49.13	+ 3 4.9	2.170	3.070	10.0	21.1
5 1	15 36.04	-25 7.5	2.552	3.525	5.0	21.1	5 1	15 39.59	+ 2 58.8	2.118	3.064	7.8	20.9
5 11	15 27.92	-24 11.2	2.538	3.542	2.1	20.9	5 11	15 28.86	+ 2 37.9	2.093	3.058	6.8	20.8
5 21	15 19.74	-23 9.2	2.553	3.558	2.3	20.9	5 21	15 17.82	+ 2 0.5	2.097	3.051	7.7	20.9
5 31	15 12.22	-22 5.4	2.598	3.574	5.2	21.2	5 31	15 7.39	+ 1 6.6	2.129	3.044	9.9	21.0
6 10	15 5.96	-21 4.0	2.671	3.589	8.0	21.4	6 10	14 58.38	- 0 2.2	2.188	3.036	12.4	21.2
6 20	15 1.36	-20 8.7	2.769	3.604	10.5	21.6	6 20	14 51.34	- 1 23.0	2.268	3.027	14.8	21.3
105835	2000 SW ₁₅₀		5 14.3 164°67	1°4/15.3	18		346177	2007 WO ₈		5 14.3 150°96	1°0/15.0	18	
4 11	15 48.65	-24 15.8	2.689	3.524	10.4	20.3	4 11	15 49.18	-23 1.2	2.556	3.394	10.7	21.6
4 21	15 43.08	-24 15.3	2.610	3.527	7.8	20.2	4 21	15 43.48	-22 52.6	2.480	3.401	7.9	21.4
5 1	15 35.97	-24 7.1	2.555	3.530	4.9	20.0	5 1	15 36.21	-22 36.4	2.430	3.408	4.8	21.2
5 11	15 27.93	-23 51.7	2.528	3.533	2.0	19.8	5 11	15 28.00	-22 13.6	2.408	3.414	1.7	21.0
5 21	15 19.66	-23 30.6	2.531	3.535	2.3	19.8	5 21	15 19.59	-21 46.0	2.414	3.420	2.3	21.0
5 31	15 11.91	-23 6.2	2.562	3.538	5.2	20.0	5 31	15 11.75	-21 16.5	2.450	3.425	5.5	21.3
6 10	15 5.32	-22 41.5	2.620	3.540	8.1	20.2	6 10	15 5.14	-20 48.2	2.512	3.430	8.5	21.5
6 20	15 0.36	-22 19.4	2.703	3.541	10.7	20.4	6 20	15 0.22	-20 24.0	2.598	3.435	11.1	21.6
258591	2002 CP ₁₉₂		5 14.3 198°00	4°0/11.1	18		286455	2002 AA ₉₄		5 14.3 54°59	2°0/15.6	17	
4 11	15 46.40	- 6 18.3	2.622	3.477	9.9	20.9	4 11	15 48.78	-25 20.8	2.102	2.945	12.5	20.1
4 21	15 41.35	- 5 37.8	2.549	3.475	7.5	20.8	4 21	15 43.50	-25 23.8	2.034	2.955	9.4	19.9
5 1	15 34.92	- 4 59.8	2.501	3.473	5.2	20.6	5 1	15 36.34	-25 16.7	1.990	2.965	6.0	19.7
5 11	15 27.66	- 4 27.5	2.482	3.470	4.0	20.5	5 11	15 28.04	-25 0.1	1.971	2.975	2.7	19.5
5 21	15 20.21	- 4 3.8	2.490	3.467	5.1	20.6	5 21	15 19.52	-24 35.6	1.980	2.985	2.9	19.6
5 31	15 13.22	- 3 51.0	2.526	3.464	7.5	20.7	5 31	15 11.69	-24 6.5	2.017	2.995	6.2	19.8
6 10	15 7.29	- 3 50.1	2.588	3.461	9.9	20.9	6 10	15 5.37	-23 37.0	2.079	3.006	9.5	20.0
6 20	15 2.83	- 4 1.2	2.671	3.457	12.2	21.1	6 20	15 1.06	-23 10.8	2.164	3.016	12.4	20.2
489712	2007 VY ₂₃₀		5 14.3 197°49	0°1/14.4	17		471846	2012 XJ ₁₃₅		5 14.3 281°20	4°4/12.0	17	
4 11	15 48.96	-19 59.0	2.377	3.225	11.1	22.0	4 11	15 50.66	- 6 44.0	2.023	2.882	12.3	21.1
4 21	15 43.46	-19 47.8	2.295	3.223	8.2	21.8	4 21	15 45.06	- 6 26.6	1.930	2.859	9.3	20.8
5 1	15 36.26	-19 30.6	2.239	3.221	4.8	21.6	5 1	15 37.40	- 6 12.8	1.861	2.837	6.3	20.6
5 11	15 28.01	-19 8.6	2.210	3.218	1.2	21.3	5 11	15 28.36	- 6 6.1	1.819	2.814	4.4	20.4
5 21	15 19.49	-18 43.9	2.209	3.215	2.4	21.4	5 21	15 18.79	- 6 9.2	1.804	2.791	5.8	20.5
5 31	15 11.51	-18 19.4	2.238	3.212	6.0	21.7	5 31	15 9.67	- 6 24.4	1.816	2.767	9.0	20.6
6 10	15 4.80	-17 58.2	2.292	3.209	9.2	21.8	6 10	15 1.90	- 6 52.5	1.853	2.744	12.4	20.8
6 20	14 59.85	-17 42.7	2.370	3.205	12.1	22.0	6 20	14 56.13	- 7 33.3	1.912	2.720	15.5	20.9
102206	1999 SM ₂₀		5 14.3 287°23	6°4/11.4	18		510648	2012 TG ₂₃₅		5 14.3 254°80	4°6/11.1	17	
4 11	15 51.37	- 5 14.3	1.493	2.364	15.1	19.3	4 11	15 47.77	- 7 48.9	2.092	2.955	11.7	21.7
4 21	15 46.14	- 4 36.1	1.410	2.344	11.7	19.0	4 21	15 42.75	- 6 52.7	2.011	2.943	8.9	21.5
5 1	15 38.27	- 4 2.8	1.350	2.324	8.3	18.8	5 1	15 35.92	- 5 57.2	1.954	2.930	6.0	21.3
5 11	15 28.60	- 3 40.4	1.313	2.304	6.4	18.6	5 11	15 27.96	- 5 6.9	1.925	2.917	4.6	21.1
5 21	15 18.24	- 3 33.8	1.302	2.284	8.1	18.6	5 21	15 19.66	- 4 26.3	1.922	2.903	6.0	21.2
5 31	15 8.52	- 3 46.5	1.315	2.264	11.8	18.8	5 31	15 11.89	- 3 59.1	1.947	2.890	9.0	21.4
6 10	15 0.62	- 4 19.5	1.350	2.244	15.8	19.0	6 10	15 5.42	- 3 47.4	1.995	2.876	12.1	21.5
6 20	14 55.35	- 5 11.2	1.403	2.224	19.5	19.2	6 20	15 0.81	- 3 51.6	2.064	2.862	14.9	21.7
216104	2006 RA ₄₄		5 14.3 311°11	4°2/12.1	17		266406	2007 FQ ₂		5 14.3 32°48	5°9/12.5	18	
4 11	15 47.19	-13 11.2	1.281	2.169	16.1	20.8	4 11	15 52.41	- 4 27.5	1.368	2.242	16.1	19.4
4 21	15 43.51	-12 13.9	1.193	2.141	12.0	20.5	4 21	15 46.65	- 4 25.6	1.318	2.253	12.3	19.2
5 1	15 36.94	-11 9.6	1.126	2.113	7.5	20.1	5 1	15 38.35	- 4 33.1	1.288	2.265	8.4	19.0
5 11	15 28.30	-10 4.3	1.082	2.086	4.2	19.8	5 11	15 28.56	- 4 53.7	1.283	2.277	6.0	18.9
5 21	15 18.80	- 9 5.2	1.062	2.060	6.7	19.9	5 21	15 18.54	- 5 29.1	1.302	2.290	7.3	19.0
5 31	15 9.94	- 8 20.2	1.065	2.033	11.7	20.1	5 31	15 9.57	- 6 19.4	1.346	2.304	10.9	19.2
6 10	15 3.08	- 7 55.1	1.088	2.008	16.7	20.3	6 10	15 2.69	- 7 23.0	1.413	2.318	14.6	19.5
6 20	14 59.13	- 7 52.3	1.129	1.983	21.2	20.5	6 20	14 58.49	- 8 37.1	1.499	2.333	17.8	19.7
191904	2005 CU ₃₇		5 14.3 71°52	0°7/14.9	17		430662	2003 SP ₄₂₁		5 14.3 136°67	2°5/12.7	17	
4 11	15 46.05	-22 18.7	2.628	3.473	10.2	20.4	4 11	15 48.49	-13 31.3	1.974	2.838	12.3	21.8
4 21	15 41.17	-22 6.9	2.554	3.478	7.6	20.2	4 21	15 43.28	-12 53.2	1.905	2.841	9.0	21.6
5 1	15 34.84	-21 48.1	2.504	3.483	4.6	20.0	5 1	15 36.20	-12 12.4	1.860	2.844	5.4	21.4
5 11	15 27.65	-21 23.8	2.482	3.489	1.5	19.8	5 11	15 28.02	-11 32.5	1.842	2.846	2.6	21.2
5 21	15 20.27	-20 55.7	2.488	3.494	2.1	19.8	5 21	15 19.59	-10 57.1	1.851	2.849	4.3	21.3
5 31	15 13.41	-20 26.5	2.523	3.499	5.3	20.1	5 31	15 11.84	-10 29.9	1.887	2.851	7.8	21.5
6 10	15 7.68	-19 59.3	2.585	3.505	8.2	20.3	6 10	15 5.55	-10 13.6	1.948	2.853	11.2	21.7
6 20	15 3.51	-19 36.7	2.670	3.510	10.7	20.4	6 20	15 1.23	-10 9.5	2.031	2.855	14.2	21.9
304316	2006 SB ₁₆₇		5 14.3 167°50	3°5/16.8	17		512762	2016 UO ₅₁		5 14.3 288°55	0°1/14.3	18	
4 11	15 50.57	-30 45.7	2.553	3.366	11.5	21.6	4 11	15 49.04	-19 32.5	2.195	3.048	11.7	21.0
4 21	15 44.67	-31 0.0	2.471	3.368	9.0	21.4	4 21	15 43.88	-19 24.0	2.089	3.019	8.7	20.8
5 1	15 36.99	-31 2.8	2.414	3.371	6.3	21.2	5 1	15 36.72	-19 9.2	2.008	2.990	5.2	20.5
5 11	15 28.21	-30 53.2	2.383	3.373	4.0	21.1	5 11	15 28.20	-18 49.2	1.953	2.961	1.3	20.2
5 21	15 19.13	-30 32.0	2.380	3.375	3.8	21.1	5 21	15 19.11	-18 26.0	1.926	2.932	2.7	20.2
5 31	15 10.63	-30 1.8	2.406	3.377	5.9	21.2	5 31	15 10.40	-18 2.5	1.927	2.902	6.7	20.4
6 10	15 3.47	-29 26.5	2.459	3.378	8.6	21.4	6 10	15 2.97	-17 42.3	1.954	2.873	10.5	20.6
6 20	14 58.17	-28 50.4	2.535	3.379	11.1	21.6	6 20	14 57.45	-17 28.4	2.004	2.843	13.8	20.8
81166	2000 ES ₁₆₀		5 14.3 235°93	1°9/15.3	18		336651	2009 WL ₂₅₉		5 14.3 93°71	2°2/15.8		

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
190707	2001 <i>FC</i> ₁₅₉		5 14.3 354°04	1°9/13.5 16			130513	2000 <i>QG</i> ₁₅₉		5 14.3 309°23	6°3/10.5 18		
4 11	15 49.40	-16 26.5	1.045	1.937	18.4	19.5	4 11	15 46.68	-10 36.2	1.228	2.119	16.4	19.2
4 21	15 45.37	-16 4.1	0.983	1.934	13.6	19.2	4 21	15 43.06	-8 59.2	1.151	2.099	12.3	18.9
5 1	15 38.05	-15 34.6	0.942	1.931	8.0	18.9	5 1	15 36.61	-7 15.5	1.096	2.079	8.3	18.6
5 11	15 28.56	-15 2.1	0.921	1.929	2.5	18.5	5 11	15 28.23	-5 34.6	1.063	2.060	6.3	18.4
5 21	15 18.49	-14 31.9	0.923	1.928	5.1	18.7	5 21	15 19.18	-4 6.9	1.054	2.041	8.8	18.5
5 31	15 9.56	-14 10.1	0.947	1.928	10.9	19.0	5 31	15 10.92	-3 1.8	1.068	2.023	13.3	18.6
6 10	15 3.20	-14 1.7	0.991	1.928	16.2	19.3	6 10	15 4.73	-2 24.9	1.101	2.005	17.9	18.9
6 20	15 0.18	-14 9.0	1.052	1.930	20.7	19.6	6 20	15 1.40	-2 17.2	1.151	1.988	22.0	19.1
150819	2001 <i>RD</i> ₁₂₇		5 14.3 207°72	0°5/14.0 18			521194	2015 <i>FS</i> ₄₁₂		5 14.3 112°09	4°0/11.2 17		
4 11	15 51.78	-18 15.3	2.084	2.936	12.3	20.8	4 11	15 48.59	-10 12.8	2.119	2.981	11.7	21.7
4 21	15 45.76	-18 2.6	2.001	2.931	9.0	20.5	4 21	15 43.08	-8 57.7	2.064	2.997	8.6	21.5
5 1	15 37.73	-17 44.3	1.942	2.925	5.3	20.3	5 1	15 35.96	-7 42.2	2.034	3.012	5.6	21.4
5 11	15 28.43	-17 21.9	1.910	2.919	1.3	20.0	5 11	15 27.95	-6 31.4	2.032	3.027	4.0	21.3
5 21	15 18.75	-16 57.9	1.907	2.912	2.9	20.1	5 21	15 19.86	-5 30.1	2.058	3.042	5.5	21.4
5 31	15 9.68	-16 35.4	1.932	2.905	6.9	20.4	5 31	15 12.50	-4 42.2	2.112	3.056	8.3	21.6
6 10	15 2.08	-16 17.9	1.983	2.897	10.6	20.6	6 10	15 6.52	-4 10.1	2.190	3.070	11.2	21.8
6 20	14 56.54	-16 7.8	2.056	2.889	13.7	20.8	6 20	15 2.34	-3 54.0	2.290	3.084	13.7	22.0
499621	2010 <i>UL</i> ₅₅		5 14.3 175°53	0°2/14.4 17			120900	1998 <i>SP</i> ₂₅		5 14.3 284°18	0°2/14.2 17		
4 11	15 52.37	-21 1.9	2.063	2.910	12.6	22.9	4 11	15 53.73	-18 36.1	1.386	2.255	16.2	19.8
4 21	15 46.13	-20 40.2	1.986	2.913	9.3	22.7	4 21	15 48.46	-18 36.9	1.290	2.228	12.2	19.5
5 1	15 37.90	-20 10.1	1.934	2.915	5.5	22.5	5 1	15 40.00	-18 30.7	1.215	2.201	7.4	19.2
5 11	15 28.46	-19 33.4	1.908	2.917	1.5	22.2	5 11	15 29.15	-18 18.3	1.164	2.173	1.9	18.7
5 21	15 18.73	-18 52.9	1.912	2.918	2.7	22.3	5 21	15 17.20	-18 1.8	1.139	2.145	4.0	18.8
5 31	15 9.72	-18 12.6	1.943	2.918	6.7	22.6	5 31	15 5.78	-17 45.5	1.138	2.117	9.8	19.0
6 10	15 2.27	-17 36.7	2.001	2.917	10.4	22.8	6 10	14 56.42	-17 34.5	1.160	2.088	15.2	19.3
6 20	14 56.91	-17 8.7	2.081	2.916	13.5	23.0	6 20	14 50.17	-17 33.1	1.200	2.060	19.9	19.5
361560	2007 <i>RX</i> ₁₄		5 14.3 300°26	3°1/12.7 17			365870	2011 <i>UO</i> ₂₈₂		5 14.3 90°55	1°9/13.3 16		
4 11	15 48.65	-15 48.9	1.280	2.163	16.3	20.8	4 11	15 52.40	-16 28.1	1.421	2.293	15.7	21.8
4 21	15 44.65	-14 50.6	1.191	2.137	12.2	20.5	4 21	15 46.64	-15 50.0	1.365	2.306	11.5	21.6
5 1	15 37.65	-13 41.5	1.122	2.110	7.4	20.1	5 1	15 38.35	-15 5.6	1.332	2.318	6.7	21.4
5 11	15 28.51	-12 26.9	1.078	2.084	3.2	19.8	5 11	15 28.59	-14 19.2	1.323	2.331	2.3	21.1
5 21	15 18.49	-11 14.3	1.057	2.058	5.9	19.9	5 21	15 18.62	-13 35.8	1.340	2.343	4.4	21.3
5 31	15 9.14	-10 12.2	1.060	2.032	11.3	20.1	5 31	15 9.74	-13 0.7	1.383	2.355	9.1	21.6
6 10	15 1.86	-9 27.9	1.083	2.006	16.6	20.3	6 10	15 2.97	-12 37.9	1.448	2.367	13.4	21.9
6 20	14 57.58	-9 5.4	1.125	1.980	21.2	20.5	6 20	14 58.87	-12 29.4	1.534	2.379	17.0	22.1
322609	1406 <i>T</i> ₋₂		5 14.3 246°16	2°8/12.6 16			211496	2003 <i>OD</i> ₉		5 14.3 329°91	20°7/24.9 17		
4 11	15 51.54	-14 42.4	1.673	2.539	14.0	21.5	4 11	15 45.26	+21 23.8	1.175	2.001	21.4	19.2
4 21	15 46.02	-13 47.9	1.587	2.524	10.4	21.3	4 21	15 42.05	+24 4.8	1.137	1.984	20.7	19.1
5 1	15 38.08	-12 46.9	1.524	2.509	6.3	21.0	5 1	15 35.97	+26 11.1	1.114	1.968	20.8	19.0
5 11	15 28.55	-11 43.9	1.488	2.493	3.0	20.7	5 11	15 28.04	+27 29.1	1.108	1.953	21.6	19.0
5 21	15 18.50	-10 44.3	1.478	2.476	5.0	20.8	5 21	15 19.61	+27 50.9	1.116	1.939	23.1	19.1
5 31	15 9.12	-9 54.0	1.495	2.459	9.4	21.0	5 31	15 12.14	+27 14.9	1.137	1.927	24.8	19.1
6 10	15 1.47	-9 18.0	1.535	2.441	13.6	21.3	6 10	15 6.86	+25 46.8	1.169	1.915	26.6	19.3
6 20	14 56.25	-8 58.7	1.596	2.423	17.3	21.4	6 20	15 4.46	+23 35.8	1.211	1.905	28.3	19.4
100408	1996 <i>AV</i> ₆		5 14.3 128°39	2°1/13.1 18			92301	2000 <i>FG</i>		5 14.3 332°40	1°5/15.0 17		
4 11	15 49.94	-13 39.8	2.022	2.882	12.2	20.1	4 11	15 47.55	-23 47.3	1.096	1.979	18.5	18.9
4 21	15 44.29	-13 20.4	1.954	2.888	8.9	19.9	4 21	15 44.16	-23 29.0	1.024	1.967	14.0	18.6
5 1	15 36.79	-12 59.1	1.911	2.894	5.3	19.7	5 1	15 37.44	-22 53.4	0.971	1.957	8.7	18.3
5 11	15 28.17	-12 38.4	1.894	2.900	2.3	19.5	5 11	15 28.46	-22 1.9	0.939	1.946	2.9	17.9
5 21	15 19.32	-12 21.2	1.905	2.905	3.8	19.6	5 21	15 18.75	-20 59.4	0.930	1.937	4.1	17.9
5 31	15 11.15	-12 10.1	1.944	2.910	7.4	19.8	5 31	15 10.07	-19 54.4	0.943	1.929	10.0	18.2
6 10	15 4.45	-12 7.5	2.008	2.915	10.8	20.0	6 10	15 3.92	-18 56.2	0.976	1.922	15.5	18.5
6 20	14 59.72	-12 14.5	2.094	2.920	13.7	20.2	6 20	15 1.14	-18 11.8	1.028	1.915	20.3	18.8
348642	2005 <i>YY</i> ₁₇₄		5 14.3 35°19	22°6/12.5 17			489948	2008 <i>RO</i> ₁₁₂		5 14.3 226°42	2°7/16.2 18		
4 11	16 1.27	+25 5.7	0.971	1.775	26.3	20.0	4 11	15 51.52	-28 19.1	2.387	3.210	11.9	21.9
4 21	15 53.85	+25 55.9	0.941	1.782	24.6	19.9	4 21	15 45.53	-28 16.7	2.291	3.199	9.2	21.7
5 1	15 42.76	+25 56.6	0.923	1.788	23.2	19.8	5 1	15 37.61	-28 2.5	2.220	3.187	6.1	21.5
5 11	15 29.67	+24 56.6	0.920	1.796	22.6	19.8	5 11	15 28.43	-27 36.4	2.175	3.174	3.3	21.3
5 21	15 16.54	+22 53.6	0.933	1.804	22.9	19.8	5 21	15 18.84	-26 59.6	2.159	3.160	3.2	21.3
5 31	15 5.30	+19 54.9	0.962	1.813	24.1	19.9	5 31	15 9.80	-26 15.4	2.172	3.147	6.1	21.4
6 10	14 57.26	+16 15.5	1.008	1.823	25.8	20.1	6 10	15 2.14	-25 28.4	2.211	3.132	9.3	21.6
6 20	14 52.96	+12 12.5	1.069	1.832	27.7	20.3	6 20	14 56.43	-24 43.1	2.274	3.117	12.3	21.8
208641	2002 <i>EY</i> ₁₀₃		5 14.3 124°36	8°6/18.3 18			300103	2006 <i>UW</i> ₂₆₉		5 14.3 122°65	2°8/15.9 17		
4 11	16 6.39	-39 47.2	1.922	2.689	16.3	20.2	4 11	15 50.61	-26 57.8	2.321	3.151	11.9	20.5
4 21	15 57.25	-41 12.8	1.859	2.710	13.7	20.1	4 21	15 44.82	-27 19.9	2.243	3.154	9.1	20.4
5 1	15 44.84	-42 18.1	1.817	2.729	11.0	20.0	5 1	15 37.16	-27 32.3	2.189	3.158	6.1	20.2
5 11	15 30.28	-42 57.1	1.801	2.748	9.1	19.9	5 11	15 28.31	-27 34.4	2.162	3.161	3.3	20.0
5 21	15 15.11	-43 6.9	1.811	2.766	8.6	19.9	5 21	15 19.13	-27 26.9	2.163	3.164	3.3	20.0
5 31	15 1.04	-42 50.0	1.848	2.783	9.9	20.0	5 31	15 10.54	-27 12.0	2.192	3.167	6.1	20.2
6 10	14 49.49	-42 13.7	1.909	2.799	12.2	20.2	6 10	15 3.35	-26 53.4	2.248	3.170	9.1	20.4
6 20	14 41.26	-41 26.9	1.993	2.814	14.5	20.4	6 20	14 58.12	-26 34.6	2.327	3.173	11.9	20.6
387027	2012 <i>SA</i> ₁₀		5 14.3 251°82	0°6/14.7 17			414055	2007 <i>RL</i> _{270</}					

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
290525	2005 <i>UK</i> ₄₄		5 14.3 339°80	2°6/12.8	17		18500	1996 <i>NX</i> ₃		5 14.3 69°48	3°6/16.1	18	
4 11	15 48.01	-15 23.2	1.557	2.432	14.4	20.1	4 11	15 52.99	-27 58.2	1.414	2.266	17.0	18.1
4 21	15 43.42	-14 31.0	1.487	2.429	10.6	19.9	4 21	15 47.51	-28 3.9	1.348	2.271	13.1	17.9
5 1	15 36.50	-13 32.7	1.440	2.426	6.3	19.6	5 1	15 39.10	-27 52.8	1.302	2.275	8.7	17.6
5 11	15 28.16	-12 32.9	1.417	2.424	2.7	19.4	5 11	15 28.87	-27 24.2	1.279	2.280	4.5	17.4
5 21	15 19.46	-11 37.3	1.421	2.421	4.8	19.5	5 21	15 18.20	-26 40.5	1.282	2.285	4.4	17.4
5 31	15 11.58	-10 51.7	1.450	2.419	9.1	19.7	5 31	15 8.63	-25 47.6	1.310	2.291	8.5	17.7
6 10	15 5.49	-10 20.3	1.502	2.417	13.2	20.0	6 10	15 1.37	-24 53.4	1.361	2.296	12.8	17.9
6 20	15 1.79	-10 5.2	1.574	2.416	16.8	20.2	6 20	14 57.11	-24 4.7	1.432	2.301	16.7	18.2
213221	2000 <i>VQ</i> ₂₆		5 14.3 194°89	0°6/14.7	16		383877	2008 <i>RM</i> ₉₆		5 14.3 229°76	1°4/15.2	18	
4 11	15 54.12	-21 29.0	1.977	2.822	13.1	21.4	4 11	15 51.14	-23 55.4	2.276	3.114	11.8	21.8
4 21	15 47.60	-21 19.8	1.895	2.820	9.7	21.2	4 21	15 45.29	-23 52.2	2.183	3.103	8.9	21.6
5 1	15 38.88	-21 2.1	1.836	2.817	5.9	20.9	5 1	15 37.50	-23 40.1	2.115	3.092	5.6	21.3
5 11	15 28.76	-20 36.8	1.805	2.813	1.7	20.6	5 11	15 28.45	-23 19.3	2.074	3.080	2.2	21.1
5 21	15 18.24	-20 6.2	1.802	2.808	2.8	20.7	5 21	15 18.98	-22 51.5	2.062	3.067	2.7	21.1
5 31	15 8.42	-19 34.1	1.827	2.802	7.0	21.0	5 31	15 10.04	-22 19.8	2.078	3.054	6.2	21.3
6 10	15 0.24	-19 4.7	1.878	2.796	10.9	21.2	6 10	15 2.47	-21 48.2	2.120	3.041	9.7	21.5
6 20	14 54.32	-18 41.8	1.952	2.789	14.2	21.4	6 20	14 56.86	-21 20.3	2.186	3.027	12.7	21.7
478214	2011 <i>UU</i> ₂₉₉		5 14.3 228°48	0°7/13.8	18		238466	2004 <i>RE</i> ₆₃		5 14.3 328°10	4°1/12.3	17	
4 11	15 47.53	-17 36.6	2.725	3.573	9.8	22.5	4 11	15 48.06	-13 35.4	1.168	2.059	17.0	19.7
4 21	15 42.27	-17 18.0	2.634	3.563	7.2	22.3	4 21	15 44.14	-12 36.0	1.101	2.050	12.6	19.4
5 1	15 35.54	-16 55.1	2.570	3.553	4.2	22.1	5 1	15 37.25	-11 30.4	1.053	2.041	7.8	19.1
5 11	15 27.90	-16 29.6	2.534	3.542	1.1	21.8	5 11	15 28.43	-10 25.5	1.029	2.033	4.2	18.9
5 21	15 19.97	-16 3.4	2.527	3.531	2.5	21.9	5 21	15 19.04	-9 28.9	1.027	2.026	6.6	19.0
5 31	15 12.47	-15 39.2	2.549	3.520	5.6	22.1	5 31	15 10.61	-8 48.0	1.049	2.019	11.6	19.2
6 10	15 6.02	-15 19.5	2.599	3.508	8.6	22.3	6 10	15 4.44	-8 27.7	1.090	2.013	16.5	19.5
6 20	15 1.08	-15 6.2	2.671	3.496	11.2	22.4	6 20	15 1.26	-8 29.1	1.149	2.007	20.6	19.7
388246	2006 <i>KH</i> ₅₆		5 14.3 254°68	2°2/12.9	18		77513	2001 <i>HD</i> ₄₉		5 14.3 74°99	5°6/17.3	18	
4 11	15 50.81	-12 9.0	2.528	3.378	10.4	21.3	4 11	15 55.99	-32 28.4	1.494	2.324	17.3	19.2
4 21	15 44.85	-11 55.0	2.426	3.354	7.7	21.1	4 21	15 49.51	-32 51.7	1.441	2.346	13.7	19.0
5 1	15 37.17	-11 40.1	2.349	3.330	4.7	20.9	5 1	15 40.14	-32 55.1	1.408	2.367	9.7	18.8
5 11	15 28.34	-11 26.4	2.301	3.305	2.3	20.7	5 11	15 29.10	-32 36.6	1.399	2.388	6.4	18.7
5 21	15 19.06	-11 16.0	2.282	3.279	3.6	20.7	5 21	15 17.85	-31 58.1	1.415	2.409	5.8	18.7
5 31	15 10.14	-11 11.0	2.292	3.253	6.8	20.9	5 31	15 7.89	-31 5.3	1.456	2.430	8.6	18.9
6 10	15 2.31	-11 13.5	2.329	3.226	10.0	21.0	6 10	15 0.38	-30 6.5	1.521	2.451	12.1	19.2
6 20	14 56.14	-11 24.4	2.389	3.198	12.8	21.2	6 20	14 55.89	-29 9.4	1.607	2.471	15.4	19.4
385009	2012 <i>TE</i> ₂₃₈		5 14.3 262°49	0°7/13.9	17		259102	2002 <i>WT</i> ₅		5 14.3 155°44	1°3/13.6	18	
4 11	15 49.83	-17 24.9	1.989	2.848	12.5	21.3	4 11	15 53.33	-15 22.2	2.009	2.863	12.6	21.3
4 21	15 44.44	-17 17.8	1.907	2.840	9.2	21.1	4 21	15 46.84	-15 14.5	1.939	2.870	9.2	21.1
5 1	15 37.03	-17 6.0	1.848	2.833	5.4	20.8	5 1	15 38.34	-15 3.7	1.894	2.877	5.4	20.9
5 11	15 28.30	-16 51.2	1.816	2.825	1.4	20.5	5 11	15 28.64	-14 51.8	1.875	2.883	1.7	20.7
5 21	15 19.17	-16 35.6	1.812	2.817	3.1	20.6	5 21	15 18.67	-14 40.9	1.885	2.888	3.4	20.8
5 31	15 10.63	-16 22.0	1.835	2.809	7.1	20.9	5 31	15 9.42	-14 33.6	1.924	2.893	7.2	21.1
6 10	15 3.57	-16 13.6	1.883	2.801	10.8	21.1	6 10	15 1.74	-14 32.4	1.988	2.898	10.8	21.3
6 20	14 58.57	-16 12.7	1.954	2.793	14.1	21.3	6 20	14 56.16	-14 39.0	2.074	2.901	13.8	21.5
175369	2005 <i>RX</i> ₂₇		5 14.3 325°04	1°8/15.4	16		246573	2008 <i>TN</i> ₁₁₂		5 14.3 165°49	0°7/14.8	17	
4 11	15 47.45	-24 39.9	1.935	2.786	13.1	20.0	4 11	15 49.51	-23 13.2	2.142	2.988	12.2	20.7
4 21	15 42.84	-24 33.8	1.851	2.777	9.9	19.8	4 21	15 44.01	-22 40.4	2.065	2.990	9.1	20.5
5 1	15 36.13	-24 16.9	1.790	2.768	6.2	19.6	5 1	15 36.66	-21 57.3	2.013	2.993	5.5	20.2
5 11	15 28.08	-23 49.7	1.754	2.759	2.6	19.3	5 11	15 28.21	-21 6.1	1.988	2.995	1.7	20.0
5 21	15 19.62	-23 14.7	1.745	2.751	3.0	19.3	5 21	15 19.54	-20 9.9	1.991	2.997	2.6	20.1
5 31	15 11.78	-22 35.5	1.763	2.743	6.8	19.5	5 31	15 11.55	-19 13.4	2.022	2.999	6.3	20.3
6 10	15 5.48	-21 57.1	1.806	2.735	10.5	19.7	6 10	15 5.03	-18 21.3	2.080	3.000	9.8	20.5
6 20	15 1.32	-21 23.7	1.871	2.728	13.9	19.9	6 20	15 0.46	-17 37.4	2.160	3.001	12.9	20.7
161768	2006 <i>TA</i> ₆₄		5 14.3 276°81	6°4/10.1	18		395420	2011 <i>SB</i> ₁₈₅		5 14.3 263°01	3°2/11.8	16	
4 11	15 47.39	-1 3.2	2.161	3.017	11.7	19.7	4 11	15 46.50	-11 17.0	2.334	3.196	10.8	21.7
4 21	15 42.40	-0 16.6	2.088	3.007	9.3	19.5	4 21	15 41.71	-10 24.3	2.248	3.182	8.0	21.5
5 1	15 35.71	+0 23.2	2.038	2.997	7.2	19.4	5 1	15 35.30	-9 29.7	2.187	3.167	5.1	21.3
5 11	15 27.96	+0 51.7	2.015	2.988	6.4	19.3	5 11	15 27.88	-8 36.8	2.153	3.153	3.2	21.2
5 21	15 19.93	+1 5.2	2.018	2.978	7.5	19.3	5 21	15 20.16	-7 49.5	2.148	3.138	4.6	21.2
5 31	15 12.42	+1 1.6	2.047	2.968	9.9	19.5	5 31	15 12.90	-7 11.6	2.170	3.123	7.6	21.4
6 10	15 6.16	+0 40.5	2.100	2.959	12.5	19.6	6 10	15 6.81	-6 45.8	2.217	3.107	10.7	21.6
6 20	15 1.67	+0 3.2	2.172	2.949	14.9	19.8	6 20	15 2.37	-6 33.3	2.286	3.092	13.4	21.7
459465	2013 <i>AK</i> ₁₁₂		5 14.3 186°21	0°4/14.2	16		93492	2000 <i>TD</i> ₃₆		5 14.3 124°23	0°5/14.0	17	
4 11	15 54.54	-19 4.3	1.466	2.330	15.8	21.9	4 11	15 50.94	-19 27.8	2.293	3.140	11.5	20.2
4 21	15 48.46	-18 50.8	1.395	2.331	11.7	21.7	4 21	15 44.78	-18 53.5	2.230	3.158	8.4	20.0
5 1	15 39.61	-18 29.1	1.346	2.330	6.9	21.4	5 1	15 36.98	-18 12.6	2.193	3.176	4.9	19.8
5 11	15 28.99	-18 1.1	1.321	2.330	1.7	21.1	5 11	15 28.28	-17 27.7	2.184	3.193	1.2	19.6
5 21	15 17.90	-17 30.1	1.323	2.329	3.7	21.2	5 21	15 19.48	-16 41.8	2.205	3.209	2.6	19.7
5 31	15 7.75	-17 1.0	1.350	2.327	8.8	21.5	5 31	15 11.40	-15 58.8	2.254	3.225	6.2	20.0
6 10	14 59.74	-16 38.8	1.401	2.325	13.4	21.7	6 10	15 4.73	-15 22.2	2.329	3.240	9.4	20.2
6 20	14 54.55	-16 27.1	1.472	2.323	17.3	22.0	6 20	14 59.89	-14 54.2	2.428	3.255	12.1	20.4
248949	2006 <i>WD</i> ₁₈₄		5 14.3 238°25	1°0/15.2	16		341213	2007 <i>RQ</i> ₁₂₄		5 14.3			

EPHEMERIDES

5 14.3

5 14.3

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
251034	2006 QY ₁₂₆		5 14.3 185°33	3.4/16.3	16		383951	2008 SK ₃₀₆		5 14.3 185°76	2.7/16.3	17	
4 11	15 55.68	-29 1.4	2.252	3.069	12.7	21.8	4 11	15 50.97	-28 33.6	2.297	3.122	12.2	22.0
4 21	15 48.68	-29 20.3	2.168	3.069	9.9	21.7	4 21	15 45.12	-28 26.0	2.214	3.122	9.4	21.8
5 1	15 39.52	-29 27.4	2.107	3.069	6.7	21.5	5 1	15 37.36	-28 6.0	2.155	3.122	6.2	21.6
5 11	15 28.98	-29 21.4	2.073	3.068	4.0	21.3	5 11	15 28.44	-27 33.8	2.122	3.121	3.3	21.4
5 21	15 18.02	-29 2.9	2.068	3.066	3.8	21.3	5 21	15 19.23	-26 51.2	2.118	3.119	3.2	21.4
5 31	15 7.72	-28 34.5	2.091	3.063	6.6	21.4	5 31	15 10.66	-26 1.9	2.142	3.118	6.1	21.6
6 10	14 59.00	-28 0.9	2.141	3.059	9.7	21.6	6 10	15 3.55	-25 10.8	2.192	3.115	9.3	21.8
6 20	14 52.49	-27 26.9	2.215	3.054	12.7	21.8	6 20	14 58.43	-24 22.4	2.267	3.113	12.2	22.0
521130	2015 DN ₂₄₈		5 14.3 303°79	5.2/11.1	17		348467	2005 SY ₆₇		5 14.3 146°29	3.2/11.7	18	
4 11	15 47.73	-4 28.1	2.094	2.955	11.8	20.8	4 11	15 45.94	-10 41.4	2.478	3.338	10.3	21.3
4 21	15 42.66	-3 50.8	2.025	2.953	9.1	20.6	4 21	15 41.11	-9 48.0	2.409	3.342	7.6	21.2
5 1	15 35.87	-3 18.3	1.981	2.950	6.5	20.4	5 1	15 34.86	-8 53.8	2.366	3.345	4.8	21.0
5 11	15 28.03	-2 54.6	1.962	2.948	5.2	20.3	5 11	15 27.79	-8 2.5	2.350	3.348	3.2	20.9
5 21	15 19.93	-2 43.1	1.970	2.945	6.5	20.4	5 21	15 20.55	-7 17.7	2.363	3.351	4.5	21.0
5 31	15 12.42	-2 45.9	2.005	2.943	9.1	20.6	5 31	15 13.83	-6 42.4	2.404	3.354	7.1	21.2
6 10	15 6.22	-3 3.7	2.063	2.941	11.9	20.7	6 10	15 8.24	-6 18.9	2.470	3.357	9.9	21.3
6 20	15 1.83	-3 35.5	2.142	2.938	14.5	20.9	6 20	15 4.19	-6 7.9	2.559	3.360	12.2	21.5
325841	2010 TO ₂₄		5 14.3 204°16	0.2/14.5	17		112344	2002 NW ₈		5 14.3 279°64	2.9/12.8	18	
4 11	15 53.15	-20 25.2	1.964	2.813	13.0	22.0	4 11	15 50.21	-14 17.7	1.565	2.437	14.5	20.0
4 21	15 46.93	-20 13.9	1.881	2.809	9.7	21.7	4 21	15 45.27	-13 35.6	1.479	2.419	10.8	19.7
5 1	15 38.53	-19 55.0	1.822	2.804	5.8	21.5	5 1	15 37.81	-12 48.0	1.415	2.400	6.5	19.5
5 11	15 28.73	-19 29.5	1.790	2.798	1.5	21.2	5 11	15 28.62	-11 59.1	1.376	2.381	3.0	19.2
5 21	15 18.53	-18 59.9	1.786	2.792	2.9	21.3	5 21	15 18.81	-11 14.0	1.363	2.362	5.1	19.3
5 31	15 8.99	-18 29.9	1.809	2.784	7.1	21.5	5 31	15 9.65	-10 38.3	1.375	2.343	9.6	19.5
6 10	15 1.06	-18 3.7	1.859	2.777	11.0	21.7	6 10	15 2.27	-10 16.2	1.410	2.324	14.1	19.7
6 20	14 55.35	-17 44.6	1.931	2.768	14.3	21.9	6 20	14 57.42	-10 10.2	1.465	2.304	17.9	19.9
44410	1998 SQ ₁₃₇		5 14.3 297°13	1.5/13.5	18		33926	2000 LC ₂₇		5 14.3 316°85	3.5/12.9	18	
4 11	15 49.42	-15 23.7	1.893	2.756	12.8	18.5	4 11	15 49.49	-11 21.5	1.428	2.307	15.2	17.1
4 21	15 44.19	-15 11.5	1.816	2.752	9.4	18.3	4 21	15 44.97	-11 9.2	1.344	2.287	11.4	16.8
5 1	15 36.91	-14 56.1	1.762	2.747	5.6	18.1	5 1	15 37.74	-10 57.4	1.282	2.267	7.1	16.5
5 11	15 28.32	-14 39.6	1.735	2.743	1.8	17.8	5 11	15 28.63	-10 49.6	1.243	2.248	3.6	16.3
5 21	15 19.37	-14 24.7	1.735	2.739	3.6	17.9	5 21	15 18.77	-10 49.4	1.229	2.229	5.5	16.3
5 31	15 11.05	-14 14.3	1.763	2.734	7.6	18.2	5 31	15 9.54	-11 0.0	1.240	2.211	10.2	16.5
6 10	15 4.26	-14 11.1	1.814	2.730	11.3	18.4	6 10	15 2.19	-11 23.5	1.273	2.193	14.7	16.8
6 20	14 59.58	-14 16.9	1.888	2.726	14.5	18.6	6 20	14 57.55	-12 0.3	1.325	2.176	18.8	17.0
72309	2001 BJ ₃₆		5 14.3 214°59	2.7/13.0	17		117244	2004 SG ₂₉		5 14.3 256°26	1.7/13.5	17	
4 11	15 52.99	-12 35.4	1.740	2.603	13.8	19.9	4 11	15 51.69	-17 20.1	1.501	2.371	15.2	19.9
4 21	15 46.96	-12 16.0	1.663	2.598	10.2	19.6	4 21	15 46.43	-16 40.7	1.419	2.358	11.2	19.6
5 1	15 38.61	-11 55.2	1.609	2.593	6.2	19.4	5 1	15 38.50	-15 52.8	1.360	2.346	6.7	19.3
5 11	15 28.77	-11 36.1	1.582	2.587	2.9	19.2	5 11	15 28.79	-14 59.9	1.325	2.333	2.1	19.0
5 21	15 18.49	-11 21.8	1.582	2.580	4.6	19.3	5 21	15 18.51	-14 7.0	1.316	2.320	4.3	19.1
5 31	15 8.92	-11 15.4	1.608	2.574	8.7	19.5	5 31	15 8.99	-13 20.3	1.333	2.306	9.3	19.4
6 10	15 1.07	-11 19.4	1.659	2.567	12.6	19.7	6 10	15 1.42	-12 45.2	1.373	2.293	13.9	19.6
6 20	14 55.58	-11 34.9	1.730	2.559	16.1	19.9	6 20	14 56.53	-12 25.2	1.433	2.279	17.9	19.8
292051	Bohlender		5 14.3 253°87	4.4/11.4	16		498312	2007 VY ₁₄₃		5 14.3 153°53	1.7/13.6	17	
4 11	15 48.27	-5 44.7	2.328	3.185	11.0	21.1	4 11	15 53.84	-14 49.6	1.627	2.490	14.5	21.9
4 21	15 43.00	-5 14.2	2.247	3.173	8.4	20.9	4 21	15 47.65	-14 42.2	1.558	2.494	10.7	21.6
5 1	15 36.07	-4 47.1	2.190	3.161	5.8	20.8	5 1	15 39.03	-14 32.0	1.513	2.498	6.3	21.4
5 11	15 28.10	-4 26.8	2.160	3.149	4.4	20.7	5 11	15 28.89	-14 21.2	1.494	2.501	2.1	21.1
5 21	15 19.82	-4 16.1	2.158	3.137	5.6	20.7	5 21	15 18.38	-14 12.4	1.501	2.504	4.0	21.2
5 31	15 12.01	-4 17.3	2.183	3.125	8.3	20.8	5 31	15 8.72	-14 8.7	1.535	2.507	8.5	21.5
6 10	15 5.38	-4 31.4	2.233	3.112	11.1	21.0	6 10	15 0.95	-14 12.7	1.593	2.509	12.6	21.8
6 20	15 0.43	-4 58.0	2.305	3.099	13.6	21.2	6 20	14 55.70	-14 26.2	1.672	2.511	16.1	22.0
368447	2003 EV ₃₇		5 14.3 86°70	9.9/7.5	17		211855	2004 FZ ₁₄₃		5 14.3 103°03	0.8/14.8	18	
4 11	15 48.48	+3 37.8	1.693	2.550	14.4	20.6	4 11	15 50.90	-20 48.6	2.229	3.075	11.8	20.0
4 21	15 43.37	+5 22.4	1.651	2.560	11.9	20.5	4 21	15 45.00	-21 1.5	2.158	3.083	8.7	19.8
5 1	15 36.31	+6 54.1	1.631	2.571	10.2	20.4	5 1	15 37.26	-21 8.5	2.112	3.092	5.2	19.6
5 11	15 28.15	+8 4.9	1.636	2.581	10.0	20.4	5 11	15 28.42	-21 9.9	2.093	3.100	1.6	19.4
5 21	15 19.85	+8 49.3	1.665	2.591	11.3	20.5	5 21	15 19.31	-21 6.9	2.102	3.108	2.5	19.4
5 31	15 12.40	+9 4.6	1.717	2.601	13.5	20.6	5 31	15 10.83	-21 1.7	2.140	3.117	6.1	19.7
6 10	15 6.59	+8 52.2	1.788	2.611	15.8	20.8	6 10	15 3.76	-20 57.0	2.204	3.125	9.4	19.9
6 20	15 2.88	+8 15.7	1.877	2.621	18.0	21.0	6 20	14 58.62	-20 55.5	2.292	3.133	12.2	20.1
192757	1999 TH ₂₇₀		5 14.3 236°63	4.1/16.8	18		406837	2008 YE ₁₆₀		5 14.3 138°53	0.2/14.3	16	
4 11	15 52.22	-31 0.8	2.163	2.982	13.1	20.7	4 11	15 54.47	-19 58.5	1.744	2.597	14.2	22.4
4 21	15 46.34	-31 16.5	2.072	2.972	10.3	20.5	4 21	15 47.90	-19 36.6	1.679	2.609	10.4	22.2
5 1	15 38.25	-31 18.7	2.003	2.961	7.3	20.3	5 1	15 39.06	-19 6.4	1.638	2.621	6.1	21.9
5 11	15 28.69	-31 5.9	1.960	2.951	4.7	20.1	5 11	15 28.87	-18 30.0	1.623	2.632	1.5	21.7
5 21	15 18.66	-30 38.8	1.945	2.940	4.4	20.1	5 21	15 18.46	-17 50.8	1.636	2.642	3.1	21.8
5 31	15 9.22	-30 0.2	1.957	2.929	6.9	20.2	5 31	15 8.98	-17 13.4	1.677	2.652	7.6	22.1
6 10	15 1.35	-29 15.4	1.995	2.917	10.1	20.4	6 10	15 1.38	-16 42.4	1.742	2.660	11.5	22.3
6 20	14 55.70	-28 29.7	2.056	2.905	13.1	20.5	6 20	14 56.19	-16 21.0	1.829	2.668	14.9	22.6
507044	2008 UU ₂₅₅		5 14.3 186°86	0.4/14.1	17		346006	2007 TG ₂₁₇		5 14.3 34°32	2.4/15.6	17	
4 11	15 49.65	-18 57.1	2.095	2.949									

EPHEMERIDES

5 14.3

5 14.4

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
240914	2006 <i>DQ</i> ₁₉₆		5 14.3 331°64	6°8/ 4.4 18			462233	2008 <i>AV</i> ₆₈		5 14.4 117°84	2°7/12.9 18		
4 11	15 40.39	+15 4.9	4.057	4.847	8.0	19.7	4 11	15 52.84	-13 17.1	1.773	2.635	13.6	21.3
4 21	15 36.68	+15 57.1	4.006	4.843	7.2	19.7	4 21	15 46.57	-12 42.3	1.716	2.651	9.9	21.1
5 1	15 32.14	+16 38.9	3.978	4.839	6.8	19.6	5 1	15 38.23	-12 5.3	1.683	2.666	6.0	20.9
5 11	15 27.11	+17 7.7	3.975	4.836	6.9	19.6	5 11	15 28.71	-11 29.8	1.676	2.680	2.8	20.8
5 21	15 21.97	+17 21.9	3.996	4.832	7.5	19.7	5 21	15 19.03	-10 59.6	1.697	2.695	4.5	20.9
5 31	15 17.12	+17 20.5	4.041	4.829	8.3	19.7	5 31	15 10.25	-10 38.2	1.744	2.708	8.3	21.1
6 10	15 12.91	+17 4.1	4.107	4.825	9.2	19.8	6 10	15 3.21	-10 28.1	1.816	2.721	11.9	21.4
6 20	15 9.60	+16 34.0	4.191	4.822	10.2	19.9	6 20	14 58.41	-10 30.4	1.910	2.734	15.0	21.6
7644	Cslewis		5 14.4 246°36	1°8/12.9 18			55775	1993 <i>FY</i> ₁₀		5 14.4 4°23	5°7/11.7 18		
4 11	15 49.06	-17 37.3	1.933	2.793	12.7	17.9	4 11	15 45.80	-11 21.9	0.994	1.896	18.3	18.2
4 21	15 43.91	-16 30.3	1.847	2.783	9.3	17.7	4 21	15 42.69	-10 12.0	0.941	1.895	13.6	17.9
5 1	15 36.75	-15 14.3	1.786	2.771	5.5	17.4	5 1	15 36.48	-8 59.5	0.907	1.895	8.7	17.7
5 11	15 28.33	-13 53.6	1.753	2.760	2.0	17.2	5 11	15 28.34	-7 53.4	0.894	1.896	5.7	17.5
5 21	15 19.56	-12 33.7	1.747	2.748	4.0	17.3	5 21	15 19.76	-7 2.5	0.903	1.898	8.1	17.6
5 31	15 11.44	-11 20.7	1.769	2.736	8.0	17.5	5 31	15 12.36	-6 33.8	0.933	1.902	12.8	17.9
6 10	15 4.81	-10 19.9	1.817	2.723	11.8	17.7	6 10	15 7.38	-6 30.4	0.982	1.907	17.6	18.2
6 20	15 0.26	-9 34.6	1.885	2.711	15.1	17.9	6 20	15 5.51	-6 51.0	1.046	1.913	21.6	18.5
288316	2004 <i>BH</i> ₃₉		5 14.4 248°07	5°4/22.4 18			146986	2002 <i>PE</i> ₁₈		5 14.4 238°43	1°4/13.6 17		
4 11	15 46.29	-49 32.9	4.628	5.311	8.5	20.3	4 11	15 51.80	-17 1.0	1.878	2.736	13.1	21.5
4 21	15 41.16	-49 41.3	4.536	5.309	7.5	20.2	4 21	15 46.09	-16 30.4	1.790	2.723	9.7	21.3
5 1	15 34.83	-49 37.0	4.465	5.307	6.5	20.2	5 1	15 38.15	-15 53.4	1.726	2.710	5.7	21.0
5 11	15 27.80	-49 18.9	4.418	5.304	5.7	20.1	5 11	15 28.75	-15 12.7	1.688	2.695	1.8	20.7
5 21	15 20.63	-48 47.3	4.396	5.302	5.4	20.1	5 21	15 18.87	-14 31.8	1.677	2.681	3.6	20.8
5 31	15 13.89	-48 3.3	4.401	5.300	5.6	20.1	5 31	15 9.60	-13 55.2	1.695	2.665	7.9	21.0
6 10	15 8.09	-47 9.6	4.432	5.297	6.3	20.1	6 10	15 1.90	-13 27.0	1.737	2.649	11.9	21.2
6 20	15 3.60	-46 9.3	4.488	5.295	7.3	20.2	6 20	14 56.43	-13 10.2	1.800	2.633	15.4	21.4
160380	2004 <i>HB</i> ₆₇		5 14.4 298°76	0°9/13.9 16			188270	2003 <i>AD</i> ₃₄		5 14.4 125°18	8°0/ 9.4 17		
4 11	15 49.35	-16 0.3	2.104	2.962	11.9	20.3	4 11	15 50.65	+ 1 53.8	1.910	2.760	13.3	20.7
4 21	15 44.04	-16 2.9	2.021	2.954	8.8	20.1	4 21	15 44.80	+ 2 59.9	1.861	2.772	10.7	20.5
5 1	15 36.82	-16 2.8	1.962	2.946	5.2	19.8	5 1	15 37.13	+ 3 55.6	1.835	2.783	8.7	20.4
5 11	15 28.36	-16 1.3	1.930	2.938	1.5	19.6	5 11	15 28.44	+ 4 34.8	1.835	2.794	8.1	20.4
5 21	15 19.50	-16 0.1	1.925	2.930	3.0	19.7	5 21	15 19.61	+ 4 53.8	1.861	2.804	9.2	20.5
5 31	15 11.17	-16 1.3	1.949	2.922	6.8	19.9	5 31	15 11.56	+ 4 50.8	1.911	2.814	11.4	20.7
6 10	15 4.21	-16 7.1	1.997	2.914	10.4	20.1	6 10	15 5.04	+ 4 26.4	1.984	2.824	13.8	20.8
6 20	14 59.19	-16 19.1	2.069	2.906	13.5	20.3	6 20	15 0.52	+ 3 43.6	2.075	2.833	16.1	21.0
160343	2003 <i>SP</i> ₁₃₉		5 14.4 257°15	3°0/15.7 17			313624	2003 <i>RZ</i> ₁₁		5 14.4 293°13	17°0/24.1 18		
4 11	15 53.91	-26 13.9	2.168	2.998	12.7	20.1	4 11	16 2.10	-57 7.0	1.588	2.281	21.9	19.7
4 21	15 47.65	-26 47.2	2.069	2.981	9.8	19.9	4 21	15 56.62	-58 37.1	1.499	2.261	20.5	19.5
5 1	15 39.11	-27 11.9	1.994	2.963	6.5	19.7	5 1	15 45.85	-59 35.6	1.423	2.240	19.0	19.3
5 11	15 28.98	-27 26.4	1.946	2.946	3.5	19.4	5 11	15 30.95	-59 50.9	1.364	2.219	17.8	19.1
5 21	15 18.20	-27 30.1	1.927	2.927	3.7	19.4	5 21	15 14.37	-59 14.8	1.322	2.198	17.1	19.0
5 31	15 7.86	-27 24.8	1.935	2.909	6.8	19.6	5 31	14 59.27	-57 46.4	1.298	2.178	17.3	19.0
6 10	14 58.99	-27 14.0	1.970	2.890	10.3	19.7	6 10	14 48.30	-55 35.3	1.294	2.157	18.4	19.0
6 20	14 52.30	-27 1.9	2.027	2.871	13.5	19.9	6 20	14 42.70	-52 56.4	1.307	2.137	20.2	19.0
69489	1997 <i>AB</i> ₄		5 14.4 203°31	1°5/15.2 18			164548	2006 <i>JC</i> ₄₈		5 14.4 334°44	1°1/14.9 17		
4 11	15 53.69	-24 7.8	2.029	2.868	13.0	20.1	4 11	15 47.45	-21 58.1	1.506	2.375	15.1	19.9
4 21	15 47.35	-23 59.0	1.943	2.863	9.8	19.9	4 21	15 43.42	-21 58.3	1.425	2.362	11.4	19.6
5 1	15 38.82	-23 39.5	1.881	2.858	6.1	19.6	5 1	15 36.80	-21 48.6	1.365	2.349	7.0	19.3
5 11	15 28.89	-23 10.1	1.846	2.851	2.3	19.4	5 11	15 28.44	-21 29.7	1.329	2.337	2.3	19.0
5 21	15 18.54	-22 32.8	1.839	2.844	2.9	19.4	5 21	15 19.48	-21 4.0	1.318	2.325	3.3	19.1
5 31	15 8.87	-21 51.5	1.860	2.837	6.8	19.6	5 31	15 11.23	-20 36.0	1.332	2.315	8.2	19.3
6 10	15 0.82	-21 11.2	1.908	2.828	10.6	19.8	6 10	15 4.86	-20 10.7	1.369	2.305	12.7	19.5
6 20	14 54.99	-20 36.3	1.978	2.819	13.9	20.0	6 20	15 1.11	-19 52.7	1.426	2.296	16.7	19.8
67521	2000 <i>RN</i> ₇₁		5 14.4 139°04	4°5/11.9 18			211601	2003 <i>SA</i> ₃₁₀		5 14.4 259°25	1°0/14.8 18		
4 11	15 50.72	-11 3.4	1.453	2.329	15.2	18.6	4 11	15 54.67	-21 35.7	1.772	2.621	14.2	20.3
4 21	15 45.51	-10 5.2	1.390	2.331	11.3	18.3	4 21	15 48.59	-21 41.5	1.673	2.600	10.7	20.1
5 1	15 37.83	-9 5.5	1.349	2.332	7.2	18.1	5 1	15 39.86	-21 39.0	1.597	2.577	6.6	19.8
5 11	15 28.63	-8 10.1	1.333	2.333	4.5	18.0	5 11	15 29.24	-21 28.0	1.547	2.554	2.1	19.4
5 21	15 19.10	-7 25.1	1.342	2.334	6.5	18.1	5 21	15 17.84	-21 10.0	1.524	2.530	3.2	19.4
5 31	15 10.49	-6 55.4	1.375	2.335	10.5	18.3	5 31	15 6.94	-20 48.1	1.528	2.505	7.9	19.7
6 10	15 3.82	-6 44.1	1.432	2.336	14.5	18.5	6 10	14 57.77	-20 27.1	1.558	2.480	12.4	19.9
6 20	14 59.70	-6 51.2	1.507	2.337	18.0	18.8	6 20	14 51.15	-20 11.4	1.608	2.454	16.3	20.1
417570	2006 <i>UA</i> ₂₁₃		5 14.4 309°85	1°0/14.9 17			6837	Bressi		5 14.4 142°13	5°0/17.9 18		
4 11	15 48.73	-23 38.8	1.423	2.290	16.0	20.4	4 11	15 53.85	-35 45.7	2.564	3.351	12.2	18.0
4 21	15 44.48	-23 10.0	1.340	2.276	12.1	20.1	4 21	15 47.20	-36 11.3	2.488	3.362	9.9	17.9
5 1	15 37.47	-22 26.1	1.278	2.261	7.4	19.8	5 1	15 38.61	-36 22.4	2.436	3.372	7.5	17.7
5 11	15 28.60	-21 28.8	1.240	2.248	2.4	19.5	5 11	15 28.83	-36 17.4	2.410	3.382	5.5	17.6
5 21	15 19.12	-20 22.5	1.227	2.234	3.5	19.5	5 21	15 18.78	-35 56.7	2.412	3.392	5.1	17.6
5 31	15 10.45	-19 14.5	1.239	2.221	8.7	19.8	5 31	15 9.40	-35 22.8	2.442	3.401	6.6	17.7
6 10	15 3.82	-18 12.4	1.274	2.209	13.6	20.0	6 10	15 1.53	-34 40.3	2.498	3.409	8.8	17.8
6 20	14 59.99	-17 22.5	1.329	2.197	17.8	20.3	6 20	14 55.69	-33 54.1	2.579	3.417	11.1	18.0
27702	1984 <i>SE</i> ₁		5 14.4 300°23	5°0/16.9 18			502140	2015 <i>BG</i> ₂₆		5 14.4 177°73	4°8/11.2		

EPHEMERIDES

5 14.4

5 14.4

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
10067	Bertuch		5 14.4 240°48	1.2°/13.8	18		157474	2005 QX ₁₈		5 14.4 180°91	7.2°/9.0	17	
4 11	15 52.77	-17 32.9	1.507	2.374	15.3	18.2	4 11	15 49.33	-0 41.3	2.026	2.880	12.4	21.2
4 21	15 47.21	-17 10.5	1.429	2.366	11.3	17.9	4 21	15 43.87	+0 39.7	1.965	2.881	9.9	21.0
5 1	15 38.98	-16 41.0	1.373	2.359	6.7	17.7	5 1	15 36.65	+1 54.0	1.928	2.882	7.9	20.9
5 11	15 28.99	-16 6.9	1.342	2.351	1.9	17.3	5 11	15 28.38	+2 55.4	1.917	2.882	7.3	20.8
5 21	15 18.45	-15 32.1	1.338	2.342	4.0	17.4	5 21	15 19.88	+3 39.1	1.933	2.882	8.6	20.9
5 31	15 8.72	-15 1.6	1.359	2.334	8.9	17.7	5 31	15 12.04	+4 1.8	1.974	2.881	10.9	21.1
6 10	15 0.96	-14 40.1	1.403	2.325	13.5	17.9	6 10	15 5.59	+4 3.0	2.038	2.879	13.5	21.2
6 20	14 55.92	-14 30.8	1.467	2.316	17.4	18.2	6 20	15 1.02	+3 44.3	2.121	2.878	15.8	21.4
519557	2012 QX ₅₃		5 14.4 206°18	2.7°/16.1	18		126858	2002 EQ ₇₈		5 14.4 218°27	1.0°/15.0	17	
4 11	15 50.45	-27 38.2	2.067	2.902	13.0	21.1	4 11	15 50.77	-23 2.2	2.040	2.886	12.7	20.6
4 21	15 44.96	-27 35.6	1.986	2.900	10.0	20.8	4 21	15 45.20	-22 48.5	1.956	2.881	9.5	20.4
5 1	15 37.41	-27 20.6	1.928	2.898	6.6	20.6	5 1	15 37.57	-22 25.3	1.896	2.876	5.8	20.1
5 11	15 28.55	-26 53.2	1.896	2.896	3.4	20.4	5 11	15 28.64	-21 53.4	1.863	2.870	2.0	19.9
5 21	15 19.35	-26 15.2	1.892	2.894	3.3	20.4	5 21	15 19.34	-21 15.5	1.858	2.864	2.7	19.9
5 31	15 10.83	-25 30.4	1.915	2.892	6.5	20.6	5 31	15 10.68	-20 35.3	1.880	2.857	6.7	20.2
6 10	15 3.87	-24 44.1	1.963	2.890	10.0	20.8	6 10	15 3.54	-19 57.4	1.928	2.851	10.4	20.4
6 20	14 59.06	-24 1.0	2.035	2.887	13.1	21.0	6 20	14 58.51	-19 25.7	1.998	2.844	13.6	20.6
38853	2000 SW ₇₁		5 14.4 282°15	4.2°/15.9	18		7781	Townsend		5 14.4 286°79	18.5°/19.9	18	R
4 11	15 55.16	-27 28.4	1.798	2.633	14.6	19.0	4 11	16 5.00	-49 56.7	1.187	1.952	24.6	17.6
4 21	15 49.12	-28 20.4	1.702	2.614	11.5	18.7	4 21	15 59.65	-52 31.1	1.119	1.943	22.5	17.4
5 1	15 40.28	-29 3.0	1.628	2.594	7.9	18.5	5 1	15 48.28	-54 36.5	1.065	1.935	20.4	17.2
5 11	15 29.39	-29 32.8	1.579	2.575	4.8	18.3	5 11	15 31.80	-55 56.8	1.029	1.926	18.9	17.1
5 21	15 17.58	-29 48.2	1.558	2.555	4.9	18.2	5 21	15 12.76	-56 20.1	1.009	1.918	18.5	17.0
5 31	15 6.24	-29 50.2	1.563	2.536	8.2	18.4	5 31	14 55.01	-55 44.6	1.008	1.909	19.2	17.0
6 10	14 56.70	-29 43.1	1.592	2.516	12.1	18.5	6 10	14 41.96	-54 22.3	1.022	1.901	21.0	17.1
6 20	14 49.86	-29 32.3	1.644	2.496	15.7	18.7	6 20	14 35.28	-52 31.5	1.052	1.893	23.3	17.2
425048	2009 QW ₁₀		5 14.4 276°32	1.1°/13.8	17		300998	2008 GF ₃₄		5 14.4 131°66	3.9°/10.8	18	
4 11	15 51.09	-17 12.7	1.706	2.570	13.9	22.0	4 11	15 46.04	-7 49.8	2.662	3.519	9.7	21.1
4 21	15 45.86	-16 53.6	1.614	2.550	10.3	21.7	4 21	15 41.10	-6 44.8	2.600	3.528	7.3	20.9
5 1	15 38.18	-16 28.2	1.545	2.530	6.2	21.4	5 1	15 34.87	-5 40.9	2.564	3.538	5.0	20.8
5 11	15 28.81	-15 58.8	1.502	2.510	1.8	21.1	5 11	15 27.91	-4 42.0	2.557	3.547	3.9	20.7
5 21	15 18.80	-15 28.6	1.485	2.489	3.7	21.2	5 21	15 20.84	-3 51.8	2.579	3.555	5.0	20.8
5 31	15 9.37	-15 1.9	1.494	2.469	8.4	21.4	5 31	15 14.28	-3 13.1	2.628	3.564	7.3	21.0
6 10	15 1.61	-14 42.9	1.528	2.448	12.8	21.6	6 10	15 8.78	-2 47.7	2.703	3.572	9.7	21.2
6 20	14 56.27	-14 34.7	1.582	2.427	16.6	21.8	6 20	15 4.70	-2 35.7	2.800	3.580	11.8	21.3
258622	2002 DJ ₁₁		5 14.4 51°05	2.8°/12.5	17		96791	1999 RL ₁₁₀		5 14.4 187°55	4.5°/17.8	18	
4 11	15 46.63	-12 2.0	2.150	3.015	11.4	20.1	4 11	15 52.53	-34 38.5	2.402	3.200	12.6	20.0
4 21	15 41.84	-11 24.8	2.086	3.022	8.4	19.9	4 21	15 46.36	-34 40.0	2.316	3.199	10.1	19.8
5 1	15 35.41	-10 46.5	2.046	3.029	5.2	19.7	5 1	15 38.19	-34 25.9	2.253	3.198	7.4	19.6
5 11	15 28.03	-10 10.7	2.034	3.036	2.8	19.5	5 11	15 28.80	-33 55.2	2.215	3.197	5.1	19.5
5 21	15 20.46	-9 40.4	2.049	3.044	4.3	19.7	5 21	15 19.10	-33 9.1	2.206	3.195	4.7	19.4
5 31	15 13.52	-9 18.8	2.091	3.051	7.4	19.9	5 31	15 10.09	-32 11.1	2.225	3.192	6.5	19.6
6 10	15 7.87	-9 7.9	2.158	3.059	10.4	20.1	6 10	15 2.60	-31 6.5	2.270	3.189	9.2	19.7
6 20	15 3.98	-9 8.6	2.246	3.067	13.1	20.3	6 20	14 57.19	-30 1.3	2.340	3.186	11.8	19.9
471322	2011 KU ₆		5 14.4 317°15	0.5°/14.2	17		485158	2010 RB ₃₇		5 14.4 279°87	19.5°/27.6	18	
4 11	15 53.89	-15 28.3	1.666	2.528	14.3	20.7	4 11	15 49.38	+13 41.8	1.052	1.909	21.1	20.7
4 21	15 47.97	-16 5.7	1.583	2.517	10.6	20.5	4 21	15 45.39	+17 13.7	1.010	1.895	19.8	20.6
5 1	15 39.46	-16 43.0	1.522	2.506	6.3	20.2	5 1	15 38.19	+20 19.5	0.987	1.881	19.6	20.5
5 11	15 29.15	-17 20.0	1.487	2.495	1.6	19.9	5 11	15 28.88	+22 40.1	0.982	1.868	20.7	20.5
5 21	15 18.15	-17 56.6	1.479	2.485	3.4	20.0	5 21	15 18.94	+24 3.2	0.994	1.854	22.7	20.6
5 31	15 7.75	-18 33.2	1.498	2.475	8.1	20.2	5 31	15 10.03	+24 24.5	1.020	1.840	25.1	20.7
6 10	14 59.13	-19 11.4	1.542	2.465	12.4	20.4	6 10	15 3.54	+23 48.8	1.057	1.826	27.6	20.9
6 20	14 53.07	-19 52.5	1.607	2.456	16.2	20.7	6 20	15 0.24	+22 25.8	1.103	1.813	29.8	21.0
475638	2006 UN ₂₅₂		5 14.4 209°07	0.6°/13.9	16		77955	2002 HX ₁		5 14.4 317°82	2.7°/15.2	18	
4 11	15 47.55	-18 29.7	2.546	3.396	10.4	22.7	4 11	15 51.75	-22 34.7	1.475	2.337	15.8	18.7
4 21	15 42.40	-17 59.4	2.463	3.392	7.6	22.6	4 21	15 47.11	-23 21.2	1.374	2.306	12.1	18.4
5 1	15 35.73	-17 23.4	2.405	3.388	4.4	22.3	5 1	15 39.39	-24 2.2	1.294	2.275	7.8	18.1
5 11	15 28.13	-16 44.0	2.375	3.383	1.2	22.1	5 11	15 29.27	-24 35.4	1.239	2.244	3.5	17.8
5 21	15 20.29	-16 3.8	2.374	3.378	2.6	22.2	5 21	15 17.95	-24 59.3	1.208	2.213	4.2	17.7
5 31	15 12.94	-15 26.0	2.401	3.372	5.9	22.4	5 31	15 6.98	-25 14.7	1.203	2.184	9.1	17.9
6 10	15 6.74	-14 53.7	2.455	3.367	8.9	22.6	6 10	14 57.90	-25 25.3	1.220	2.155	14.0	18.1
6 20	15 2.13	-14 29.3	2.533	3.361	11.6	22.8	6 20	14 51.83	-25 35.7	1.256	2.127	18.5	18.3
417640	2006 XN ₄₃		5 14.4 137°65	5.9°/18.3	17		153645	2001 TV ₉₃		5 14.4 166°34	3.3°/16.3	17	
4 11	15 53.07	-35 57.2	1.765	2.575	15.9	20.9	4 11	15 54.22	-28 34.6	2.126	2.950	13.1	21.6
4 21	15 47.34	-35 59.6	1.688	2.578	12.9	20.7	4 21	15 47.72	-28 50.8	2.048	2.954	10.1	21.4
5 1	15 38.99	-35 40.6	1.633	2.580	9.6	20.5	5 1	15 39.06	-28 55.0	1.993	2.958	6.9	21.2
5 11	15 29.00	-34 58.7	1.601	2.582	6.8	20.3	5 11	15 29.04	-28 46.1	1.965	2.961	3.9	21.0
5 21	15 18.65	-33 55.3	1.595	2.584	6.0	20.2	5 21	15 18.65	-28 25.0	1.965	2.964	3.8	21.0
5 31	15 9.29	-32 36.2	1.615	2.586	8.2	20.4	5 31	15 8.98	-27 54.9	1.992	2.966	6.6	21.2
6 10	15 2.02	-31 9.6	1.660	2.588	11.4	20.6	6 10	15 0.95	-27 20.3	2.046	2.968	9.9	21.4
6 20	14 57.45	-29 44.1	1.728	2.590	14.6	20.8	6 20	14 55.15	-26 46.3	2.124	2.969	12.9	21.6
169848	2002 RJ ₂₁		5 14.4 213°21	1.0°/13.7	18		297570	2001 RA ₉₈		5 14.4 180°79	0.3°/14.6	18	
4 11	15 49.20	-16 4											

EPHEMERIDES

5 14.4

5 14.4

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
506518	2004 <i>RB</i> ₃₃₆		5 14.4 209°64	2.4/12.5	17		341917	2008 <i>KV</i> ₈		5 14.4 291°27	0.4/13.8	18	
4 11	15 49.17	-14 12.4	2.286	3.142	11.1	22.4	4 11	15 40.45	-18 0.9	4.312	5.159	6.5	21.2
4 21	15 43.72	-13 15.8	2.204	3.136	8.2	22.2	4 21	15 36.77	-17 34.3	4.226	5.154	4.7	21.1
5 1	15 36.58	-12 14.9	2.147	3.129	5.0	22.0	5 1	15 32.27	-17 4.8	4.166	5.148	2.8	20.9
5 11	15 28.40	-11 13.4	2.119	3.122	2.5	21.8	5 11	15 27.29	-16 33.7	4.135	5.143	0.8	20.8
5 21	15 19.96	-10 15.4	2.119	3.115	4.0	21.9	5 21	15 22.20	-16 2.4	4.134	5.138	1.6	20.8
5 31	15 12.08	-9 25.2	2.148	3.107	7.3	22.1	5 31	15 17.36	-15 32.6	4.163	5.133	3.7	21.0
6 10	15 5.46	-8 46.1	2.202	3.098	10.5	22.2	6 10	15 13.13	-15 5.9	4.219	5.127	5.6	21.1
6 20	15 0.60	-8 20.1	2.279	3.089	13.3	22.4	6 20	15 9.76	-14 43.8	4.301	5.122	7.3	21.2
144738	2004 <i>GB</i> ₅₀		5 14.4 309°09	0.3/14.6	17		58361	1995 <i>MC</i> ₃		5 14.4 266°43	6.4/10.9	18	
4 11	15 47.87	-21 0.5	2.063	2.918	12.2	20.6	4 11	15 51.51	-2 7.7	1.958	2.812	12.8	19.7
4 21	15 43.03	-20 42.6	1.982	2.912	9.1	20.4	4 21	15 45.81	-1 30.4	1.871	2.792	10.1	19.4
5 1	15 36.29	-20 16.9	1.925	2.907	5.4	20.2	5 1	15 38.02	-0 59.6	1.808	2.771	7.6	19.2
5 11	15 28.35	-19 44.8	1.894	2.902	1.5	19.9	5 11	15 28.84	-0 40.1	1.770	2.750	6.4	19.1
5 21	15 20.07	-19 9.1	1.891	2.897	2.6	20.0	5 21	15 19.16	-0 35.8	1.760	2.728	7.7	19.2
5 31	15 12.40	-18 33.6	1.915	2.892	6.6	20.2	5 31	15 9.97	-0 49.3	1.775	2.706	10.5	19.3
6 10	15 6.14	-18 2.2	1.964	2.887	10.2	20.4	6 10	15 2.19	-1 20.9	1.814	2.684	13.6	19.4
6 20	15 1.84	-17 38.0	2.036	2.883	13.3	20.6	6 20	14 56.46	-2 9.2	1.873	2.662	16.5	19.6
245606	2005 <i>WK</i> ₃₂		5 14.4 290°41	0.5/14.1	18		165373	2000 <i>WV</i> ₁₁₁		5 14.4 190°66	1.0/14.9	18	
4 11	15 48.27	-17 46.0	2.272	3.126	11.3	21.0	4 11	15 55.69	-21 20.3	1.842	2.688	13.9	20.4
4 21	15 43.28	-17 38.8	2.174	3.106	8.3	20.7	4 21	15 49.04	-21 31.8	1.762	2.687	10.4	20.1
5 1	15 36.46	-17 27.1	2.101	3.085	4.9	20.5	5 1	15 39.98	-21 35.7	1.706	2.686	6.3	19.9
5 11	15 28.41	-17 12.3	2.056	3.064	1.3	20.2	5 11	15 29.34	-21 32.1	1.676	2.684	2.0	19.6
5 21	15 19.91	-16 56.3	2.038	3.043	2.7	20.3	5 21	15 18.23	-21 22.1	1.675	2.681	3.0	19.7
5 31	15 11.82	-16 41.7	2.048	3.022	6.5	20.5	5 31	15 7.85	-21 8.8	1.701	2.677	7.3	19.9
6 10	15 4.94	-16 31.3	2.084	3.001	10.0	20.6	6 10	14 59.24	-20 56.1	1.752	2.673	11.3	20.2
6 20	14 59.88	-16 27.5	2.143	2.980	13.1	20.8	6 20	14 53.07	-20 47.6	1.826	2.669	14.8	20.4
501816	2014 <i>WE</i> ₆₁		5 14.4 294°98	3.5/12.9	17		56787	2000 <i>OZ</i> ₅₃		5 14.4 215°09	3.9/17.1	18	
4 11	15 51.02	-12 34.5	1.345	2.225	16.0	21.3	4 11	15 50.45	-31 56.5	2.469	3.280	11.9	20.0
4 21	15 46.32	-12 5.1	1.262	2.205	12.0	21.0	4 21	15 44.82	-32 6.4	2.381	3.276	9.4	19.8
5 1	15 38.71	-11 32.9	1.200	2.186	7.4	20.7	5 1	15 37.32	-32 3.4	2.317	3.271	6.7	19.6
5 11	15 29.06	-11 2.4	1.162	2.167	3.7	20.5	5 11	15 28.64	-31 46.7	2.279	3.266	4.4	19.4
5 21	15 18.61	-10 38.4	1.148	2.147	5.8	20.5	5 21	15 19.60	-31 17.1	2.268	3.261	4.1	19.4
5 31	15 8.86	-10 26.0	1.158	2.128	10.7	20.7	5 31	15 11.13	-30 37.5	2.286	3.256	6.2	19.5
6 10	15 1.13	-10 28.8	1.190	2.109	15.6	21.0	6 10	15 4.03	-29 52.3	2.330	3.251	8.9	19.7
6 20	14 56.28	-10 48.0	1.240	2.091	19.9	21.2	6 20	14 58.85	-29 6.1	2.397	3.245	11.5	19.9
470224	2006 <i>WA</i> ₉₈		5 14.4 332°47	0.9/15.1	18		184615	2005 <i>RD</i> ₁₀		5 14.4 272°49	1.2/14.9	18	
4 11	15 47.15	-24 3.2	2.115	2.963	12.2	20.5	4 11	15 54.74	-21 17.3	1.865	2.712	13.7	20.3
4 21	15 42.44	-23 30.3	2.035	2.961	9.1	20.3	4 21	15 48.66	-21 34.1	1.760	2.685	10.3	20.0
5 1	15 35.90	-22 46.4	1.978	2.958	5.6	20.1	5 1	15 39.98	-21 44.2	1.678	2.658	6.4	19.7
5 11	15 28.24	-21 53.5	1.948	2.955	1.9	19.8	5 11	15 29.41	-21 47.3	1.622	2.629	2.2	19.4
5 21	15 20.31	-20 54.9	1.946	2.953	2.5	19.9	5 21	15 17.98	-21 43.6	1.595	2.601	3.1	19.4
5 31	15 13.02	-20 55.3	1.972	2.951	6.3	20.1	5 31	15 6.94	-21 35.7	1.594	2.571	7.7	19.6
6 10	15 7.14	-18 59.6	2.023	2.948	9.8	20.3	6 10	14 57.49	-21 27.2	1.619	2.541	12.0	19.8
6 20	15 3.18	-18 11.9	2.098	2.946	12.9	20.5	6 20	14 50.48	-21 22.3	1.666	2.511	15.9	20.0
136673	1995 <i>SB</i> ₂₀		5 14.4 315°75	0.6/14.6	17		17074	1999 <i>GQ</i> ₃₆		5 14.4 55°04	3.4/12.0	18	
4 11	15 49.62	-20 40.6	1.317	2.192	16.5	20.7	4 11	15 48.61	-15 52.8	1.506	2.382	14.8	17.5
4 21	15 45.42	-20 37.6	1.235	2.175	12.4	20.4	4 21	15 43.78	-14 14.9	1.452	2.394	10.8	17.3
5 1	15 38.23	-20 24.6	1.173	2.159	7.5	20.1	5 1	15 36.74	-12 29.4	1.420	2.406	6.4	17.1
5 11	15 28.94	-20 2.7	1.135	2.143	2.1	19.7	5 11	15 28.47	-10 43.8	1.415	2.419	3.4	16.9
5 21	15 18.86	-19 34.7	1.121	2.128	3.7	19.7	5 21	15 20.07	-9 6.5	1.436	2.432	5.6	17.1
5 31	15 9.54	-19 5.7	1.130	2.113	9.2	20.0	5 31	15 12.66	-7 45.1	1.483	2.445	9.6	17.3
6 10	15 2.36	-18 41.6	1.162	2.099	14.4	20.2	6 10	15 7.12	-6 44.3	1.553	2.458	13.5	17.6
6 20	14 58.19	-18 27.2	1.212	2.086	18.8	20.5	6 20	15 3.92	-6 5.8	1.643	2.472	16.8	17.8
216765	2005 <i>TG</i> ₉₉		5 14.4 245°60	0.6/13.9	16		427991	2006 <i>AL</i> ₅₉		5 14.4 269°61	1.6/13.6	17	
4 11	15 46.89	-19 32.0	2.352	3.205	11.0	20.4	4 11	15 50.19	-15 38.9	1.804	2.668	13.3	21.3
4 21	15 42.06	-18 51.9	2.269	3.200	8.1	20.2	4 21	15 44.91	-15 20.6	1.729	2.665	9.8	21.5
5 1	15 35.61	-18 4.6	2.212	3.195	4.7	20.0	5 1	15 37.49	-14 58.3	1.676	2.661	5.8	21.0
5 11	15 28.17	-17 12.7	2.182	3.190	1.2	19.7	5 11	15 28.70	-14 34.6	1.650	2.657	2.0	20.7
5 21	15 20.49	-16 19.5	2.181	3.185	2.7	19.8	5 21	15 19.53	-14 12.4	1.651	2.654	3.7	20.9
5 31	15 13.35	-15 28.9	2.208	3.180	6.2	20.0	5 31	15 11.04	-13 55.4	1.678	2.650	7.8	21.1
6 10	15 7.43	-14 44.9	2.261	3.175	9.4	20.2	6 10	15 4.16	-13 46.5	1.730	2.646	11.7	21.3
6 20	15 3.21	-14 10.0	2.337	3.170	12.3	20.4	6 20	14 59.49	-13 47.7	1.803	2.643	15.1	21.5
20985	1981 <i>EA</i> ₃₅		5 14.4 226°58	5.3/18.3	18		96272	1995 <i>SZ</i> ₈₈		5 14.4 75°35	0.7/13.9	18	
4 11	15 52.77	-37 48.4	2.938	3.710	11.1	19.0	4 11	15 49.47	-18 56.6	1.802	2.663	13.4	20.0
4 21	15 46.47	-38 19.4	2.839	3.698	9.2	18.8	4 21	15 44.32	-18 26.9	1.732	2.667	9.8	19.8
5 1	15 38.30	-38 37.3	2.763	3.686	7.3	18.7	5 1	15 37.08	-17 49.7	1.687	2.671	5.8	19.5
5 11	15 28.89	-38 39.9	2.714	3.674	5.7	18.5	5 11	15 28.58	-17 7.9	1.667	2.675	1.5	19.2
5 21	15 19.04	-38 26.8	2.692	3.661	5.3	18.5	5 21	15 19.81	-16 25.0	1.674	2.680	3.2	19.4
5 31	15 9.63	-37 59.6	2.698	3.648	6.5	18.6	5 31	15 11.80	-15 45.8	1.708	2.684	7.4	19.6
6 10	15 1.47	-37 21.8	2.731	3.634	8.4	18.7	6 10	15 5.44	-15 14.2	1.767	2.688	11.3	19.9
6 20	14 55.15	-36 38.2	2.788	3.620	10.5	18.8	6 20	15 1.27	-14 53.2	1.847	2.692	14.6	20.1
235265	2003 <i>TY</i> ₈		5 14.4 189°95	2.4/12.9	18		331498	1999 <i>TX</i> ₁₂₃		5 14.4 2			

EPHEMERIDES

5 14.4

5 14.4

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
74357	1998 WZ ₁₂		5 14.4 284°46	1°8/15.3	18		63625	2001 QC ₈₀		5 14.4 336°91	1°3/14.9	18	
4 11	15 51.86	-23 20.8	1.991	2.836	13.0	19.1	4 11	15 53.31	-21 48.2	1.317	2.185	17.0	18.5
4 21	15 46.35	-23 38.0	1.890	2.813	9.9	18.9	4 21	15 48.03	-21 58.0	1.247	2.183	12.7	18.2
5 1	15 38.51	-23 47.2	1.812	2.789	6.3	18.6	5 1	15 39.70	-21 57.4	1.198	2.181	7.8	17.9
5 11	15 29.03	-23 47.9	1.759	2.764	2.6	18.3	5 11	15 29.34	-21 46.8	1.172	2.180	2.6	17.6
5 21	15 18.84	-23 40.7	1.735	2.740	3.1	18.3	5 21	15 18.39	-21 28.1	1.171	2.178	3.7	17.7
5 31	15 9.09	-23 27.8	1.738	2.716	7.1	18.5	5 31	15 8.41	-21 5.9	1.195	2.177	9.0	18.0
6 10	15 0.81	-23 13.1	1.766	2.691	11.0	18.7	6 10	15 0.75	-20 46.0	1.241	2.176	13.8	18.2
6 20	14 54.79	-23 0.6	1.816	2.666	14.6	18.8	6 20	14 56.18	-20 33.1	1.306	2.175	18.0	18.5
83008	2001 QY ₁₆₃		5 14.4 311°56	5°1/17.1	18		67326	2000 HX ₇₃		5 14.4 296°45	10°6/8.4	18	
4 11	15 51.53	-32 22.1	2.030	2.848	13.8	18.7	4 11	15 49.86	+ 5 39.8	1.614	2.466	15.2	19.3
4 21	15 46.10	-32 58.9	1.945	2.841	11.1	18.5	4 21	15 44.80	+ 6 50.0	1.550	2.456	12.9	19.2
5 1	15 38.32	-33 21.8	1.881	2.834	8.1	18.3	5 1	15 37.48	+ 7 45.7	1.509	2.445	11.1	19.0
5 11	15 28.95	-33 28.6	1.843	2.828	5.7	18.1	5 11	15 28.73	+ 8 19.1	1.490	2.436	10.7	19.0
5 21	15 19.04	-33 18.8	1.831	2.821	5.3	18.1	5 21	15 19.58	+ 8 24.9	1.494	2.426	11.9	19.0
5 31	15 9.75	-32 54.9	1.846	2.814	7.5	18.2	5 31	15 11.16	+ 8 1.0	1.521	2.416	14.3	19.1
6 10	15 2.12	-32 21.7	1.885	2.808	10.5	18.4	6 10	15 4.44	+ 7 9.1	1.568	2.407	16.9	19.3
6 20	14 56.85	-31 44.9	1.947	2.802	13.5	18.6	6 20	15 0.02	+ 5 53.5	1.632	2.397	19.5	19.4
402954	2007 TV ₃₈₅		5 14.4 202°77	1°8/12.4	18		75105	1999 VP ₅₁		5 14.4 234°80	2°2/15.5	18	
4 11	15 43.38	-10 37.4	4.161	5.009	6.7	22.0	4 11	15 54.43	-24 49.5	1.852	2.693	14.0	20.5
4 21	15 38.89	-10 18.6	4.077	5.004	4.9	21.9	4 21	15 48.29	-25 0.4	1.762	2.681	10.7	20.2
5 1	15 33.53	-9 59.8	4.020	4.999	3.1	21.7	5 1	15 39.65	-25 0.7	1.694	2.669	6.8	20.0
5 11	15 27.65	-9 42.7	3.993	4.993	1.8	21.6	5 11	15 29.33	-24 49.8	1.653	2.657	3.0	19.7
5 21	15 21.63	-9 28.6	3.996	4.987	2.6	21.7	5 21	15 18.39	-24 28.8	1.639	2.644	3.4	19.7
5 31	15 15.87	-9 18.8	4.028	4.981	4.4	21.8	5 31	15 8.08	-24 1.0	1.653	2.631	7.4	19.9
6 10	15 10.75	-9 14.3	4.088	4.975	6.3	21.9	6 10	14 59.51	-23 31.3	1.692	2.617	11.4	20.1
6 20	15 6.53	-9 15.8	4.172	4.968	8.0	22.0	6 20	14 53.41	-23 4.7	1.753	2.602	15.0	20.3
464831	2005 AR ₂₀		5 14.4 147°98	3°0/12.6	18		247772	2003 QM ₉₀		5 14.4 264°06	4°0/16.3	17	
4 11	15 54.22	-11 36.2	2.032	2.885	12.5	22.8	4 11	15 54.42	-28 39.2	1.663	2.500	15.5	20.3
4 21	15 47.44	-11 0.3	1.969	2.898	9.2	22.6	4 21	15 48.73	-28 56.4	1.568	2.482	12.2	20.1
5 1	15 38.76	-10 23.6	1.931	2.911	5.7	22.4	5 1	15 40.14	-28 59.0	1.495	2.463	8.3	19.8
5 11	15 29.00	-9 49.4	1.920	2.922	3.1	22.3	5 11	15 29.50	-28 45.0	1.446	2.444	4.8	19.5
5 21	15 19.07	-9 21.1	1.938	2.932	4.6	22.4	5 21	15 18.03	-28 14.7	1.423	2.424	4.6	19.5
5 31	15 9.92	-9 1.9	1.985	2.942	7.9	22.6	5 31	15 7.21	-27 31.7	1.426	2.404	8.3	19.7
6 10	15 2.32	-8 53.8	2.057	2.950	11.2	22.8	6 10	14 58.35	-26 42.8	1.453	2.383	12.6	19.8
6 20	14 56.78	-8 57.6	2.150	2.958	14.0	23.0	6 20	14 52.33	-25 55.2	1.502	2.362	16.5	20.0
370978	2005 SY ₂₃₉		5 14.4 227°56	1°5/15.3	17		436565	2011 HJ ₄₃		5 14.4 269°54	7°2/10.1	18	
4 11	15 51.56	-24 29.3	1.958	2.801	13.3	22.0	4 11	15 50.13	+ 0 29.0	2.011	2.862	12.7	21.0
4 21	15 45.93	-24 12.9	1.871	2.793	10.0	21.7	4 21	15 44.70	+ 1 13.4	1.930	2.845	10.2	20.9
5 1	15 38.11	-23 44.9	1.808	2.785	6.2	21.5	5 1	15 37.33	+ 1 49.5	1.874	2.828	8.0	20.7
5 11	15 28.89	-23 6.3	1.771	2.777	2.4	21.2	5 11	15 28.70	+ 2 12.1	1.843	2.811	7.2	20.6
5 21	15 19.24	-22 19.6	1.762	2.768	2.9	21.2	5 21	15 19.65	+ 2 17.3	1.838	2.794	8.4	20.6
5 31	15 10.26	-21 29.4	1.780	2.758	6.9	21.5	5 31	15 11.13	+ 2 2.8	1.858	2.776	10.9	20.7
6 10	15 2.88	-20 41.0	1.824	2.748	10.8	21.7	6 10	15 3.96	+ 1 28.7	1.902	2.759	13.7	20.9
6 20	14 57.73	-19 59.0	1.890	2.738	14.1	21.9	6 20	14 58.74	+ 0 37.0	1.965	2.741	16.3	21.0
265665	2005 UQ ₂₄		5 14.4 319°93	1°2/14.9	17		6925	Susumu		5 14.4 308°85	3°6/11.7	18	
4 11	15 49.40	-22 33.3	1.467	2.333	15.6	20.1	4 11	15 46.52	-13 23.9	1.830	2.701	12.8	16.4
4 21	15 44.98	-22 28.8	1.386	2.321	11.8	19.9	4 21	15 42.17	-12 3.2	1.752	2.692	9.4	16.2
5 1	15 37.84	-22 13.0	1.326	2.309	7.2	19.6	5 1	15 35.85	-10 36.7	1.699	2.682	5.9	16.0
5 11	15 28.86	-21 46.7	1.291	2.298	2.4	19.2	5 11	15 28.31	-9 10.4	1.672	2.673	3.6	15.8
5 21	15 19.26	-21 12.7	1.280	2.287	3.4	19.3	5 21	15 20.45	-7 50.6	1.672	2.664	5.5	15.9
5 31	15 10.42	-20 35.8	1.294	2.277	8.4	19.5	5 31	15 13.23	-6 43.3	1.699	2.656	9.1	16.1
6 10	15 3.56	-20 2.0	1.332	2.267	13.1	19.8	6 10	15 7.48	-5 53.1	1.749	2.647	12.7	16.3
6 20	14 59.44	-19 36.4	1.389	2.257	17.1	20.0	6 20	15 3.77	-5 21.7	1.820	2.639	15.8	16.5
70125	1999 NZ		5 14.4 219°28	6°1/10.6	17		253904	2004 BL ₁₄₄		5 14.4 199°33	0°8/14.9	17	R
4 11	15 51.31	- 5 8.9	1.846	2.706	13.2	19.8	4 11	15 53.41	-22 21.3	2.031	2.874	12.9	22.4
4 21	15 45.63	- 4 2.5	1.771	2.699	10.2	19.6	4 21	15 47.17	-22 9.6	1.947	2.871	9.6	22.2
5 1	15 37.88	- 2 59.1	1.721	2.690	7.3	19.4	5 1	15 38.80	-21 48.7	1.887	2.867	5.9	21.9
5 11	15 28.82	- 2 4.4	1.697	2.681	6.1	19.3	5 11	15 29.08	-21 19.7	1.855	2.862	1.9	21.7
5 21	15 19.39	- 1 23.9	1.700	2.672	7.6	19.3	5 21	15 18.97	-20 44.8	1.850	2.856	2.7	21.7
5 31	15 10.61	- 1 1.5	1.728	2.662	10.6	19.5	5 31	15 9.51	-20 7.8	1.874	2.850	6.8	21.9
6 10	15 3.37	- 0 58.8	1.780	2.651	13.8	19.7	6 10	15 1.64	-19 33.2	1.924	2.843	10.5	22.2
6 20	14 58.25	- 1 15.1	1.851	2.639	16.7	19.8	6 20	14 55.95	-19 5.0	1.996	2.836	13.8	22.4
174613	2003 SH ₄₁		5 14.4 199°23	3°8/16.4	17		69143	2003 FN ₁₁₅		5 14.4 275°50	3°9/11.6	18	
4 11	15 56.77	-29 9.8	2.020	2.841	13.8	21.0	4 11	15 48.66	-12 41.6	1.787	2.656	13.2	18.4
4 21	15 49.87	-29 36.3	1.934	2.837	10.8	20.8	4 21	15 43.89	-11 22.9	1.699	2.637	9.8	18.1
5 1	15 40.52	-29 50.3	1.871	2.833	7.4	20.6	5 1	15 36.96	- 9 57.9	1.635	2.618	6.2	17.8
5 11	15 29.53	-29 49.9	1.834	2.828	4.5	20.4	5 11	15 28.62	- 8 32.6	1.598	2.598	3.9	17.7
5 21	15 17.99	-29 35.2	1.825	2.822	4.3	20.3	5 21	15 19.81	- 7 13.6	1.587	2.578	5.9	17.7
5 31	15 7.13	-29 8.8	1.844	2.816	7.2	20.5	5 31	15 11.59	- 6 7.3	1.603	2.558	9.7	17.9
6 10	14 58.03	-28 35.9	1.889	2.809	10.7	20.7	6 10	15 4.89	- 5 18.5	1.643	2.538	13.5	18.1
6 20	14 51.39	-28 2.1	1.956	2.801	13.9	20.9	6 20	15 0.36	- 4 49.6	1.703	2.517	16.9	18.3
84041	2002 PL ₅₅		5 14.4 226°26	0°6/14.8	18		231199	2005 UO ₅₀₅		5 14.4 11°52	1°9/15.4	18	
4 11	15 52.73	-22 12.8	2.032</										

EPHEMERIDES

5 14.4

5 14.4

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
155031	2005 <i>QW</i> ₉₄		5 14.4 248°42	4.7/17.5	18		374303	2005 <i>SH</i> ₁₅₀		5 14.4 243°52	0.2/14.4	17	
4 11	15 51.26	-33 30.7	2.385	3.190	12.4	20.7	4 11	15 51.93	-19 23.9	1.939	2.792	13.0	22.2
4 21	15 45.60	-33 56.9	2.295	3.183	10.0	20.6	4 21	15 46.26	-19 12.1	1.850	2.780	9.6	22.0
5 1	15 37.90	-34 9.7	2.229	3.176	7.4	20.4	5 1	15 38.38	-18 53.5	1.785	2.767	5.7	21.7
5 11	15 28.87	-34 7.4	2.189	3.169	5.2	20.2	5 11	15 29.05	-18 29.2	1.746	2.754	1.5	21.4
5 21	15 19.39	-33 50.2	2.175	3.162	4.9	20.2	5 21	15 19.22	-18 1.9	1.735	2.740	2.9	21.5
5 31	15 10.46	-33 20.2	2.189	3.155	6.7	20.3	5 31	15 9.96	-17 35.0	1.751	2.726	7.2	21.7
6 10	15 2.98	-32 41.9	2.229	3.148	9.4	20.5	6 10	15 2.25	-17 12.6	1.793	2.712	11.2	21.9
6 20	14 57.54	-32 0.3	2.293	3.141	12.0	20.6	6 20	14 56.73	-16 57.9	1.856	2.697	14.7	22.1
274503	2008 <i>SC</i> ₁₃₉		5 14.4 241°30	2.9/12.6	18		81503	2000 <i>GD</i> ₁₆₃		5 14.4 112°87	6.3/9.7	18	
4 11	15 49.05	-12 29.0	1.998	2.861	12.2	20.7	4 11	15 47.71	-1 50.8	2.163	3.019	11.7	19.2
4 21	15 43.90	-11 49.1	1.919	2.854	9.0	20.5	4 21	15 42.61	-0 41.0	2.109	3.029	9.2	19.0
5 1	15 36.84	-11 7.0	1.865	2.847	5.6	20.3	5 1	15 35.93	+0 22.7	2.079	3.038	7.1	18.9
5 11	15 28.58	-10 26.4	1.837	2.840	3.0	20.1	5 11	15 28.35	+1 14.9	2.076	3.047	6.4	18.9
5 21	15 19.99	-9 50.9	1.837	2.833	4.6	20.2	5 21	15 20.64	+1 51.6	2.100	3.056	7.5	19.0
5 31	15 11.99	-9 24.3	1.864	2.825	8.1	20.4	5 31	15 13.56	+2 10.2	2.150	3.065	9.8	19.1
6 10	15 5.40	-9 9.5	1.915	2.818	11.5	20.6	6 10	15 7.76	+2 10.4	2.223	3.073	12.2	19.3
6 20	15 0.77	-9 7.5	1.988	2.810	14.5	20.8	6 20	15 3.69	+1 53.3	2.315	3.082	14.4	19.5
492218	2013 <i>SM</i> ₈₅		5 14.4 258°76	1.2/15.1	18		510111	2010 <i>RG</i> ₁₁₂		5 14.4 280°54	0.3/14.2	18	
4 11	15 52.52	-23 1.3	1.871	2.719	13.6	22.0	4 11	15 47.85	-18 48.5	2.359	3.211	11.0	22.1
4 21	15 46.88	-22 54.8	1.775	2.700	10.3	21.8	4 21	15 42.93	-18 34.8	2.265	3.195	8.1	21.9
5 1	15 38.84	-22 38.1	1.702	2.681	6.4	21.5	5 1	15 36.27	-18 15.7	2.195	3.178	4.8	21.6
5 11	15 29.15	-22 11.7	1.655	2.662	2.2	21.2	5 11	15 28.49	-17 52.7	2.153	3.162	1.2	21.3
5 21	15 18.84	-21 37.5	1.635	2.642	3.0	21.2	5 21	15 20.32	-17 27.7	2.139	3.145	2.5	21.4
5 31	15 9.09	-20 59.6	1.643	2.621	7.4	21.4	5 31	15 12.58	-17 3.8	2.154	3.128	6.2	21.6
6 10	15 0.97	-20 23.0	1.676	2.600	11.5	21.6	6 10	15 6.03	-16 44.0	2.194	3.111	9.5	21.8
6 20	14 55.20	-19 52.4	1.731	2.579	15.2	21.8	6 20	15 1.21	-16 30.8	2.257	3.094	12.5	22.0
472352	2015 <i>BR</i> ₁₇		5 14.4 273°10	3.1/12.7	18		281939	2011 <i>FQ</i> ₁₄₃		5 14.4 67°75	2.0/13.3	17	
4 11	15 49.89	-12 26.0	1.736	2.604	13.5	20.8	4 11	15 49.61	-15 33.6	1.727	2.594	13.6	20.5
4 21	15 44.75	-11 52.4	1.663	2.600	10.0	20.5	4 21	15 44.43	-14 56.5	1.666	2.604	9.9	20.3
5 1	15 37.43	-11 16.9	1.613	2.596	6.1	20.3	5 1	15 37.17	-14 15.0	1.629	2.614	5.9	20.1
5 11	15 28.76	-10 43.3	1.588	2.592	3.2	20.1	5 11	15 28.70	-13 32.7	1.618	2.625	2.3	19.9
5 21	15 19.71	-10 15.6	1.591	2.588	4.9	20.2	5 21	15 20.02	-12 53.7	1.634	2.635	4.0	20.0
5 31	15 11.36	-9 57.6	1.619	2.584	8.7	20.4	5 31	15 12.16	-12 22.3	1.676	2.646	8.0	20.3
6 10	15 4.64	-9 51.9	1.671	2.580	12.5	20.6	6 10	15 5.99	-12 1.7	1.742	2.656	11.8	20.5
6 20	15 0.15	-9 59.5	1.744	2.576	15.8	20.8	6 20	15 2.02	-11 53.6	1.829	2.667	15.0	20.8
368403	2002 <i>TZ</i> ₇₅		5 14.4 222°21	0.3/14.3	17		204428	2004 <i>XN</i> ₁₃		5 14.4 110°49	0.7/14.8	18	
4 11	15 51.80	-20 22.4	1.971	2.822	12.9	21.8	4 11	15 54.65	-22 13.8	1.605	2.459	15.2	20.4
4 21	15 46.05	-19 49.0	1.884	2.813	9.5	21.6	4 21	15 48.31	-21 56.4	1.545	2.474	11.2	20.2
5 1	15 38.18	-19 6.5	1.821	2.804	5.7	21.3	5 1	15 39.53	-21 28.3	1.508	2.490	6.8	20.0
5 11	15 28.96	-18 17.1	1.785	2.794	1.4	21.0	5 11	15 29.32	-20 51.3	1.497	2.504	2.0	19.7
5 21	15 19.34	-17 24.3	1.778	2.783	3.0	21.1	5 21	15 18.91	-20 8.9	1.512	2.519	3.1	19.8
5 31	15 10.35	-16 32.9	1.798	2.772	7.2	21.3	5 31	15 9.54	-19 26.2	1.554	2.533	7.7	20.1
6 10	15 2.92	-15 47.9	1.843	2.760	11.1	21.5	6 10	15 2.20	-18 48.7	1.621	2.546	11.8	20.4
6 20	14 57.64	-15 12.9	1.911	2.748	14.5	21.7	6 20	14 57.45	-18 20.2	1.709	2.559	15.3	20.6
173901	2001 <i>UR</i> ₁₆₀		5 14.4 62°33	0.7/14.1	18		478908	2012 <i>WM</i> ₃₂		5 14.4 118°19	3.3/16.9	17	
4 11	15 52.82	-15 31.1	2.041	2.895	12.4	19.8	4 11	15 49.21	-30 25.5	2.400	3.219	11.9	21.4
4 21	15 46.51	-15 52.7	1.982	2.912	9.1	19.6	4 21	15 43.91	-30 27.2	2.320	3.222	9.3	21.2
5 1	15 38.29	-16 12.4	1.947	2.930	5.3	19.4	5 1	15 36.82	-30 16.4	2.264	3.225	6.4	21.0
5 11	15 28.96	-16 30.8	1.939	2.948	1.4	19.2	5 11	15 28.63	-29 52.9	2.234	3.227	3.9	20.9
5 21	15 19.42	-16 48.7	1.960	2.965	2.9	19.3	5 21	15 20.17	-29 18.2	2.232	3.230	3.6	20.8
5 31	15 10.61	-17 7.3	2.009	2.983	6.6	19.6	5 31	15 12.32	-28 35.4	2.258	3.233	5.9	21.0
6 10	15 3.35	-17 28.2	2.085	3.001	10.0	19.8	6 10	15 5.84	-27 49.0	2.310	3.235	8.8	21.2
6 20	14 58.12	-17 52.8	2.183	3.019	12.9	20.1	6 20	15 1.24	-27 3.5	2.386	3.238	11.5	21.3
335758	2007 <i>EM</i> ₈₈		5 14.4 175°19	1.4/13.9	14 C		225940	2002 <i>AE</i> ₁₈₇		5 14.4 92°28	10.1/10.3	17	
4 11	16 5.16	-17 19.4	1.218	2.078	18.6	22.6	4 11	15 54.12	+8 43.0	1.819	2.648	14.8	20.0
4 21	15 56.88	-16 58.9	1.151	2.084	13.8	22.3	4 21	15 47.51	+9 16.1	1.770	2.658	12.5	19.9
5 1	15 45.00	-16 30.2	1.105	2.089	8.2	22.0	5 1	15 38.89	+9 31.3	1.744	2.667	10.7	19.8
5 11	15 30.78	-15 55.8	1.084	2.092	2.3	21.6	5 11	15 29.15	+9 23.6	1.741	2.677	10.1	19.8
5 21	15 15.97	-15 19.8	1.088	2.093	4.7	21.8	5 21	15 19.26	+8 50.6	1.763	2.687	10.9	19.9
5 31	15 2.49	-14 48.6	1.118	2.092	10.7	22.1	5 31	15 10.25	+7 52.9	1.809	2.696	12.8	20.0
6 10	14 51.87	-14 27.9	1.172	2.089	16.0	22.4	6 10	15 2.94	+6 33.7	1.878	2.706	15.0	20.2
6 20	14 44.89	-14 21.5	1.244	2.085	20.4	22.7	6 20	14 57.80	+4 58.1	1.966	2.715	17.1	20.3
471739	2012 <i>UC</i> ₄₄		5 14.4 269°62	2.3/15.7	16		442446	2011 <i>UX</i> ₁₉₄		5 14.4 190°51	3.1/11.6	16	
4 11	15 51.29	-25 31.6	2.013	2.854	13.1	22.4	4 11	15 46.37	-9 50.3	2.849	3.703	9.3	22.0
4 21	15 45.86	-25 38.5	1.918	2.837	10.0	22.1	4 21	15 41.41	-8 57.4	2.773	3.702	6.9	21.9
5 1	15 38.19	-25 34.9	1.847	2.821	6.5	21.9	5 1	15 35.18	-8 4.1	2.724	3.700	4.5	21.7
5 11	15 29.00	-25 20.5	1.801	2.804	3.0	21.6	5 11	15 28.20	-7 13.6	2.703	3.698	3.1	21.6
5 21	15 19.25	-24 56.3	1.783	2.787	3.2	21.6	5 21	15 21.04	-6 29.1	2.711	3.696	4.2	21.7
5 31	15 10.03	-24 25.5	1.792	2.770	6.9	21.8	5 31	15 14.31	-5 53.3	2.747	3.693	6.6	21.8
6 10	15 2.35	-23 52.8	1.826	2.752	10.6	22.0	6 10	15 8.55	-5 28.3	2.810	3.689	9.0	22.0
6 20	14 56.87	-23 22.8	1.883	2.735	14.0	22.2	6 20	15 4.16	-5 14.8	2.896	3.686	11.2	22.1
346387	2008 <i>SO</i> ₆₄		5 14.4 221°93	2.8/16.3	18		21041	1990 <i>QO</i> ₁		5			

EPHEMERIDES

5 14.4

5 14.5

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
514616	2004 <i>BX</i> ₁₆₃		5 14.4 269°73	3°3/10.9	18		12985	1980 <i>UW</i> ₁		5 14.5 264°49	1°1/15.0	18	
4 11	15 42.79	- 1 40.6	4.367	5.207	6.6	20.7	4 11	15 52.62	-22 43.5	1.733	2.585	14.3	19.0
4 21	15 38.46	- 1 29.7	4.288	5.201	5.1	20.6	4 21	15 47.16	-22 33.6	1.639	2.567	10.8	18.7
5 1	15 33.33	- 1 22.8	4.236	5.194	3.8	20.5	5 1	15 39.14	-22 12.9	1.567	2.548	6.7	18.4
5 11	15 27.72	- 1 21.3	4.213	5.188	3.3	20.4	5 11	15 29.37	-21 41.9	1.521	2.528	2.2	18.1
5 21	15 21.98	- 1 26.3	4.219	5.181	3.9	20.5	5 21	15 18.92	-21 3.2	1.502	2.508	3.1	18.1
5 31	15 16.48	- 1 38.7	4.253	5.175	5.2	20.5	5 31	15 9.06	-20 21.1	1.509	2.488	7.8	18.3
6 10	15 11.56	- 1 58.7	4.315	5.168	6.7	20.6	6 10	15 0.95	-19 41.3	1.541	2.467	12.2	18.5
6 20	15 7.49	- 2 26.0	4.399	5.162	8.1	20.7	6 20	14 55.36	-19 8.8	1.594	2.446	16.1	18.7
335605	2006 <i>EW</i> ₃₄		5 14.4 62°61	3°3/16.0	17		32007	Amirhelmy		5 14.5 210°12	1°0/14.0	18	
4 11	15 53.21	-26 39.2	1.755	2.596	14.6	20.8	4 11	15 55.34	-16 55.1	1.685	2.542	14.4	19.7
4 21	15 47.34	-27 7.2	1.689	2.607	11.2	20.6	4 21	15 49.00	-16 47.9	1.605	2.537	10.7	19.4
5 1	15 39.05	-27 23.5	1.646	2.617	7.4	20.4	5 1	15 40.13	-16 35.8	1.548	2.532	6.3	19.2
5 11	15 29.25	-27 26.8	1.628	2.628	4.0	20.2	5 11	15 29.60	-16 20.3	1.517	2.525	1.8	18.8
5 21	15 19.09	-27 18.1	1.637	2.639	3.9	20.2	5 21	15 18.54	-16 4.1	1.513	2.518	3.6	18.9
5 31	15 9.80	-27 0.3	1.672	2.650	7.3	20.5	5 31	15 8.21	-15 50.5	1.537	2.511	8.2	19.2
6 10	15 2.39	-26 38.4	1.732	2.661	11.0	20.7	6 10	14 59.72	-15 43.2	1.585	2.503	12.5	19.4
6 20	14 57.49	-26 17.4	1.814	2.672	14.2	20.9	6 20	14 53.77	-15 44.9	1.654	2.494	16.2	19.7
36656	2000 <i>QS</i> ₂₀₂		5 14.4 175°32	2°8/12.2	18		123339	2000 <i>VY</i> ₅₂		5 14.5 192°56	2°7/16.1	18	
4 11	15 47.46	- 9 52.3	2.810	3.663	9.4	19.9	4 11	15 52.23	-27 32.8	2.132	2.962	12.8	19.8
4 21	15 42.22	- 9 19.3	2.736	3.665	7.0	19.7	4 21	15 46.35	-27 33.7	2.049	2.961	9.9	19.6
5 1	15 35.67	- 8 46.7	2.689	3.666	4.5	19.6	5 1	15 38.39	-27 22.6	1.990	2.959	6.5	19.3
5 11	15 28.34	- 8 17.0	2.670	3.668	2.8	19.4	5 11	15 29.12	-26 59.3	1.957	2.957	3.4	19.1
5 21	15 20.84	- 7 52.8	2.679	3.668	3.9	19.5	5 21	15 19.48	-26 25.6	1.952	2.955	3.3	19.1
5 31	15 13.78	- 7 36.1	2.718	3.669	6.4	19.7	5 31	15 10.50	-25 44.8	1.975	2.952	6.4	19.3
6 10	15 7.73	- 7 28.6	2.783	3.669	8.9	19.8	6 10	15 3.07	-25 1.8	2.024	2.949	9.8	19.5
6 20	15 1.30	- 7 30.8	2.871	3.669	11.1	20.0	6 20	14 57.78	-24 21.5	2.096	2.945	12.9	19.7
91265	1999 <i>CY</i> ₁₀₈		5 14.4 107°73	0°6/14.1	18		204723	2006 <i>HO</i> ₂		5 14.5 331°67	1°5/13.8	17	
4 11	15 53.96	-20 32.9	1.508	2.370	15.6	19.6	4 11	15 51.21	-16 37.4	1.267	2.147	16.7	20.1
4 21	15 47.85	-19 45.8	1.451	2.385	11.4	19.4	4 21	15 46.53	-16 21.4	1.198	2.142	12.4	19.8
5 1	15 39.27	-18 47.9	1.417	2.401	6.7	19.2	5 1	15 38.89	-15 59.2	1.149	2.137	7.4	19.5
5 11	15 29.29	-17 43.1	1.407	2.416	1.7	18.9	5 11	15 29.30	-15 33.9	1.124	2.132	2.2	19.2
5 21	15 19.16	-16 36.9	1.425	2.430	3.5	19.0	5 21	15 19.12	-15 9.6	1.122	2.128	4.4	19.3
5 31	15 10.13	-15 35.9	1.469	2.445	8.3	19.4	5 31	15 9.87	-14 51.0	1.145	2.124	9.7	19.6
6 10	15 3.19	-14 45.9	1.537	2.458	12.6	19.6	6 10	15 2.84	-14 42.8	1.190	2.120	14.7	19.8
6 20	14 58.86	-14 10.3	1.625	2.472	16.1	19.9	6 20	14 58.80	-14 47.3	1.253	2.117	18.9	20.1
86314	1999 <i>VX</i> ₁₆₁		5 14.4 241°80	0°9/15.1	18		510653	2012 <i>TH</i> ₂₅₆		5 14.5 235°47	1°3/13.6	17	
4 11	15 47.87	-23 11.7	2.779	3.615	10.0	20.2	4 11	15 48.91	-16 27.9	2.171	3.028	11.6	22.1
4 21	15 42.73	-22 56.8	2.683	3.603	7.5	20.0	4 21	15 43.74	-16 1.4	2.090	3.023	8.5	21.9
5 1	15 36.09	-22 34.4	2.612	3.590	4.6	19.8	5 1	15 36.78	-15 30.3	2.033	3.016	5.0	21.7
5 11	15 28.49	-22 5.3	2.570	3.576	1.6	19.5	5 11	15 28.70	-14 57.1	2.003	3.010	1.6	21.4
5 21	15 20.59	-21 31.5	2.556	3.562	2.1	19.5	5 21	15 20.29	-14 24.7	2.001	3.004	3.2	21.5
5 31	15 13.10	-20 55.5	2.572	3.548	5.2	19.7	5 31	15 12.43	-13 56.4	2.027	2.997	6.8	21.7
6 10	15 6.67	-20 20.8	2.615	3.534	8.1	19.9	6 10	15 5.90	-13 35.4	2.078	2.990	10.3	21.9
6 20	15 1.77	-19 50.1	2.682	3.519	10.8	20.1	6 20	15 1.21	-13 23.7	2.152	2.983	13.2	22.1
31668	1999 <i>JX</i> ₃		5 14.4 246°50	4°7/11.2	18		380639	2004 <i>XN</i> ₄₂		5 14.5 168°61	0°3/14.7	17	
4 11	15 48.07	- 5 8.0	2.375	3.230	10.8	18.1	4 11	15 50.61	-21 38.8	2.294	3.137	11.6	21.5
4 21	15 42.94	- 4 30.6	2.295	3.220	8.3	17.9	4 21	15 44.87	-21 14.9	2.216	3.141	8.6	21.3
5 1	15 36.23	- 3 56.6	2.241	3.211	5.9	17.7	5 1	15 37.38	-20 43.0	2.164	3.144	5.1	21.1
5 11	15 28.53	- 3 29.7	2.214	3.200	4.7	17.7	5 11	15 28.84	-20 4.7	2.139	3.147	1.4	20.8
5 21	15 20.53	- 3 13.1	2.214	3.190	5.8	17.7	5 21	15 20.06	-19 22.7	2.143	3.149	2.4	20.9
5 31	15 13.00	- 3 8.9	2.242	3.179	8.3	17.8	5 31	15 11.89	-18 40.7	2.176	3.151	6.0	21.2
6 10	15 6.62	- 3 18.3	2.294	3.169	11.0	18.0	6 10	15 5.09	-18 2.5	2.235	3.152	9.4	21.4
6 20	15 1.87	- 3 40.8	2.368	3.158	13.4	18.1	6 20	15 0.15	-17 31.3	2.317	3.153	12.3	21.6
479834	2014 <i>FU</i> ₆₆		5 14.4 20°16	12°9/ 1.9	17		234084	1999 <i>TN</i> ₉₉		5 14.5 277°90	6°9/ 9.2	16	
4 11	15 44.99	+15 59.8	1.950	2.763	14.5	20.4	4 11	15 49.11	- 2 20.2	2.019	2.876	12.4	20.5
4 21	15 40.88	+18 2.3	1.919	2.768	13.4	20.3	4 21	15 44.11	- 1 2.9	1.927	2.848	9.8	20.2
5 1	15 35.03	+19 43.3	1.909	2.774	12.9	20.3	5 1	15 37.13	+ 0 11.4	1.859	2.819	7.7	20.0
5 11	15 28.20	+20 55.7	1.922	2.780	13.2	20.3	5 11	15 28.82	+ 1 16.2	1.818	2.790	7.0	19.9
5 21	15 21.21	+21 35.1	1.955	2.787	14.2	20.4	5 21	15 20.00	+ 2 5.8	1.803	2.760	8.4	20.0
5 31	15 14.90	+21 40.6	2.008	2.794	15.5	20.5	5 31	15 11.59	+ 2 35.7	1.813	2.730	11.2	20.1
6 10	15 9.98	+21 14.8	2.077	2.802	16.9	20.6	6 10	15 4.47	+ 2 43.7	1.846	2.699	14.2	20.2
6 20	15 6.90	+20 22.2	2.161	2.810	18.2	20.8	6 20	14 59.27	+ 2 30.3	1.899	2.668	17.0	20.3
513164	2004 <i>BY</i> ₁₆₃		5 14.5 193°77	0°5/13.9	18		102272	1999 <i>TG</i> ₄₆		5 14.5 242°50	4°7/17.2	18	
4 11	15 41.11	-16 43.5	4.643	5.488	6.1	21.2	4 11	15 52.64	-33 11.7	2.576	3.376	11.8	20.2
4 21	15 37.25	-16 33.6	4.560	5.487	4.4	21.1	4 21	15 46.59	-33 51.9	2.484	3.368	9.5	20.0
5 1	15 32.64	-16 21.9	4.505	5.487	2.6	20.9	5 1	15 38.56	-34 20.6	2.415	3.360	7.1	19.9
5 11	15 27.57	-16 9.2	4.478	5.486	0.7	20.8	5 11	15 29.19	-34 35.6	2.373	3.351	5.1	19.7
5 21	15 22.39	-15 56.7	4.482	5.485	1.5	20.9	5 21	15 19.32	-34 36.4	2.359	3.343	4.8	19.7
5 31	15 17.44	-15 45.4	4.515	5.485	3.4	21.0	5 31	15 9.91	-34 24.4	2.372	3.334	6.5	19.8
6 10	15 13.04	-15 36.7	4.576	5.484	5.2	21.1	6 10	15 1.82	-34 3.1	2.412	3.325	9.0	19.9
6 20	15 9.46	-15 31.3	4.662	5.483	6.8	21.2	6 20	14 55.68	-33 36.9	2.476	3.317	11.4	20.1
286043	2001 <i>SA</i> ₂₁₂		5 14.5 279°46	5°3/10.2	17		505912	2015 <i>EJ</i> ₂₀					

EPHEMERIDES

5 14.5

5 14.5

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
278802	2008 <i>SK</i> ₂₃₈		5 14.5 321°89	0°1/14.4	17		292019	2006 <i>QP</i> ₁₄₉		5 14.5 43°24	2°6/12.8	18	R
4 11	15 51.17	-18 20.0	1.704	2.567	14.0	20.3	4 11	15 48.08	-12 56.0	1.988	2.853	12.2	20.4
4 21	15 45.93	-18 27.5	1.626	2.561	10.4	20.1	4 21	15 43.17	-12 23.2	1.921	2.857	8.9	20.2
5 1	15 38.31	-18 29.9	1.571	2.555	6.2	19.8	5 1	15 36.45	-11 48.7	1.878	2.862	5.4	20.0
5 11	15 29.14	-18 28.2	1.541	2.550	1.6	19.5	5 11	15 28.64	-11 15.6	1.862	2.866	2.7	19.8
5 21	15 19.47	-18 24.1	1.538	2.544	3.1	19.6	5 21	15 20.59	-10 47.5	1.872	2.870	4.2	19.9
5 31	15 10.47	-18 20.2	1.561	2.540	7.7	19.8	5 31	15 13.19	-10 27.6	1.910	2.875	7.6	20.1
6 10	15 3.20	-18 20.0	1.609	2.535	11.8	20.1	6 10	15 7.20	-10 18.2	1.972	2.879	11.0	20.4
6 20	14 58.32	-18 26.0	1.677	2.530	15.4	20.3	6 20	15 3.13	-10 20.3	2.056	2.884	13.9	20.6
476605	2008 <i>SM</i> ₁₁₀		5 14.5 118°20	1°6/12.8	18		360509	2003 <i>OD</i> ₃		5 14.5 282°85	8°2/9.3	17	
4 11	15 43.95	-12 46.1	3.730	4.579	7.4	22.1	4 11	15 51.27	-2 47.2	1.573	2.439	14.8	20.8
4 21	15 39.39	-12 18.3	3.666	4.594	5.4	22.0	4 21	15 46.28	-1 22.2	1.482	2.409	11.8	20.6
5 1	15 33.91	-11 49.7	3.629	4.610	3.2	21.8	5 1	15 38.72	+ 0 0.2	1.413	2.378	9.2	20.3
5 11	15 27.92	-11 22.1	3.621	4.624	1.6	21.7	5 11	15 29.33	+ 1 11.9	1.369	2.346	8.3	20.2
5 21	15 21.85	-10 57.1	3.643	4.639	2.5	21.8	5 21	15 19.17	+ 2 4.7	1.350	2.313	10.1	20.2
5 31	15 16.13	-10 36.6	3.695	4.653	4.6	22.0	5 31	15 9.48	+ 2 32.4	1.355	2.280	13.5	20.3
6 10	15 11.16	-10 21.7	3.773	4.667	6.6	22.1	6 10	15 1.44	+ 2 32.5	1.380	2.247	17.3	20.5
6 20	15 7.22	-10 13.4	3.877	4.681	8.4	22.3	6 20	14 55.88	+ 2 5.8	1.423	2.213	20.7	20.6
522354	2016 <i>CS</i> ₂₉₈		5 14.5 35°16	4°1/12.8	17		282274	2002 <i>OB</i> ₆		5 14.5 287°21	3°9/11.8	17	
4 11	15 52.50	-10 31.7	1.349	2.226	16.1	21.1	4 11	15 47.71	-11 11.8	1.905	2.773	12.5	20.7
4 21	15 47.13	-10 9.1	1.288	2.229	12.0	20.8	4 21	15 43.13	-10 11.8	1.819	2.756	9.3	20.4
5 1	15 39.08	-9 47.8	1.249	2.232	7.5	20.6	5 1	15 36.56	-9 8.9	1.758	2.739	6.0	20.2
5 11	15 29.33	-9 32.0	1.233	2.235	4.2	20.4	5 11	15 28.71	-8 8.1	1.723	2.722	3.9	20.0
5 21	15 19.19	-9 25.5	1.242	2.239	6.0	20.5	5 21	15 20.43	-7 14.3	1.715	2.705	5.6	20.1
5 31	15 10.02	-9 31.5	1.275	2.243	10.3	20.7	5 31	15 12.69	-6 32.6	1.733	2.688	9.0	20.2
6 10	15 2.95	-9 51.6	1.331	2.247	14.6	21.0	6 10	15 6.36	-6 6.2	1.775	2.671	12.6	20.4
6 20	14 58.64	-10 25.4	1.406	2.251	18.3	21.2	6 20	15 2.03	-5 56.5	1.837	2.654	15.7	20.6
32446	2000 <i>SY</i> ₅		5 14.5 117°72	6°3/10.9	18		300956	2008 <i>DA</i> ₇		5 14.5 219°68	2°3/12.8	17	
4 11	15 51.46	-2 4.6	1.962	2.816	12.8	18.4	4 11	15 47.79	-12 52.0	2.449	3.306	10.5	21.6
4 21	15 45.50	-1 20.0	1.909	2.829	10.0	18.2	4 21	15 42.73	-12 19.2	2.369	3.301	7.7	21.4
5 1	15 37.73	-0 42.8	1.880	2.842	7.4	18.1	5 1	15 36.13	-11 44.5	2.314	3.296	4.7	21.2
5 11	15 28.93	-0 17.6	1.876	2.854	6.3	18.0	5 11	15 28.57	-11 10.8	2.287	3.290	2.4	21.0
5 21	15 19.99	-0 7.7	1.900	2.866	7.4	18.1	5 21	15 20.75	-10 40.8	2.288	3.285	3.7	21.1
5 31	15 11.80	-0 14.9	1.949	2.877	9.9	18.3	5 31	15 13.42	-10 17.5	2.318	3.279	6.7	21.3
6 10	15 5.11	-0 38.8	2.022	2.888	12.6	18.5	6 10	15 7.22	-10 3.0	2.373	3.273	9.7	21.5
6 20	15 0.39	-1 17.8	2.116	2.899	15.0	18.7	6 20	15 2.63	-9 58.7	2.451	3.266	12.3	21.7
431413	2007 <i>HG</i> ₇₆		5 14.5 339°33	0°1/14.4	17		377737	2005 <i>XZ</i> ₂₅		5 14.5 232°12	2°1/13.3	18	
4 11	15 46.61	-18 10.4	1.222	2.109	16.7	20.2	4 11	15 53.04	-12 50.4	2.185	3.037	11.8	21.5
4 21	15 43.43	-18 22.8	1.143	2.090	12.5	19.9	4 21	15 46.87	-12 39.8	2.094	3.023	8.7	21.3
5 1	15 37.26	-18 29.5	1.083	2.072	7.5	19.6	5 1	15 38.72	-12 28.2	2.028	3.010	5.3	21.1
5 11	15 28.95	-18 31.8	1.046	2.055	2.0	19.2	5 11	15 29.29	-12 17.6	1.990	2.995	2.3	20.8
5 21	15 19.80	-18 31.8	1.032	2.040	3.8	19.3	5 21	15 19.39	-12 10.0	1.981	2.980	3.8	20.9
5 31	15 11.37	-18 32.8	1.041	2.026	9.5	19.5	5 31	15 9.98	-12 8.0	2.000	2.965	7.3	21.1
6 10	15 5.07	-18 39.0	1.071	2.014	14.7	19.8	6 10	15 1.90	-12 13.5	2.045	2.948	10.8	21.3
6 20	15 1.82	-18 53.5	1.119	2.003	19.2	20.0	6 20	14 55.76	-12 27.7	2.113	2.931	13.9	21.5
264245	2010 <i>UQ</i> ₅₅		5 14.5 223°04	0°2/14.6	17		488679	2003 <i>UR</i> ₂₉₅		5 14.5 269°27	3°2/12.1	18	
4 11	15 53.50	-20 29.0	1.960	2.808	13.1	22.2	4 11	15 48.36	-13 24.9	2.015	2.879	12.1	21.5
4 21	15 47.43	-20 17.3	1.872	2.799	9.7	21.9	4 21	15 43.52	-12 17.7	1.925	2.861	9.0	21.3
5 1	15 39.13	-19 57.8	1.807	2.788	5.8	21.7	5 1	15 36.77	-11 5.3	1.861	2.843	5.6	21.1
5 11	15 29.37	-19 31.5	1.769	2.777	1.6	21.4	5 11	15 28.77	-9 52.1	1.823	2.825	3.2	20.9
5 21	15 19.12	-19 0.9	1.760	2.766	2.8	21.4	5 21	15 20.38	-8 43.6	1.814	2.807	4.9	20.9
5 31	15 9.48	-18 29.7	1.778	2.753	7.1	21.7	5 31	15 12.51	-7 45.0	1.831	2.789	8.5	21.1
6 10	15 1.41	-18 2.1	1.821	2.741	11.1	21.9	6 10	15 5.99	-7 0.5	1.873	2.770	12.0	21.3
6 20	14 55.58	-17 41.7	1.888	2.727	14.5	22.1	6 20	15 1.42	-6 32.2	1.937	2.751	15.1	21.5
505592	2014 <i>CE</i> ₁₁		5 14.5 107°58	5°6/18.1	17		124377	2001 <i>QG</i> ₁₅₇		5 14.5 20°99	3°1/15.9	18	
4 11	15 53.76	-35 36.6	2.223	3.019	13.5	21.6	4 11	15 51.91	-26 33.5	1.179	2.046	18.6	19.1
4 21	15 47.53	-36 8.4	2.151	3.030	11.0	21.5	4 21	15 47.33	-26 30.0	1.116	2.049	14.2	18.8
5 1	15 39.11	-36 24.5	2.101	3.040	8.3	21.3	5 1	15 39.47	-26 8.2	1.072	2.051	9.2	18.5
5 11	15 29.34	-36 22.7	2.077	3.050	6.2	21.2	5 11	15 29.52	-25 28.3	1.050	2.055	4.2	18.2
5 21	15 19.22	-36 3.2	2.079	3.060	5.7	21.2	5 21	15 19.06	-24 34.1	1.052	2.058	4.3	18.3
5 31	15 9.87	-35 28.9	2.109	3.070	7.3	21.3	5 31	15 9.79	-23 32.9	1.077	2.062	9.2	18.6
6 10	15 2.19	-34 45.0	2.164	3.080	9.7	21.5	6 10	15 3.10	-22 33.9	1.124	2.067	14.2	18.8
6 20	14 56.80	-33 57.3	2.242	3.089	12.2	21.6	6 20	14 59.70	-21 44.4	1.190	2.072	18.5	19.1
140381	2001 <i>TR</i> ₄₆		5 14.5 93°81	11°5/14.7	18		474434	2003 <i>GS</i> ₂₆		5 14.5 342°21	7°7/17.0	16	
4 11	16 12.75	+ 7 54.3	1.007	1.848	23.1	17.7	4 11	15 53.64	-34 32.4	1.736	2.553	15.9	20.3
4 21	16 3.02	+ 7 7.1	0.946	1.851	19.0	17.5	4 21	15 48.41	-36 1.2	1.652	2.541	13.1	20.1
5 1	15 48.95	+ 5 44.5	0.903	1.854	14.8	17.2	5 1	15 40.19	-37 16.4	1.589	2.530	10.3	19.9
5 11	15 32.00	+ 3 40.9	0.883	1.858	11.8	17.1	5 11	15 29.77	-38 12.3	1.550	2.520	8.1	19.7
5 21	15 14.29	+ 0 59.3	0.887	1.861	12.3	17.1	5 21	15 18.38	-38 45.4	1.536	2.511	7.9	19.7
5 31	14 58.18	-2 9.4	0.917	1.864	15.9	17.3	5 31	15 7.54	-38 55.9	1.546	2.503	9.8	19.8
6 10	14 45.53	-5 30.6	0.970	1.867	20.3	17.6	6 10	14 58.69	-38 48.2	1.580	2.495	12.7	19.9
6 20	14 37.22	-8 52.0	1.043	1.870	24.4	17.9	6 20	14 52.79	-38 29.4	1.634	2.489	15.7	20.1
264608	2001 <i>UO</i> ₁₄₄		5 14.5 166°18	0°9/13.9	17		80786	2000 <i>CH</i> ₈₁		5 14.5			

EPHEMERIDES

5 14.5

5 14.5

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
500869	2013 <i>JW</i> ₄₆		5 14.5 311°21	5°9/11.6	17		168525	1999 <i>TM</i> ₂₅₉		5 14.5 222°48	0°0/14.5	18	
4 11	15 48.58	- 9 13.9	1.275	2.161	16.2	21.0	4 11	15 44.41	-19 42.0	4.019	4.857	7.1	21.5
4 21	15 44.65	- 8 14.1	1.197	2.141	12.3	20.7	4 21	15 39.82	-19 30.7	3.924	4.847	5.2	21.3
5 1	15 37.88	- 7 13.1	1.140	2.122	8.3	20.4	5 1	15 34.26	-19 15.8	3.857	4.837	3.1	21.2
5 11	15 29.15	- 6 18.0	1.105	2.103	5.9	20.2	5 11	15 28.11	-18 58.1	3.818	4.826	0.8	21.0
5 21	15 19.69	- 5 36.2	1.094	2.085	7.9	20.3	5 21	15 21.79	-18 39.0	3.810	4.816	1.5	21.0
5 31	15 10.95	- 5 13.9	1.106	2.067	12.3	20.4	5 31	15 15.72	-18 19.9	3.831	4.804	3.8	21.2
6 10	15 4.22	- 5 14.5	1.139	2.050	16.9	20.6	6 10	15 10.34	-18 2.6	3.881	4.793	5.9	21.3
6 20	15 0.34	- 5 38.0	1.188	2.033	20.9	20.8	6 20	15 5.94	-17 48.4	3.956	4.781	7.8	21.4
375883	2009 <i>VS</i> ₆₂		5 14.5 89°43	0°2/14.6	17		469164	2015 <i>KG</i> ₈		5 14.5 99°90	7°4/ 9.1	17	
4 11	15 50.93	-21 49.5	1.841	2.695	13.5	20.8	4 11	15 48.11	+ 0 16.5	2.030	2.885	12.4	21.0
4 21	15 45.35	-21 11.6	1.781	2.710	10.0	20.6	4 21	15 43.06	+ 1 34.3	1.979	2.894	9.9	20.8
5 1	15 37.75	-20 23.8	1.744	2.726	5.9	20.4	5 1	15 36.33	+ 2 43.9	1.953	2.904	8.0	20.7
5 11	15 29.01	-19 29.0	1.733	2.741	1.6	20.1	5 11	15 28.66	+ 3 39.3	1.952	2.913	7.4	20.7
5 21	15 20.12	-18 31.3	1.750	2.756	2.8	20.2	5 21	15 20.84	+ 4 16.2	1.977	2.923	8.6	20.8
5 31	15 12.11	-17 35.8	1.794	2.771	7.0	20.5	5 31	15 13.69	+ 4 32.0	2.027	2.932	10.8	20.9
6 10	15 5.78	-16 47.4	1.864	2.786	10.7	20.8	6 10	15 7.91	+ 4 26.8	2.100	2.941	13.1	21.1
6 20	15 1.63	-16 9.6	1.955	2.801	13.8	21.0	6 20	15 3.94	+ 4 2.5	2.191	2.950	15.3	21.3
312547	2009 <i>FG</i> ₂₃		5 14.5 30°75	0°3/14.6	17		501862	2014 <i>WW</i> ₂₆₉		5 14.5 156°21	3°1/12.8	17	
4 11	15 52.02	-19 22.3	1.160	2.041	17.9	20.3	4 11	15 52.71	-11 51.0	1.843	2.704	13.2	22.6
4 21	15 47.21	-19 30.9	1.107	2.050	13.2	20.0	4 21	15 46.69	-11 17.3	1.776	2.709	9.7	22.3
5 1	15 39.30	-19 31.3	1.073	2.059	7.9	19.8	5 1	15 38.61	-10 42.4	1.733	2.715	6.0	22.1
5 11	15 29.48	-19 24.7	1.061	2.070	2.1	19.5	5 11	15 29.28	-10 10.1	1.717	2.720	3.2	22.0
5 21	15 19.25	-19 13.9	1.074	2.081	3.7	19.6	5 21	15 19.68	- 9 44.0	1.728	2.724	4.8	22.1
5 31	15 10.22	-19 3.3	1.109	2.093	9.3	19.9	5 31	15 10.84	- 9 27.4	1.767	2.728	8.4	22.3
6 10	15 3.67	-18 57.5	1.167	2.106	14.2	20.3	6 10	15 3.63	- 9 22.6	1.829	2.731	12.0	22.5
6 20	15 0.25	-19 0.1	1.243	2.119	18.3	20.5	6 20	14 58.59	- 9 30.4	1.913	2.734	15.1	22.7
519451	2011 <i>YE</i> ₈₀		5 14.5 205°07	3°2/17.1	18		263147	2007 <i>VZ</i> ₂₁₆		5 14.5 173°68	0°6/14.8	17	
4 11	15 48.66	-31 7.1	2.836	3.646	10.5	22.1	4 11	15 54.04	-21 34.7	1.760	2.611	14.2	21.7
4 21	15 43.38	-31 11.0	2.749	3.644	8.3	22.0	4 21	15 47.94	-21 22.6	1.685	2.613	10.6	21.5
5 1	15 36.53	-31 3.9	2.685	3.641	5.8	21.8	5 1	15 39.48	-21 1.1	1.634	2.615	6.4	21.2
5 11	15 28.71	-30 45.5	2.648	3.638	3.7	21.7	5 11	15 29.53	-20 31.4	1.609	2.617	1.9	20.9
5 21	15 20.63	-30 16.7	2.640	3.635	3.4	21.6	5 21	15 19.21	-19 56.5	1.611	2.617	3.0	21.0
5 31	15 13.02	-29 40.0	2.660	3.632	5.3	21.8	5 31	15 9.69	-19 20.5	1.640	2.618	7.4	21.3
6 10	15 6.56	-28 59.1	2.707	3.628	7.8	21.9	6 10	15 1.99	-18 48.5	1.694	2.618	11.5	21.5
6 20	15 1.72	-28 17.7	2.779	3.625	10.2	22.1	6 20	14 56.71	-18 24.2	1.770	2.617	15.0	21.8
135739	2002 <i>PT</i> ₁₅₀		5 14.5 236°41	2°5/15.8	17		504574	2008 <i>TG</i> ₅₉		5 14.5 180°33	1°0/15.1	17	
4 11	15 54.59	-26 10.4	1.967	2.801	13.6	21.1	4 11	15 51.90	-21 58.5	2.021	2.868	12.8	21.2
4 21	15 48.42	-26 16.9	1.873	2.788	10.4	20.9	4 21	15 46.16	-22 2.9	1.943	2.868	9.5	21.0
5 1	15 39.85	-26 12.0	1.801	2.773	6.8	20.6	5 1	15 38.35	-21 59.6	1.889	2.868	5.8	20.7
5 11	15 29.65	-25 54.9	1.756	2.758	3.3	20.3	5 11	15 29.24	-21 49.0	1.862	2.868	2.0	20.5
5 21	15 18.83	-25 26.7	1.738	2.742	3.4	20.3	5 21	15 19.75	-21 32.8	1.862	2.868	2.7	20.5
5 31	15 8.60	-24 50.8	1.748	2.725	7.1	20.5	5 31	15 10.91	-21 13.9	1.890	2.868	6.6	20.8
6 10	15 0.02	-24 12.4	1.784	2.708	11.0	20.7	6 10	15 3.60	-20 56.1	1.944	2.868	10.2	21.0
6 20	14 53.80	-23 36.7	1.843	2.690	14.5	20.9	6 20	14 58.42	-20 42.6	2.020	2.867	13.4	21.2
471914	2013 <i>CS</i> ₂₀₀		5 14.5 159°86	5°7/ 9.4	18		237085	2008 <i>SK</i> ₃₀₁		5 14.5 230°83	2°2/13.1	18	
4 11	15 47.10	+ 2 40.3	3.057	3.890	9.2	22.5	4 11	15 50.26	-13 56.6	2.177	3.033	11.6	21.1
4 21	15 41.86	+ 3 25.4	2.997	3.897	7.5	22.4	4 21	15 44.79	-13 26.2	2.091	3.024	8.6	20.9
5 1	15 35.47	+ 4 3.1	2.964	3.903	6.1	22.3	5 1	15 37.49	-12 52.8	2.031	3.013	5.2	20.7
5 11	15 28.41	+ 4 30.4	2.957	3.908	5.7	22.3	5 11	15 29.01	-12 19.2	1.998	3.003	2.3	20.4
5 21	15 21.23	+ 4 44.8	2.979	3.913	6.5	22.3	5 21	15 20.17	-11 48.6	1.993	2.992	3.8	20.5
5 31	15 14.48	+ 4 45.1	3.027	3.918	8.1	22.4	5 31	15 11.86	-11 24.3	2.015	2.980	7.3	20.7
6 10	15 8.65	+ 4 31.2	3.100	3.922	9.8	22.6	6 10	15 4.85	-11 9.0	2.064	2.968	10.7	20.9
6 20	15 4.09	+ 4 4.3	3.194	3.926	11.4	22.7	6 20	14 59.70	-11 4.3	2.134	2.956	13.7	21.1
140967	2001 <i>VL</i> ₁₁₃		5 14.5 230°27	1°5/15.7	18		229635	2006 <i>EC</i> ₅₉		5 14.5 87°17	2°1/15.7	17	
4 11	15 48.82	-25 48.9	2.483	3.317	11.1	20.1	4 11	15 51.14	-25 35.1	1.863	2.707	13.8	20.3
4 21	15 43.61	-25 26.6	2.393	3.309	8.4	19.9	4 21	15 45.72	-25 29.5	1.792	2.713	10.4	20.1
5 1	15 36.71	-24 53.8	2.327	3.301	5.3	19.7	5 1	15 38.12	-25 12.1	1.743	2.719	6.6	19.9
5 11	15 28.77	-24 11.5	2.289	3.293	2.3	19.4	5 11	15 29.17	-24 43.4	1.720	2.724	2.9	19.7
5 21	15 20.54	-23 22.1	2.279	3.284	2.4	19.4	5 21	15 19.92	-24 5.9	1.725	2.730	3.1	19.7
5 31	15 12.83	-22 29.2	2.298	3.276	5.6	19.6	5 31	15 11.46	-23 23.7	1.756	2.736	6.8	19.9
6 10	15 6.36	-21 37.1	2.344	3.266	8.8	19.8	6 10	15 4.70	-22 42.1	1.812	2.741	10.5	20.1
6 20	15 1.62	-20 49.7	2.413	3.257	11.6	20.0	6 20	15 0.21	-22 5.6	1.891	2.747	13.8	20.4
281794	2009 <i>US</i> ₁₃₂		5 14.5 161°41	5°1/17.6	17		504446	2008 <i>CC</i> ₇₅		5 14.5 126°38	0°4/14.8	17	
4 11	15 55.56	-34 0.9	2.220	3.020	13.4	21.5	4 11	15 50.35	-20 39.9	2.746	3.585	10.0	22.9
4 21	15 48.89	-34 28.6	2.141	3.026	10.8	21.3	4 21	15 44.42	-20 37.0	2.678	3.600	7.4	22.8
5 1	15 39.98	-34 41.4	2.086	3.031	8.0	21.2	5 1	15 37.06	-20 28.7	2.636	3.615	4.4	22.6
5 11	15 29.64	-34 37.1	2.056	3.035	5.6	21.0	5 11	15 28.87	-20 15.9	2.622	3.629	1.3	22.4
5 21	15 18.91	-34 16.0	2.053	3.039	5.2	21.0	5 21	15 20.51	-20 0.1	2.637	3.643	2.0	22.5
5 31	15 8.91	-33 40.9	2.078	3.043	7.1	21.1	5 31	15 12.70	-19 43.5	2.682	3.657	5.1	22.7
6 10	15 0.59	-32 57.0	2.129	3.046	9.8	21.3	6 10	15 6.04	-19 28.6	2.754	3.670	7.9	22.9
6 20	14 54.58	-32 10.1	2.203	3.048	12.5	21.5	6 20	15 0.94	-19 17.4	2.851	3.683	10.3	23.1
249664	1999 <i>VG</i> ₄₂		5 14.5 218°07	0°1/14.5	18		335746	2007 <i>EJ</i>					

EPHEMERIDES

5 14.5

5 14.5

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
229935	1998 <i>KB</i> ₄₃		5 14.5 290°38	6°7/11.4	18		114586	2003 <i>BZ</i> ₈₀		5 14.5 116°82	7°2/9.1	18	
4 11	15 51.94	- 1 26.3	1.791	2.648	13.7	19.6	4 11	15 47.22	+ 1 36.0	2.232	3.082	11.6	19.7
4 21	15 46.35	- 1 2.2	1.713	2.634	10.8	19.4	4 21	15 42.36	+ 2 40.1	2.174	3.084	9.4	19.6
5 1	15 38.57	- 0 47.0	1.657	2.621	8.1	19.2	5 1	15 35.95	+ 3 35.8	2.140	3.087	7.7	19.4
5 11	15 29.34	- 0 45.2	1.627	2.608	6.7	19.0	5 11	15 28.63	+ 4 17.9	2.132	3.089	7.2	19.4
5 21	15 19.64	- 1 0.3	1.623	2.594	7.9	19.1	5 21	15 21.12	+ 4 42.9	2.150	3.091	8.3	19.5
5 31	15 10.52	- 1 33.8	1.644	2.581	10.8	19.2	5 31	15 14.17	+ 4 48.4	2.193	3.094	10.2	19.6
6 10	15 2.96	- 2 25.0	1.689	2.568	14.0	19.4	6 10	15 8.45	+ 4 34.8	2.258	3.096	12.5	19.8
6 20	14 57.59	- 3 31.7	1.754	2.555	17.0	19.6	6 20	15 4.38	+ 4 3.6	2.344	3.098	14.5	19.9
198064	2004 <i>RG</i> ₃₂₅		5 14.5 269°96	7°0/17.3	18		420743	2012 <i>TS</i> ₁₄₆		5 14.5 217°81	0°3/14.2	18	
4 11	15 56.94	-35 0.2	1.901	2.705	15.2	19.8	4 11	15 41.68	-17 32.0	4.648	5.490	6.2	21.4
4 21	15 50.64	-36 8.4	1.813	2.695	12.5	19.6	4 21	15 37.74	-17 26.3	4.563	5.489	4.5	21.3
5 1	15 41.45	-37 2.1	1.746	2.685	9.7	19.4	5 1	15 33.03	-17 18.5	4.505	5.487	2.6	21.1
5 11	15 30.17	-37 36.5	1.704	2.675	7.5	19.2	5 11	15 27.85	-17 9.5	4.477	5.485	0.7	21.0
5 21	15 18.01	-37 48.9	1.687	2.664	7.1	19.2	5 21	15 22.54	-17 0.2	4.478	5.483	1.4	21.0
5 31	15 6.44	-37 40.4	1.697	2.654	9.0	19.3	5 31	15 17.46	-16 51.7	4.509	5.481	3.3	21.2
6 10	14 56.78	-37 16.2	1.731	2.644	11.9	19.4	6 10	15 12.94	-16 45.2	4.568	5.479	5.1	21.3
6 20	14 49.94	-36 43.2	1.786	2.633	14.9	19.6	6 20	15 9.24	-16 41.6	4.653	5.477	6.8	21.4
422298	2014 <i>SH</i> ₁₅₉		5 14.5 230°33	1°9/13.5	17		8944	Ortigara		5 14.5 22°17	0°3/14.3	18	
4 11	15 53.48	-16 2.6	1.782	2.641	13.7	22.3	4 11	15 47.79	-19 15.0	1.924	2.785	12.7	18.3
4 21	15 47.59	-15 27.8	1.696	2.629	10.1	22.0	4 21	15 43.14	-18 56.1	1.855	2.789	9.3	18.1
5 1	15 39.35	-14 47.1	1.633	2.617	6.1	21.7	5 1	15 36.56	-18 30.6	1.810	2.794	5.5	17.9
5 11	15 29.56	-14 3.5	1.597	2.604	2.2	21.4	5 11	15 28.81	-18 0.6	1.791	2.799	1.4	17.6
5 21	15 19.25	-13 20.9	1.588	2.590	4.0	21.5	5 21	15 20.79	-17 29.1	1.798	2.805	2.8	17.7
5 31	15 9.58	-12 44.1	1.606	2.576	8.4	21.8	5 31	15 13.46	-16 59.7	1.833	2.810	6.8	18.0
6 10	15 1.58	-12 17.4	1.649	2.561	12.5	22.0	6 10	15 7.62	-16 36.2	1.893	2.817	10.5	18.2
6 20	14 55.93	-12 3.3	1.713	2.545	16.1	22.2	6 20	15 3.79	-16 21.0	1.974	2.823	13.6	18.4
429187	2009 <i>WX</i> ₃₂		5 14.5 318°19	1°2/13.9	18		19675	1999 <i>RE</i> ₁₆₂		5 14.5 79°58	2°2/13.5	18	
4 11	15 50.35	-16 12.1	1.494	2.367	15.0	20.1	4 11	15 53.40	-15 23.0	1.450	2.321	15.6	18.2
4 21	15 45.72	-16 10.4	1.413	2.353	11.2	19.8	4 21	15 47.55	-14 52.8	1.399	2.337	11.4	18.0
5 1	15 38.44	-16 4.7	1.352	2.339	6.7	19.5	5 1	15 39.23	-14 18.3	1.369	2.354	6.7	17.7
5 11	15 29.36	-15 57.0	1.317	2.325	2.0	19.2	5 11	15 29.50	-13 43.2	1.364	2.371	2.5	17.5
5 21	15 19.60	-15 49.8	1.306	2.312	3.8	19.3	5 21	15 19.59	-13 11.9	1.385	2.387	4.4	17.7
5 31	15 10.50	-15 46.4	1.321	2.299	8.8	19.5	5 31	15 10.76	-12 48.7	1.431	2.404	8.9	18.0
6 10	15 3.26	-15 50.3	1.358	2.287	13.4	19.7	6 10	15 3.98	-12 36.9	1.501	2.420	13.0	18.3
6 20	14 58.66	-16 3.6	1.416	2.275	17.4	20.0	6 20	14 59.81	-12 38.0	1.591	2.436	16.5	18.5
342829	2008 <i>XG</i> ₃₆		5 14.5 298°32	0°3/14.7	17		496565	2014 <i>XL</i> ₃₉		5 14.5 225°58	1°2/13.8	17	
4 11	15 51.05	-19 42.3	1.879	2.735	13.2	21.0	4 11	15 54.38	-16 30.2	1.995	2.846	12.8	21.6
4 21	15 45.71	-19 46.5	1.800	2.731	9.8	20.8	4 21	15 48.09	-16 11.8	1.904	2.834	9.4	21.4
5 1	15 38.18	-19 44.6	1.744	2.726	5.9	20.6	5 1	15 39.60	-15 48.5	1.838	2.821	5.6	21.1
5 11	15 29.24	-19 37.4	1.714	2.722	1.6	20.3	5 11	15 29.65	-15 22.3	1.799	2.806	1.8	20.8
5 21	15 19.86	-19 26.6	1.711	2.718	2.8	20.3	5 21	15 19.20	-14 55.9	1.788	2.792	3.4	20.9
5 31	15 11.12	-19 15.1	1.736	2.714	7.0	20.6	5 31	15 9.30	-14 32.8	1.805	2.776	7.5	21.1
6 10	15 3.96	-19 6.3	1.785	2.710	10.9	20.8	6 10	15 0.91	-14 16.5	1.848	2.759	11.4	21.3
6 20	14 59.00	-19 3.0	1.856	2.706	14.3	21.0	6 20	14 54.69	-14 9.5	1.914	2.742	14.8	21.5
411812	2012 <i>DT</i> ₂₇		5 14.5 123°79	4°3/16.8	18		222513	2001 <i>TM</i> ₆₆		5 14.5 161°39	0°5/14.8	17	
4 11	15 57.39	-30 16.9	1.807	2.630	15.1	21.4	4 11	15 53.13	-21 4.8	2.218	3.060	12.0	21.5
4 21	15 50.46	-30 40.9	1.741	2.645	11.8	21.2	4 21	15 46.85	-20 57.5	2.143	3.066	8.9	21.3
5 1	15 40.99	-30 49.7	1.698	2.659	8.2	21.0	5 1	15 38.68	-20 43.1	2.093	3.072	5.3	21.1
5 11	15 29.96	-30 41.7	1.680	2.672	5.0	20.9	5 11	15 29.37	-20 22.6	2.070	3.077	1.6	20.8
5 21	15 18.61	-30 17.7	1.689	2.685	4.7	20.9	5 21	15 19.79	-19 57.9	2.076	3.082	2.5	20.9
5 31	15 8.22	-29 41.7	1.724	2.698	7.5	21.1	5 31	15 10.86	-19 32.3	2.110	3.086	6.2	21.1
6 10	14 59.87	-28 59.8	1.786	2.710	11.0	21.3	6 10	15 3.38	-19 9.1	2.171	3.089	9.6	21.4
6 20	14 54.17	-28 18.2	1.869	2.721	14.1	21.5	6 20	14 57.87	-18 51.4	2.256	3.092	12.6	21.6
96737	1999 <i>NJ</i> ₄₈		5 14.5 310°85	3°0/16.4	18		215855	2005 <i>EG</i> ₃₆		5 14.5 0°14	0°7/14.1	17	
4 11	15 48.75	-28 58.8	1.584	2.432	15.6	19.0	4 11	15 44.44	-21 14.9	1.036	1.930	18.4	19.4
4 21	15 44.59	-28 31.9	1.491	2.413	12.2	18.7	4 21	15 41.96	-20 22.1	0.976	1.927	13.6	19.1
5 1	15 37.78	-27 45.5	1.420	2.394	8.1	18.4	5 1	15 36.39	-19 12.7	0.935	1.924	8.1	18.7
5 11	15 29.18	-26 39.8	1.373	2.375	4.1	18.1	5 11	15 28.84	-17 52.3	0.915	1.924	2.1	18.4
5 21	15 19.97	-25 18.3	1.351	2.356	3.8	18.1	5 21	15 20.81	-16 29.1	0.917	1.924	4.3	18.5
5 31	15 11.49	-23 48.0	1.355	2.339	8.0	18.3	5 31	15 13.89	-15 13.4	0.942	1.927	10.2	18.9
6 10	15 4.92	-22 17.8	1.384	2.321	12.5	18.5	6 10	15 9.38	-14 13.7	0.986	1.931	15.5	19.2
6 20	15 1.02	-20 56.0	1.433	2.304	16.5	18.7	6 20	15 7.95	-13 34.6	1.049	1.936	20.0	19.4
513549	2010 <i>MA</i> ₁₁₆		5 14.5 254°95	5°8/19.1	18		238511	2004 <i>TJ</i> ₆₈		5 14.5 167°97	2°6/12.6	18	
4 11	15 52.43	-40 3.2	2.794	3.557	11.8	21.9	4 11	15 50.40	-11 38.7	2.518	3.368	10.4	22.1
4 21	15 46.49	-40 20.1	2.687	3.538	10.0	21.7	4 21	15 44.56	-11 2.2	2.445	3.374	7.7	21.9
5 1	15 38.58	-40 21.4	2.603	3.518	8.0	21.6	5 1	15 37.22	-10 24.8	2.399	3.378	4.8	21.8
5 11	15 29.35	-40 4.8	2.543	3.498	6.3	21.4	5 11	15 28.98	-9 49.2	2.381	3.382	2.7	21.6
5 21	15 19.66	-39 30.2	2.511	3.477	5.9	21.4	5 21	15 20.55	-9 18.5	2.392	3.386	3.9	21.7
5 31	15 10.46	-38 39.6	2.507	3.456	6.9	21.4	5 31	15 12.67	-8 55.2	2.432	3.388	6.8	21.9
6 10	15 2.61	-37 37.5	2.528	3.435	8.9	21.5	6 10	15 5.95	-8 41.5	2.499	3.390	9.6	22.1
6 20	14 56.71	-36 29.5	2.575	3.413	11.1	21.6	6 20	15 0.85	-8 38.0	2.588	3.391	12.1	22.2
178460	1999 <i>RD</i> ₆₄		5 14.5 291°92	7°5/18.9	18		40100	1998 <i>PV</i>		5 14.5 195			

EPHEMERIDES

5 14.5

5 14.5

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
98361	2000 <i>SG</i> ₃₆₁		5 14.5 306°95	1.8/12.5	18		134349	1993 <i>FC</i> ₁₉		5 14.5 154°75	2.4/12.7	18	
4 11	15 41.93	-10 27.6	4.015	4.867	6.8	19.4	4 11	15 48.46	-11 55.6	2.618	3.471	10.0	20.2
4 21	15 38.02	-10 11.5	3.931	4.860	5.0	19.2	4 21	15 43.12	-11 24.9	2.548	3.478	7.4	20.1
5 1	15 33.24	-9 55.7	3.874	4.852	3.2	19.1	5 1	15 36.37	-10 53.4	2.503	3.483	4.5	19.9
5 11	15 27.93	-9 41.8	3.845	4.845	1.9	19.0	5 11	15 28.79	-10 23.7	2.487	3.489	2.4	19.8
5 21	15 22.47	-9 31.1	3.846	4.838	2.7	19.0	5 21	15 21.04	-9 58.2	2.499	3.494	3.6	19.8
5 31	15 17.27	-9 24.9	3.876	4.831	4.5	19.2	5 31	15 13.78	-9 39.5	2.540	3.498	6.4	20.0
6 10	15 12.69	-9 24.2	3.933	4.824	6.4	19.3	6 10	15 7.62	-9 29.2	2.607	3.503	9.1	20.2
6 20	15 9.01	-9 29.5	4.014	4.817	8.1	19.4	6 20	15 2.98	-9 28.4	2.697	3.506	11.5	20.4
12180	Kistemaker		5 14.5 293°25	5.0/10.9	17		137771	1999 <i>XS</i> ₁₉₆		5 14.5 231°32	1.3/15.2	18	
4 11	15 46.98	-5 8.3	2.213	3.073	11.3	18.8	4 11	15 54.79	-22 52.3	2.015	2.855	13.1	21.3
4 21	15 42.32	-4 21.9	2.137	3.064	8.7	18.6	4 21	15 48.52	-22 54.9	1.921	2.842	9.9	21.0
5 1	15 36.02	-3 38.9	2.086	3.055	6.2	18.4	5 1	15 39.94	-22 48.5	1.851	2.828	6.1	20.8
5 11	15 28.69	-3 3.5	2.061	3.046	5.0	18.3	5 11	15 29.81	-22 33.5	1.807	2.813	2.2	20.5
5 21	15 21.07	-2 39.3	2.063	3.038	6.2	18.4	5 21	15 19.10	-22 11.1	1.792	2.798	2.8	20.5
5 31	15 13.94	-2 29.1	2.091	3.029	8.8	18.5	5 31	15 8.94	-21 44.5	1.805	2.782	6.9	20.7
6 10	15 8.01	-2 34.1	2.144	3.020	11.6	18.7	6 10	15 0.34	-21 18.0	1.844	2.765	10.8	20.9
6 20	15 3.78	-2 53.8	2.217	3.011	14.1	18.8	6 20	14 54.00	-20 55.8	1.905	2.747	14.3	21.1
247297	2001 <i>SH</i> ₃₅₄		5 14.5 111°53	2.3/16.9	18		203312	2001 <i>TW</i> ₃₄		5 14.5 92°01	3.8/16.4	18	
4 11	15 45.02	-30 25.0	4.453	5.254	7.1	20.0	4 11	15 59.61	-28 8.6	1.521	2.358	16.8	20.2
4 21	15 40.29	-30 44.5	4.368	5.258	5.6	19.9	4 21	15 52.23	-28 28.2	1.471	2.384	12.8	20.0
5 1	15 34.59	-30 57.4	4.309	5.261	4.0	19.7	5 1	15 42.06	-28 32.0	1.442	2.410	8.5	19.8
5 11	15 28.29	-31 3.7	4.278	5.265	2.6	19.6	5 11	15 30.30	-28 18.9	1.437	2.436	4.6	19.6
5 21	15 21.82	-31 3.6	4.276	5.268	2.4	19.6	5 21	15 18.39	-27 50.7	1.459	2.461	4.4	19.7
5 31	15 15.61	-30 58.1	4.304	5.272	3.7	19.7	5 31	15 7.77	-27 12.6	1.508	2.485	8.0	19.9
6 10	15 10.07	-30 48.8	4.360	5.275	5.3	19.8	6 10	14 59.55	-26 31.5	1.581	2.509	11.9	20.2
6 20	15 5.52	-30 37.5	4.442	5.278	6.8	20.0	6 20	14 54.29	-25 53.7	1.675	2.532	15.2	20.5
146700	2001 <i>VU</i> ₁₀₀		5 14.5 117°96	7.5/19.1	18		265616	2005 <i>SC</i> ₉₁		5 14.5 62°60	4.8/11.1	17	
4 11	15 59.33	-39 56.1	2.078	2.850	15.1	19.6	4 11	15 48.78	-11 19.1	1.619	2.492	14.0	19.9
4 21	15 51.96	-40 44.8	2.012	2.867	12.6	19.5	4 21	15 44.02	-9 43.3	1.558	2.497	10.4	19.7
5 1	15 41.94	-41 13.9	1.967	2.883	10.1	19.3	5 1	15 37.14	-8 4.5	1.522	2.503	6.8	19.5
5 11	15 30.27	-41 19.8	1.946	2.899	8.1	19.2	5 11	15 29.02	-6 29.9	1.511	2.508	4.8	19.4
5 21	15 18.21	-41 1.8	1.951	2.914	7.5	19.2	5 21	15 20.68	-5 7.2	1.527	2.513	6.7	19.5
5 31	15 7.12	-40 23.0	1.983	2.929	8.7	19.3	5 31	15 13.18	-4 2.5	1.569	2.519	10.2	19.7
6 10	14 58.10	-39 30.0	2.040	2.943	10.8	19.5	6 10	15 7.38	-3 19.4	1.633	2.524	13.8	20.0
6 20	14 51.83	-38 30.3	2.119	2.957	13.2	19.7	6 20	15 3.79	-2 58.4	1.717	2.530	16.8	20.2
433538	2013 <i>WS</i> ₉₇		5 14.5 281°90	9.5/18.8	18		315384	2007 <i>VP</i> ₇₂		5 14.5 227°52	0.2/14.6	17	
4 11	15 56.97	-41 3.2	1.794	2.575	16.8	20.1	4 11	15 54.29	-20 41.6	1.904	2.752	13.4	22.0
4 21	15 51.13	-42 12.5	1.701	2.559	14.4	19.9	4 21	15 48.18	-20 24.3	1.813	2.740	10.0	21.7
5 1	15 41.99	-43 2.2	1.629	2.543	12.0	19.7	5 1	15 39.74	-19 58.2	1.746	2.727	6.0	21.5
5 11	15 30.41	-43 25.9	1.579	2.527	10.0	19.6	5 11	15 29.76	-19 24.7	1.706	2.714	1.6	21.1
5 21	15 17.77	-43 20.2	1.553	2.510	9.5	19.5	5 21	15 19.25	-18 46.5	1.693	2.700	2.9	21.2
5 31	15 5.79	-42 46.2	1.551	2.494	10.8	19.5	5 31	15 9.34	-18 7.8	1.709	2.685	7.4	21.4
6 10	14 56.05	-41 50.6	1.572	2.478	13.3	19.6	6 10	15 1.06	-17 33.3	1.750	2.669	11.4	21.7
6 20	14 49.56	-40 42.7	1.613	2.462	16.1	19.8	6 20	14 55.09	-17 7.0	1.813	2.652	15.0	21.8
379240	2009 <i>SE</i> ₃₂₀		5 14.5 151°74	0.1/14.6	17		217227	2002 <i>XC</i> ₆₁		5 14.5 252°25	0.8/14.9	18	
4 11	15 51.53	-21 4.8	2.258	3.102	11.7	22.2	4 11	15 52.80	-22 24.5	1.903	2.750	13.4	21.1
4 21	15 45.60	-20 38.0	2.186	3.110	8.6	22.1	4 21	15 47.16	-22 9.5	1.807	2.733	10.1	20.8
5 1	15 37.91	-20 3.5	2.138	3.118	5.1	21.8	5 1	15 39.18	-21 44.3	1.735	2.715	6.2	20.5
5 11	15 29.18	-19 23.1	2.118	3.126	1.4	21.6	5 11	15 29.63	-21 10.0	1.689	2.696	2.0	20.2
5 21	15 20.25	-18 39.6	2.126	3.133	2.4	21.7	5 21	15 19.49	-20 28.9	1.671	2.677	2.9	20.3
5 31	15 11.98	-17 57.0	2.164	3.139	6.1	21.9	5 31	15 9.90	-19 45.3	1.680	2.658	7.3	20.5
6 10	15 5.11	-17 18.9	2.228	3.144	9.5	22.2	6 10	15 1.91	-19 4.5	1.714	2.638	11.4	20.7
6 20	15 0.12	-16 48.4	2.315	3.150	12.3	22.4	6 20	14 56.21	-18 30.9	1.771	2.617	15.0	20.9
15578	2000 <i>GW</i> ₆₉		5 14.5 229°55	0.6/14.9	18		35935	1999 <i>JO</i> ₁₂₂		5 14.5 18°87	0.4/14.3	18	
4 11	15 49.79	-21 49.8	2.221	3.068	11.8	18.6	4 11	15 49.00	-20 32.2	1.124	2.009	18.0	18.3
4 21	15 44.50	-21 38.7	2.137	3.063	8.8	18.4	4 21	15 45.11	-19 56.9	1.068	2.013	13.3	18.0
5 1	15 37.37	-21 19.9	2.078	3.058	5.3	18.2	5 1	15 38.17	-19 8.7	1.031	2.018	7.9	17.7
5 11	15 29.06	-20 54.5	2.045	3.052	1.7	17.9	5 11	15 29.35	-18 11.8	1.016	2.024	2.0	17.4
5 21	15 20.42	-20 24.5	2.040	3.047	2.4	17.9	5 21	15 20.14	-17 12.5	1.024	2.031	4.0	17.6
5 31	15 12.33	-19 53.2	2.064	3.041	6.2	18.2	5 31	15 12.10	-16 18.5	1.055	2.039	9.7	17.9
6 10	15 5.58	-19 24.4	2.113	3.035	9.6	18.4	6 10	15 6.47	-15 36.7	1.108	2.047	14.7	18.2
6 20	15 0.73	-19 1.1	2.186	3.029	12.6	18.6	6 20	15 3.89	-15 11.1	1.179	2.056	18.9	18.5
463502	2013 <i>QG</i> ₅₇		5 14.5 331°98	4.9/12.3	17		471814	2012 <i>WF</i> ₁₂		5 14.5 231°81	0.6/14.1	17	
4 11	15 49.21	-9 49.5	1.328	2.211	15.9	20.7	4 11	15 49.16	-18 32.0	2.212	3.066	11.6	22.0
4 21	15 44.96	-9 11.6	1.258	2.202	11.9	20.4	4 21	15 44.01	-18 8.9	2.130	3.060	8.5	21.8
5 1	15 38.01	-8 34.4	1.209	2.193	7.7	20.2	5 1	15 37.08	-17 39.9	2.072	3.055	5.0	21.5
5 11	15 29.29	-8 3.4	1.183	2.184	4.9	20.0	5 11	15 29.03	-17 6.9	2.041	3.050	1.4	21.3
5 21	15 20.01	-7 43.8	1.182	2.176	6.7	20.1	5 21	15 20.66	-16 32.8	2.039	3.044	2.7	21.4
5 31	15 11.53	-7 39.9	1.204	2.169	11.0	20.3	5 31	15 12.84	-16 1.0	2.064	3.038	6.5	21.6
6 10	15 5.04	-7 53.8	1.247	2.162	15.3	20.5	6 10	15 6.33	-15 34.7	2.116	3.032	9.9	21.8
6 20	15 1.27	-8 25.1	1.308	2.157	19.2	20.7	6 20	15 1.65	-15 16.6	2.189	3.026	12.9	22.0
497725	2006 <i>SD</i> ₁₆₇		5 14.5 200°08	0.9/13.9	17								

EPHEMERIDES

5 14.5

5 14.5

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
498845	2008 <i>WT</i> ₉₉		5 14.5 16°86	1.6/13.8	17		339219	2004 <i>TV</i> ₃₀₀		5 14.5 282°98	5°1/16.7	17	
4 11	15 51.93	-14 9.4	1.763	2.626	13.6	20.7	4 11	15 55.29	-30 55.3	1.900	2.721	14.5	21.0
4 21	15 46.39	-14 14.5	1.692	2.627	10.0	20.5	4 21	15 49.47	-31 38.1	1.793	2.694	11.7	20.7
5 1	15 38.62	-14 18.3	1.645	2.629	6.0	20.2	5 1	15 40.86	-32 8.5	1.709	2.666	8.5	20.5
5 11	15 29.46	-14 22.4	1.623	2.631	2.1	20.0	5 11	15 30.17	-32 23.2	1.650	2.638	5.7	20.3
5 21	15 19.90	-14 28.8	1.629	2.632	3.6	20.1	5 21	15 18.50	-32 20.4	1.617	2.610	5.5	20.2
5 31	15 11.06	-14 39.4	1.661	2.635	7.8	20.4	5 31	15 7.20	-32 1.7	1.611	2.581	8.3	20.3
6 10	15 3.87	-14 56.1	1.718	2.637	11.6	20.6	6 10	14 57.60	-31 31.8	1.629	2.552	11.9	20.4
6 20	14 58.95	-15 20.1	1.796	2.639	15.0	20.8	6 20	14 50.64	-30 57.4	1.669	2.523	15.4	20.6
125495	2001 <i>WC</i> ₂₉		5 14.5 151°94	2°2/13.2	17		346039	2007 <i>TS</i> ₄₂₂		5 14.5 107°37	0°7/14.1	17	
4 11	15 52.22	-13 19.5	2.213	3.066	11.6	20.7	4 11	15 50.88	-16 49.0	2.249	3.101	11.5	21.1
4 21	15 46.09	-12 53.8	2.145	3.075	8.5	20.5	4 21	15 45.13	-16 44.6	2.183	3.112	8.4	20.9
5 1	15 38.22	-12 26.3	2.102	3.083	5.1	20.3	5 1	15 37.68	-16 36.7	2.141	3.123	4.9	20.7
5 11	15 29.32	-11 59.5	2.086	3.091	2.3	20.1	5 11	15 29.20	-16 26.8	2.126	3.134	1.4	20.5
5 21	15 20.21	-11 36.3	2.100	3.098	3.7	20.2	5 21	15 20.51	-16 16.6	2.140	3.145	2.7	20.6
5 31	15 11.74	-11 19.5	2.141	3.105	7.0	20.4	5 31	15 12.44	-16 8.6	2.182	3.155	6.2	20.9
6 10	15 4.65	-11 11.1	2.209	3.111	10.2	20.6	6 10	15 5.72	-16 5.0	2.251	3.166	9.5	21.1
6 20	14 59.42	-11 12.5	2.299	3.116	13.0	20.8	6 20	15 0.82	-16 7.5	2.342	3.176	12.2	21.3
133669	2003 <i>US</i> ₁₈₆		5 14.5 324°98	5°0/11.3	17		149849	2005 <i>QH</i> ₆		5 14.5 212°96	0°3/14.8	18	
4 11	15 46.86	- 9 37.2	1.633	2.509	13.8	19.2	4 11	15 48.42	-21 20.2	2.872	3.711	9.6	22.1
4 21	15 42.78	- 8 28.1	1.559	2.499	10.4	18.9	4 21	15 43.15	-21 2.6	2.782	3.704	7.1	21.9
5 1	15 36.54	- 7 17.6	1.508	2.488	6.9	18.7	5 1	15 36.46	-20 38.7	2.717	3.696	4.3	21.7
5 11	15 28.92	- 6 12.0	1.482	2.478	5.0	18.5	5 11	15 28.88	-20 9.8	2.681	3.689	1.2	21.5
5 21	15 20.89	- 5 17.4	1.482	2.469	6.8	18.6	5 21	15 21.05	-19 37.7	2.674	3.681	2.0	21.5
5 31	15 13.53	- 4 39.1	1.507	2.460	10.3	18.8	5 31	15 13.64	-19 5.0	2.697	3.672	5.1	21.7
6 10	15 7.77	- 4 20.2	1.554	2.451	14.0	19.0	6 10	15 7.25	-18 34.6	2.747	3.663	7.9	21.9
6 20	15 4.20	- 4 21.0	1.620	2.443	17.2	19.2	6 20	15 2.32	-18 9.0	2.821	3.654	10.4	22.0
206721	2004 <i>BJ</i> ₅₈		5 14.5 134°59	1°0/15.3	18		66971	1999 <i>XG</i> ₅₉		5 14.5 270°15	0°1/14.5	18	
4 11	15 50.37	-23 51.7	2.515	3.350	11.0	20.8	4 11	15 50.71	-19 45.9	2.009	2.862	12.6	19.7
4 21	15 44.62	-23 29.7	2.444	3.363	8.2	20.6	4 21	15 45.49	-19 31.3	1.914	2.844	9.4	19.5
5 1	15 37.30	-22 59.0	2.398	3.375	5.0	20.5	5 1	15 38.15	-19 9.5	1.843	2.825	5.6	19.2
5 11	15 29.07	-22 21.1	2.380	3.386	1.8	20.3	5 11	15 29.38	-18 41.9	1.799	2.807	1.5	18.9
5 21	15 20.68	-21 38.3	2.391	3.397	2.2	20.3	5 21	15 20.09	-18 10.9	1.782	2.788	2.8	19.0
5 31	15 12.91	-20 54.0	2.431	3.408	5.4	20.5	5 31	15 11.30	-17 40.2	1.792	2.769	7.0	19.2
6 10	15 6.42	-20 12.1	2.498	3.418	8.4	20.7	6 10	15 3.93	-17 13.7	1.828	2.749	10.9	19.4
6 20	15 1.63	-19 35.6	2.589	3.427	11.1	20.9	6 20	14 58.66	-16 54.9	1.886	2.730	14.3	19.6
106060	2000 <i>SS</i> ₃₁₆		5 14.5 251°83	1°2/16.2	18		367701	2010 <i>RY</i> ₁₇₈		5 14.5 257°33	1°5/13.7	17	
4 11	15 41.94	-26 54.7	4.428	5.248	6.9	19.8	4 11	15 52.76	-16 44.3	1.683	2.545	14.2	21.5
4 21	15 38.02	-26 33.9	4.339	5.246	5.2	19.7	4 21	15 47.31	-16 16.1	1.594	2.528	10.5	21.2
5 1	15 33.26	-26 6.9	4.276	5.244	3.4	19.6	5 1	15 39.37	-15 41.3	1.527	2.512	6.3	20.9
5 11	15 27.99	-25 34.5	4.241	5.242	1.6	19.4	5 11	15 29.73	-15 2.7	1.487	2.494	2.0	20.6
5 21	15 22.62	-24 57.9	4.236	5.240	1.6	19.4	5 21	15 19.47	-14 24.2	1.473	2.476	3.9	20.7
5 31	15 17.52	-24 19.0	4.261	5.238	3.3	19.6	5 31	15 9.82	-13 50.4	1.485	2.458	8.6	20.9
6 10	15 13.07	-23 39.8	4.315	5.236	5.2	19.7	6 10	15 1.88	-13 25.9	1.522	2.440	13.0	21.1
6 20	15 9.53	-23 2.1	4.394	5.233	6.8	19.8	6 20	14 56.40	-13 13.8	1.579	2.421	16.8	21.3
364027	2005 <i>VC</i> ₁₂₆		5 14.5 294°34	3°8/11.6	17		438046	2004 <i>NG</i> ₃₁		5 14.5 290°92	11°4/23.7	18	
4 11	15 46.41	-10 23.3	2.183	3.048	11.3	21.3	4 11	15 58.81	-55 35.8	2.455	3.118	15.6	20.6
4 21	15 41.95	- 9 20.4	2.106	3.040	8.4	21.1	4 21	15 52.34	-56 21.2	2.350	3.095	14.4	20.4
5 1	15 35.83	- 8 16.0	2.054	3.033	5.5	20.9	5 1	15 42.60	-56 42.7	2.263	3.071	13.1	20.3
5 11	15 28.71	- 7 14.7	2.030	3.027	3.8	20.8	5 11	15 30.61	-56 34.4	2.195	3.048	12.0	20.2
5 21	15 21.31	- 6 20.9	2.033	3.020	5.2	20.9	5 21	15 17.84	-55 53.1	2.148	3.024	11.4	20.1
5 31	15 14.44	- 5 38.8	2.063	3.013	8.1	21.0	5 31	15 5.99	-54 39.8	2.125	3.001	11.6	20.0
6 10	15 8.79	- 5 10.9	2.117	3.006	11.2	21.2	6 10	14 56.51	-53 0.4	2.124	2.977	12.6	20.1
6 20	15 4.86	- 4 58.2	2.193	3.000	13.8	21.4	6 20	14 50.29	-51 3.5	2.145	2.953	14.1	20.1
317523	2002 <i>TE</i> ₁₇₄		5 14.5 312°70	2°3/13.6	17		168696	2000 <i>GY</i> ₁₁₉		5 14.5 251°84	0°7/14.9	17	
4 11	15 50.51	-13 31.4	1.625	2.496	14.2	20.3	4 11	15 50.05	-21 42.4	2.156	3.004	12.1	21.2
4 21	15 45.89	-13 27.1	1.524	2.463	10.6	20.0	4 21	15 44.81	-21 33.8	2.070	2.996	9.0	21.0
5 1	15 38.69	-13 21.5	1.445	2.430	6.5	19.7	5 1	15 37.64	-21 17.4	2.008	2.988	5.5	20.7
5 11	15 29.58	-13 17.0	1.391	2.398	2.6	19.4	5 11	15 29.23	-20 54.3	1.972	2.979	1.7	20.5
5 21	15 19.57	-13 16.2	1.363	2.366	4.4	19.4	5 21	15 20.43	-20 26.4	1.964	2.971	2.5	20.5
5 31	15 9.94	-13 22.2	1.360	2.334	9.1	19.6	5 31	15 12.17	-19 57.0	1.984	2.962	6.3	20.7
6 10	15 1.90	-13 37.7	1.381	2.303	13.7	19.8	6 10	15 5.29	-19 30.0	2.030	2.953	9.9	20.9
6 20	14 56.34	-14 4.2	1.421	2.272	17.8	20.0	6 20	15 0.35	-19 8.5	2.099	2.944	13.0	21.1
290424	2005 <i>TK</i> ₈₁		5 14.5 22°81	1°0/15.2	17		153877	2001 <i>XB</i> ₁₃₁		5 14.5 44°66	3°1/13.0	17	
4 11	15 48.10	-23 14.2	2.102	2.951	12.3	20.6	4 11	15 50.61	-12 50.1	1.523	2.397	14.8	19.6
4 21	15 43.32	-22 58.1	2.027	2.953	9.2	20.4	4 21	15 45.54	-12 20.4	1.465	2.405	10.9	19.4
5 1	15 36.69	-22 32.8	1.977	2.956	5.6	20.2	5 1	15 38.15	-11 49.2	1.429	2.414	6.6	19.2
5 11	15 28.94	-21 59.6	1.952	2.959	1.9	19.9	5 11	15 29.35	-11 20.4	1.418	2.423	3.2	19.0
5 21	15 20.92	-21 21.2	1.955	2.962	2.5	20.0	5 21	15 20.28	-10 57.9	1.432	2.432	4.9	19.1
5 31	15 13.53	-20 41.2	1.986	2.965	6.2	20.2	5 31	15 12.11	-10 45.4	1.472	2.441	9.0	19.4
6 10	15 7.56	-20 3.9	2.042	2.969	9.7	20.4	6 10	15 5.79	-10 45.4	1.535	2.451	13.0	19.6
6 20	15 3.51	-19 32.7	2.121	2.973	12.7	20.6	6 20	15 1.89	-10 58.5	1.618	2.461	16.4	19.9
439186	2011 <i>WZ</i> ₁₂₂		5 14.5 275°21	1°6/13.6	16		427930	200					

EPHEMERIDES

5 14.5

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
211999	2005 <i>BH</i> ₆		5 14.5 77°23	1.2°/14.0	17		163335	2002 <i>LJ</i>		5 14.5 205°55	11°0°/20.9	17	
4 11	15 54.53	-17 1.9	1.403	2.272	16.1	20.6	4 11	16 49.66	-50 10.1	1.537	2.212	23.2	20.8
4 21	15 48.55	-16 47.8	1.350	2.288	11.8	20.4	4 21	16 31.30	-49 48.3	1.417	2.206	20.3	20.5
5 1	15 39.96	-16 28.0	1.319	2.304	6.9	20.1	5 1	16 6.20	-48 35.0	1.316	2.196	16.6	20.2
5 11	15 29.83	-16 5.2	1.313	2.321	2.0	19.9	5 11	15 36.85	-46 9.3	1.241	2.182	12.9	19.9
5 21	15 19.48	-15 43.0	1.332	2.337	3.8	20.0	5 21	15 7.30	-42 24.5	1.200	2.164	11.0	19.8
5 31	15 10.25	-15 25.4	1.377	2.354	8.7	20.3	5 31	14 41.60	-37 38.1	1.195	2.141	13.1	19.8
6 10	15 3.18	-15 16.4	1.445	2.370	13.0	20.6	6 10	14 22.07	-32 26.9	1.226	2.115	17.5	20.0
6 20	14 58.84	-15 17.8	1.533	2.386	16.6	20.9	6 20	14 9.08	-27 28.0	1.286	2.084	22.2	20.2
89521	2001 <i>XG</i> ₆₄		5 14.5 155°90	2°3°/13.1	17		304005	2006 <i>CZ</i> ₂		5 14.5 282°57	1°8°/13.7	16	
4 11	15 51.89	-13 14.2	2.165	3.019	11.8	20.3	4 11	15 52.09	-16 54.6	1.362	2.236	16.1	21.4
4 21	15 45.91	-12 46.8	2.096	3.026	8.6	20.1	4 21	15 47.31	-16 24.2	1.279	2.220	12.0	21.1
5 1	15 38.16	-12 17.5	2.051	3.033	5.2	19.9	5 1	15 39.60	-15 45.8	1.218	2.205	7.2	20.8
5 11	15 29.35	-11 49.1	2.034	3.039	2.4	19.7	5 11	15 29.87	-15 2.8	1.181	2.189	2.3	20.4
5 21	15 20.31	-11 24.5	2.046	3.044	3.8	19.8	5 21	15 19.39	-14 20.1	1.169	2.173	4.5	20.5
5 31	15 11.91	-11 6.6	2.086	3.049	7.2	20.0	5 31	15 9.66	-13 43.6	1.181	2.157	9.8	20.8
6 10	15 4.91	-10 57.7	2.151	3.054	10.4	20.3	6 10	15 1.99	-13 18.8	1.215	2.141	14.8	21.0
6 20	14 59.78	-10 58.8	2.239	3.057	13.2	20.4	6 20	14 57.22	-13 9.1	1.268	2.126	19.1	21.2
182669	2001 <i>UZ</i> ₂₁₄		5 14.5 305°41	0°5°/13.9	18		394044	2005 <i>WO</i> ₁₁₇		5 14.6 214°74	0°2°/14.6	18	
4 11	15 41.20	-17 35.3	4.287	5.133	6.6	20.4	4 11	15 52.40	-18 13.4	2.673	3.513	10.3	21.0
4 21	15 37.50	-17 14.1	4.202	5.130	4.8	20.3	4 21	15 46.20	-18 36.7	2.586	3.509	7.6	20.8
5 1	15 32.97	-16 50.2	4.145	5.127	2.8	20.1	5 1	15 38.36	-18 57.1	2.524	3.504	4.5	20.6
5 11	15 27.96	-16 24.9	4.116	5.124	0.8	20.0	5 11	15 29.46	-19 14.7	2.491	3.499	1.2	20.4
5 21	15 22.82	-15 59.5	4.117	5.121	1.6	20.0	5 21	15 20.20	-19 30.0	2.488	3.495	2.2	20.4
5 31	15 17.94	-15 35.7	4.147	5.118	3.6	20.2	5 31	15 11.34	-19 44.0	2.515	3.489	5.4	20.7
6 10	15 13.65	-15 14.9	4.205	5.115	5.6	20.3	6 10	15 3.60	-19 58.3	2.570	3.484	8.5	20.8
6 20	15 10.24	-14 58.4	4.289	5.112	7.3	20.4	6 20	14 57.49	-20 14.6	2.649	3.479	11.1	21.0
62195	2000 <i>SM</i> ₄₈		5 14.5 215°02	1°0°/13.8	18		319405	2006 <i>GG</i> ₄₄		5 14.6 336°02	1°2°/14.1	17	
4 11	15 50.43	-19 8.7	2.047	2.900	12.4	19.4	4 11	15 52.84	-16 50.5	1.348	2.222	16.3	20.6
4 21	15 45.06	-18 16.9	1.964	2.895	9.1	19.2	4 21	15 47.71	-16 41.5	1.279	2.220	12.1	20.3
5 1	15 37.76	-17 16.5	1.906	2.889	5.4	18.9	5 1	15 39.73	-16 27.0	1.231	2.217	7.2	20.0
5 11	15 29.27	-16 10.8	1.875	2.883	1.5	18.7	5 11	15 29.87	-16 9.3	1.207	2.215	2.1	19.7
5 21	15 20.46	-15 4.0	1.872	2.876	3.2	18.8	5 21	15 19.47	-15 51.6	1.208	2.214	4.0	19.8
5 31	15 12.28	-14 1.4	1.898	2.869	7.1	19.0	5 31	15 9.98	-15 38.3	1.234	2.212	9.2	20.1
6 10	15 5.56	-13 7.8	1.949	2.862	10.8	19.2	6 10	15 2.63	-15 33.3	1.282	2.211	14.0	20.4
6 20	15 0.82	-12 26.4	2.023	2.854	14.0	19.4	6 20	14 58.16	-15 39.2	1.349	2.210	18.0	20.6
170310	2003 <i>SM</i> ₃₈		5 14.5 231°64	3°5°/16.8	18		264990	2003 <i>DR</i> ₄		5 14.6 89°57	2°7°/12.3	18	
4 11	15 51.12	-29 52.9	1.946	2.776	13.9	19.8	4 11	15 46.05	- 8 17.3	3.235	4.085	8.4	20.9
4 21	15 45.83	-29 48.1	1.866	2.775	10.8	19.6	4 21	15 41.12	- 7 58.7	3.177	4.103	6.2	20.8
5 1	15 38.33	-29 28.3	1.809	2.774	7.4	19.3	5 1	15 35.14	- 7 42.0	3.146	4.121	4.0	20.6
5 11	15 29.43	-28 53.2	1.777	2.774	4.2	19.1	5 11	15 28.56	- 7 28.9	3.143	4.139	2.7	20.6
5 21	15 20.17	-28 5.0	1.772	2.773	3.9	19.1	5 21	15 21.90	- 7 21.1	3.170	4.157	3.5	20.6
5 31	15 11.65	-27 8.0	1.794	2.772	6.9	19.3	5 31	15 15.65	- 7 19.9	3.225	4.174	5.6	20.8
6 10	15 4.82	-26 8.4	1.841	2.771	10.3	19.5	6 10	15 10.27	- 7 26.1	3.307	4.192	7.7	21.0
6 20	15 0.27	-25 11.9	1.911	2.771	13.5	19.7	6 20	15 6.08	- 7 39.9	3.413	4.209	9.6	21.1
359505	2010 <i>QD</i> ₅		5 14.5 263°68	5°8°/ 9.0	18		7973	Koppeschaar		5 14.6 133°08	1°1°/13.8	18	
4 11	15 46.49	- 1 53.5	2.556	3.408	10.3	21.4	4 11	15 49.90	-16 45.7	2.177	3.032	11.7	19.0
4 21	15 41.85	- 0 38.4	2.473	3.389	8.2	21.2	4 21	15 44.50	-16 21.4	2.107	3.038	8.6	18.8
5 1	15 35.75	+ 0 33.2	2.415	3.371	6.4	21.0	5 1	15 37.37	-15 52.6	2.061	3.044	5.0	18.6
5 11	15 28.73	+ 1 36.5	2.385	3.352	5.9	21.0	5 11	15 29.19	-15 21.8	2.043	3.050	1.6	18.4
5 21	15 21.42	+ 2 27.0	2.382	3.333	7.0	21.0	5 21	15 20.78	-14 51.8	2.052	3.056	3.0	18.5
5 31	15 14.49	+ 3 1.5	2.405	3.314	9.2	21.1	5 31	15 12.99	-14 25.6	2.090	3.061	6.6	18.7
6 10	15 8.57	+ 3 18.5	2.453	3.294	11.5	21.2	6 10	15 6.56	-14 6.4	2.153	3.066	9.9	18.9
6 20	15 4.12	+ 3 18.2	2.521	3.274	13.6	21.4	6 20	15 1.97	-13 55.9	2.239	3.071	12.8	19.1
427201	2014 <i>VK</i> ₂₈		5 14.5 189°27	0°5°/14.9	17		395686	2011 <i>YB</i> ₂		5 14.6 302°52	0°6°/14.0	16	
4 11	15 54.29	-21 33.2	1.950	2.796	13.2	22.7	4 11	15 46.83	-20 10.6	2.325	3.178	11.1	20.8
4 21	15 48.04	-21 20.2	1.870	2.795	9.9	22.4	4 21	15 42.23	-19 17.7	2.244	3.174	8.2	20.6
5 1	15 39.60	-20 58.4	1.814	2.794	6.0	22.2	5 1	15 36.02	-18 16.5	2.187	3.170	4.8	20.4
5 11	15 29.77	-20 29.0	1.784	2.792	1.8	21.9	5 11	15 28.84	-17 10.1	2.158	3.166	1.3	20.2
5 21	15 19.56	-19 54.5	1.783	2.789	2.7	22.0	5 21	15 21.43	-16 2.3	2.158	3.162	2.7	20.3
5 31	15 10.04	-19 18.8	1.809	2.786	6.9	22.2	5 31	15 14.57	-14 57.7	2.186	3.159	6.2	20.5
6 10	15 2.15	-18 46.5	1.861	2.782	10.8	22.4	6 10	15 8.93	-14 0.7	2.240	3.155	9.5	20.7
6 20	14 56.51	-18 21.1	1.936	2.777	14.1	22.7	6 20	15 4.98	-13 14.2	2.317	3.152	12.3	20.9
118249	1997 <i>WF</i> ₁₅		5 14.5 16°75	1°5°/13.9	17		103276	2000 <i>AT</i> ₃₃		5 14.6 255°92	3°9°/12.6	17	
4 11	15 51.08	-15 20.9	1.326	2.204	16.2	19.1	4 11	15 55.26	-11 25.0	1.622	2.484	14.6	20.5
4 21	15 46.31	-15 24.9	1.265	2.208	12.0	18.9	4 21	15 49.33	-10 43.3	1.528	2.461	11.0	20.3
5 1	15 38.82	-15 25.9	1.226	2.213	7.1	18.6	5 1	15 40.71	- 9 58.7	1.456	2.437	7.0	20.0
5 11	15 29.59	-15 26.2	1.210	2.218	2.2	18.3	5 11	15 30.19	- 9 15.8	1.411	2.413	4.0	19.7
5 21	15 19.93	-15 28.2	1.219	2.225	4.0	18.4	5 21	15 18.88	- 8 39.5	1.392	2.387	5.9	19.8
5 31	15 11.23	-15 34.7	1.253	2.232	9.0	18.7	5 31	15 8.10	- 8 14.8	1.399	2.360	10.2	20.0
6 10	15 4.65	-15 48.4	1.309	2.240	13.6	19.0	6 10	14 59.06	- 8 5.6	1.430	2.332	14.6	20.1
6 20	15 0.86	-16 10.9	1.384	2.249	17.4	19.3	6 20	14 52.60	- 8 13.2	1.481	2.304	18.6	20.3
253747	2003 <i>WU</i> ₆₇		5 14.5 150°35	0°5°/14.8	17		281682	2008 <i>WW</i> ₈					

EPHEMERIDES

5 14.6

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
433598	2013 YG ₆₀		5 14.6 199°92	1.2°/13.9	18		196830	2003 SK ₂₄₁		5 14.6 76°71	1.3°/15.3	17	
4 11	15 51.34	-15 37.8	2.064	2.920	12.2	21.1	4 11	15 51.39	-22 51.8	1.889	2.738	13.4	21.1
4 21	15 45.74	-15 30.9	1.987	2.918	9.0	20.9	4 21	15 45.99	-22 52.2	1.815	2.741	10.1	20.9
5 1	15 38.20	-15 21.1	1.934	2.917	5.3	20.7	5 1	15 38.44	-22 43.6	1.765	2.744	6.2	20.7
5 11	15 29.45	-15 9.9	1.908	2.915	1.7	20.4	5 11	15 29.54	-22 26.5	1.741	2.747	2.2	20.5
5 21	15 20.34	-14 59.7	1.910	2.914	3.2	20.5	5 21	15 20.29	-22 3.0	1.744	2.750	2.8	20.5
5 31	15 11.83	-14 52.9	1.940	2.912	6.9	20.8	5 31	15 11.74	-21 36.5	1.774	2.753	6.8	20.8
6 10	15 4.74	-14 52.0	1.995	2.910	10.5	21.0	6 10	15 4.83	-21 11.4	1.829	2.757	10.5	21.0
6 20	14 59.62	-14 58.6	2.073	2.908	13.6	21.2	6 20	15 0.13	-20 51.3	1.906	2.760	13.8	21.2
297826	2002 AQ ₁₅₁		5 14.6 133°28	4.6°/11.2	18		65942	1998 FL ₉₀		5 14.6 219°42	3.1°/16.1	17	
4 11	15 47.96	-4 36.6	2.518	3.370	10.4	20.6	4 11	15 57.02	-26 55.6	1.932	2.761	14.0	19.3
4 21	15 42.82	-3 58.3	2.454	3.377	7.9	20.5	4 21	15 50.39	-27 17.7	1.841	2.752	10.8	19.1
5 1	15 36.27	-3 24.0	2.416	3.383	5.7	20.3	5 1	15 41.23	-27 28.6	1.773	2.742	7.2	18.9
5 11	15 28.90	-2 57.2	2.405	3.390	4.6	20.3	5 11	15 30.33	-27 26.6	1.732	2.731	3.8	18.6
5 21	15 21.36	-2 40.5	2.423	3.396	5.6	20.3	5 21	15 18.79	-27 12.1	1.718	2.720	3.8	18.6
5 31	15 14.34	-2 35.9	2.467	3.401	7.8	20.5	5 31	15 7.86	-26 47.8	1.732	2.708	7.3	18.8
6 10	15 8.42	-2 44.0	2.536	3.407	10.2	20.6	6 10	14 58.68	-26 18.7	1.772	2.695	11.1	19.0
6 20	15 4.02	-3 4.3	2.628	3.412	12.4	20.8	6 20	14 51.98	-25 50.0	1.834	2.682	14.5	19.2
382476	2000 WC ₁₉₀		5 14.6 272°02	0.3°/14.7	18		136394	2004 TB ₁₀₆		5 14.6 194°77	1.7°/13.5	17	
4 11	15 53.80	-20 6.4	2.099	2.944	12.4	21.9	4 11	15 50.71	-15 46.7	1.969	2.828	12.6	20.9
4 21	15 47.89	-20 4.2	1.989	2.914	9.4	21.6	4 21	15 45.33	-15 16.3	1.893	2.827	9.2	20.7
5 1	15 39.72	-19 55.3	1.902	2.883	5.7	21.4	5 1	15 37.98	-14 41.5	1.842	2.826	5.5	20.4
5 11	15 29.92	-19 40.3	1.843	2.851	1.6	21.0	5 11	15 29.41	-14 5.1	1.817	2.824	2.0	20.2
5 21	15 19.38	-19 20.8	1.812	2.818	2.7	21.0	5 21	15 20.52	-13 30.4	1.820	2.822	3.6	20.3
5 31	15 9.18	-18 59.5	1.809	2.785	7.0	21.2	5 31	15 12.27	-13 1.4	1.850	2.820	7.4	20.5
6 10	15 0.34	-18 40.4	1.832	2.751	11.1	21.4	6 10	15 5.50	-12 41.1	1.906	2.818	11.0	20.7
6 20	14 53.60	-18 26.8	1.878	2.716	14.6	21.6	6 20	15 0.76	-12 31.6	1.983	2.816	14.2	20.9
266609	2008 MR		5 14.6 321°21	3.4°/16.2	18		366601	2003 AA ₁₆		5 14.6 199°85	0.7°/15.0	17	
4 11	15 49.15	-27 28.5	1.409	2.267	16.6	19.5	4 11	15 53.52	-22 22.6	2.309	3.146	11.7	22.3
4 21	15 45.27	-27 29.9	1.323	2.250	12.9	19.2	4 21	15 47.25	-22 8.8	2.222	3.142	8.8	22.1
5 1	15 38.46	-27 14.5	1.257	2.233	8.6	18.9	5 1	15 39.08	-21 46.6	2.159	3.137	5.4	21.9
5 11	15 29.61	-26 41.6	1.214	2.217	4.4	18.6	5 11	15 29.71	-21 17.0	2.124	3.131	1.7	21.6
5 21	15 19.99	-25 53.3	1.196	2.201	4.3	18.6	5 21	15 19.98	-20 42.1	2.117	3.124	2.4	21.7
5 31	15 11.12	-24 55.0	1.201	2.186	8.6	18.8	5 31	15 10.81	-20 5.2	2.140	3.116	6.1	21.9
6 10	15 4.34	-23 54.9	1.230	2.171	13.3	19.0	6 10	15 3.02	-19 30.4	2.190	3.108	9.6	22.1
6 20	15 0.51	-23 0.5	1.278	2.158	17.6	19.2	6 20	14 57.17	-19 1.1	2.264	3.099	12.6	22.3
287885	2003 ST ₃₂₉		5 14.6 290°60	0.6°/14.4	17		478045	2011 SB ₂₆₀		5 14.6 198°47	2.2°/12.8	16	
4 11	15 53.76	-17 33.2	1.446	2.314	15.8	20.6	4 11	15 47.60	-13 46.8	2.567	3.421	10.1	22.6
4 21	15 48.65	-17 38.0	1.352	2.290	11.8	20.3	4 21	15 42.63	-13 0.8	2.488	3.419	7.4	22.4
5 1	15 40.54	-17 37.6	1.280	2.265	7.2	19.9	5 1	15 36.21	-12 12.1	2.435	3.416	4.5	22.2
5 11	15 30.20	-17 33.2	1.232	2.240	1.9	19.5	5 11	15 28.92	-11 23.4	2.410	3.414	2.3	22.0
5 21	15 18.87	-17 26.8	1.209	2.215	3.8	19.6	5 21	15 21.41	-10 38.2	2.414	3.410	3.5	22.1
5 31	15 8.04	-17 21.6	1.211	2.190	9.3	19.8	5 31	15 14.38	-9 59.6	2.446	3.407	6.4	22.3
6 10	14 59.15	-17 21.8	1.236	2.165	14.4	20.0	6 10	15 8.43	-9 30.2	2.505	3.403	9.3	22.5
6 20	14 53.18	-17 30.8	1.281	2.140	18.8	20.3	6 20	15 4.01	-9 11.6	2.587	3.399	11.8	22.6
24325	Kaleighanne		5 14.6 153°97	1.6°/15.6	18		235849	2005 AE ₁₅		5 14.6 175°91	0.5°/14.9	17	
4 11	15 53.39	-25 11.9	1.737	2.583	14.6	19.0	4 11	15 51.40	-21 51.3	2.438	3.277	11.1	22.2
4 21	15 47.58	-24 49.6	1.664	2.587	11.0	18.8	4 21	15 45.54	-21 36.5	2.358	3.279	8.3	22.0
5 1	15 39.41	-24 13.8	1.614	2.591	6.9	18.5	5 1	15 37.99	-21 14.4	2.302	3.281	5.0	21.8
5 11	15 29.78	-23 26.0	1.590	2.595	2.7	18.3	5 11	15 29.41	-20 46.0	2.275	3.282	1.5	21.6
5 21	15 19.82	-22 29.5	1.592	2.599	3.0	18.3	5 21	15 20.56	-20 13.5	2.277	3.283	2.3	21.6
5 31	15 10.74	-21 29.9	1.622	2.602	7.3	18.6	5 31	15 12.27	-19 39.9	2.307	3.283	5.7	21.9
6 10	15 3.51	-20 33.6	1.677	2.605	11.3	18.8	6 10	15 5.27	-19 8.9	2.365	3.283	8.9	22.1
6 20	14 58.74	-19 45.5	1.753	2.607	14.8	19.0	6 20	15 0.03	-18 43.2	2.446	3.282	11.7	22.2
316183	2010 HB ₃₉		5 14.6 298°67	1.6°/15.2	17		165215	2000 SX ₃₁		5 14.6 8°12	5.2°/16.6	17	
4 11	15 51.71	-23 9.3	1.344	2.211	16.8	20.9	4 11	15 53.60	-28 42.4	1.220	2.078	18.7	19.3
4 21	15 47.32	-23 7.2	1.255	2.190	12.8	20.5	4 21	15 48.86	-29 24.3	1.154	2.078	14.7	19.0
5 1	15 39.79	-22 52.2	1.186	2.168	8.0	20.2	5 1	15 40.70	-29 49.4	1.108	2.079	10.2	18.8
5 11	15 30.00	-22 24.5	1.140	2.147	2.9	19.8	5 11	15 30.23	-29 54.5	1.083	2.080	6.1	18.5
5 21	15 19.26	-21 46.4	1.118	2.125	3.7	19.8	5 21	15 19.05	-29 39.5	1.082	2.082	5.8	18.5
5 31	15 9.18	-21 3.1	1.120	2.104	9.2	20.1	5 31	15 8.95	-29 8.8	1.104	2.085	9.6	18.7
6 10	15 1.25	-20 22.0	1.145	2.083	14.4	20.3	6 10	15 1.47	-28 30.5	1.147	2.088	14.1	19.0
6 20	14 56.41	-19 49.5	1.189	2.063	19.1	20.5	6 20	14 57.43	-27 52.7	1.210	2.092	18.2	19.3
187541	2006 UX ₁₄₉		5 14.6 90°70	8.3°/6.7	18		406541	2007 VK ₃₃₃		5 14.6 141°71	3.1°/12.9	16	
4 11	15 47.36	+ 5 47.1	2.413	3.248	11.4	20.5	4 11	15 53.88	-12 10.5	1.810	2.669	13.5	21.9
4 21	15 42.34	+ 7 30.5	2.377	3.268	9.6	20.4	4 21	15 47.65	-11 34.1	1.747	2.680	9.9	21.7
5 1	15 35.95	+ 9 2.4	2.367	3.287	8.4	20.3	5 1	15 39.33	-10 56.3	1.708	2.690	6.1	21.5
5 11	15 28.82	+10 17.3	2.382	3.306	8.4	20.4	5 11	15 29.77	-10 20.9	1.696	2.699	3.2	21.3
5 21	15 21.62	+11 11.1	2.424	3.324	9.3	20.5	5 21	15 19.97	-9 51.7	1.711	2.708	4.8	21.4
5 31	15 15.01	+11 41.9	2.490	3.342	10.9	20.6	5 31	15 11.00	-9 32.1	1.754	2.716	8.4	21.7
6 10	15 9.57	+11 50.1	2.577	3.361	12.6	20.7	6 10	15 3.70	-9 24.6	1.821	2.723	12.0	21.9
6 20	15 5.67	+11 38.2	2.683	3.378	14.1	20.9	6 20	14 58.62	-9 29.9	1.909	2.730	15.1	22.1
41723	2000 UP ₈₀		5 14.6 163°76	0.8°/14.2	18		106155	2000 TB ₅₉		5 14.6 213°67	5.6°/10.3	18	
4 11	15 55.27	-17											

EPHEMERIDES

5 14.6

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
503576	2016 <i>GP</i> ₃₄		5 14.6 272°84	1°3/13.8	17		331275	2011 <i>CT</i> ₈₈		5 14.6 82°06	3°3/11.4	18	
4 11	15 51.13	-18 29.9	1.558	2.425	14.9	21.8	4 11	15 44.79	-7 21.3	3.121	3.974	8.6	21.7
4 21	15 46.25	-17 47.6	1.474	2.412	11.0	21.5	4 21	15 40.26	-6 36.9	3.067	3.993	6.4	21.5
5 1	15 38.82	-16 55.5	1.413	2.399	6.6	21.2	5 1	15 34.68	-5 54.5	3.040	4.012	4.4	21.4
5 11	15 29.70	-15 57.2	1.377	2.386	1.9	20.9	5 11	15 28.52	-5 16.7	3.042	4.032	3.3	21.4
5 21	15 20.01	-14 57.6	1.368	2.372	3.9	21.0	5 21	15 22.28	-4 46.1	3.072	4.050	4.2	21.5
5 31	15 11.04	-14 2.9	1.384	2.359	8.8	21.3	5 31	15 16.48	-4 24.4	3.130	4.069	6.1	21.6
6 10	15 3.91	-13 19.1	1.423	2.346	13.3	21.5	6 10	15 11.55	-4 12.8	3.214	4.088	8.2	21.8
6 20	14 59.32	-12 50.0	1.483	2.332	17.3	21.7	6 20	15 7.81	-4 11.4	3.321	4.106	10.0	21.9
1478	Vihuri		5 14.6 105°95	5°0/17.4	18		429195	2009 <i>WU</i> ₈₈		5 14.6 106°16	1°3/13.8	17	
4 11	15 55.17	-32 17.6	1.693	2.517	15.9	16.6	4 11	15 51.71	-16 46.3	1.960	2.817	12.7	21.8
4 21	15 49.14	-32 34.0	1.625	2.526	12.6	16.4	4 21	15 45.94	-16 17.8	1.899	2.832	9.3	21.6
5 1	15 40.45	-32 32.4	1.578	2.535	9.0	16.2	5 1	15 38.26	-15 44.6	1.863	2.846	5.5	21.4
5 11	15 30.10	-32 11.3	1.555	2.544	5.8	16.1	5 11	15 29.50	-15 9.3	1.853	2.861	1.7	21.1
5 21	15 19.38	-31 32.0	1.558	2.553	5.3	16.1	5 21	15 20.56	-14 35.3	1.871	2.875	3.3	21.3
5 31	15 9.64	-30 39.1	1.587	2.562	7.9	16.2	5 31	15 12.39	-14 6.2	1.917	2.888	7.1	21.5
6 10	15 2.00	-29 39.9	1.641	2.570	11.4	16.5	6 10	15 5.77	-13 45.1	1.988	2.902	10.6	21.8
6 20	14 57.10	-28 41.8	1.716	2.578	14.7	16.7	6 20	15 1.19	-13 33.9	2.081	2.915	13.5	22.0
357829	2005 <i>UQ</i> ₈₆		5 14.6 198°03	0°4/14.3	18		303783	2005 <i>RT</i> ₂₀		5 14.6 259°89	1°2/13.6	16	
4 11	15 48.25	-18 23.4	2.875	3.719	9.5	22.2	4 11	15 47.45	-18 18.0	2.389	3.242	10.8	20.7
4 21	15 43.04	-18 7.7	2.790	3.716	7.0	22.0	4 21	15 42.70	-17 22.9	2.301	3.232	8.0	20.5
5 1	15 36.44	-17 47.7	2.731	3.713	4.1	21.8	5 1	15 36.35	-16 20.7	2.238	3.222	4.7	20.3
5 11	15 29.00	-17 24.7	2.701	3.709	1.1	21.6	5 11	15 29.01	-15 14.3	2.203	3.211	1.5	20.0
5 21	15 21.32	-17 0.7	2.700	3.705	2.1	21.6	5 21	15 21.39	-14 7.8	2.197	3.200	3.0	20.1
5 31	15 14.06	-16 38.0	2.728	3.701	5.2	21.9	5 31	15 14.26	-13 5.6	2.220	3.189	6.4	20.3
6 10	15 7.80	-16 18.9	2.784	3.696	8.0	22.0	6 10	15 8.31	-12 11.7	2.269	3.178	9.6	20.5
6 20	15 2.97	-16 5.3	2.864	3.691	10.4	22.2	6 20	15 4.02	-11 29.0	2.341	3.167	12.5	20.7
346268	2008 <i>FB</i> ₁₃₄		5 14.6 334°79	2°1/11.9	18		231398	2006 <i>PX</i> ₉		5 14.6 253°72	0°1/14.5	18	
4 11	15 41.22	-11 10.6	3.869	4.724	7.0	20.4	4 11	15 45.16	-19 38.2	3.319	4.162	8.4	20.9
4 21	15 37.60	-10 22.2	3.790	4.720	5.2	20.3	4 21	15 40.68	-19 23.1	3.227	4.152	6.2	20.7
5 1	15 33.10	-9 33.0	3.737	4.716	3.3	20.2	5 1	15 35.02	-19 3.6	3.162	4.143	3.7	20.5
5 11	15 28.09	-8 45.3	3.714	4.712	2.1	20.1	5 11	15 28.64	-18 40.8	3.125	4.133	1.0	20.3
5 21	15 22.96	-8 1.3	3.720	4.708	3.0	20.1	5 21	15 22.05	-18 16.5	3.117	4.123	1.8	20.4
5 31	15 18.11	-7 23.0	3.755	4.705	4.8	20.2	5 31	15 15.78	-17 52.6	3.139	4.113	4.5	20.5
6 10	15 13.91	-6 52.2	3.817	4.701	6.7	20.4	6 10	15 10.32	-17 31.2	3.188	4.103	7.0	20.7
6 20	15 10.63	-6 29.8	3.902	4.698	8.5	20.5	6 20	15 6.07	-17 14.1	3.262	4.093	9.2	20.8
123760	2001 <i>AP</i> ₄₀		5 14.6 249°44	15°6/23.1	18		191236	2002 <i>TT</i> ₁₃₉		5 14.6 180°69	3°9/16.5	18	
4 11	16 3.43	-50 39.5	1.254	2.011	23.9	19.9	4 11	15 58.23	-29 5.1	1.676	2.506	15.8	21.0
4 21	15 57.80	-51 50.3	1.176	2.002	21.5	19.7	4 21	15 51.50	-29 18.7	1.598	2.508	12.3	20.8
5 1	15 46.87	-52 25.3	1.112	1.991	19.0	19.5	5 1	15 41.95	-29 16.9	1.543	2.509	8.4	20.5
5 11	15 32.03	-52 12.0	1.064	1.981	16.8	19.3	5 11	15 30.56	-28 57.9	1.512	2.509	4.7	20.3
5 21	15 15.82	-51 3.1	1.035	1.970	15.7	19.2	5 21	15 18.64	-28 22.9	1.507	2.508	4.5	20.3
5 31	15 1.35	-49 1.5	1.026	1.959	16.2	19.2	5 31	15 7.62	-27 36.3	1.530	2.507	8.0	20.5
6 10	14 51.06	-46 22.5	1.037	1.947	18.3	19.3	6 10	14 58.73	-26 45.2	1.578	2.505	11.9	20.7
6 20	14 45.98	-43 25.7	1.067	1.935	21.2	19.4	6 20	14 52.68	-25 56.4	1.647	2.502	15.5	20.9
153768	2001 <i>VD</i> ₂₇		5 14.6 165°41	0°6/14.9	18		263620	2008 <i>GJ</i> ₂₄		5 14.6 236°98	3°5/16.6	18	
4 11	15 51.88	-22 41.0	1.996	2.842	12.9	19.5	4 11	15 52.66	-29 24.2	2.544	3.358	11.5	20.8
4 21	15 46.20	-22 13.9	1.920	2.845	9.6	19.3	4 21	15 46.70	-29 59.8	2.454	3.352	9.0	20.6
5 1	15 38.50	-21 36.7	1.869	2.848	5.8	19.1	5 1	15 38.84	-30 25.9	2.388	3.346	6.3	20.4
5 11	15 29.57	-20 51.2	1.844	2.851	1.8	18.8	5 11	15 29.71	-30 40.8	2.350	3.340	4.0	20.2
5 21	15 20.35	-20 0.7	1.847	2.853	2.6	18.9	5 21	15 20.12	-30 44.4	2.339	3.334	3.8	20.2
5 31	15 11.85	-19 9.8	1.877	2.855	6.6	19.1	5 31	15 10.97	-30 38.1	2.357	3.328	6.0	20.3
6 10	15 4.92	-18 23.3	1.934	2.857	10.3	19.4	6 10	15 3.10	-30 25.1	2.402	3.321	8.8	20.5
6 20	15 0.10	-17 45.0	2.013	2.858	13.5	19.6	6 20	14 57.09	-30 9.1	2.471	3.314	11.4	20.7
130560	2000 <i>RL</i> ₃₂		5 14.6 275°92	1°7/13.6	17		4084	Hollis		5 14.6 290°95	1°0/14.0	18	
4 11	15 51.10	-18 15.7	1.435	2.307	15.6	19.2	4 11	15 49.71	-17 0.2	2.042	2.900	12.2	16.8
4 21	15 46.32	-17 23.2	1.360	2.299	11.6	18.9	4 21	15 44.59	-16 44.5	1.966	2.899	9.0	16.6
5 1	15 38.88	-16 20.2	1.306	2.292	6.9	18.6	5 1	15 37.56	-16 24.3	1.914	2.897	5.3	16.4
5 11	15 29.72	-15 11.1	1.277	2.285	2.2	18.3	5 11	15 29.35	-16 1.6	1.888	2.896	1.6	16.1
5 21	15 20.06	-14 2.1	1.273	2.277	4.3	18.4	5 21	15 20.81	-15 39.0	1.890	2.895	3.0	16.2
5 31	15 11.24	-13 0.4	1.295	2.270	9.3	18.7	5 31	15 12.87	-15 19.6	1.920	2.894	6.9	16.4
6 10	15 4.40	-12 12.2	1.340	2.262	14.0	18.9	6 10	15 6.34	-15 6.5	1.975	2.893	10.4	16.6
6 20	15 0.25	-11 41.1	1.404	2.255	17.9	19.1	6 20	15 1.76	-15 1.6	2.052	2.891	13.5	16.8
214501	2005 <i>WZ</i> ₁₉₂		5 14.6 293°89	4°4/11.6	18		520018	2013 <i>UE</i> ₂₁		5 14.6 207°03	0°8/14.1	17	
4 11	15 48.03	-7 27.1	2.193	3.054	11.4	20.3	4 11	15 51.75	-17 36.9	2.031	2.885	12.4	21.9
4 21	15 43.33	-6 46.8	2.099	3.029	8.7	20.1	4 21	15 46.13	-17 21.9	1.951	2.882	9.2	21.7
5 1	15 36.84	-6 7.7	2.029	3.004	5.9	19.9	5 1	15 38.51	-17 1.7	1.896	2.878	5.4	21.4
5 11	15 29.16	-5 33.8	1.986	2.979	4.4	19.7	5 11	15 29.62	-16 38.2	1.866	2.875	1.5	21.1
5 21	15 21.02	-5 8.8	1.970	2.953	5.7	19.8	5 21	15 20.35	-16 13.9	1.865	2.870	3.0	21.2
5 31	15 13.27	-4 55.9	1.981	2.928	8.6	19.9	5 31	15 11.69	-15 52.0	1.892	2.866	6.9	21.5
6 10	15 6.69	-4 56.9	2.016	2.903	11.7	20.1	6 10	15 4.50	-15 35.9	1.944	2.861	10.6	21.7
6 20	15 1.87	-5 12.3	2.072	2.878	14.6	20.2	6 20	14 59.34	-15 28.0	2.019	2.856	13.8	21.9
392668	2011 <i>UE</i> ₃₀₂		5 14.6 234°29	2°7/16.1	18								

EPHEMERIDES

5 14.6

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
398487	2011 <i>UJ</i> ₁₅₃		5 14.6 288°89	0°9/14.2 18			424021	2006 <i>XX</i> ₁₅		5 14.6 193°53	2°5/16.2 17		
4 11	15 51.83	-15 29.3	2.165	3.018	11.8	20.5	4 11	15 53.42	-27 54.9	1.995	2.826	13.6	21.6
4 21	15 46.26	-15 42.0	2.069	2.999	8.8	20.3	4 21	15 47.50	-27 36.3	1.912	2.824	10.4	21.4
5 1	15 38.67	-15 53.2	1.997	2.979	5.3	20.0	5 1	15 39.38	-27 3.5	1.852	2.822	6.8	21.2
5 11	15 29.70	-16 3.6	1.952	2.960	1.6	19.7	5 11	15 29.89	-26 16.9	1.818	2.820	3.3	21.0
5 21	15 20.18	-16 14.4	1.936	2.941	2.9	19.8	5 21	15 20.05	-25 19.3	1.812	2.817	3.2	21.0
5 31	15 11.05	-16 27.2	1.948	2.922	6.8	20.0	5 31	15 10.93	-24 15.4	1.834	2.813	6.7	21.2
6 10	15 3.21	-16 43.7	1.986	2.903	10.4	20.2	6 10	15 3.49	-23 11.4	1.882	2.809	10.4	21.4
6 20	14 57.30	-17 5.5	2.047	2.884	13.6	20.3	6 20	14 58.30	-22 13.0	1.953	2.804	13.6	21.6
342236	2008 <i>SU</i> ₂₇₂		5 14.6 233°84	0°2/14.7 18			341891	2008 <i>HK</i> ₁₈		5 14.6 270°69	2°4/11.7 17		
4 11	15 51.58	-19 32.4	1.944	2.798	12.9	20.6	4 11	15 41.35	-7 4.5	4.393	5.243	6.3	21.3
4 21	15 46.11	-19 33.6	1.867	2.797	9.6	20.4	4 21	15 37.64	-6 40.5	4.312	5.236	4.8	21.2
5 1	15 38.54	-19 28.8	1.814	2.796	5.7	20.2	5 1	15 33.15	-6 18.0	4.258	5.229	3.2	21.1
5 11	15 29.64	-19 19.0	1.787	2.795	1.6	19.9	5 11	15 28.20	-5 58.6	4.232	5.222	2.4	21.0
5 21	15 20.35	-19 6.0	1.787	2.794	2.7	20.0	5 21	15 23.11	-5 43.8	4.235	5.216	3.1	21.0
5 31	15 11.69	-18 52.7	1.815	2.793	6.8	20.2	5 31	15 18.26	-5 34.6	4.268	5.209	4.6	21.1
6 10	15 4.58	-18 42.4	1.868	2.791	10.6	20.5	6 10	15 13.96	-5 32.0	4.327	5.202	6.2	21.2
6 20	14 59.59	-18 37.8	1.943	2.790	13.8	20.7	6 20	15 10.47	-5 36.3	4.410	5.195	7.7	21.4
239741	2009 <i>FF</i> ₇		5 14.6 328°43	2°0/13.5 16			380860	2006 <i>BL</i> ₁₄₀		5 14.6 315°52	2°6/13.2 17		
4 11	15 47.86	-14 47.3	1.785	2.654	13.2	20.0	4 11	15 49.96	-13 48.2	1.662	2.532	13.9	20.7
4 21	15 43.55	-14 26.3	1.703	2.641	9.7	19.8	4 21	15 45.17	-13 17.3	1.587	2.526	10.3	20.5
5 1	15 37.12	-14 1.9	1.644	2.629	5.8	19.5	5 1	15 38.11	-12 43.2	1.535	2.520	6.3	20.2
5 11	15 29.30	-13 36.9	1.611	2.618	2.3	19.3	5 11	15 29.59	-12 9.7	1.509	2.514	2.8	20.0
5 21	15 21.01	-13 14.6	1.604	2.606	3.9	19.4	5 21	15 20.65	-11 40.5	1.508	2.509	4.5	20.1
5 31	15 13.29	-12 58.6	1.623	2.596	8.0	19.6	5 31	15 12.39	-11 20.0	1.534	2.503	8.7	20.3
6 10	15 7.08	-12 51.9	1.666	2.586	11.9	19.8	6 10	15 5.80	-11 11.1	1.582	2.498	12.7	20.5
6 20	15 3.01	-12 56.2	1.730	2.576	15.3	20.0	6 20	15 1.52	-11 15.3	1.652	2.493	16.1	20.7
269958	2000 <i>SR</i> ₂₃₂		5 14.6 187°84	9°0/ 5.6 17			272879	2006 <i>BB</i> ₉₅		5 14.6 289°55	1°2/15.3 17		
4 11	15 49.94	+ 4 5.1	2.164	3.004	12.3	20.7	4 11	15 50.68	-23 15.0	1.806	2.659	13.8	20.7
4 21	15 44.53	+ 6 19.7	2.107	3.003	10.4	20.6	4 21	15 45.71	-23 5.5	1.723	2.650	10.4	20.5
5 1	15 37.44	+ 8 25.7	2.077	3.002	9.2	20.5	5 1	15 38.45	-22 45.5	1.662	2.642	6.5	20.2
5 11	15 29.34	+10 14.8	2.074	3.001	9.2	20.5	5 11	15 29.69	-22 15.9	1.627	2.633	2.3	19.9
5 21	15 21.00	+11 40.6	2.097	2.999	10.5	20.6	5 21	15 20.46	-21 39.2	1.618	2.625	2.9	19.9
5 31	15 13.25	+12 39.4	2.145	2.997	12.5	20.7	5 31	15 11.87	-20 59.6	1.636	2.617	7.1	20.2
6 10	15 6.80	+13 10.6	2.214	2.994	14.5	20.8	6 10	15 4.94	-20 22.2	1.679	2.609	11.2	20.4
6 20	15 2.12	+13 16.3	2.301	2.991	16.4	21.0	6 20	15 0.31	-19 51.5	1.744	2.601	14.7	20.6
248221	2005 <i>EF</i> ₁₇₈		5 14.6 145°05	0°5/14.8 17			153701	2001 <i>UT</i> ₄₆		5 14.6 169°50	1°0/13.9 18		
4 11	15 54.09	-21 47.6	1.665	2.518	14.7	21.0	4 11	15 52.31	-17 19.9	2.124	2.975	12.1	21.1
4 21	15 48.16	-21 25.9	1.596	2.525	11.0	20.8	4 21	15 46.40	-16 55.2	2.049	2.978	8.9	20.9
5 1	15 39.82	-20 53.7	1.549	2.531	6.6	20.6	5 1	15 38.62	-16 25.3	1.999	2.982	5.3	20.7
5 11	15 30.00	-20 12.9	1.529	2.536	1.9	20.3	5 11	15 29.70	-15 52.6	1.976	2.984	1.6	20.5
5 21	15 19.85	-19 27.2	1.535	2.542	3.0	20.4	5 21	15 20.50	-15 19.8	1.982	2.986	3.0	20.6
5 31	15 10.58	-18 41.7	1.568	2.547	7.6	20.7	5 31	15 11.94	-14 50.4	2.016	2.988	6.8	20.8
6 10	15 3.22	-18 1.6	1.626	2.551	11.8	20.9	6 10	15 4.82	-14 27.7	2.076	2.989	10.2	21.0
6 20	14 58.35	-17 31.1	1.705	2.555	15.3	21.1	6 20	14 59.65	-14 13.9	2.159	2.989	13.2	21.2
24449	2000 <i>QL</i> ₆₃		5 14.6 212°84	7°0/ 1.5 18			371617	2006 <i>XP</i> ₆₀		5 14.6 250°34	4°1/16.9 18		
4 11	15 41.13	+21 39.2	4.705	5.449	7.6	19.5	4 11	15 54.26	-30 55.2	1.913	2.736	14.4	21.7
4 21	15 37.44	+22 37.6	4.664	5.447	7.2	19.5	4 21	15 48.50	-30 58.6	1.817	2.720	11.4	21.5
5 1	15 33.00	+23 25.0	4.646	5.445	7.0	19.4	5 1	15 40.21	-30 46.1	1.743	2.704	8.0	21.2
5 11	15 28.13	+23 59.0	4.651	5.443	7.1	19.4	5 11	15 30.19	-30 16.3	1.694	2.687	4.9	21.0
5 21	15 23.14	+24 18.1	4.679	5.442	7.6	19.5	5 21	15 19.55	-29 30.0	1.671	2.670	4.5	20.9
5 31	15 18.40	+24 21.7	4.728	5.440	8.2	19.5	5 31	15 9.54	-28 31.4	1.676	2.652	7.4	21.1
6 10	15 14.23	+24 10.4	4.796	5.438	8.8	19.6	6 10	15 1.29	-27 27.0	1.707	2.634	11.2	21.3
6 20	15 10.87	+23 45.5	4.881	5.436	9.5	19.6	6 20	14 55.53	-26 23.9	1.759	2.616	14.6	21.4
46613	1993 <i>TA</i> ₁₇		5 14.6 249°68	2°7/12.6 18			426222	2012 <i>LS</i> ₁₅		5 14.6 39°92	7°2/11.2 17		
4 11	15 49.32	-12 38.9	2.319	3.175	11.0	19.6	4 11	15 50.01	-4 50.0	1.334	2.213	16.1	20.3
4 21	15 44.17	-11 53.0	2.227	3.158	8.2	19.4	4 21	15 45.27	-3 47.1	1.289	2.226	12.3	20.1
5 1	15 37.30	-11 4.1	2.161	3.141	5.1	19.2	5 1	15 38.11	-2 51.4	1.266	2.240	8.9	20.0
5 11	15 29.33	-10 15.6	2.122	3.124	2.8	19.0	5 11	15 29.56	-2 9.8	1.266	2.254	7.2	19.9
5 21	15 20.98	-9 31.3	2.112	3.106	4.2	19.1	5 21	15 20.83	-1 47.6	1.290	2.268	8.7	20.0
5 31	15 13.08	-8 54.8	2.130	3.088	7.4	19.2	5 31	15 13.13	-1 47.9	1.338	2.284	12.0	20.2
6 10	15 6.35	-8 29.0	2.173	3.069	10.6	19.4	6 10	15 7.42	-2 10.2	1.406	2.299	15.4	20.5
6 20	15 1.35	-8 15.6	2.239	3.050	13.4	19.5	6 20	15 4.22	-2 51.9	1.492	2.315	18.4	20.7
474859	2005 <i>SR</i> ₁₀₁		5 14.6 196°04	0°3/14.3 16			253632	2003 <i>UK</i> ₁₀₂		5 14.6 233°71	1°6/13.9 16		
4 11	15 47.80	-19 52.3	2.630	3.476	10.2	22.0	4 11	15 54.84	-15 16.3	1.818	2.674	13.6	21.4
4 21	15 42.82	-19 19.0	2.548	3.474	7.5	21.8	4 21	15 48.74	-15 6.4	1.731	2.662	10.1	21.2
5 1	15 36.39	-18 39.2	2.491	3.473	4.4	21.6	5 1	15 40.27	-14 53.2	1.667	2.650	6.1	20.9
5 11	15 29.06	-17 55.2	2.462	3.471	1.2	21.3	5 11	15 30.20	-14 38.5	1.630	2.637	2.1	20.6
5 21	15 21.52	-17 9.6	2.463	3.468	2.3	21.4	5 21	15 19.56	-14 24.9	1.621	2.624	3.7	20.7
5 31	15 14.45	-16 25.6	2.492	3.466	5.5	21.6	5 31	15 9.50	-14 15.6	1.638	2.610	8.0	20.9
6 10	15 8.49	-15 46.6	2.548	3.463	8.5	21.8	6 10	15 1.07	-14 13.5	1.681	2.596	12.1	21.1
6 20	15 4.07	-15 15.0	2.628	3.460	11.1	22.0	6 20	14 54.98	-14 20.7	1.746	2.580	15.7	21.3
181348	2006 <i>RM</i> ₃₀		5 14.6 174°02	1°0/15.2 17			410351	2007 <i>VJ</i> ₅ </					

EPHEMERIDES

5 14.6

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
352591	2008 <i>ED</i> ₂₄		5 14.6 47°23	2°0/15.7	17		302806	2003 <i>AH</i> ₈₃		5 14.6 268°94	3°4/16.5	17	
4 11	15 51.65	-24 4.6	2.163	3.002	12.3	20.6	4 11	15 52.39	-28 24.2	2.239	3.063	12.5	21.4
4 21	15 46.05	-24 29.5	2.089	3.008	9.3	20.4	4 21	15 46.78	-28 51.5	2.146	3.052	9.8	21.2
5 1	15 38.49	-24 46.6	2.039	3.013	6.0	20.2	5 1	15 39.06	-29 8.5	2.076	3.040	6.7	21.0
5 11	15 29.68	-24 55.3	2.016	3.019	2.7	20.0	5 11	15 29.90	-29 13.8	2.033	3.028	4.0	20.8
5 21	15 20.53	-24 56.3	2.021	3.025	2.9	20.0	5 21	15 20.21	-29 7.5	2.017	3.016	3.8	20.8
5 31	15 11.98	-24 51.6	2.053	3.031	6.1	20.2	5 31	15 10.99	-28 51.5	2.029	3.004	6.5	20.9
6 10	15 4.87	-24 44.5	2.112	3.038	9.4	20.5	6 10	15 3.18	-28 29.7	2.068	2.992	9.7	21.1
6 20	14 59.77	-24 38.1	2.193	3.044	12.4	20.7	6 20	14 57.45	-28 6.5	2.129	2.979	12.7	21.3
426259	2012 <i>QG</i> ₂₅		5 14.6 311°01	3°4/16.5	18		60880	2000 <i>HG</i> ₉₀		5 14.6 247°40	1°1/13.9	18	
4 11	15 51.66	-28 22.7	1.861	2.697	14.2	21.0	4 11	15 51.87	-17 30.0	1.946	2.802	12.8	19.8
4 21	15 46.44	-28 31.7	1.781	2.694	11.0	20.8	4 21	15 46.43	-17 1.3	1.856	2.788	9.5	19.6
5 1	15 38.89	-28 27.3	1.723	2.691	7.4	20.6	5 1	15 38.84	-16 26.1	1.790	2.773	5.7	19.3
5 11	15 29.82	-28 8.8	1.690	2.688	4.1	20.4	5 11	15 29.84	-15 46.9	1.750	2.758	1.7	19.0
5 21	15 20.30	-27 37.6	1.684	2.685	3.9	20.3	5 21	15 20.35	-15 7.0	1.738	2.743	3.3	19.1
5 31	15 11.48	-26 57.4	1.704	2.683	7.1	20.5	5 31	15 11.41	-14 30.7	1.754	2.727	7.5	19.3
6 10	15 4.38	-26 13.8	1.749	2.680	10.7	20.7	6 10	15 3.95	-14 2.0	1.795	2.710	11.4	19.5
6 20	14 59.65	-25 32.3	1.817	2.678	14.1	20.9	6 20	14 58.62	-13 43.7	1.857	2.694	14.8	19.7
382970	2004 <i>XE</i> ₁₃₅		5 14.6 136°40	1°9/13.6	18		149170	2002 <i>GT</i> ₁₂₂		5 14.6 124°34	0°1/14.6	18	
4 11	15 52.91	-13 21.9	2.182	3.033	11.8	21.0	4 11	15 49.36	-19 10.3	2.637	3.481	10.2	20.5
4 21	15 46.75	-13 15.9	2.114	3.043	8.7	20.8	4 21	15 43.95	-19 3.3	2.565	3.490	7.5	20.3
5 1	15 38.79	-13 8.7	2.070	3.052	5.2	20.6	5 1	15 37.07	-18 51.6	2.519	3.500	4.5	20.1
5 11	15 29.76	-13 2.4	2.055	3.060	2.1	20.4	5 11	15 29.31	-18 36.4	2.501	3.509	1.2	19.9
5 21	15 20.48	-12 58.7	2.068	3.069	3.4	20.5	5 21	15 21.35	-18 19.5	2.511	3.517	2.1	20.0
5 31	15 11.84	-12 59.8	2.109	3.077	6.8	20.8	5 31	15 13.90	-18 3.1	2.551	3.526	5.3	20.2
6 10	15 4.59	-13 7.2	2.176	3.084	10.1	21.0	6 10	15 7.59	-17 49.5	2.618	3.534	8.2	20.4
6 20	14 59.23	-13 22.1	2.267	3.091	12.9	21.2	6 20	15 2.84	-17 40.9	2.708	3.543	10.8	20.6
302050	2000 <i>TX</i> ₂₄		5 14.6 242°28	0°6/14.2	18		437231	2012 <i>XX</i> ₅		5 14.6 233°84	3°9/12.1	17	
4 11	15 50.39	-16 49.2	2.446	3.294	10.8	20.4	4 11	15 49.78	-7 50.0	2.267	3.123	11.2	21.8
4 21	15 44.92	-16 49.4	2.358	3.286	7.9	20.2	4 21	15 44.48	-7 20.4	2.188	3.116	8.5	21.7
5 1	15 37.75	-16 46.4	2.296	3.278	4.7	20.0	5 1	15 37.50	-6 52.8	2.133	3.109	5.7	21.5
5 11	15 29.50	-16 41.4	2.261	3.269	1.3	19.7	5 11	15 29.45	-6 30.5	2.106	3.101	3.9	21.3
5 21	15 20.89	-16 35.9	2.255	3.260	2.5	19.8	5 21	15 21.08	-6 16.3	2.107	3.093	5.1	21.4
5 31	15 12.71	-16 31.9	2.278	3.251	6.0	20.0	5 31	15 13.20	-6 12.7	2.135	3.086	7.9	21.6
6 10	15 5.71	-16 31.6	2.327	3.242	9.2	20.2	6 10	15 6.55	-6 20.9	2.189	3.077	10.8	21.7
6 20	15 0.39	-16 36.6	2.400	3.233	12.0	20.4	6 20	15 1.61	-6 40.9	2.264	3.069	13.5	21.9
207707	2007 <i>RB</i> ₉₂		5 14.6 115°76	1°6/13.5	17		301912	1999 <i>BU</i> ₃₁		5 14.6 108°21	0°3/14.7	16	
4 11	15 50.24	-14 58.7	2.326	3.179	11.1	21.5	4 11	15 54.79	-20 35.8	1.426	2.290	16.2	21.6
4 21	15 44.66	-14 32.0	2.263	3.193	8.1	21.4	4 21	15 49.02	-20 23.8	1.363	2.297	12.0	21.4
5 1	15 37.48	-14 2.5	2.224	3.207	4.8	21.2	5 1	15 40.50	-20 2.2	1.321	2.304	7.2	21.1
5 11	15 29.40	-13 32.7	2.214	3.220	1.9	21.0	5 11	15 30.28	-19 32.6	1.303	2.311	2.0	20.8
5 21	15 21.15	-13 5.2	2.232	3.233	3.2	21.1	5 21	15 19.67	-18 58.5	1.311	2.318	3.3	20.9
5 31	15 13.53	-12 42.9	2.279	3.246	6.4	21.3	5 31	15 10.08	-18 25.0	1.345	2.325	8.4	21.3
6 10	15 7.19	-12 28.1	2.352	3.259	9.4	21.5	6 10	15 2.65	-17 57.6	1.402	2.332	13.0	21.5
6 20	15 2.56	-12 22.1	2.447	3.271	12.1	21.7	6 20	14 58.04	-17 40.0	1.480	2.338	16.8	21.8
389553	2010 <i>RY</i> ₁₁₃		5 14.6 342°89	9°8/18.6	16		348814	2006 <i>QN</i> ₁₈₆		5 14.6 160°39	0°2/14.7	17	
4 11	15 52.45	-40 8.1	1.699	2.495	17.0	19.7	4 11	15 49.64	-20 32.3	2.372	3.218	11.2	21.9
4 21	15 47.96	-41 33.5	1.615	2.482	14.6	19.5	4 21	15 44.35	-20 16.7	2.295	3.220	8.2	21.7
5 1	15 40.31	-42 40.2	1.551	2.469	12.2	19.3	5 1	15 37.39	-19 54.6	2.242	3.223	4.9	21.5
5 11	15 30.32	-43 22.1	1.509	2.458	10.3	19.2	5 11	15 29.41	-19 27.5	2.217	3.225	1.4	21.3
5 21	15 19.32	-43 35.5	1.490	2.447	9.8	19.1	5 21	15 21.17	-18 57.5	2.221	3.227	2.3	21.3
5 31	15 8.96	-43 21.0	1.494	2.438	11.1	19.2	5 31	15 13.49	-18 27.7	2.253	3.229	5.8	21.6
6 10	15 0.76	-42 44.6	1.519	2.430	13.4	19.3	6 10	15 7.07	-18 1.4	2.311	3.231	9.0	21.8
6 20	14 55.73	-41 54.5	1.565	2.422	16.1	19.5	6 20	15 2.38	-17 41.1	2.393	3.232	11.8	22.0
497657	2006 <i>RQ</i> ₆₇		5 14.6 298°12	4°4/16.8	17		48657	1995 <i>WK</i>		5 14.6 169°65	1°0/14.1	18	
4 11	15 52.22	-29 47.6	1.446	2.293	17.0	21.5	4 11	15 54.77	-16 30.1	1.855	2.709	13.4	19.6
4 21	15 47.62	-29 54.7	1.360	2.278	13.4	21.2	4 21	15 48.50	-16 24.9	1.782	2.712	9.9	19.4
5 1	15 39.97	-29 43.5	1.294	2.263	9.3	21.0	5 1	15 40.02	-16 15.7	1.732	2.715	5.9	19.1
5 11	15 30.19	-29 12.1	1.251	2.249	5.4	20.7	5 11	15 30.14	-16 4.0	1.709	2.717	1.7	18.9
5 21	15 19.63	-28 21.9	1.233	2.235	5.0	20.6	5 21	15 19.89	-15 52.3	1.714	2.719	3.2	19.0
5 31	15 9.87	-27 18.2	1.239	2.221	8.8	20.8	5 31	15 10.35	-15 43.2	1.746	2.720	7.4	19.2
6 10	15 2.29	-26 9.7	1.268	2.207	13.3	21.0	6 10	15 2.47	-15 39.9	1.804	2.720	11.3	19.5
6 20	14 57.75	-25 4.9	1.317	2.194	17.4	21.2	6 20	14 56.87	-15 44.2	1.883	2.721	14.6	19.7
247724	2003 <i>FM</i> ₉₈		5 14.6 336°08	6°8/18.5	18		200262	1999 <i>XO</i> ₄₆		5 14.6 202°73	1°4/13.9	18	
4 11	15 51.08	-36 47.4	1.932	2.736	14.9	19.6	4 11	15 53.41	-14 9.3	2.400	3.246	11.0	20.7
4 21	15 46.28	-37 27.1	1.847	2.727	12.4	19.5	4 21	15 47.12	-14 11.2	2.315	3.242	8.1	20.5
5 1	15 38.94	-37 49.3	1.782	2.719	9.7	19.3	5 1	15 39.07	-14 11.7	2.256	3.237	4.9	20.3
5 11	15 29.88	-37 50.9	1.741	2.711	7.4	19.1	5 11	15 29.88	-14 12.3	2.225	3.232	1.8	20.1
5 21	15 20.21	-37 31.1	1.725	2.704	6.9	19.1	5 21	15 20.33	-14 14.3	2.223	3.226	3.0	20.2
5 31	15 11.20	-36 52.6	1.734	2.697	8.5	19.1	5 31	15 11.26	-14 19.3	2.251	3.220	6.4	20.4
6 10	15 4.00	-36 1.2	1.768	2.690	11.2	19.3	6 10	15 3.43	-14 29.3	2.305	3.213	9.6	20.6
6 20	14 59.34	-35 3.9	1.823	2.685	14.0	19.4	6 20	14 57.38	-14 45.2	2.383	3.205	12.4	20.8
273859	2007 <i>GD</i> ₅₈		5 14.6 298°05	2°5/13.3	17		349422	2008 <i>AG</i> ₂₉		5			

EPHEMERIDES

5 14.6

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
275108	2009 VO ₄₃		5 14.6 182°34	2.4/13.1	17		431135	2006 KD ₈₈		5 14.6 327°97	1.9/13.9	17	
4 11	15 50.94	-14 17.6	1.940	2.800	12.7	20.9	4 11	15 51.61	-13 34.0	1.695	2.561	13.9	20.2
4 21	15 45.55	-13 38.0	1.867	2.801	9.3	20.7	4 21	15 46.46	-13 40.4	1.616	2.553	10.3	19.9
5 1	15 38.21	-12 54.8	1.818	2.801	5.6	20.5	5 1	15 38.98	-13 46.4	1.560	2.544	6.2	19.7
5 11	15 29.65	-12 11.4	1.795	2.801	2.5	20.3	5 11	15 29.92	-13 53.7	1.530	2.537	2.3	19.4
5 21	15 20.78	-11 31.8	1.801	2.800	4.1	20.4	5 21	15 20.34	-14 4.0	1.526	2.529	3.9	19.5
5 31	15 12.58	-10 59.9	1.833	2.799	7.8	20.6	5 31	15 11.37	-14 19.4	1.548	2.522	8.1	19.7
6 10	15 5.87	-10 38.8	1.891	2.798	11.3	20.8	6 10	15 4.06	-14 41.6	1.594	2.516	12.2	19.9
6 20	15 1.20	-10 30.2	1.970	2.797	14.4	21.0	6 20	14 59.09	-15 11.7	1.662	2.510	15.8	20.2
433822	2015 BH ₁₈₂		5 14.6 91°62	5.2/17.4	17		507787	2014 AT ₅₆		5 14.6 208°50	1.6/13.5	17	
4 11	15 54.64	-32 9.1	1.759	2.582	15.4	21.2	4 11	15 49.75	-15 39.6	2.260	3.114	11.3	21.8
4 21	15 48.84	-32 38.4	1.686	2.586	12.3	21.0	4 21	15 44.50	-15 5.5	2.179	3.110	8.3	21.6
5 1	15 40.41	-32 51.3	1.635	2.591	8.9	20.8	5 1	15 37.53	-14 27.3	2.124	3.106	5.0	21.4
5 11	15 30.28	-32 45.6	1.608	2.595	5.9	20.7	5 11	15 29.49	-13 47.6	2.095	3.102	1.9	21.2
5 21	15 19.67	-32 21.7	1.606	2.600	5.5	20.6	5 21	15 21.15	-13 9.6	2.096	3.097	3.3	21.3
5 31	15 9.92	-31 43.3	1.631	2.604	7.9	20.8	5 31	15 13.35	-12 36.8	2.124	3.092	6.7	21.5
6 10	15 2.15	-30 56.7	1.680	2.608	11.3	21.0	6 10	15 6.82	-12 12.1	2.178	3.087	10.0	21.7
6 20	14 57.06	-30 8.8	1.752	2.613	14.5	21.2	6 20	15 2.06	-11 57.5	2.255	3.081	12.9	21.9
93616	2000 UW ₆₆		5 14.6 222°40	0.4/14.9	18		72135	2000 YS ₇₉		5 14.6 47°65	0.4/14.8	18	
4 11	15 50.37	-23 14.8	1.837	2.689	13.6	19.6	4 11	15 52.40	-21 20.6	1.263	2.135	17.3	19.0
4 21	15 45.32	-22 26.7	1.760	2.688	10.2	19.3	4 21	15 47.43	-21 1.7	1.209	2.148	12.8	18.7
5 1	15 38.13	-21 25.9	1.705	2.686	6.1	19.1	5 1	15 39.60	-20 31.4	1.176	2.161	7.7	18.5
5 11	15 29.64	-20 15.3	1.677	2.685	1.8	18.8	5 11	15 30.06	-19 52.1	1.166	2.174	2.2	18.2
5 21	15 20.83	-18 59.5	1.676	2.683	2.8	18.9	5 21	15 20.24	-19 8.4	1.181	2.188	3.5	18.3
5 31	15 12.77	-17 44.7	1.703	2.681	7.1	19.1	5 31	15 11.59	-18 26.4	1.220	2.203	8.7	18.6
6 10	15 6.36	-16 37.2	1.755	2.680	11.1	19.4	6 10	15 5.25	-17 52.2	1.282	2.218	13.4	18.9
6 20	15 2.15	-15 41.4	1.829	2.678	14.5	19.6	6 20	15 1.83	-17 29.7	1.363	2.233	17.3	19.2
167461	2003 YX ₁₅		5 14.6 144°38	1.9/13.5	18		290238	2005 SR ₈₁		5 14.6 269°78	0.1/14.7	16	
4 11	15 51.71	-13 2.4	2.291	3.143	11.3	20.2	4 11	15 48.96	-20 6.0	2.302	3.151	11.3	21.5
4 21	15 45.84	-12 55.8	2.220	3.149	8.3	20.0	4 21	15 43.99	-19 53.5	2.216	3.143	8.4	21.3
5 1	15 38.27	-12 48.5	2.174	3.155	5.0	19.8	5 1	15 37.27	-19 34.8	2.154	3.135	5.0	21.1
5 11	15 29.66	-12 42.2	2.155	3.161	2.1	19.6	5 11	15 29.43	-19 11.1	2.119	3.127	1.4	20.8
5 21	15 20.79	-12 38.7	2.166	3.166	3.4	19.7	5 21	15 21.24	-18 44.6	2.113	3.119	2.4	20.9
5 31	15 12.50	-12 40.1	2.204	3.171	6.6	19.9	5 31	15 13.54	-18 18.2	2.134	3.111	6.0	21.1
6 10	15 5.50	-12 48.0	2.269	3.176	9.8	20.1	6 10	15 7.09	-17 55.3	2.182	3.103	9.4	21.3
6 20	15 0.29	-13 3.2	2.357	3.180	12.5	20.3	6 20	15 2.41	-17 38.4	2.252	3.095	12.4	21.5
191681	2004 RJ ₇₅		5 14.6 290°98	4.9/11.6	17		234382	2001 QC ₆₇		5 14.6 303°73	4.2/15.9	17	
4 11	15 49.37	- 9 25.5	1.705	2.576	13.6	20.2	4 11	15 53.53	-25 59.8	1.220	2.084	18.3	19.9
4 21	15 44.81	- 8 24.9	1.617	2.554	10.3	19.9	4 21	15 49.41	-26 35.8	1.123	2.053	14.4	19.5
5 1	15 38.00	- 7 22.7	1.553	2.532	6.9	19.7	5 1	15 41.59	-26 59.4	1.045	2.022	9.7	19.2
5 11	15 29.65	- 6 24.3	1.514	2.510	4.9	19.5	5 11	15 30.83	-27 7.3	0.990	1.992	5.2	18.8
5 21	15 20.73	- 5 35.6	1.500	2.488	6.6	19.6	5 21	15 18.53	-26 57.8	0.957	1.961	5.2	18.7
5 31	15 12.34	- 5 1.8	1.513	2.466	10.3	19.7	5 31	15 6.64	-26 33.5	0.947	1.931	10.4	18.9
6 10	15 5.49	- 4 46.3	1.547	2.444	14.1	19.9	6 10	14 57.10	-26 1.7	0.958	1.901	16.0	19.1
6 20	15 0.87	- 4 50.0	1.602	2.422	17.5	20.1	6 20	14 51.23	-25 31.0	0.986	1.872	21.2	19.3
11608	1995 WU ₄		5 14.6 214°63	4.4/17.8	18		250354	Lewicdeparis		5 14.6 222°55	0.7/14.9	17	
4 11	15 53.60	-33 54.7	2.377	3.177	12.6	19.2	4 11	15 54.69	-21 54.6	1.908	2.753	13.5	22.1
4 21	15 47.56	-33 59.3	2.285	3.170	10.1	19.1	4 21	15 48.61	-21 42.1	1.819	2.743	10.1	21.8
5 1	15 39.45	-33 48.8	2.215	3.162	7.4	18.9	5 1	15 40.20	-21 20.1	1.753	2.732	6.2	21.6
5 11	15 30.01	-33 22.1	2.171	3.154	5.1	18.7	5 11	15 30.26	-20 49.7	1.714	2.721	1.9	21.3
5 21	15 20.17	-32 39.9	2.154	3.145	4.6	18.7	5 21	15 19.79	-20 13.3	1.703	2.709	2.8	21.3
5 31	15 10.93	-31 45.5	2.166	3.136	6.5	18.8	5 31	15 9.94	-19 34.9	1.719	2.697	7.2	21.6
6 10	15 3.18	-30 44.3	2.205	3.126	9.3	18.9	6 10	15 1.72	-18 59.3	1.762	2.684	11.2	21.8
6 20	14 57.51	-29 41.9	2.268	3.116	12.1	19.1	6 20	14 55.82	-18 30.9	1.826	2.670	14.7	22.0
158475	2002 CW ₃₀₃		5 14.6 224°97	1.1/13.9	17		173898	2001 UN ₁₄₁		5 14.6 124°12	0.6/14.1	18	
4 11	15 50.89	-17 26.5	1.861	2.721	13.1	20.7	4 11	15 49.17	-18 29.9	2.467	3.315	10.7	20.9
4 21	15 45.67	-17 0.7	1.785	2.719	9.7	20.5	4 21	15 43.87	-18 0.8	2.398	3.326	7.8	20.8
5 1	15 38.36	-16 29.1	1.732	2.716	5.7	20.2	5 1	15 37.05	-17 26.4	2.354	3.336	4.6	20.6
5 11	15 29.72	-15 54.1	1.706	2.714	1.7	19.9	5 11	15 29.34	-16 48.9	2.339	3.347	1.3	20.3
5 21	15 20.72	-15 19.1	1.707	2.711	3.3	20.1	5 21	15 21.47	-16 11.1	2.352	3.357	2.5	20.5
5 31	15 12.38	-14 48.1	1.734	2.708	7.4	20.3	5 31	15 14.17	-15 35.9	2.393	3.366	5.8	20.7
6 10	15 5.60	-14 24.9	1.787	2.706	11.3	20.5	6 10	15 8.07	-15 6.6	2.462	3.375	8.8	20.9
6 20	15 0.97	-14 12.0	1.861	2.703	14.6	20.7	6 20	15 3.61	-14 45.0	2.553	3.384	11.4	21.1
429149	2009 UU ₁₀₂		5 14.6 170°10	1.9/15.7	17		249312	2008 UX ₁₆₄		5 14.6 19°67	1.3/13.7	17	
4 11	15 55.13	-24 39.6	2.401	3.228	11.7	22.2	4 11	15 48.22	-20 7.1	1.612	2.480	14.4	19.5
4 21	15 48.46	-24 54.8	2.321	3.232	8.9	22.0	4 21	15 43.87	-18 54.3	1.545	2.483	10.6	19.3
5 1	15 39.89	-25 1.7	2.265	3.236	5.7	21.8	5 1	15 37.31	-17 30.0	1.501	2.486	6.2	19.0
5 11	15 30.12	-25 0.0	2.237	3.240	2.6	21.6	5 11	15 29.44	-15 59.2	1.482	2.490	1.8	18.8
5 21	15 20.01	-24 50.4	2.238	3.242	2.7	21.6	5 21	15 21.32	-14 28.7	1.490	2.495	3.7	18.9
5 31	15 10.48	-24 35.3	2.268	3.244	5.8	21.8	5 31	15 14.05	-13 5.9	1.525	2.500	8.2	19.2
6 10	15 2.33	-24 18.0	2.326	3.245	9.0	22.0	6 10	15 8.51	-11 57.2	1.584	2.505	12.3	19.4
6 20	14 56.11	-24 1.9	2.407	3.246	11.8	22.2	6 20	15 5.26	-11 5.9	1.663	2.511	15.8	19.7
415114	2012 CB ₅₂		5 14.6 132°05	0.2/14.7	17		129385	4041 T ₋₁		5 14.6 88°83	3.4/16.3	17	
4 11	15 53.39	-21 10											

EPHEMERIDES

5 14.6

5 14.6

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
164273	2004 <i>XO</i> ₁₆		5 14.6 164°07'	10°6/23.2	18		518786	2010 <i>BV</i> ₂₀		5 14.6 352°98'	1°0/15.4	17	
4 11	16 6.89	-52 17.8	2.277	2.960	16.2	20.1	4 11	15 46.53	-26 25.3	1.530	2.391	15.4	20.2
4 21	15 58.13	-53 2.5	2.198	2.967	14.6	20.0	4 21	15 42.90	-25 16.3	1.454	2.385	11.6	19.9
5 1	15 46.04	-53 21.7	2.138	2.974	12.8	19.9	5 1	15 36.87	-23 47.7	1.399	2.380	7.2	19.6
5 11	15 31.84	-53 9.6	2.100	2.980	11.3	19.8	5 11	15 29.37	-22 3.3	1.370	2.377	2.5	19.3
5 21	15 17.16	-52 24.2	2.084	2.985	10.6	19.7	5 21	15 21.52	-20 10.2	1.366	2.374	3.0	19.4
5 31	15 3.78	-51 8.5	2.094	2.989	10.9	19.8	5 31	15 14.54	-18 17.6	1.389	2.372	7.8	19.6
6 10	14 53.08	-49 30.3	2.128	2.992	12.1	19.8	6 10	15 9.41	-16 34.9	1.436	2.371	12.3	19.9
6 20	14 45.78	-47 39.7	2.184	2.994	13.8	20.0	6 20	15 6.71	-15 8.8	1.504	2.371	16.1	20.1
397439	2007 <i>DK</i> ₈₅		5 14.6 315°76'	5°2/12.5	16		382456	2000 <i>QV</i> ₈₄		5 14.6 251°72'	4°1/11.5	17	
4 11	15 49.51	-10 57.3	1.080	1.973	17.9	20.4	4 11	15 51.27	- 8 36.7	2.346	3.198	11.1	21.4
4 21	15 46.03	-10 12.5	1.004	1.953	13.6	20.0	4 21	15 45.68	- 7 38.3	2.248	3.174	8.4	21.1
5 1	15 39.25	- 9 25.4	0.947	1.933	8.8	19.7	5 1	15 38.32	- 6 38.7	2.175	3.149	5.7	20.9
5 11	15 30.11	- 8 42.8	0.911	1.914	5.3	19.4	5 11	15 29.76	- 5 42.3	2.131	3.123	4.1	20.8
5 21	15 20.01	- 8 11.9	0.898	1.896	7.5	19.5	5 21	15 20.77	- 4 53.3	2.115	3.097	5.5	20.8
5 31	15 10.68	- 7 59.2	0.906	1.878	12.7	19.7	5 31	15 12.15	- 4 15.7	2.127	3.069	8.4	21.0
6 10	15 3.66	- 8 8.8	0.933	1.861	18.0	19.9	6 10	15 4.69	- 3 52.2	2.164	3.041	11.5	21.1
6 20	14 59.92	- 8 40.5	0.976	1.845	22.6	20.2	6 20	14 58.94	- 3 43.8	2.223	3.011	14.2	21.2
314134	2005 <i>EC</i> ₁₈₅		5 14.6 14°08'	2°4/15.7	17		35098	1991 <i>GB</i> ₇		5 14.6 79°33'	1°7/15.7	18	
4 11	15 50.41	-24 22.3	1.170	2.045	18.2	20.4	4 11	15 50.76	-24 1.0	2.312	3.150	11.7	18.7
4 21	15 46.40	-24 29.7	1.110	2.048	13.8	20.2	4 21	15 45.28	-24 12.1	2.240	3.158	8.8	18.5
5 1	15 39.22	-24 22.6	1.070	2.052	8.7	19.9	5 1	15 38.02	-24 15.2	2.192	3.167	5.6	18.4
5 11	15 30.03	-24 1.2	1.051	2.056	3.6	19.6	5 11	15 29.66	-24 10.5	2.171	3.175	2.4	18.2
5 21	15 20.31	-23 28.5	1.055	2.062	3.9	19.7	5 21	15 21.03	-23 59.2	2.178	3.183	2.6	18.2
5 31	15 11.71	-22 50.4	1.083	2.069	9.0	20.0	5 31	15 12.99	-23 43.6	2.214	3.192	5.7	18.4
6 10	15 5.55	-22 14.2	1.132	2.077	13.9	20.3	6 10	15 6.29	-23 27.1	2.275	3.200	8.9	18.6
6 20	15 2.56	-21 45.7	1.200	2.085	18.1	20.5	6 20	15 1.45	-23 12.7	2.360	3.209	11.7	18.8
31177	1997 <i>XH</i> ₁₁		5 14.6 75°01'	1°9/13.9	18 R		224478	2005 <i>VN</i> ₇₅		5 14.6 136°19'	4°1/17.8	18 R	
4 11	15 54.21	-13 34.9	1.708	2.569	14.1	17.5	4 11	15 54.98	-33 35.8	2.355	3.154	12.7	20.8
4 21	15 48.16	-13 40.6	1.646	2.579	10.3	17.3	4 21	15 48.36	-33 30.8	2.283	3.169	10.1	20.6
5 1	15 39.84	-13 45.5	1.607	2.590	6.2	17.1	5 1	15 39.81	-33 10.5	2.233	3.183	7.3	20.5
5 11	15 30.15	-13 51.3	1.594	2.600	2.3	16.8	5 11	15 30.13	-32 34.3	2.211	3.196	4.8	20.4
5 21	15 20.14	-13 59.6	1.608	2.611	3.8	17.0	5 21	15 20.26	-31 44.1	2.216	3.209	4.2	20.3
5 31	15 10.95	-14 12.5	1.649	2.621	7.9	17.2	5 31	15 11.18	-30 43.7	2.250	3.221	6.2	20.5
6 10	15 3.53	-14 31.7	1.714	2.632	11.7	17.5	6 10	15 3.70	-29 38.8	2.311	3.232	9.0	20.7
6 20	14 58.46	-14 58.0	1.801	2.642	15.0	17.7	6 20	14 58.30	-28 34.8	2.396	3.243	11.6	20.9
12882	1998 <i>QS</i> ₃₁		5 14.6 323°53'	6°9/18.5	18		213846	2003 <i>SA</i> ₅₂		5 14.6 196°50'	1°7/13.8	17	
4 11	15 52.48	-37 45.2	2.140	2.931	14.1	17.1	4 11	15 53.90	-15 52.3	1.699	2.560	14.1	20.8
4 21	15 47.21	-38 33.5	2.052	2.922	11.8	16.9	4 21	15 48.09	-15 30.7	1.625	2.558	10.5	20.6
5 1	15 39.50	-39 5.7	1.985	2.913	9.4	16.7	5 1	15 39.90	-15 4.4	1.573	2.557	6.2	20.3
5 11	15 30.11	-39 18.5	1.942	2.904	7.4	16.6	5 11	15 30.21	-14 36.2	1.547	2.554	2.1	20.0
5 21	15 20.09	-39 10.6	1.925	2.896	6.9	16.5	5 21	15 20.08	-14 9.4	1.548	2.552	3.8	20.1
5 31	15 10.65	-38 43.9	1.934	2.888	8.3	16.6	5 31	15 10.70	-13 47.9	1.576	2.549	8.2	20.4
6 10	15 2.89	-38 3.3	1.967	2.880	10.7	16.7	6 10	15 3.07	-13 35.3	1.628	2.545	12.3	20.6
6 20	14 57.53	-37 15.2	2.022	2.873	13.2	16.9	6 20	14 57.84	-13 33.6	1.702	2.541	15.8	20.8
144560	2004 <i>FH</i> ₁₂		5 14.6 50°21'	4°5/17.7	18		349065	2006 <i>XC</i> ₁₁		5 14.6 170°57'	0°8/14.1	17	
4 11	15 51.34	-32 50.1	2.087	2.902	13.6	19.9	4 11	15 49.65	-16 50.4	2.673	3.520	10.0	22.1
4 21	15 46.05	-32 59.9	2.010	2.905	10.8	19.7	4 21	15 44.20	-16 38.8	2.595	3.522	7.4	21.9
5 1	15 38.60	-32 54.1	1.955	2.908	7.8	19.5	5 1	15 37.28	-16 23.9	2.543	3.525	4.4	21.7
5 11	15 29.82	-32 31.9	1.925	2.911	5.2	19.4	5 11	15 29.46	-16 7.1	2.519	3.527	1.3	21.5
5 21	15 20.69	-31 54.5	1.921	2.915	4.7	19.3	5 21	15 21.41	-15 50.2	2.524	3.528	2.4	21.6
5 31	15 12.27	-31 5.4	1.945	2.918	6.9	19.5	5 31	15 13.82	-15 35.5	2.558	3.529	5.5	21.8
6 10	15 5.48	-30 10.3	1.994	2.921	9.8	19.7	6 10	15 7.33	-15 25.1	2.619	3.530	8.4	22.0
6 20	15 0.89	-29 15.0	2.066	2.925	12.7	19.9	6 20	15 2.36	-15 20.6	2.704	3.531	11.0	22.2
279857	2001 <i>DB</i> ₂₃		5 14.6 44°05'	5°7/11.7	17		363256	2002 <i>CT</i> ₂₀₀		5 14.6 10°71'	3°7/13.2	17	
4 11	15 49.97	- 6 9.4	1.592	2.463	14.4	19.9	4 11	15 47.28	-13 29.1	0.971	1.873	18.7	19.9
4 21	15 45.00	- 5 23.5	1.541	2.475	10.9	19.7	4 21	15 44.22	-12 55.5	0.921	1.875	13.8	19.6
5 1	15 37.92	- 4 42.5	1.513	2.488	7.5	19.5	5 1	15 37.98	-12 18.8	0.889	1.879	8.4	19.3
5 11	15 29.61	- 4 11.7	1.510	2.501	5.7	19.4	5 11	15 29.72	-11 45.1	0.878	1.884	4.0	19.1
5 21	15 21.11	- 3 55.2	1.532	2.515	7.1	19.6	5 21	15 21.00	-11 20.4	0.888	1.891	6.1	19.2
5 31	15 13.48	- 3 55.7	1.579	2.529	10.2	19.8	5 31	15 13.46	-11 10.3	0.920	1.899	11.4	19.5
6 10	15 7.56	- 4 13.4	1.649	2.543	13.5	20.0	6 10	15 8.42	-11 17.5	0.970	1.909	16.4	19.8
6 20	15 3.87	- 4 47.0	1.738	2.557	16.4	20.2	6 20	15 6.55	-11 42.2	1.038	1.920	20.6	20.1
295884	2008 <i>WE</i> ₆₂		5 14.6 195°26'	0°2/14.7	16		41174	1999 <i>VH</i> ₁₈₄		5 14.6 334°46'	1°0/15.0	18	
4 11	15 54.69	-21 31.8	1.608	2.463	15.1	21.4	4 11	15 52.30	-19 32.4	1.898	2.752	13.2	18.0
4 21	15 48.83	-21 1.4	1.531	2.461	11.3	21.2	4 21	15 46.94	-20 11.2	1.812	2.741	9.9	17.7
5 1	15 40.40	-20 19.5	1.477	2.459	6.8	20.9	5 1	15 39.30	-20 46.6	1.750	2.731	6.1	17.5
5 11	15 30.33	-19 28.4	1.449	2.457	1.9	20.6	5 11	15 30.09	-21 17.7	1.714	2.721	2.0	17.2
5 21	15 19.81	-18 32.3	1.447	2.454	3.2	20.7	5 21	15 20.26	-21 44.3	1.705	2.712	2.8	17.2
5 31	15 10.14	-17 37.0	1.472	2.450	8.1	21.0	5 31	15 10.94	-22 7.4	1.724	2.703	7.0	17.5
6 10	15 2.42	-16 48.7	1.521	2.446	12.5	21.2	6 10	15 3.15	-22 29.0	1.768	2.695	10.9	17.7
6 20	14 57.29	-16 11.8	1.591	2.441	16.3	21.4	6 20	14 57.59	-22 51.5	1.834	2.688	14.3	17.9
111377	2001 <i>XJ</i> ₁₄₉		5 14.6 322°83'	1°3/15.6	18		429387						

EPHEMERIDES

5 14.6

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
383952	2008 <i>SH</i> ₃₀₇		5 14.6 163°40	3°5/17.1	18		419600	2010 <i>RT</i> ₁₁₈		5 14.7 211°62	4°3/12.1	17	
4 11	15 53.31	-30 50.6	2.321	3.134	12.5	21.7	4 11	15 52.37	-9 55.6	1.814	2.676	13.3	21.4
4 21	15 47.25	-30 53.6	2.241	3.139	9.8	21.5	4 21	15 46.79	-9 2.7	1.738	2.671	10.0	21.2
5 1	15 39.24	-30 43.3	2.185	3.143	6.8	21.3	5 1	15 39.09	-8 9.1	1.687	2.666	6.5	21.0
5 11	15 30.02	-30 19.3	2.155	3.147	4.2	21.1	5 11	15 30.03	-7 19.6	1.662	2.660	4.3	20.8
5 21	15 20.50	-29 42.8	2.153	3.150	3.8	21.1	5 21	15 20.59	-6 39.0	1.664	2.653	5.9	20.9
5 31	15 11.63	-28 57.2	2.179	3.153	6.2	21.3	5 31	15 11.81	-6 11.5	1.692	2.646	9.3	21.1
6 10	15 4.26	-28 7.4	2.232	3.155	9.1	21.4	6 10	15 4.61	-5 59.7	1.745	2.639	12.9	21.3
6 20	14 58.91	-27 18.4	2.308	3.157	11.9	21.6	6 20	14 59.56	-6 4.1	1.818	2.631	16.0	21.5
237366	1994 <i>PJ</i> ₁₄		5 14.6 332°90	3°6/13.0	17		271127	2003 <i>SQ</i> ₅₇		5 14.7 318°36	6°8/16.4	17	
4 11	15 48.74	-14 26.7	1.105	1.998	17.7	19.4	4 11	15 53.64	-30 34.8	1.477	2.317	17.0	19.6
4 21	15 45.26	-13 39.0	1.037	1.987	13.2	19.1	4 21	15 49.25	-31 47.8	1.372	2.282	13.8	19.3
5 1	15 38.67	-12 44.7	0.988	1.977	8.1	18.8	5 1	15 41.45	-32 50.3	1.288	2.248	10.3	19.0
5 11	15 29.96	-11 49.7	0.961	1.967	3.8	18.5	5 11	15 30.89	-33 36.6	1.226	2.214	7.4	18.7
5 21	15 20.56	-11 1.3	0.957	1.959	6.1	18.6	5 21	15 18.79	-34 2.4	1.189	2.180	7.2	18.6
5 31	15 12.09	-10 26.7	0.975	1.951	11.4	18.9	5 31	15 6.92	-34 6.9	1.175	2.147	10.4	18.7
6 10	15 5.93	-10 11.0	1.013	1.944	16.5	19.2	6 10	14 57.05	-33 54.8	1.183	2.115	14.6	18.8
6 20	15 2.89	-10 15.7	1.068	1.939	21.0	19.4	6 20	14 50.50	-33 33.6	1.211	2.084	18.8	19.0
324950	2007 <i>YH</i> ₃₀		5 14.6 149°52	1°0/14.1	17		372465	2009 <i>SF</i> ₁₅₄		5 14.7 167°73	3°6/11.9	17	
4 11	15 54.71	-17 31.3	1.826	2.680	13.6	22.0	4 11	15 51.06	-10 26.1	2.240	3.095	11.4	22.4
4 21	15 48.45	-17 10.2	1.758	2.689	10.0	21.8	4 21	15 45.38	-9 27.1	2.171	3.100	8.5	22.2
5 1	15 40.00	-16 43.5	1.714	2.696	5.9	21.6	5 1	15 38.04	-8 27.3	2.127	3.104	5.5	22.0
5 11	15 30.23	-16 13.3	1.696	2.704	1.7	21.3	5 11	15 29.71	-7 30.7	2.111	3.108	3.6	21.9
5 21	15 20.17	-15 42.8	1.705	2.710	3.3	21.4	5 21	15 21.18	-6 41.5	2.123	3.111	5.0	22.0
5 31	15 10.90	-15 15.9	1.743	2.716	7.5	21.7	5 31	15 13.25	-6 3.4	2.164	3.113	7.9	22.2
6 10	15 3.35	-14 56.2	1.805	2.722	11.3	22.0	6 10	15 6.61	-5 38.7	2.229	3.115	10.8	22.4
6 20	14 58.07	-14 46.0	1.890	2.726	14.6	22.2	6 20	15 1.74	-5 28.2	2.317	3.116	13.4	22.6
472182	2014 <i>DB</i> ₁₀₄		5 14.6 104°52	6°4/19.0	17		118415	1999 <i>SV</i> ₁₉		5 14.7 274°58	5°1/10.6	18	
4 11	15 55.30	-38 46.7	2.336	3.112	13.5	21.1	4 11	15 47.70	-4 23.9	2.432	3.286	10.6	19.7
4 21	15 48.93	-39 25.8	2.264	3.124	11.2	20.9	4 21	15 42.98	-3 30.8	2.343	3.266	8.3	19.5
5 1	15 40.33	-39 48.0	2.215	3.136	8.9	20.8	5 1	15 36.69	-2 40.4	2.280	3.246	6.1	19.3
5 11	15 30.34	-39 50.9	2.190	3.148	7.0	20.7	5 11	15 29.37	-1 57.0	2.243	3.225	5.1	19.2
5 21	15 19.98	-39 34.1	2.192	3.160	6.5	20.7	5 21	15 21.71	-1 24.4	2.235	3.204	6.3	19.3
5 31	15 10.36	-39 0.2	2.220	3.171	7.6	20.8	5 31	15 14.42	-1 5.5	2.252	3.183	8.6	19.4
6 10	15 2.44	-38 14.4	2.274	3.182	9.7	20.9	6 10	15 8.19	-1 2.0	2.295	3.161	11.3	19.5
6 20	14 56.80	-37 22.7	2.351	3.193	11.9	21.1	6 20	15 3.52	-1 13.7	2.358	3.139	13.7	19.6
497652	2006 <i>RS</i> ₅₆		5 14.6 256°53	0°9/15.1	17		4563	Kahnia		5 14.7 246°58	3°3/12.9	18	R
4 11	15 54.32	-21 54.3	1.794	2.643	14.0	22.8	4 11	15 53.76	-12 48.1	1.620	2.485	14.5	17.1
4 21	15 48.62	-21 51.5	1.699	2.625	10.6	22.5	4 21	15 48.21	-12 9.5	1.537	2.472	10.8	16.9
5 1	15 40.40	-21 39.5	1.627	2.607	6.5	22.2	5 1	15 40.13	-11 27.7	1.476	2.458	6.7	16.6
5 11	15 30.43	-21 18.8	1.581	2.588	2.1	21.9	5 11	15 30.36	-10 46.7	1.440	2.444	3.4	16.4
5 21	15 19.77	-20 51.3	1.562	2.569	3.0	21.9	5 21	15 19.98	-10 11.2	1.431	2.429	5.2	16.4
5 31	15 9.65	-20 20.7	1.570	2.549	7.6	22.2	5 31	15 10.25	-9 45.7	1.448	2.414	9.5	16.6
6 10	15 1.21	-19 51.9	1.603	2.529	11.9	22.4	6 10	15 2.28	-9 34.1	1.489	2.398	13.7	16.9
6 20	14 55.21	-19 29.3	1.658	2.508	15.7	22.6	6 20	14 56.80	-9 37.6	1.549	2.381	17.5	17.1
110247	2001 <i>SK</i> ₂₃₅		5 14.7 251°35	0°7/14.3	18		139863	2001 <i>RJ</i> ₆₆		5 14.7 36°48	0°8/15.2	18	
4 11	15 51.69	-18 42.8	1.768	2.628	13.7	20.1	4 11	15 49.09	-23 6.1	1.960	2.811	12.9	19.3
4 21	15 46.47	-18 19.3	1.688	2.621	10.2	19.9	4 21	15 44.29	-22 40.4	1.888	2.815	9.7	19.1
5 1	15 38.98	-17 48.4	1.630	2.613	6.1	19.6	5 1	15 37.54	-22 4.5	1.840	2.820	5.9	18.8
5 11	15 30.01	-17 12.3	1.598	2.606	1.7	19.3	5 11	15 29.60	-21 20.4	1.817	2.824	1.9	18.6
5 21	15 20.58	-16 34.5	1.592	2.598	3.2	19.4	5 21	15 21.39	-20 31.2	1.822	2.829	2.5	18.6
5 31	15 11.81	-15 59.4	1.614	2.590	7.7	19.7	5 31	15 13.87	-19 41.5	1.854	2.834	6.5	18.9
6 10	15 4.69	-15 31.3	1.660	2.583	11.8	19.9	6 10	15 7.87	-18 56.1	1.912	2.839	10.2	19.1
6 20	14 59.86	-15 13.4	1.728	2.574	15.3	20.1	6 20	15 3.91	-18 18.6	1.992	2.845	13.3	19.3
58895	1998 <i>JS</i> ₃		5 14.7 81°34	2°8/12.8	18		398853	2013 <i>CC</i> ₄₉		5 14.7 104°88	4°4/11.7	17	
4 11	15 48.55	-11 53.7	2.222	3.082	11.3	19.1	4 11	15 48.80	-5 33.9	2.376	3.231	10.8	21.8
4 21	15 43.54	-11 17.8	2.159	3.092	8.3	18.9	4 21	15 43.64	-5 2.3	2.313	3.237	8.2	21.6
5 1	15 36.94	-10 41.1	2.122	3.103	5.2	18.7	5 1	15 36.98	-4 34.6	2.274	3.244	5.7	21.5
5 11	15 29.40	-10 6.8	2.111	3.113	2.8	18.6	5 11	15 29.43	-4 14.0	2.262	3.251	4.4	21.4
5 21	15 21.69	-9 38.1	2.128	3.123	4.1	18.7	5 21	15 21.69	-4 3.0	2.278	3.257	5.4	21.5
5 31	15 14.58	-9 17.7	2.173	3.133	7.1	18.9	5 31	15 14.49	-4 3.7	2.322	3.264	7.8	21.7
6 10	15 8.73	-9 7.6	2.243	3.144	10.1	19.1	6 10	15 8.46	-4 16.6	2.390	3.270	10.4	21.8
6 20	15 4.60	-9 8.5	2.335	3.154	12.7	19.3	6 20	15 4.03	-4 41.2	2.480	3.276	12.7	22.0
52583	1997 <i>NY</i> ₆		5 14.7 154°19	7°0/10.4	17		301409	2009 <i>DB</i> ₄₂		5 14.7 64°31	5°1/11.1	18	
4 11	15 51.84	-1 20.0	1.919	2.772	13.1	19.2	4 11	15 47.97	-6 23.6	2.055	2.918	11.9	20.3
4 21	15 46.14	-0 18.9	1.860	2.778	10.3	19.0	4 21	15 43.24	-5 23.6	1.994	2.923	9.1	20.1
5 1	15 38.56	+0 34.9	1.825	2.783	7.9	18.9	5 1	15 36.81	-4 26.3	1.956	2.928	6.4	20.0
5 11	15 29.85	+1 15.7	1.816	2.788	7.0	18.8	5 11	15 29.39	-3 36.7	1.946	2.933	5.1	19.9
5 21	15 20.92	+1 39.5	1.833	2.792	8.2	18.9	5 21	15 21.76	-2 58.9	1.962	2.938	6.3	20.0
5 31	15 12.70	+1 43.6	1.875	2.796	10.6	19.1	5 31	15 14.75	-2 36.1	2.004	2.944	9.0	20.2
6 10	15 5.96	+1 27.9	1.941	2.800	13.3	19.3	6 10	15 9.05	-2 29.6	2.070	2.949	11.8	20.3
6 20	15 1.22	+0 54.5	2.026	2.803	15.8	19.4	6 20	15 5.14	-2 39.1	2.157	2.954	14.3	20.5
39465	1978 <i>RW</i> ₆		5 14.7 260°50	5°6/17.3	18		504445	2008 <i>CR</i> ₅₇		5 14.7 6°98	0°9/15.2	17	

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
257889	2000 <i>SD</i> ₂₉₂		5 14.7 285°56	5°1/16.7	18		501109	2013 <i>TE</i> ₇		5 14.7 168°45	0°6/14.3	17	
4 11	15 54.93	-29 40.6	1.442	2.285	17.2	20.6	4 11	15 53.15	-17 42.1	2.312	3.157	11.4	22.2
4 21	15 49.86	-30 13.4	1.354	2.269	13.6	20.3	4 21	15 47.00	-17 34.2	2.235	3.161	8.4	22.0
5 1	15 41.52	-30 30.6	1.286	2.252	9.6	20.0	5 1	15 39.06	-17 21.9	2.184	3.165	5.0	21.8
5 11	15 30.82	-30 28.7	1.241	2.236	6.0	19.8	5 11	15 30.03	-17 6.6	2.160	3.168	1.4	21.6
5 21	15 19.14	-30 6.9	1.221	2.220	5.6	19.7	5 21	15 20.71	-16 50.2	2.166	3.171	2.6	21.7
5 31	15 8.16	-29 28.9	1.225	2.204	9.2	19.9	5 31	15 11.97	-16 35.2	2.200	3.173	6.2	21.9
6 10	14 59.43	-28 41.9	1.252	2.188	13.7	20.1	6 10	15 4.56	-16 24.4	2.261	3.175	9.5	22.1
6 20	14 53.91	-27 54.4	1.299	2.172	17.8	20.3	6 20	14 58.99	-16 19.7	2.345	3.176	12.3	22.3
442433	2011 <i>UV</i> ₁₄₄		5 14.7 140°63	2°6/17.2	18		958	<i>Asplinda</i>		5 14.7 150°42	1°5/16.2	18	A
4 11	15 50.48	-31 38.3	2.615	3.424	11.4	20.3	4 11	15 46.14	-26 26.7	3.814	4.633	7.9	17.5
4 21	15 44.89	-30 54.0	2.533	3.429	8.8	20.3	4 21	15 41.35	-26 23.4	3.733	4.639	6.0	17.4
5 1	15 37.70	-29 55.3	2.475	3.435	6.0	19.9	5 1	15 35.50	-26 13.6	3.677	4.645	3.9	17.2
5 11	15 29.62	-28 43.3	2.445	3.440	3.4	19.8	5 11	15 29.04	-25 57.9	3.651	4.651	1.9	17.1
5 21	15 21.41	-27 21.1	2.444	3.445	2.9	19.7	5 21	15 22.42	-25 37.1	3.654	4.657	1.9	17.1
5 31	15 13.86	-25 53.4	2.473	3.450	5.3	19.9	5 31	15 16.15	-25 13.0	3.686	4.662	3.8	17.2
6 10	15 7.62	-24 25.8	2.530	3.455	8.1	20.1	6 10	15 10.65	-24 47.8	3.747	4.667	5.9	17.4
6 20	15 3.11	-23 3.4	2.613	3.459	10.7	20.3	6 20	15 6.27	-24 23.5	3.833	4.672	7.8	17.5
501326	2013 <i>XG</i> ₅		5 14.7 214°10	1°7/13.6	17		396043	2013 <i>CN</i> ₃₃		5 14.7 183°51	8°7/ 5.1	18	
4 11	15 51.44	-15 16.7	2.088	2.943	12.1	22.0	4 11	15 47.54	+13 46.2	2.966	3.761	10.5	21.3
4 21	15 45.94	-14 49.5	2.007	2.938	8.9	21.8	4 21	15 42.51	+15 2.4	2.916	3.761	9.4	21.2
5 1	15 38.52	-14 18.5	1.950	2.932	5.3	21.5	5 1	15 36.24	+16 5.6	2.889	3.761	8.8	21.2
5 11	15 29.89	-13 46.2	1.920	2.926	2.0	21.3	5 11	15 29.25	+16 51.3	2.888	3.760	8.9	21.2
5 21	15 20.90	-13 15.8	1.918	2.920	3.5	21.4	5 21	15 22.09	+17 16.8	2.911	3.759	9.6	21.2
5 31	15 12.47	-12 50.5	1.944	2.913	7.2	21.6	5 31	15 15.36	+17 20.9	2.957	3.758	10.7	21.3
6 10	15 5.44	-12 33.6	1.996	2.906	10.7	21.8	6 10	15 9.57	+17 4.4	3.024	3.756	12.0	21.4
6 20	15 0.34	-12 26.7	2.070	2.899	13.8	22.0	6 20	15 5.11	+16 29.4	3.109	3.753	13.2	21.5
112298	2002 <i>LF</i> ₃₉		5 14.7 282°90	6°6/10.9	18		460789	2014 <i>WD</i> ₃₁		5 14.7 18°37	3°9/16.3	17	
4 11	15 51.20	- 2 6.0	1.925	2.781	12.9	19.6	4 11	15 54.66	-27 20.3	1.398	2.249	17.2	21.0
4 21	15 45.96	- 1 26.3	1.839	2.760	10.2	19.4	4 21	15 49.38	-27 47.3	1.328	2.250	13.3	20.7
5 1	15 38.66	- 0 53.1	1.776	2.739	7.7	19.2	5 1	15 41.03	-27 59.6	1.279	2.251	8.9	20.5
5 11	15 29.96	- 0 31.3	1.739	2.718	6.6	19.1	5 11	15 30.65	-27 55.5	1.253	2.252	4.9	20.3
5 21	15 20.74	- 0 25.1	1.728	2.697	7.8	19.1	5 21	15 19.65	-27 35.5	1.251	2.254	4.7	20.3
5 31	15 11.99	- 0 37.1	1.742	2.675	10.6	19.2	5 31	15 9.62	-27 4.1	1.275	2.256	8.6	20.5
6 10	15 4.62	- 1 7.8	1.780	2.654	13.7	19.4	6 10	15 1.89	-26 28.1	1.321	2.258	13.0	20.7
6 20	14 59.28	- 1 55.8	1.838	2.632	16.6	19.5	6 20	14 57.24	-25 54.4	1.388	2.261	16.9	21.0
207475	2006 <i>HS</i> ₂₀		5 14.7 78°78	1°7/13.7	18		243634	1999 <i>SH</i> ₁₂		5 14.7 223°03	6°1/20.9	18	
4 11	15 53.07	-18 18.1	1.367	2.239	16.3	20.4	4 11	15 54.04	-44 51.1	3.222	3.947	11.1	20.9
4 21	15 47.69	-17 24.5	1.313	2.252	11.9	20.2	4 21	15 47.64	-44 57.3	3.120	3.935	9.6	20.8
5 1	15 39.70	-16 21.7	1.280	2.266	7.0	19.9	5 1	15 39.44	-44 47.0	3.039	3.924	8.0	20.6
5 11	15 30.20	-15 14.8	1.271	2.279	2.2	19.7	5 11	15 30.14	-44 18.3	2.983	3.912	6.7	20.5
5 21	15 20.48	-14 10.1	1.289	2.293	4.2	19.8	5 21	15 20.54	-43 31.1	2.954	3.899	6.1	20.5
5 31	15 11.88	-13 14.2	1.331	2.306	9.1	20.1	5 31	15 11.52	-42 27.6	2.953	3.886	6.7	20.5
6 10	15 5.42	-12 32.5	1.396	2.320	13.5	20.4	6 10	15 3.82	-41 12.2	2.978	3.872	8.1	20.6
6 20	15 1.65	-12 7.5	1.481	2.333	17.2	20.7	6 20	14 57.97	-39 50.3	3.029	3.858	9.9	20.7
309634	2008 <i>CY</i> ₁₅₆		5 14.7 327°36	1°0/14.1	16		369398	2009 <i>VS</i> ₁₁₂		5 14.7 173°33	9°6/ 4.5	17	
4 11	15 48.40	-17 5.1	2.046	2.906	12.1	21.3	4 11	15 50.65	+14 23.4	2.722	3.513	11.4	22.3
4 21	15 43.78	-16 49.3	1.966	2.899	8.9	21.1	4 21	15 44.85	+15 58.3	2.677	3.517	10.3	22.2
5 1	15 37.27	-16 28.9	1.909	2.893	5.3	20.8	5 1	15 37.66	+17 18.6	2.656	3.521	9.7	22.2
5 11	15 29.56	-16 6.0	1.878	2.886	1.6	20.6	5 11	15 29.64	+18 19.1	2.660	3.524	9.8	22.2
5 21	15 21.48	-15 43.1	1.875	2.880	3.0	20.7	5 21	15 21.46	+18 56.4	2.688	3.526	10.6	22.3
5 31	15 13.94	-15 23.4	1.899	2.874	6.8	20.9	5 31	15 13.78	+19 9.0	2.739	3.527	11.8	22.3
6 10	15 7.75	-15 10.0	1.948	2.868	10.4	21.1	6 10	15 7.20	+18 58.2	2.811	3.527	13.1	22.4
6 20	15 3.47	-15 4.8	2.019	2.863	13.5	21.3	6 20	15 2.13	+18 26.7	2.899	3.526	14.4	22.6
428245	2006 <i>YQ</i> ₃₁		5 14.7 95°59	0°6/14.3	17		375715	2009 <i>QF</i> ₁₉		5 14.7 310°94	1°4/13.9	17	
4 11	15 53.95	-18 3.1	1.720	2.578	14.1	21.3	4 11	15 49.58	-17 40.3	1.374	2.251	15.9	20.6
4 21	15 47.96	-17 51.5	1.661	2.593	10.4	21.1	4 21	15 45.65	-17 11.4	1.287	2.229	11.9	20.3
5 1	15 39.75	-17 34.1	1.624	2.607	6.1	20.9	5 1	15 38.88	-16 33.7	1.220	2.207	7.1	20.0
5 11	15 30.21	-17 12.9	1.613	2.622	1.7	20.6	5 11	15 30.11	-15 50.2	1.177	2.185	2.2	19.6
5 21	15 20.44	-16 50.8	1.630	2.636	3.1	20.8	5 21	15 20.53	-15 5.6	1.159	2.164	4.2	19.7
5 31	15 11.55	-16 31.2	1.673	2.649	7.4	21.1	5 31	15 11.57	-14 26.1	1.164	2.143	9.6	19.9
6 10	15 4.45	-16 17.7	1.741	2.663	11.3	21.3	6 10	15 4.55	-13 57.5	1.192	2.123	14.6	20.1
6 20	14 59.70	-16 12.7	1.831	2.676	14.6	21.6	6 20	15 0.34	-13 43.5	1.238	2.104	19.0	20.3
119829	2002 <i>BP</i> ₂₂		5 14.7 230°07	4°9/16.9	18		105930	2000 <i>SO</i> ₂₂₂		5 14.7 211°92	5°7/ 9.6	18	
4 11	15 57.22	-31 33.6	2.085	2.895	13.8	18.9	4 11	15 47.03	- 2 3.3	2.527	3.378	10.4	19.9
4 21	15 50.69	-32 18.2	1.992	2.885	11.0	18.7	4 21	15 42.33	- 0 54.1	2.458	3.375	8.2	19.8
5 1	15 41.63	-32 50.3	1.923	2.875	8.0	18.5	5 1	15 36.23	+ 0 10.7	2.415	3.371	6.4	19.6
5 11	15 30.80	-33 6.9	1.879	2.865	5.5	18.3	5 11	15 29.27	+ 1 6.4	2.398	3.367	5.7	19.6
5 21	15 19.27	-33 7.0	1.863	2.853	5.2	18.3	5 21	15 22.10	+ 1 49.2	2.409	3.363	6.8	19.7
5 31	15 8.27	-32 52.1	1.875	2.842	7.5	18.4	5 31	15 15.38	+ 2 16.2	2.447	3.359	8.8	19.8
6 10	14 58.94	-32 27.0	1.912	2.830	10.7	18.5	6 10	15 9.72	+ 2 26.5	2.508	3.355	11.1	19.9
6 20	14 52.05	-31 57.2	1.971	2.818	13.7	18.7	6 20	15 5.52	+ 2 20.5	2.590	3.350	13.2	20.1
65129	2002 <i>CO</i> ₇₃		5 14.7 264°58	2°9/12.6	18		437101	2012 <i>UO</i> ₁₀₃					

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
262283	2006 <i>SM</i> ₃₆₇	5 14.7 231°55		5°6/11.2 17			78681	2002 <i>TK</i> ₁₃₆	5 14.7 262°23		7°8/18.8 17		
4 11	15 53.58	-4 4.6	2.095	2.944	12.3	21.4	4 11	15 56.87	-40 16.6	2.188	2.959	14.5	19.9
4 21	15 47.53	-3 19.2	2.010	2.930	9.6	21.2	4 21	15 50.66	-41 18.5	2.097	2.949	12.3	19.7
5 1	15 39.52	-2 37.8	1.949	2.914	6.9	21.0	5 1	15 41.74	-42 3.6	2.027	2.939	10.1	19.5
5 11	15 30.22	-2 5.1	1.915	2.898	5.6	20.9	5 11	15 30.91	-42 27.5	1.981	2.928	8.4	19.4
5 21	15 20.47	-1 45.0	1.909	2.881	6.9	20.9	5 21	15 19.28	-42 28.0	1.961	2.918	7.9	19.3
5 31	15 11.22	-1 40.5	1.930	2.864	9.6	21.0	5 31	15 8.21	-42 6.1	1.966	2.908	9.0	19.4
6 10	15 3.31	-1 52.6	1.975	2.845	12.7	21.2	6 10	14 58.92	-41 26.9	1.996	2.897	11.2	19.5
6 20	14 57.34	-2 20.6	2.042	2.826	15.5	21.4	6 20	14 52.26	-40 37.3	2.048	2.887	13.6	19.6
435784	2008 <i>UR</i> ₃₂₈	5 14.7 144°73		1°6/15.7 17			177361	2004 <i>BW</i> ₅	5 14.7 90°75		2°1/13.6 18		
4 11	15 51.83	-24 52.4	2.121	2.959	12.6	22.1	4 11	15 54.01	-14 59.9	1.592	2.456	14.7	20.6
4 21	15 46.24	-24 41.0	2.046	2.965	9.5	21.9	4 21	15 48.09	-14 32.8	1.536	2.472	10.8	20.4
5 1	15 38.70	-24 19.2	1.995	2.970	6.0	21.7	5 1	15 39.86	-14 2.1	1.504	2.488	6.4	20.2
5 11	15 29.97	-23 47.9	1.970	2.975	2.5	21.5	5 11	15 30.30	-13 31.1	1.497	2.504	2.5	19.9
5 21	15 20.96	-23 9.4	1.973	2.979	2.6	21.5	5 21	15 20.52	-13 3.7	1.517	2.519	4.1	20.1
5 31	15 12.62	-22 27.5	2.004	2.984	6.2	21.8	5 31	15 11.71	-12 43.6	1.563	2.534	8.4	20.4
6 10	15 5.77	-21 46.6	2.062	2.988	9.6	22.0	6 10	15 4.78	-12 33.9	1.632	2.549	12.3	20.6
6 20	15 0.95	-21 10.8	2.142	2.991	12.7	22.2	6 20	15 0.28	-12 36.0	1.723	2.564	15.6	20.9
347888	2002 <i>TE</i> ₁₉₀	5 14.7 238°84		6°8/19.2 18			496012	2008 <i>DK</i> ₆₁	5 14.7 311°31		10°2/5.3 16		
4 11	15 55.34	-40 7.2	2.393	3.161	13.4	21.4	4 11	15 46.41	+9 34.6	2.141	2.972	12.8	20.9
4 21	15 49.20	-40 43.1	2.297	3.150	11.4	21.2	4 21	15 42.17	+11 11.0	2.082	2.962	11.2	20.7
5 1	15 40.68	-41 2.1	2.224	3.139	9.2	21.0	5 1	15 36.26	+12 33.9	2.047	2.952	10.3	20.7
5 11	15 30.57	-41 1.0	2.175	3.127	7.4	20.9	5 11	15 29.33	+13 36.6	2.035	2.943	10.4	20.7
5 21	15 19.86	-40 38.8	2.151	3.115	6.9	20.8	5 21	15 22.12	+14 14.3	2.047	2.933	11.5	20.7
5 31	15 9.73	-39 57.6	2.155	3.103	8.0	20.9	5 31	15 15.42	+14 24.6	2.081	2.924	13.1	20.8
6 10	15 1.22	-39 2.4	2.184	3.090	10.1	21.0	6 10	15 9.94	+14 8.3	2.135	2.915	15.0	20.9
6 20	14 55.03	-37 59.7	2.236	3.077	12.5	21.1	6 20	15 6.16	+13 28.1	2.206	2.906	16.7	21.0
114680	2003 <i>FE</i> ₅₆	5 14.7 16°47		0°3/14.8 18			466089	2012 <i>BZ</i> ₁₀₆	5 14.7 163°89		3°9/16.8 17		
4 11	15 49.11	-20 30.8	1.917	2.774	12.9	19.5	4 11	15 55.98	-29 46.4	1.755	2.583	15.2	21.3
4 21	15 44.38	-20 21.7	1.845	2.777	9.6	19.3	4 21	15 49.84	-29 56.4	1.679	2.587	11.9	21.1
5 1	15 37.66	-20 5.3	1.797	2.780	5.8	19.1	5 1	15 41.09	-29 50.9	1.626	2.590	8.2	20.9
5 11	15 29.70	-19 43.1	1.775	2.783	1.6	18.8	5 11	15 30.69	-29 28.6	1.597	2.593	4.8	20.7
5 21	15 21.42	-19 17.6	1.780	2.787	2.6	18.9	5 21	15 19.83	-28 51.0	1.595	2.595	4.4	20.7
5 31	15 13.80	-18 52.3	1.811	2.791	6.7	19.1	5 31	15 9.84	-28 2.5	1.619	2.597	7.5	20.9
6 10	15 7.69	-18 30.9	1.868	2.795	10.4	19.4	6 10	15 1.81	-27 9.6	1.669	2.598	11.3	21.1
6 20	15 3.63	-18 16.2	1.947	2.800	13.6	19.6	6 20	14 56.43	-26 18.9	1.741	2.599	14.7	21.3
499235	2009 <i>UZ</i> ₁₂₂	5 14.7 232°16		2°4/13.4 17			290735	2005 <i>UG</i> ₄₅₃	5 14.7 237°35		0°9/15.4 18		
4 11	15 52.38	-13 24.9	1.836	2.697	13.2	21.8	4 11	15 49.06	-23 19.8	2.659	3.496	10.4	21.4
4 21	15 46.88	-13 5.3	1.758	2.692	9.8	21.6	4 21	15 43.96	-23 4.5	2.567	3.486	7.8	21.2
5 1	15 39.21	-12 43.7	1.704	2.686	6.0	21.4	5 1	15 37.29	-22 41.3	2.499	3.475	4.8	21.0
5 11	15 30.14	-12 23.0	1.676	2.681	2.6	21.1	5 11	15 29.62	-22 11.3	2.459	3.465	1.7	20.8
5 21	15 20.65	-12 6.0	1.675	2.675	4.1	21.2	5 21	15 21.64	-21 36.2	2.447	3.454	2.1	20.8
5 31	15 11.79	-11 56.0	1.701	2.670	8.1	21.5	5 31	15 14.08	-20 59.0	2.465	3.443	5.3	21.0
6 10	15 4.50	-11 55.5	1.752	2.664	11.8	21.7	6 10	15 7.63	-20 23.1	2.510	3.431	8.3	21.2
6 20	14 59.38	-12 5.8	1.824	2.658	15.2	21.9	6 20	15 2.77	-19 51.5	2.578	3.420	11.0	21.3
253169	2002 <i>WS</i> ₁₇	5 14.7 66°46		4°5/11.1 18			253912	2004 <i>CP</i> ₁₃	5 14.7 170°01		1°1/14.0 18		
4 11	15 54.05	-15 57.7	1.479	2.347	15.5	19.6	4 11	15 53.80	-17 28.4	1.991	2.843	12.8	21.2
4 21	15 47.88	-13 21.6	1.437	2.375	11.2	19.4	4 21	15 47.71	-17 1.9	1.917	2.847	9.4	21.0
5 1	15 39.54	-10 38.3	1.421	2.404	6.9	19.2	5 1	15 39.61	-16 29.7	1.868	2.850	5.6	20.8
5 11	15 30.14	-7 58.9	1.432	2.432	4.5	19.1	5 11	15 30.26	-15 54.2	1.845	2.853	1.7	20.5
5 21	15 20.86	-5 35.2	1.472	2.460	6.7	19.3	5 21	15 20.60	-15 18.6	1.851	2.855	3.1	20.6
5 31	15 12.80	-3 36.1	1.540	2.488	10.5	19.6	5 31	15 11.64	-14 46.6	1.884	2.856	7.1	20.9
6 10	15 6.75	-2 6.4	1.631	2.516	14.1	19.9	6 10	15 4.22	-14 21.9	1.943	2.857	10.8	21.1
6 20	15 3.10	-1 6.1	1.742	2.543	17.1	20.1	6 20	14 58.89	-14 6.9	2.025	2.858	13.9	21.3
64260	2001 <i>TK</i> ₁₉₀	5 14.7 331°00		2°0/15.5 17			353891	2012 <i>XX</i> ₃₃	5 14.7 78°99		1°4/13.9 17		
4 11	15 51.62	-24 3.2	1.204	2.076	18.0	18.9	4 11	15 49.93	-15 33.8	2.144	3.000	11.8	21.1
4 21	15 47.46	-24 0.5	1.132	2.068	13.7	18.6	4 21	15 44.74	-15 18.2	2.074	3.006	8.6	20.9
5 1	15 40.06	-23 43.0	1.079	2.062	8.6	18.3	5 1	15 37.78	-14 59.5	2.029	3.012	5.1	20.7
5 11	15 30.45	-23 11.1	1.049	2.055	3.3	18.0	5 11	15 29.77	-14 39.9	2.012	3.019	1.8	20.4
5 21	15 20.12	-22 27.9	1.042	2.049	3.8	18.0	5 21	15 21.50	-14 21.8	2.021	3.025	3.1	20.5
5 31	15 10.75	-21 39.8	1.058	2.044	9.3	18.3	5 31	15 13.83	-14 7.9	2.059	3.031	6.6	20.8
6 10	15 3.79	-20 54.7	1.096	2.039	14.4	18.6	6 10	15 7.50	-14 0.6	2.122	3.037	9.9	21.0
6 20	15 0.06	-20 19.2	1.153	2.035	18.9	18.8	6 20	15 3.02	-14 1.4	2.208	3.043	12.8	21.2
156548	2002 <i>EM</i> ₁	5 14.7 324°29		3°1/15.7 18			180342	2003 <i>YH</i> ₅₈	5 14.7 87°83		2°2/13.6 18		
4 11	15 55.11	-24 17.1	1.636	2.484	15.2	19.3	4 11	15 53.94	-14 54.6	1.549	2.415	15.0	20.0
4 21	15 49.49	-25 7.7	1.555	2.477	11.7	19.0	4 21	15 48.12	-14 27.8	1.493	2.430	11.0	19.8
5 1	15 41.08	-25 50.4	1.496	2.470	7.7	18.8	5 1	15 39.94	-13 57.4	1.460	2.444	6.6	19.6
5 11	15 30.72	-26 22.7	1.461	2.463	3.9	18.5	5 11	15 30.36	-13 26.8	1.452	2.458	2.5	19.3
5 21	15 19.61	-26 43.7	1.453	2.457	4.1	18.5	5 21	15 20.55	-12 59.9	1.470	2.473	4.2	19.5
5 31	15 9.13	-26 54.5	1.471	2.450	8.0	18.7	5 31	15 11.71	-12 40.6	1.515	2.487	8.5	19.8
6 10	15 0.55	-26 58.9	1.514	2.445	12.1	19.0	6 10	15 4.79	-12 32.0	1.583	2.500	12.5	20.0
6 20	14 54.72	-27 1.6	1.577	2.439	15.8	19.2	6 20	15 0.35	-12 35.3	1.671	2.514	15.9	20.3
117423	2005 <i>AP</i> ₁₈	5 14.7 2°31		2°4/11.9 18			172397	2003 <i>BR</i> ₁₄	5 14.7 13°08		3°9/17.2 17		
4 11	15 41.92												

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
325006	2008 <i>BO</i> ₄₂		5 14.7 175°68	0°4/14.9	17		40873	1999 <i>TL</i> ₁₂₁		5 14.7 300°47	1°7/13.7	18	
4 11	15 55.85	-20 28.0	2.094	2.934	12.6	21.7	4 11	15 50.48	-15 46.0	1.784	2.648	13.4	18.9
4 21	15 49.23	-20 24.9	2.015	2.938	9.4	21.5	4 21	15 45.56	-15 21.4	1.707	2.643	9.9	18.7
5 1	15 40.54	-20 14.8	1.961	2.940	5.7	21.3	5 1	15 38.48	-14 52.2	1.653	2.637	5.9	18.5
5 11	15 30.54	-19 58.8	1.934	2.942	1.7	21.0	5 11	15 30.01	-14 21.4	1.625	2.632	2.1	18.2
5 21	15 20.18	-19 38.5	1.936	2.943	2.6	21.1	5 21	15 21.12	-13 52.3	1.623	2.627	3.7	18.3
5 31	15 10.48	-19 17.1	1.967	2.943	6.5	21.3	5 31	15 12.88	-13 28.9	1.648	2.622	7.9	18.5
6 10	15 2.31	-18 58.1	2.024	2.942	10.2	21.5	6 10	15 6.21	-13 14.5	1.698	2.617	11.8	18.8
6 20	14 56.26	-18 44.6	2.104	2.941	13.3	21.7	6 20	15 1.72	-13 11.1	1.768	2.612	15.2	19.0
510867	2013 <i>CB</i> ₁₀₇		5 14.7 192°42	0°2/14.9	18		11923	1992 <i>WX</i>		5 14.7 274°54	4°0/12.6	18	
4 11	15 49.60	-20 28.5	2.880	3.717	9.6	22.0	4 11	15 52.65	-11 12.0	1.615	2.483	14.4	17.5
4 21	15 44.19	-20 19.4	2.794	3.716	7.1	21.8	4 21	15 47.52	-10 30.0	1.525	2.461	10.8	17.3
5 1	15 37.36	-20 4.9	2.734	3.713	4.3	21.6	5 1	15 39.86	-9 45.7	1.458	2.439	6.9	17.0
5 11	15 29.65	-19 46.1	2.703	3.711	1.2	21.4	5 11	15 30.44	-9 3.7	1.416	2.417	4.1	16.7
5 21	15 21.69	-19 24.6	2.701	3.708	1.9	21.4	5 21	15 20.32	-8 29.1	1.400	2.394	5.9	16.8
5 31	15 14.15	-19 2.7	2.729	3.704	5.0	21.6	5 31	15 10.72	-8 6.6	1.409	2.371	10.0	17.0
6 10	15 7.63	-18 42.8	2.784	3.700	7.8	21.8	6 10	15 2.81	-7 59.7	1.441	2.348	14.3	17.2
6 20	15 2.57	-18 27.1	2.863	3.696	10.3	22.0	6 20	14 57.36	-8 9.6	1.493	2.325	18.1	17.3
425187	2009 <i>UB</i> ₇₄		5 14.7 64°71	1°9/13.4	17		496662	2016 <i>BK</i> ₄₀		5 14.7 358°67	5°4/12.5	17	
4 11	15 51.40	-18 19.9	1.595	2.461	14.6	21.0	4 11	15 52.01	-9 4.9	1.236	2.118	16.9	21.2
4 21	15 46.06	-17 5.3	1.546	2.483	10.7	20.8	4 21	15 47.32	-8 24.7	1.175	2.117	12.7	20.9
5 1	15 38.59	-15 42.7	1.521	2.506	6.2	20.6	5 1	15 39.77	-7 46.6	1.134	2.116	8.4	20.7
5 11	15 29.96	-14 17.5	1.521	2.528	2.2	20.4	5 11	15 30.39	-7 16.5	1.117	2.116	5.5	20.5
5 21	15 21.29	-12 56.5	1.548	2.551	4.1	20.6	5 21	15 20.52	-6 59.8	1.122	2.116	7.2	20.6
5 31	15 13.62	-11 46.1	1.602	2.573	8.2	20.9	5 31	15 11.60	-7 0.5	1.152	2.116	11.5	20.8
6 10	15 7.80	-10 51.0	1.681	2.596	12.1	21.1	6 10	15 4.86	-7 20.0	1.202	2.117	15.8	21.1
6 20	15 4.26	-10 13.3	1.780	2.618	15.3	21.4	6 20	15 0.99	-7 57.3	1.270	2.119	19.6	21.3
78141	2002 <i>NY</i> ₁₆		5 14.7 300°37	1°1/14.2	17		239981	2001 <i>RH</i> ₁₁₅		5 14.7 126°21	2°7/13.4	18	
4 11	15 52.21	-17 11.3	1.414	2.286	15.8	19.5	4 11	15 55.17	-14 33.6	1.506	2.372	15.3	20.6
4 21	15 47.69	-17 1.8	1.320	2.260	11.9	19.2	4 21	15 49.13	-13 55.0	1.446	2.383	11.3	20.4
5 1	15 40.22	-16 46.1	1.248	2.234	7.2	18.9	5 1	15 40.60	-13 12.3	1.409	2.393	6.8	20.1
5 11	15 30.58	-16 26.2	1.199	2.207	2.1	18.5	5 11	15 30.57	-12 29.6	1.397	2.402	2.9	19.9
5 21	15 19.97	-16 5.0	1.175	2.181	4.0	18.5	5 21	15 20.26	-11 51.7	1.411	2.412	4.7	20.1
5 31	15 9.85	-15 47.2	1.176	2.155	9.4	18.7	5 31	15 10.93	-11 23.2	1.451	2.420	9.1	20.3
6 10	15 1.65	-15 37.4	1.199	2.130	14.6	19.0	6 10	15 3.59	-11 7.6	1.514	2.429	13.2	20.6
6 20	14 56.31	-15 39.1	1.241	2.104	19.1	19.2	6 20	14 58.84	-11 6.2	1.598	2.437	16.7	20.8
480528	2015 <i>MM</i> ₁₃		5 14.7 311°00	11°3/7.9	16		85301	1994 <i>UM</i> ₅		5 14.7 320°47	4°3/16.1	18	
4 11	15 52.27	+15 49.6	2.181	2.975	13.8	20.7	4 11	15 52.21	-26 15.3	1.316	2.177	17.4	18.2
4 21	15 46.46	+16 28.4	2.116	2.962	12.4	20.5	4 21	15 48.09	-27 0.4	1.229	2.157	13.6	17.9
5 1	15 38.82	+16 47.7	2.073	2.950	11.5	20.4	5 1	15 40.66	-27 34.2	1.162	2.137	9.3	17.6
5 11	15 30.07	+16 42.2	2.052	2.938	11.3	20.4	5 11	15 30.76	-27 53.5	1.117	2.117	5.2	17.3
5 21	15 21.02	+16 9.0	2.055	2.926	12.0	20.4	5 21	15 19.73	-27 56.9	1.095	2.098	5.1	17.2
5 31	15 12.55	+15 7.9	2.080	2.915	13.4	20.5	5 31	15 9.30	-27 46.7	1.098	2.081	9.5	17.4
6 10	15 5.45	+13 41.7	2.127	2.904	15.1	20.6	6 10	15 1.11	-27 28.7	1.122	2.064	14.3	17.6
6 20	15 0.21	+11 55.2	2.193	2.893	16.8	20.7	6 20	14 56.22	-27 9.8	1.165	2.047	18.8	17.8
371649	2007 <i>BT</i> ₆₄		5 14.7 70°15	4°2/12.4	17		408278	2013 <i>FB</i> ₂₇		5 14.7 58°56	0°2/14.6	17	
4 11	15 51.26	-10 20.9	1.611	2.481	14.3	21.0	4 11	15 54.39	-19 20.3	1.306	2.176	16.9	21.1
4 21	15 46.07	-9 33.0	1.554	2.491	10.6	20.8	4 21	15 49.06	-19 13.9	1.243	2.181	12.6	20.8
5 1	15 38.69	-8 45.4	1.521	2.501	6.8	20.6	5 1	15 40.80	-18 59.1	1.202	2.187	7.5	20.5
5 11	15 30.03	-8 3.0	1.512	2.512	4.3	20.5	5 11	15 30.67	-18 37.7	1.184	2.192	2.0	20.2
5 21	15 21.14	-7 30.5	1.530	2.522	5.8	20.6	5 21	15 20.08	-18 12.9	1.190	2.198	3.6	20.3
5 31	15 13.10	-7 11.7	1.573	2.533	9.4	20.8	5 31	15 10.52	-17 49.7	1.222	2.203	8.9	20.7
6 10	15 6.80	-7 8.5	1.640	2.544	13.0	21.1	6 10	15 3.24	-17 33.0	1.276	2.209	13.7	20.9
6 20	15 2.79	-7 20.8	1.726	2.554	16.1	21.3	6 20	14 58.92	-17 26.4	1.349	2.215	17.7	21.2
417830	2007 <i>FE</i> ₄₉		5 14.7 60°86	2°8/17.7	18		211562	2003 <i>SV</i> ₉₅		5 14.7 297°78	2°0/15.6	17	
4 11	15 45.78	-32 38.1	4.240	5.031	7.6	21.2	4 11	15 52.10	-24 19.0	1.389	2.251	16.6	19.9
4 21	15 41.13	-32 57.8	4.157	5.037	6.1	21.1	4 21	15 47.68	-24 14.9	1.300	2.232	12.7	19.6
5 1	15 35.44	-33 9.9	4.100	5.043	4.5	21.0	5 1	15 40.22	-23 56.8	1.233	2.213	8.1	19.2
5 11	15 29.12	-33 14.1	4.070	5.049	3.1	20.9	5 11	15 30.59	-23 24.8	1.188	2.194	3.2	18.9
5 21	15 22.62	-33 10.7	4.069	5.055	2.9	20.9	5 21	15 20.08	-22 41.1	1.168	2.175	3.6	18.9
5 31	15 16.40	-33 0.7	4.097	5.061	4.0	20.9	5 31	15 10.27	-21 51.3	1.173	2.157	8.8	19.1
6 10	15 10.90	-32 46.1	4.153	5.067	5.5	21.1	6 10	15 2.55	-21 2.9	1.200	2.139	13.9	19.3
6 20	15 6.46	-32 29.0	4.234	5.073	7.1	21.2	6 20	14 57.84	-20 22.5	1.247	2.121	18.3	19.6
316542	2010 <i>XJ</i> ₂₁		5 14.7 185°23	0°6/15.1	18		370155	2001 <i>XK</i> ₂₆₆		5 14.7 186°98	1°0/14.1	17	
4 11	15 49.62	-20 54.8	2.772	3.610	10.0	20.6	4 11	15 52.87	-16 47.5	2.197	3.046	11.8	21.8
4 21	15 44.28	-21 4.4	2.689	3.610	7.4	20.5	4 21	15 46.94	-16 30.2	2.118	3.046	8.7	21.6
5 1	15 37.46	-21 9.1	2.632	3.610	4.5	20.3	5 1	15 39.14	-16 8.7	2.063	3.045	5.2	21.4
5 11	15 29.70	-21 9.3	2.603	3.610	1.5	20.1	5 11	15 30.18	-15 44.6	2.036	3.044	1.6	21.2
5 21	15 21.65	-21 6.1	2.603	3.609	2.0	20.1	5 21	15 20.89	-15 20.6	2.038	3.042	2.9	21.3
5 31	15 14.02	-21 1.0	2.632	3.609	5.0	20.3	5 31	15 12.18	-14 59.6	2.068	3.039	6.6	21.5
6 10	15 7.45	-20 56.2	2.688	3.608	7.9	20.5	6 10	15 4.83	-14 44.5	2.124	3.036	10.0	21.7
6 20	15 2.39	-20 53.9	2.769	3.608	10.4	20.7	6 20	14 59.39	-14 37.3	2.203	3.033	13.0	21.9
437863	2000 <i>SN</i> ₃₄₇		5 14.7 269°81	2°7/16.9	18		417865	2007 <i>LA</i> ₂₈		5 14.7 359°16</			

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
302820	2003 <i>CJ</i> ₅		5 14.7 13°94'	11.9°/23.8	17		391736	2008 <i>CZ</i> ₁₉₂		5 14.7 53°37'	1°8'/13.5	17	
4 11	15 50.72	-48 9.0	1.503	2.270	20.1	19.3	4 11	15 48.56	-15 19.8	2.092	2.952	11.9	21.2
4 21	15 46.95	-48 54.3	1.443	2.279	17.7	19.1	4 21	15 43.75	-14 48.2	2.027	2.961	8.7	21.0
5 1	15 39.76	-49 7.7	1.399	2.288	15.2	19.0	5 1	15 37.21	-14 13.1	1.986	2.970	5.2	20.8
5 11	15 30.40	-48 44.2	1.374	2.299	13.1	18.9	5 11	15 29.65	-13 37.4	1.973	2.979	2.0	20.6
5 21	15 20.58	-47 43.4	1.370	2.312	12.0	18.8	5 21	15 21.88	-13 4.5	1.986	2.988	3.4	20.7
5 31	15 12.13	-46 10.4	1.387	2.326	12.3	18.9	5 31	15 14.75	-12 37.5	2.027	2.997	6.9	20.9
6 10	15 6.39	-44 16.0	1.426	2.341	13.9	19.0	6 10	15 8.96	-12 19.2	2.094	3.007	10.1	21.1
6 20	15 4.02	-42 12.4	1.486	2.357	16.1	19.2	6 20	15 4.99	-12 11.1	2.182	3.016	13.0	21.4
204334	2004 <i>RW</i> ₂₃₃		5 14.7 126°33'	0°4'/14.5	16		361586	2007 <i>RB</i> ₂₄₀		5 14.7 296°24'	0°1'/14.7	17	
4 11	15 55.14	-19 21.0	1.506	2.368	15.6	20.6	4 11	15 55.56	-17 52.9	1.346	2.214	16.7	20.8
4 21	15 49.26	-19 4.5	1.442	2.375	11.6	20.4	4 21	15 50.56	-18 11.6	1.247	2.184	12.6	20.4
5 1	15 40.76	-18 39.9	1.399	2.382	6.9	20.1	5 1	15 42.21	-18 26.4	1.169	2.153	7.8	20.1
5 11	15 30.64	-18 9.1	1.381	2.389	1.9	19.8	5 11	15 31.24	-18 37.6	1.114	2.122	2.2	19.6
5 21	15 20.15	-17 35.7	1.389	2.395	3.3	19.9	5 21	15 18.93	-18 45.7	1.084	2.091	3.8	19.6
5 31	15 10.61	-17 4.5	1.423	2.402	8.2	20.2	5 31	15 6.95	-18 53.3	1.079	2.060	9.8	19.9
6 10	15 3.11	-16 40.3	1.481	2.407	12.6	20.5	6 10	14 56.99	-19 4.4	1.096	2.030	15.4	20.1
6 20	14 58.28	-16 26.3	1.560	2.413	16.4	20.8	6 20	14 50.23	-19 22.6	1.132	1.999	20.3	20.3
222563	2001 <i>VK</i> ₆₆		5 14.7 157°92'	1°3'/15.6	18		26232	Antink		5 14.7 302°52'	1°5'/15.4	18	
4 11	15 52.83	-24 53.8	2.069	2.907	12.9	20.4	4 11	15 52.23	-22 39.8	1.435	2.298	16.1	18.5
4 21	15 47.01	-24 26.3	1.993	2.912	9.7	20.2	4 21	15 47.69	-22 45.8	1.347	2.280	12.3	18.2
5 1	15 39.20	-23 47.2	1.941	2.917	6.0	19.9	5 1	15 40.21	-22 41.2	1.279	2.261	7.7	17.9
5 11	15 30.19	-22 58.1	1.916	2.922	2.3	19.7	5 11	15 30.61	-22 25.9	1.236	2.242	2.8	17.5
5 21	15 20.92	-22 2.0	1.919	2.926	2.6	19.7	5 21	15 20.14	-22 1.5	1.217	2.224	3.5	17.5
5 31	15 12.37	-21 3.7	1.951	2.930	6.3	20.0	5 31	15 10.31	-21 32.3	1.223	2.206	8.6	17.7
6 10	15 5.38	-20 8.4	2.009	2.933	9.9	20.2	6 10	15 2.48	-21 4.3	1.251	2.188	13.6	18.0
6 20	15 0.46	-19 20.4	2.090	2.936	13.0	20.4	6 20	14 57.56	-20 42.9	1.300	2.171	17.9	18.2
286007	2001 <i>SC</i> ₉₉		5 14.7 260°97'	0°1'/14.7	17		310506	2000 <i>WL</i> ₂₇		5 14.7 145°08'	0°1'/14.7	17	
4 11	15 49.78	-20 12.0	2.191	3.041	11.8	21.4	4 11	15 55.77	-19 54.4	1.786	2.636	14.1	22.0
4 21	15 44.78	-19 53.6	2.104	3.032	8.8	21.2	4 21	15 49.38	-19 41.1	1.718	2.646	10.4	21.8
5 1	15 37.91	-19 28.2	2.041	3.023	5.3	21.0	5 1	15 40.71	-19 20.1	1.674	2.655	6.2	21.5
5 11	15 29.86	-18 57.3	2.005	3.014	1.4	20.7	5 11	15 30.63	-18 53.1	1.655	2.663	1.7	21.2
5 21	15 21.43	-18 23.5	1.998	3.004	2.5	20.8	5 21	15 20.25	-18 22.9	1.664	2.671	2.9	21.3
5 31	15 13.51	-17 50.2	2.018	2.995	6.3	21.0	5 31	15 10.70	-17 53.4	1.701	2.678	7.3	21.6
6 10	15 6.90	-17 21.0	2.063	2.985	9.8	21.2	6 10	15 2.95	-17 28.9	1.763	2.685	11.2	21.9
6 20	15 2.16	-16 58.9	2.132	2.975	12.9	21.4	6 20	14 57.56	-17 12.6	1.847	2.691	14.6	22.1
179521	2002 <i>CG</i> ₁₆₄		5 14.7 170°65'	4°5'/11.5	18		68700	2002 <i>CN</i> ₁₉₈		5 14.7 302°20'	1°6'/13.9	17	
4 11	15 48.75	-4 40.4	2.572	3.422	10.3	20.6	4 11	15 50.42	-16 18.9	1.662	2.529	14.1	19.8
4 21	15 43.59	-4 6.0	2.503	3.424	7.9	20.4	4 21	15 45.77	-15 55.4	1.578	2.516	10.4	19.6
5 1	15 37.01	-3 35.4	2.459	3.426	5.6	20.3	5 1	15 38.75	-15 26.4	1.517	2.502	6.3	19.3
5 11	15 29.58	-3 12.0	2.442	3.427	4.5	20.2	5 11	15 30.15	-14 54.8	1.482	2.489	2.1	19.0
5 21	15 21.94	-2 58.3	2.454	3.428	5.4	20.3	5 21	15 20.99	-14 24.2	1.472	2.476	3.8	19.1
5 31	15 14.78	-2 56.1	2.493	3.429	7.6	20.4	5 31	15 12.45	-13 58.9	1.489	2.464	8.3	19.3
6 10	15 8.68	-3 6.3	2.557	3.430	10.1	20.6	6 10	15 5.56	-13 42.7	1.529	2.451	12.6	19.5
6 20	15 4.08	-3 28.3	2.644	3.430	12.3	20.7	6 20	15 1.03	-13 38.2	1.589	2.439	16.3	19.7
17075	Pankonin		5 14.7 236°23'	2°8'/16.0	17		338751	2003 <i>UF</i> ₁₇₀		5 14.7 286°49'	2°1'/15.7	17	
4 11	15 56.94	-26 1.2	1.769	2.605	14.8	18.4	4 11	15 52.93	-24 1.3	1.893	2.738	13.6	20.3
4 21	15 50.73	-26 18.2	1.677	2.593	11.4	18.2	4 21	15 47.59	-24 21.6	1.801	2.722	10.4	20.0
5 1	15 41.81	-26 23.7	1.608	2.580	7.5	17.9	5 1	15 39.86	-24 33.4	1.731	2.707	6.7	19.8
5 11	15 31.00	-26 16.3	1.564	2.566	3.7	17.7	5 11	15 30.47	-24 35.8	1.687	2.691	3.0	19.5
5 21	15 19.45	-25 56.6	1.548	2.552	3.7	17.6	5 21	15 20.42	-24 29.3	1.670	2.676	3.2	19.5
5 31	15 8.51	-25 27.7	1.558	2.537	7.7	17.8	5 31	15 10.88	-24 16.4	1.681	2.660	7.1	19.7
6 10	14 59.40	-24 55.2	1.594	2.521	11.8	18.0	6 10	15 2.92	-24 1.1	1.716	2.645	11.0	19.9
6 20	14 52.94	-24 24.6	1.651	2.505	15.6	18.2	6 20	14 57.28	-23 47.6	1.773	2.630	14.5	20.1
473611	2015 <i>XX</i> ₂₇₃		5 14.7 65°28'	3°7'/13.3	18		297048	2010 <i>HD</i> ₂₄		5 14.7 271°30'	0°3'/14.3	18	
4 11	15 54.95	-12 6.2	1.207	2.086	17.4	20.5	4 11	15 41.73	-19 4.8	4.449	5.290	6.4	20.6
4 21	15 49.50	-11 41.9	1.151	2.093	13.0	20.3	4 21	15 38.06	-18 36.6	4.361	5.286	4.7	20.4
5 1	15 41.06	-11 17.1	1.115	2.100	8.0	20.0	5 1	15 33.60	-18 5.0	4.300	5.281	2.8	20.3
5 11	15 30.75	-10 56.1	1.102	2.106	3.9	19.8	5 11	15 28.66	-17 31.3	4.269	5.277	0.8	20.1
5 21	15 20.02	-10 43.2	1.113	2.114	5.8	19.9	5 21	15 23.60	-16 57.1	4.267	5.272	1.4	20.2
5 31	15 10.40	-10 42.4	1.148	2.121	10.6	20.2	5 31	15 18.79	-16 23.9	4.295	5.268	3.4	20.3
6 10	15 3.13	-10 55.9	1.205	2.128	15.2	20.5	6 10	15 14.56	-15 53.6	4.351	5.263	5.3	20.4
6 20	14 58.89	-11 23.7	1.280	2.135	19.1	20.8	6 20	15 11.16	-15 27.3	4.433	5.259	7.0	20.6
55743	1990 <i>RF</i> ₆		5 14.7 208°50'	1°6'/13.4	18		236224	2005 <i>XE</i> ₂		5 14.7 321°44'	1°4'/14.2	16	
4 11	15 48.92	-14 30.1	2.925	3.772	9.3	20.1	4 11	15 53.88	-16 25.4	1.221	2.099	17.4	20.6
4 21	15 43.65	-13 59.8	2.838	3.765	6.8	20.0	4 21	15 49.01	-16 21.1	1.151	2.093	12.9	20.3
5 1	15 37.04	-13 26.8	2.777	3.757	4.1	19.8	5 1	15 40.98	-16 11.7	1.102	2.088	7.8	20.0
5 11	15 29.60	-12 53.3	2.744	3.750	1.8	19.6	5 11	15 30.81	-15 59.6	1.075	2.083	2.3	19.6
5 21	15 21.91	-12 21.7	2.742	3.741	2.9	19.7	5 21	15 19.94	-15 47.9	1.072	2.078	4.2	19.7
5 31	15 14.61	-11 54.3	2.768	3.732	5.6	19.8	5 31	15 9.98	-15 40.8	1.094	2.074	9.8	20.0
6 10	15 8.27	-11 33.6	2.822	3.723	8.3	20.0	6 10	15 2.34	-15 42.5	1.136	2.070	14.9	20.3
6 20	15 3.30	-11 20.8	2.900	3.713	10.7	20.1	6 20	14 57.84	-15 55.4	1.198	2.066	19.3	20.5
506878	2008 <i>AO</i> ₃₇		5 14.7 112°79'	1°1'/15.5	17		125202	2001 <i>US</i> ₁₄₀		5 14.7 84°46			

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
363460	2003 <i>SJ</i> ₂₃₇		5 14.7 259°35	1.8/13.7	17		199275	2006 <i>BU</i> ₃₂		5 14.7 243°29	2.4/13.3	18	
4 11	15 52.73	-16 59.3	1.624	2.488	14.5	21.1	4 11	15 51.09	-13 41.9	1.993	2.852	12.4	20.4
4 21	15 47.56	-16 17.9	1.537	2.473	10.8	20.9	4 21	15 45.86	-13 12.0	1.911	2.844	9.2	20.2
5 1	15 39.88	-15 28.6	1.473	2.458	6.5	20.6	5 1	15 38.64	-12 39.3	1.853	2.836	5.6	20.0
5 11	15 30.49	-14 34.8	1.435	2.442	2.3	20.3	5 11	15 30.14	-12 6.9	1.822	2.827	2.6	19.7
5 21	15 20.50	-13 41.2	1.422	2.426	4.1	20.4	5 21	15 21.24	-11 38.0	1.818	2.818	4.0	19.8
5 31	15 11.14	-12 53.6	1.436	2.409	8.8	20.6	5 31	15 12.89	-11 16.1	1.842	2.809	7.7	20.0
6 10	15 3.55	-12 17.3	1.474	2.392	13.2	20.8	6 10	15 5.95	-11 4.2	1.890	2.799	11.3	20.2
6 20	14 58.43	-11 55.5	1.532	2.375	17.1	21.0	6 20	15 1.01	-11 3.6	1.960	2.789	14.4	20.4
393941	2005 <i>UO</i> ₁₆₇		5 14.7 117°53	1.6/13.3	18		204856	2007 <i>RS</i> ₁₅₅		5 14.7 172°35	0.4/15.2	18	
4 11	15 47.67	-16 43.7	2.463	3.316	10.5	21.9	4 11	15 45.45	-21 44.4	3.949	4.781	7.4	22.1
4 21	15 42.88	-15 46.2	2.390	3.322	7.7	21.7	4 21	15 40.86	-21 31.3	3.865	4.783	5.5	22.0
5 1	15 36.63	-14 43.5	2.344	3.327	4.6	21.6	5 1	15 35.30	-21 13.8	3.808	4.785	3.3	21.8
5 11	15 29.51	-13 39.0	2.326	3.332	1.8	21.4	5 11	15 29.17	-20 52.7	3.780	4.787	1.1	21.6
5 21	15 22.23	-12 36.6	2.336	3.337	3.1	21.5	5 21	15 22.89	-20 29.2	3.782	4.789	1.4	21.7
5 31	15 15.49	-11 40.2	2.376	3.342	6.2	21.7	5 31	15 16.92	-20 5.0	3.814	4.790	3.7	21.9
6 10	15 9.90	-10 53.1	2.441	3.347	9.2	21.9	6 10	15 11.65	-19 42.0	3.874	4.791	5.8	22.0
6 20	15 5.88	-10 17.5	2.530	3.352	11.8	22.1	6 20	15 7.41	-19 21.9	3.960	4.791	7.7	22.1
366501	2002 <i>PS</i> ₂₉		5 14.7 275°16	4.4/12.2	17		454231	2013 <i>JE</i> ₅₀		5 14.7 43°02	2.2/13.6	16	
4 11	15 51.30	-11 4.4	1.588	2.458	14.4	21.0	4 11	15 51.46	-17 31.0	1.262	2.140	16.9	21.4
4 21	15 46.47	-10 8.7	1.506	2.443	10.8	20.7	4 21	15 46.84	-16 35.3	1.203	2.147	12.4	21.1
5 1	15 39.20	-9 10.2	1.446	2.428	7.0	20.4	5 1	15 39.45	-15 30.5	1.166	2.153	7.4	20.8
5 11	15 30.30	-8 14.4	1.412	2.412	4.4	20.3	5 11	15 30.36	-14 21.8	1.153	2.160	2.6	20.6
5 21	15 20.83	-7 27.0	1.404	2.396	6.2	20.3	5 21	15 20.94	-13 16.4	1.164	2.168	4.7	20.7
5 31	15 11.99	-6 53.5	1.420	2.380	10.2	20.5	5 31	15 12.59	-12 21.4	1.199	2.175	9.7	21.0
6 10	15 4.85	-6 37.5	1.460	2.364	14.3	20.7	6 10	15 6.44	-11 42.4	1.256	2.183	14.4	21.3
6 20	15 0.12	-6 39.9	1.519	2.348	17.9	20.9	6 20	15 3.09	-11 21.8	1.332	2.191	18.3	21.6
507726	2013 <i>WX</i> ₁₂		5 14.7 220°30	0.8/14.2	17		304445	2006 <i>TD</i> ₁₃₀		5 14.7 300°14	7.5/9.5	18	
4 11	15 51.94	-17 56.2	2.129	2.980	12.1	22.5	4 11	15 48.21	+ 0 38.6	2.018	2.872	12.5	20.0
4 21	15 46.39	-17 32.1	2.044	2.973	8.9	22.3	4 21	15 43.65	+ 1 41.0	1.945	2.859	10.1	19.8
5 1	15 38.91	-17 2.1	1.983	2.965	5.3	22.1	5 1	15 37.28	+ 2 35.7	1.895	2.847	8.2	19.6
5 11	15 30.19	-16 28.4	1.949	2.957	1.5	21.8	5 11	15 29.76	+ 3 16.9	1.871	2.834	7.5	19.6
5 21	15 21.08	-15 53.7	1.943	2.948	2.9	21.9	5 21	15 21.88	+ 3 40.1	1.872	2.822	8.7	19.6
5 31	15 12.51	-15 21.7	1.966	2.939	6.8	22.1	5 31	15 14.52	+ 3 42.7	1.898	2.810	11.0	19.7
6 10	15 5.32	-14 55.9	2.014	2.929	10.4	22.3	6 10	15 8.44	+ 3 24.2	1.946	2.798	13.6	19.9
6 20	15 0.08	-14 38.9	2.085	2.919	13.5	22.5	6 20	15 4.20	+ 2 46.3	2.013	2.786	16.0	20.0
137228	1999 <i>RT</i> ₂₀		5 14.7 254°29	3.4/16.4	18 R		391572	2007 <i>TO</i> ₂₃₃		5 14.7 253°83	0.8/14.2	17	
4 11	15 54.93	-27 53.3	1.678	2.516	15.4	20.4	4 11	15 50.51	-17 25.9	2.136	2.990	11.9	21.7
4 21	15 49.37	-28 3.5	1.589	2.504	12.0	20.1	4 21	15 45.35	-17 11.2	2.052	2.982	8.8	21.5
5 1	15 41.06	-27 59.4	1.522	2.491	8.1	19.9	5 1	15 38.31	-16 51.8	1.992	2.975	5.2	21.3
5 11	15 30.85	-27 39.7	1.479	2.478	4.3	19.6	5 11	15 30.05	-16 29.4	1.959	2.967	1.5	21.0
5 21	15 19.93	-27 5.5	1.462	2.465	4.1	19.6	5 21	15 21.40	-16 6.4	1.955	2.960	2.8	21.1
5 31	15 9.69	-26 20.8	1.472	2.452	7.9	19.7	5 31	15 13.28	-15 46.0	1.977	2.952	6.6	21.3
6 10	15 1.36	-25 32.2	1.506	2.438	12.1	20.0	6 10	15 6.49	-15 31.1	2.026	2.944	10.2	21.5
6 20	14 55.76	-24 46.2	1.562	2.424	15.9	20.2	6 20	15 1.59	-15 23.9	2.097	2.936	13.3	21.7
213551	2002 <i>JB</i> ₁₃₁		5 14.7 64°90	6.4/12.7	18		499737	2011 <i>BN</i> ₄₆		5 14.7 210°54	0.6/14.3	17	
4 11	15 56.93	- 4 38.1	1.301	2.170	17.1	19.5	4 11	15 53.17	-18 50.4	2.209	3.054	11.9	22.4
4 21	15 50.47	- 4 17.2	1.260	2.192	13.0	19.3	4 21	15 47.25	-18 21.5	2.121	3.047	8.8	22.1
5 1	15 41.38	- 4 5.2	1.241	2.215	8.9	19.1	5 1	15 39.41	-17 45.8	2.058	3.039	5.2	21.9
5 11	15 30.84	- 4 6.7	1.245	2.237	6.5	19.0	5 11	15 30.35	-17 5.3	2.022	3.030	1.5	21.6
5 21	15 20.18	- 4 24.5	1.274	2.260	7.8	19.1	5 21	15 20.91	-16 23.1	2.016	3.021	2.8	21.7
5 31	15 10.77	- 4 59.2	1.328	2.283	11.2	19.4	5 31	15 12.02	-15 42.9	2.038	3.011	6.6	21.9
6 10	15 3.60	- 5 49.4	1.403	2.305	14.9	19.7	6 10	15 4.49	-15 8.6	2.086	3.000	10.2	22.1
6 20	14 59.21	- 6 52.3	1.498	2.328	18.1	20.0	6 20	14 58.89	-14 43.1	2.157	2.988	13.2	22.3
34128	Hannahbrown		5 14.7 307°68	5.1/17.8	17		10483	Tomburns		5 14.7 231°87	2.7/13.2	18	
4 11	15 51.67	-33 26.8	2.056	2.869	13.9	18.6	4 11	15 54.10	-14 7.0	1.720	2.581	14.0	18.0
4 21	15 46.60	-33 49.5	1.967	2.860	11.2	18.4	4 21	15 48.40	-13 27.8	1.637	2.570	10.4	17.8
5 1	15 39.23	-33 56.9	1.901	2.851	8.3	18.2	5 1	15 40.31	-12 44.1	1.576	2.559	6.4	17.5
5 11	15 30.32	-33 47.2	1.859	2.843	5.8	18.1	5 11	15 30.63	-11 59.7	1.542	2.547	2.9	17.3
5 21	15 20.88	-33 20.7	1.844	2.834	5.3	18.0	5 21	15 20.42	-11 19.0	1.535	2.534	4.6	17.3
5 31	15 12.04	-32 40.1	1.855	2.826	7.3	18.1	5 31	15 10.85	-10 46.6	1.554	2.521	8.8	17.6
6 10	15 4.82	-31 50.9	1.891	2.818	10.3	18.3	6 10	15 2.96	-10 26.5	1.598	2.507	12.9	17.8
6 20	14 59.90	-30 59.1	1.950	2.810	13.3	18.5	6 20	14 57.44	-10 20.6	1.662	2.493	16.5	18.0
438120	2005 <i>QW</i> ₉		5 14.7 298°14	1.9/13.4	16		333938	1999 <i>VR</i> ₁₁₉		5 14.7 282°82	1.1/15.3	17	
4 11	15 48.31	-15 57.7	2.040	2.902	12.1	21.4	4 11	15 51.14	-23 0.8	1.850	2.700	13.6	21.1
4 21	15 43.89	-15 14.3	1.943	2.878	9.0	21.1	4 21	15 46.18	-22 49.8	1.764	2.690	10.3	20.8
5 1	15 37.52	-14 24.9	1.870	2.854	5.4	20.9	5 1	15 38.97	-22 28.7	1.701	2.680	6.4	20.6
5 11	15 29.84	-13 32.6	1.824	2.830	2.2	20.6	5 11	15 30.26	-21 58.3	1.663	2.670	2.2	20.3
5 21	15 21.67	-12 41.3	1.805	2.806	3.7	20.7	5 21	15 21.06	-21 21.2	1.653	2.660	2.8	20.3
5 31	15 13.93	-11 55.8	1.813	2.782	7.6	20.9	5 31	15 12.47	-20 41.4	1.669	2.650	7.0	20.5
6 10	15 7.50	-11 20.0	1.846	2.758	11.3	21.0	6 10	15 5.48	-20 4.0	1.711	2.640	11.0	20.8
6 20	15 2.97	-10 56.8	1.900	2.735	14.6	21.2	6 20	15 0.74	-19 33.2	1.774	2.630	14.6	21.0
216012	2005 <i>UX</i> ₈₀		5 14.7 221°24	5.5/10.5	18		136296	2004 <i>BR</i> ₂		5 14.7			

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
33983	2000 <i>NV</i> ₂₃		5 14.7 92°23	5°0/17.4	18		215850	2005 <i>ED</i> ₁₅		5 14.7 25°49	2°6/13.6	17	
4 11	15 58.36	-31 45.3	1.488	2.317	17.4	18.1	4 11	15 50.57	-15 13.9	1.164	2.050	17.4	20.1
4 21	15 51.82	-31 56.1	1.431	2.337	13.7	17.9	4 21	15 46.36	-14 41.7	1.111	2.057	12.8	19.8
5 1	15 42.35	-31 47.2	1.395	2.356	9.6	17.7	5 1	15 39.25	-14 4.5	1.078	2.065	7.7	19.6
5 11	15 31.16	-31 17.1	1.383	2.375	5.9	17.6	5 11	15 30.36	-13 27.0	1.067	2.074	3.0	19.3
5 21	15 19.71	-30 28.2	1.396	2.394	5.3	17.6	5 21	15 21.10	-12 54.7	1.080	2.084	5.0	19.5
5 31	15 9.52	-29 26.6	1.435	2.412	8.3	17.8	5 31	15 12.95	-12 32.8	1.116	2.094	10.0	19.8
6 10	15 1.76	-28 20.9	1.498	2.430	12.1	18.0	6 10	15 7.09	-12 25.2	1.174	2.105	14.7	20.1
6 20	14 57.00	-27 18.8	1.582	2.448	15.5	18.3	6 20	15 4.13	-12 32.8	1.249	2.117	18.7	20.4
439165	2011 <i>UC</i> ₃₄₃		5 14.7 243°05	0°2/14.6	18		294057	2007 <i>TA</i> ₁₅₆		5 14.7 153°45	0°3/14.9	16	
4 11	15 48.87	-20 29.5	2.569	3.413	10.5	21.3	4 11	15 55.29	-21 45.6	1.902	2.747	13.6	21.7
4 21	15 43.89	-19 56.8	2.476	3.401	7.8	21.1	4 21	15 48.95	-21 17.5	1.831	2.756	10.1	21.5
5 1	15 37.34	-19 16.9	2.408	3.389	4.6	20.9	5 1	15 40.45	-20 39.7	1.784	2.764	6.1	21.2
5 11	15 29.78	-18 31.6	2.369	3.377	1.3	20.6	5 11	15 30.66	-19 54.2	1.764	2.771	1.8	21.0
5 21	15 21.92	-17 43.8	2.358	3.364	2.2	20.7	5 21	15 20.59	-19 4.4	1.771	2.778	2.7	21.0
5 31	15 14.50	-16 56.8	2.376	3.351	5.7	20.9	5 31	15 11.34	-18 15.1	1.807	2.784	6.9	21.3
6 10	15 8.18	-16 14.2	2.421	3.338	8.8	21.0	6 10	15 3.78	-17 31.2	1.869	2.790	10.8	21.6
6 20	15 3.46	-15 39.0	2.490	3.324	11.6	21.2	6 20	14 58.48	-16 56.4	1.953	2.794	14.0	21.8
61695	2000 <i>QD</i> ₁₃₂		5 14.7 308°38	2°8/15.8	18		82153	Alemigliorini		5 14.7 297°45	4°4/11.8	18	
4 11	15 52.88	-24 17.0	1.260	2.127	17.7	19.5	4 11	15 49.00	-9 32.5	1.872	2.739	12.8	19.7
4 21	15 48.61	-24 37.9	1.176	2.109	13.6	19.2	4 21	15 44.34	-8 34.5	1.800	2.734	9.6	19.5
5 1	15 41.01	-24 46.5	1.112	2.092	8.8	18.8	5 1	15 37.74	-7 36.1	1.751	2.730	6.3	19.3
5 11	15 30.95	-24 41.5	1.070	2.075	3.9	18.5	5 11	15 29.93	-6 42.3	1.729	2.725	4.4	19.2
5 21	15 19.86	-24 23.5	1.052	2.058	4.2	18.5	5 21	15 21.79	-5 58.0	1.733	2.721	5.9	19.2
5 31	15 9.48	-23 56.6	1.057	2.042	9.4	18.7	5 31	15 14.26	-5 27.2	1.763	2.716	9.1	19.4
6 10	15 1.40	-23 27.7	1.084	2.026	14.6	18.9	6 10	15 8.16	-5 12.5	1.817	2.712	12.4	19.6
6 20	14 56.65	-23 3.4	1.129	2.011	19.3	19.2	6 20	15 4.05	-5 14.3	1.892	2.708	15.4	19.8
3975	Verdi		5 14.7 138°08	0°3/14.5	18 R		140892	2001 <i>VG</i> ₃₁		5 14.7 168°03	2°0/13.6	18	
4 11	15 50.40	-19 23.1	2.155	3.006	11.9	17.1	4 11	15 52.17	-11 51.8	2.421	3.270	10.9	19.8
4 21	15 45.18	-19 1.7	2.081	3.010	8.8	16.9	4 21	15 46.30	-11 54.2	2.344	3.272	8.0	19.6
5 1	15 38.14	-18 33.9	2.031	3.013	5.2	16.7	5 1	15 38.76	-11 57.1	2.293	3.273	4.9	19.4
5 11	15 30.01	-18 1.6	2.008	3.017	1.4	16.4	5 11	15 30.20	-12 1.9	2.270	3.275	2.2	19.2
5 21	15 21.60	-17 27.6	2.014	3.020	2.6	16.5	5 21	15 21.34	-12 10.0	2.276	3.276	3.3	19.3
5 31	15 13.80	-16 55.3	2.047	3.023	6.3	16.7	5 31	15 12.98	-12 22.9	2.311	3.277	6.4	19.5
6 10	15 7.36	-16 28.2	2.106	3.026	9.8	17.0	6 10	15 5.82	-12 41.6	2.372	3.277	9.4	19.7
6 20	15 2.80	-16 8.9	2.188	3.029	12.7	17.2	6 20	15 0.35	-13 6.7	2.457	3.278	12.1	19.9
456856	2007 <i>UY</i> ₁₂₆		5 14.7 73°05	1°0/14.3	18		260490	2005 <i>CY</i> ₆₆		5 14.7 76°90	1°5/14.0	18	
4 11	15 56.29	-17 8.0	1.417	2.282	16.2	21.5	4 11	15 54.39	-16 41.4	1.425	2.293	15.9	20.3
4 21	15 50.02	-17 0.1	1.369	2.305	11.9	21.3	4 21	15 48.72	-16 19.3	1.370	2.307	11.7	20.1
5 1	15 41.16	-16 46.9	1.343	2.327	7.0	21.1	5 1	15 40.47	-15 51.6	1.336	2.321	6.9	19.9
5 11	15 30.83	-16 30.6	1.341	2.349	2.0	20.8	5 11	15 30.68	-15 21.5	1.327	2.335	2.2	19.6
5 21	15 20.32	-16 14.2	1.366	2.371	3.6	21.0	5 21	15 20.62	-14 52.9	1.344	2.349	3.9	19.8
5 31	15 10.97	-16 1.6	1.416	2.394	8.4	21.3	5 31	15 11.61	-14 30.3	1.387	2.363	8.7	20.1
6 10	15 3.79	-15 56.2	1.490	2.415	12.6	21.6	6 10	15 4.68	-14 17.5	1.452	2.377	13.0	20.4
6 20	14 59.33	-16 0.0	1.584	2.437	16.2	21.9	6 20	15 0.41	-14 16.3	1.538	2.391	16.6	20.6
263220	2008 <i>AV</i> ₄₀		5 14.7 101°25	3°5/16.5	17		217019	2001 <i>KP</i> ₅		5 14.7 334°16	0°5/14.5	17	
4 11	15 55.29	-27 49.4	1.601	2.441	15.9	21.1	4 11	15 48.08	-19 36.9	1.218	2.101	17.0	19.6
4 21	15 49.51	-28 2.6	1.532	2.448	12.2	20.9	4 21	15 44.82	-19 14.9	1.141	2.086	12.7	19.3
5 1	15 41.03	-28 1.3	1.485	2.455	8.2	20.7	5 1	15 38.57	-18 42.0	1.085	2.072	7.7	19.0
5 11	15 30.84	-27 44.5	1.462	2.462	4.4	20.5	5 11	15 30.26	-18 1.0	1.051	2.059	2.1	18.6
5 21	15 20.21	-27 13.7	1.466	2.469	4.1	20.5	5 21	15 21.20	-17 16.6	1.040	2.048	3.8	18.7
5 31	15 10.52	-26 33.6	1.495	2.475	7.7	20.7	5 31	15 12.94	-16 35.1	1.053	2.037	9.5	19.0
6 10	15 2.90	-25 50.5	1.549	2.482	11.7	20.9	6 10	15 6.84	-16 3.3	1.086	2.027	14.8	19.2
6 20	14 58.01	-25 10.5	1.624	2.488	15.3	21.2	6 20	15 3.73	-15 45.4	1.138	2.019	19.2	19.5
247149	2000 <i>XM</i> ₂₃		5 14.7 157°16	3°6/17.8	18		117152	2004 <i>QO</i> ₁		5 14.7 286°88	1°6/15.4	18	
4 11	15 51.56	-33 12.4	3.025	3.818	10.3	21.4	4 11	15 55.78	-21 24.3	2.293	3.128	11.9	19.3
4 21	15 45.72	-33 20.5	2.943	3.825	8.2	21.2	4 21	15 49.33	-22 12.3	2.203	3.120	9.0	19.1
5 1	15 38.35	-33 17.1	2.886	3.832	6.0	21.1	5 1	15 40.79	-22 56.3	2.138	3.113	5.7	18.9
5 11	15 30.05	-33 1.7	2.855	3.837	4.1	21.0	5 11	15 30.82	-23 34.9	2.101	3.105	2.3	18.6
5 21	15 21.52	-32 35.1	2.853	3.843	3.7	20.9	5 21	15 20.28	-24 7.2	2.093	3.098	2.7	18.6
5 31	15 13.49	-31 59.5	2.881	3.848	5.2	21.1	5 31	15 10.15	-24 33.7	2.114	3.091	6.1	18.9
6 10	15 6.60	-31 18.6	2.935	3.853	7.4	21.2	6 10	15 1.35	-24 56.3	2.163	3.083	9.5	19.0
6 20	15 1.31	-30 36.0	3.015	3.857	9.6	21.4	6 20	14 54.53	-25 17.4	2.235	3.076	12.5	19.2
426411	2013 <i>PC</i> ₇₂		5 14.7 282°00	4°3/12.4	17		227478	2005 <i>WY</i> ₁₈₈		5 14.7 192°80	1°6/13.8	17	
4 11	15 51.05	-10 49.8	1.599	2.470	14.3	21.1	4 11	15 52.49	-15 38.6	2.147	2.999	11.9	21.5
4 21	15 46.27	-10 0.2	1.519	2.457	10.8	20.8	4 21	15 46.74	-15 12.3	2.068	2.997	8.8	21.3
5 1	15 39.10	-9 8.9	1.462	2.443	7.0	20.6	5 1	15 39.12	-14 42.0	2.013	2.995	5.3	21.0
5 11	15 30.33	-8 20.8	1.430	2.430	4.3	20.4	5 11	15 30.32	-14 10.2	1.986	2.992	1.9	20.8
5 21	15 21.02	-7 41.3	1.423	2.417	6.0	20.5	5 21	15 21.20	-13 39.9	1.987	2.989	3.3	20.9
5 31	15 12.35	-7 15.4	1.442	2.403	10.0	20.6	5 31	15 12.65	-13 14.2	2.016	2.986	6.9	21.1
6 10	15 5.37	-7 6.0	1.484	2.390	14.0	20.8	6 10	15 5.47	-12 56.3	2.071	2.981	10.4	21.3
6 20	15 0.76	-7 14.0	1.545	2.377	17.5	21.0	6 20	15 0.20	-12 48.0	2.149	2.977	13.4	21.5
347820	2002 <i>OQ</i> ₁₁		5 14.7 260°46	3°2/12.2	16		173285	1999 <i>TL</i> ₁₁₈		5 14.7 297°46	0°3/14.9		

EPHEMERIDES

5 14.7

5 14.7

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
10717	Dickwalker		5 14.7 205°41	2°4/13.6	18		172706	2004 BQ ₃₅		5 14.7 166°96	0°3/14.9	18	
4 11	15 55.81	-13 15.7	1.819	2.674	13.6	18.8	4 11	15 51.00	-20 40.2	2.100	2.949	12.3	20.4
4 21	15 49.53	-12 57.6	1.739	2.669	10.1	18.6	4 21	15 45.75	-20 32.4	2.023	2.950	9.1	20.2
5 1	15 40.95	-12 37.6	1.683	2.664	6.2	18.3	5 1	15 38.58	-20 17.8	1.970	2.950	5.5	20.0
5 11	15 30.86	-12 18.2	1.653	2.658	2.7	18.1	5 11	15 30.20	-19 57.4	1.943	2.951	1.6	19.7
5 21	15 20.30	-12 2.6	1.651	2.652	4.2	18.2	5 21	15 21.49	-19 33.5	1.944	2.951	2.4	19.8
5 31	15 10.38	-11 53.8	1.677	2.644	8.2	18.4	5 31	15 13.37	-19 9.1	1.973	2.951	6.3	20.0
6 10	15 2.12	-11 54.4	1.727	2.636	12.2	18.6	6 10	15 6.66	-18 47.7	2.028	2.952	9.9	20.2
6 20	14 56.15	-12 5.7	1.799	2.628	15.5	18.8	6 20	15 1.91	-18 32.3	2.105	2.952	12.9	20.4
504606	2008 UM ₁₅₃		5 14.7 210°17	0°8/14.2	17		171748	2000 YM ₂		5 14.7 78°33	5°8/17.9	18	
4 11	15 51.26	-17 56.4	2.120	2.972	12.1	22.1	4 11	15 57.06	-33 32.2	1.473	2.299	17.7	19.7
4 21	15 45.90	-17 31.7	2.039	2.969	8.9	21.9	4 21	15 51.02	-33 48.1	1.415	2.316	14.1	19.5
5 1	15 38.65	-17 1.3	1.982	2.965	5.3	21.7	5 1	15 41.98	-33 42.6	1.376	2.332	10.2	19.3
5 11	15 30.21	-16 27.3	1.952	2.960	1.5	21.4	5 11	15 31.15	-33 13.9	1.361	2.349	6.8	19.1
5 21	15 21.41	-15 52.6	1.951	2.956	2.9	21.5	5 21	15 20.00	-32 23.9	1.371	2.366	6.0	19.1
5 31	15 13.19	-15 20.8	1.977	2.951	6.7	21.7	5 31	15 10.10	-31 18.7	1.406	2.382	8.6	19.3
6 10	15 6.34	-14 55.4	2.029	2.946	10.2	21.9	6 10	15 2.62	-30 7.4	1.465	2.398	12.2	19.6
6 20	15 1.41	-14 38.8	2.104	2.940	13.3	22.1	6 20	14 58.19	-28 58.5	1.545	2.415	15.6	19.8
308916	2006 SD ₂₉₂		5 14.7 123°60	1°6/13.8	18		62777	2000 UE ₂₁		5 14.7 231°64	0°5/14.3	18	
4 11	15 54.98	-11 53.0	2.925	3.761	9.6	20.7	4 11	15 49.61	-17 59.8	2.719	3.564	10.0	20.3
4 21	15 47.99	-12 6.2	2.859	3.779	7.0	20.6	4 21	15 44.38	-17 44.2	2.627	3.553	7.3	20.1
5 1	15 39.62	-12 19.8	2.819	3.797	4.3	20.4	5 1	15 37.64	-17 24.2	2.560	3.542	4.4	19.9
5 11	15 30.43	-12 34.6	2.809	3.814	1.8	20.3	5 11	15 29.94	-17 1.3	2.522	3.530	1.2	19.6
5 21	15 21.09	-12 51.3	2.831	3.831	2.7	20.4	5 21	15 21.91	-16 37.4	2.513	3.518	2.3	19.7
5 31	15 12.24	-13 10.7	2.883	3.847	5.4	20.6	5 31	15 14.28	-16 14.9	2.532	3.506	5.5	19.9
6 10	15 4.49	-13 33.8	2.964	3.862	8.0	20.8	6 10	15 7.67	-15 56.4	2.579	3.493	8.5	20.1
6 20	14 58.24	-14 0.9	3.069	3.878	10.2	20.9	6 20	15 2.58	-15 43.9	2.650	3.480	11.1	20.2
143589	2003 FJ ₄₆		5 14.7 73°17	1°9/15.7	18		196191	2003 AX ₃₄		5 14.7 159°58	1°1/15.3	16	
4 11	15 55.24	-24 3.6	1.628	2.476	15.3	20.3	4 11	15 56.32	-23 42.0	1.564	2.414	15.7	20.8
4 21	15 49.19	-24 11.4	1.572	2.496	11.5	20.1	4 21	15 50.21	-23 17.9	1.493	2.419	11.8	20.6
5 1	15 40.69	-24 8.2	1.539	2.515	7.2	19.9	5 1	15 41.44	-22 40.5	1.445	2.424	7.3	20.4
5 11	15 30.76	-23 54.2	1.530	2.535	3.0	19.6	5 11	15 31.01	-21 51.5	1.421	2.428	2.5	20.1
5 21	15 20.58	-23 31.5	1.548	2.555	3.2	19.7	5 21	15 20.20	-20 54.8	1.425	2.432	3.1	20.1
5 31	15 11.41	-23 4.3	1.593	2.574	7.3	20.0	5 31	15 10.34	-19 56.4	1.455	2.435	7.9	20.4
6 10	15 4.23	-22 37.7	1.662	2.593	11.2	20.3	6 10	15 2.55	-19 3.1	1.509	2.437	12.3	20.7
6 20	14 59.60	-22 15.8	1.753	2.612	14.6	20.5	6 20	14 57.47	-18 20.0	1.584	2.439	16.1	20.9
338372	2002 XM ₁₂₀		5 14.7 271°29	1°8/12.7	18		20918	6539 P-L		5 14.7 306°43	4°4/12.0	18	
4 11	15 42.57	-10 15.2	4.347	5.195	6.4	20.8	4 11	15 49.39	-10 16.6	1.717	2.587	13.5	18.1
4 21	15 38.72	-9 59.5	4.262	5.189	4.8	20.6	4 21	15 44.83	-9 18.5	1.644	2.581	10.2	17.9
5 1	15 34.05	-9 44.2	4.205	5.182	3.0	20.5	5 1	15 38.14	-8 19.2	1.594	2.574	6.6	17.7
5 11	15 28.90	-9 30.7	4.176	5.175	1.8	20.4	5 11	15 30.10	-7 23.9	1.570	2.568	4.4	17.5
5 21	15 23.61	-9 20.2	4.177	5.169	2.5	20.4	5 21	15 21.67	-6 38.1	1.572	2.562	6.0	17.6
5 31	15 18.54	-9 14.0	4.207	5.162	4.2	20.6	5 31	15 13.90	-6 6.3	1.599	2.556	9.5	17.8
6 10	15 14.03	-9 12.8	4.265	5.156	5.9	20.7	6 10	15 7.68	-5 51.3	1.650	2.550	13.1	18.0
6 20	15 10.36	-9 17.4	4.347	5.149	7.6	20.8	6 20	15 3.62	-5 53.7	1.720	2.544	16.3	18.2
19579	1999 MB ₁		5 14.7 162°82	1°5/13.7	18		69515	1997 EM ₄₇		5 14.7 120°68	4°4/17.2	18	
4 11	15 51.38	-16 33.2	2.091	2.945	12.1	20.0	4 11	15 56.12	-31 5.4	2.088	2.902	13.7	19.6
4 21	15 45.91	-15 54.8	2.018	2.949	8.9	19.8	4 21	15 49.71	-31 39.3	2.016	2.912	10.8	19.4
5 1	15 38.61	-15 11.2	1.970	2.952	5.3	19.6	5 1	15 41.02	-31 59.8	1.967	2.922	7.7	19.2
5 11	15 30.19	-14 25.5	1.948	2.955	1.9	19.3	5 11	15 30.90	-32 5.3	1.944	2.932	5.1	19.1
5 21	15 21.50	-13 41.3	1.956	2.958	3.3	19.4	5 21	15 20.37	-31 55.7	1.948	2.941	4.7	19.1
5 31	15 13.46	-13 2.4	1.990	2.960	7.0	19.7	5 31	15 10.58	-31 33.6	1.980	2.950	6.9	19.2
6 10	15 6.82	-12 32.3	2.051	2.962	10.4	19.9	6 10	15 2.48	-31 3.9	2.037	2.959	9.9	19.4
6 20	15 2.09	-12 13.1	2.134	2.964	13.4	20.1	6 20	14 56.69	-30 31.9	2.117	2.968	12.7	19.6
374999	2007 EN ₂₂₂		5 14.7 41°59	14°0/15.1	18		26749	2001 HT ₅₂		5 14.7 270°03	2°8/13.1	18	
4 11	16 13.97	-33 24.2	0.942	1.780	24.5	20.1	4 11	15 51.39	-14 48.2	1.635	2.503	14.2	19.4
4 21	16 6.76	-37 3.9	0.885	1.784	20.6	19.8	4 21	15 46.53	-13 57.7	1.553	2.490	10.6	19.1
5 1	15 53.39	-40 32.1	0.847	1.789	16.8	19.6	5 1	15 39.28	-13 1.0	1.493	2.477	6.5	18.8
5 11	15 34.77	-43 26.6	0.831	1.794	14.3	19.5	5 11	15 30.45	-12 2.7	1.459	2.464	3.0	18.6
5 21	15 13.40	-45 28.4	0.836	1.799	14.5	19.5	5 21	15 21.08	-11 8.1	1.451	2.450	4.8	18.7
5 31	14 53.12	-46 32.1	0.862	1.805	17.2	19.7	5 31	15 12.36	-10 22.7	1.468	2.437	9.1	18.9
6 10	14 37.40	-46 48.8	0.907	1.811	20.8	19.9	6 10	15 5.33	-9 51.2	1.510	2.423	13.3	19.1
6 20	14 28.05	-46 37.4	0.967	1.818	24.2	20.2	6 20	15 0.68	-9 35.9	1.571	2.410	17.0	19.3
318421	2005 BE ₁₂		5 14.7 25°80	1°8/13.8	17		485418	2011 OL ₆₀		5 14.7 200°32	2°1/11.9	18	
4 11	15 51.10	-14 55.9	1.811	2.674	13.3	20.4	4 11	15 41.35	-8 25.4	4.580	5.429	6.1	21.8
4 21	15 45.99	-14 39.3	1.741	2.676	9.8	20.2	4 21	15 37.79	-7 55.8	4.504	5.429	4.6	21.6
5 1	15 38.78	-14 19.7	1.694	2.677	5.9	19.9	5 1	15 33.49	-7 26.9	4.454	5.428	3.0	21.5
5 11	15 30.26	-13 59.6	1.672	2.679	2.2	19.7	5 11	15 28.76	-7 0.6	4.434	5.427	2.1	21.5
5 21	15 21.38	-13 42.0	1.678	2.681	3.7	19.8	5 21	15 23.93	-6 38.1	4.443	5.426	2.8	21.5
5 31	15 13.18	-13 29.9	1.710	2.683	7.6	20.1	5 31	15 19.31	-6 20.9	4.480	5.425	4.3	21.6
6 10	15 6.56	-13 26.1	1.767	2.686	11.4	20.3	6 10	15 15.23	-6 9.9	4.545	5.424	5.9	21.7
6 20	15 2.08	-13 32.1	1.845	2.688	14.7	20.5	6 20	15 11.93	-6 5.5	4.634	5.423	7.3	21.8
346100	2007 VN ₅₉		5 14.7 109°78	1°2/15.6	17		50638	2000 EP ₇₉		5 14.7 243°10	0°2/14.9	18	
4 11	15 50.81	-23 52.6	2.254	3.094	11.9	21.8	4 11						

EPHEMERIDES

5 14.7

5 14.8

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
245381	2005 <i>GO</i> ₁₀₅		5 14.7 263°06	1°3/13.9	17		353650	2011 <i>UU</i> ₁₁₆		5 14.8 161°67	1°0/15.5	18	
4 11	15 50.04	-16 23.5	2.142	2.998	11.8	21.1	4 11	15 49.66	-23 39.8	2.671	3.505	10.4	21.7
4 21	15 45.05	-15 58.3	2.055	2.987	8.7	20.8	4 21	15 44.41	-23 24.9	2.591	3.508	7.8	21.5
5 1	15 38.19	-15 28.5	1.993	2.975	5.2	20.6	5 1	15 37.65	-23 2.2	2.536	3.512	4.8	21.4
5 11	15 30.12	-14 56.4	1.957	2.964	1.8	20.3	5 11	15 29.97	-22 32.7	2.509	3.515	1.8	21.1
5 21	15 21.66	-14 25.0	1.949	2.952	3.1	20.4	5 21	15 22.06	-21 58.4	2.511	3.518	2.1	21.2
5 31	15 13.68	-13 57.7	1.969	2.941	6.9	20.6	5 31	15 14.65	-21 22.1	2.542	3.520	5.1	21.4
6 10	15 7.01	-13 37.6	2.014	2.929	10.4	20.8	6 10	15 8.37	-20 47.2	2.600	3.522	8.0	21.6
6 20	15 2.20	-13 26.9	2.081	2.917	13.5	21.0	6 20	15 3.68	-20 16.4	2.683	3.524	10.6	21.7
513112	2017 <i>WV</i> ₂₆		5 14.7 260°73	0°2/14.6	18		727	<i>Nipponia</i>		5 14.8 182°05	8°0/9.7	18	
4 11	15 52.47	-20 4.8	1.982	2.833	12.9	21.5	4 11	15 51.79	+ 2 4.6	1.991	2.837	13.0	14.1
4 21	15 47.11	-19 41.6	1.885	2.813	9.6	21.3	4 21	15 46.24	+ 3 8.4	1.930	2.837	10.6	14.0
5 1	15 39.57	-19 10.0	1.812	2.793	5.8	21.0	5 1	15 38.83	+ 4 2.5	1.892	2.838	8.6	13.8
5 11	15 30.54	-18 31.6	1.764	2.773	1.6	20.7	5 11	15 30.31	+ 4 41.3	1.880	2.837	8.0	13.8
5 21	15 20.94	-17 49.5	1.745	2.752	2.8	20.7	5 21	15 21.52	+ 5 0.5	1.894	2.837	9.1	13.9
5 31	15 11.82	-17 7.8	1.754	2.730	7.1	20.9	5 31	15 13.37	+ 4 57.9	1.932	2.836	11.3	14.0
6 10	15 4.16	-16 31.0	1.787	2.708	11.1	21.1	6 10	15 6.63	+ 4 34.0	1.993	2.835	13.7	14.1
6 20	14 58.63	-16 3.0	1.843	2.686	14.7	21.3	6 20	15 1.81	+ 3 51.1	2.073	2.833	16.0	14.3
477638	2010 <i>MW</i> ₃₁		5 14.8 251°03	1°3/13.8	18		324961	2007 <i>YV</i> ₇₂		5 14.8 133°13	2°9/16.2	17	
4 11	15 48.74	-15 42.4	2.690	3.539	9.9	22.3	4 11	15 56.74	-26 9.7	1.698	2.537	15.2	21.0
4 21	15 43.77	-15 18.7	2.596	3.525	7.3	22.1	4 21	15 50.49	-26 28.7	1.627	2.544	11.6	20.8
5 1	15 37.30	-14 51.6	2.528	3.510	4.4	21.9	5 1	15 41.64	-26 35.6	1.579	2.551	7.6	20.6
5 11	15 29.87	-14 23.1	2.488	3.494	1.6	21.7	5 11	15 31.13	-26 29.4	1.556	2.558	3.8	20.4
5 21	15 22.12	-13 55.4	2.476	3.479	2.7	21.8	5 21	15 20.17	-26 11.3	1.560	2.564	3.7	20.4
5 31	15 14.73	-13 31.3	2.494	3.463	5.8	21.9	5 31	15 10.07	-25 44.7	1.591	2.570	7.4	20.6
6 10	15 8.35	-13 13.0	2.538	3.447	8.8	22.1	6 10	15 1.94	-25 15.2	1.646	2.576	11.4	20.8
6 20	15 3.46	-13 2.4	2.606	3.430	11.4	22.3	6 20	14 56.45	-24 48.1	1.723	2.581	14.8	21.1
336223	2008 <i>SC</i> ₇₂		5 14.8 231°34	5°6/18.4	18		17767	1998 <i>EJ</i> ₆		5 14.8 133°07	2°2/13.5	18	
4 11	15 55.27	-36 25.1	2.293	3.081	13.4	21.6	4 11	15 54.23	-15 45.9	1.671	2.532	14.3	18.2
4 21	15 49.18	-36 43.1	2.197	3.070	11.0	21.4	4 21	15 48.35	-15 2.5	1.608	2.542	10.5	18.0
5 1	15 40.80	-36 44.8	2.123	3.059	8.4	21.2	5 1	15 40.20	-14 13.8	1.568	2.551	6.3	17.8
5 11	15 30.88	-36 27.8	2.074	3.046	6.2	21.1	5 11	15 30.70	-13 23.7	1.554	2.560	2.5	17.6
5 21	15 20.43	-35 52.2	2.052	3.034	5.6	21.0	5 21	15 20.94	-12 36.9	1.567	2.569	4.1	17.7
5 31	15 10.56	-35 0.6	2.057	3.020	7.3	21.1	5 31	15 12.04	-11 58.2	1.607	2.577	8.3	18.0
6 10	15 2.29	-33 58.8	2.089	3.007	9.9	21.2	6 10	15 4.95	-11 31.3	1.671	2.584	12.2	18.2
6 20	14 56.28	-32 53.1	2.144	2.993	12.7	21.4	6 20	15 0.21	-11 18.1	1.756	2.591	15.6	18.4
61451	2000 <i>QD</i> ₂₉		5 14.8 157°78	0°7/14.2	18		164516	2006 <i>HT</i> ₁₃		5 14.8 43°20	3°8/16.5	18	
4 11	15 49.53	-17 21.2	2.813	3.657	9.7	19.9	4 11	15 54.74	-27 22.7	1.263	2.120	18.2	19.9
4 21	15 44.17	-17 2.0	2.738	3.663	7.1	19.7	4 21	15 49.68	-27 39.5	1.202	2.127	14.1	19.6
5 1	15 37.44	-16 39.1	2.688	3.669	4.2	19.5	5 1	15 41.42	-27 39.5	1.160	2.134	9.4	19.4
5 11	15 29.89	-16 14.0	2.667	3.674	1.2	19.3	5 11	15 31.10	-27 21.7	1.141	2.142	4.9	19.2
5 21	15 22.14	-15 48.8	2.675	3.679	2.3	19.4	5 21	15 20.27	-26 47.9	1.145	2.150	4.6	19.2
5 31	15 14.85	-15 25.8	2.712	3.684	5.3	19.6	5 31	15 10.58	-26 3.8	1.174	2.158	8.8	19.4
6 10	15 8.60	-15 7.4	2.777	3.688	8.0	19.8	6 10	15 3.38	-25 17.5	1.225	2.166	13.4	19.7
6 20	15 3.80	-14 55.3	2.865	3.691	10.4	20.0	6 20	14 59.39	-24 36.2	1.296	2.175	17.5	20.0
218028	2001 <i>YQ</i> ₁₀₉		5 14.8 225°81	1°9/15.9	18		193138	2000 <i>HE</i> ₆₂		5 14.8 109°89	1°3/14.1	18	
4 11	15 54.03	-25 47.5	2.295	3.123	12.1	20.6	4 11	15 54.94	-18 57.2	1.437	2.302	16.0	20.4
4 21	15 48.03	-25 42.5	2.199	3.111	9.3	20.4	4 21	15 49.15	-18 7.8	1.379	2.314	11.8	20.1
5 1	15 40.00	-25 27.0	2.127	3.099	6.0	20.2	5 1	15 40.78	-17 8.8	1.342	2.326	7.0	19.9
5 11	15 30.65	-25 1.2	2.083	3.085	2.7	19.9	5 11	15 30.87	-16 4.4	1.330	2.338	2.1	19.6
5 21	15 20.83	-24 26.5	2.066	3.071	2.7	19.9	5 21	15 20.71	-15 0.6	1.345	2.349	3.9	19.8
5 31	15 11.51	-23 46.3	2.079	3.057	6.1	20.1	5 31	15 11.61	-14 3.8	1.385	2.361	8.7	20.1
6 10	15 3.57	-23 4.8	2.118	3.041	9.6	20.3	6 10	15 4.62	-13 19.6	1.448	2.371	13.1	20.3
6 20	14 57.61	-22 26.6	2.181	3.025	12.7	20.4	6 20	15 0.31	-12 51.1	1.532	2.381	16.8	20.6
382822	2003 <i>WQ</i> ₄₆		5 14.8 165°85	0°2/14.9	17		209747	2005 <i>EU</i> ₂₀₃		5 14.8 283°15	4°0/16.6	17	
4 11	15 51.12	-21 1.9	2.198	3.044	11.9	21.1	4 11	15 54.77	-28 5.7	1.478	2.324	16.7	20.6
4 21	15 45.73	-20 38.5	2.121	3.047	8.8	21.0	4 21	15 49.64	-28 27.1	1.395	2.314	13.1	20.3
5 1	15 38.53	-20 7.4	2.069	3.049	5.3	20.7	5 1	15 41.46	-28 33.5	1.333	2.304	8.9	20.0
5 11	15 30.22	-19 30.4	2.043	3.051	1.5	20.5	5 11	15 31.16	-28 22.9	1.295	2.293	5.0	19.8
5 21	15 21.62	-18 50.1	2.046	3.053	2.4	20.5	5 21	15 20.07	-27 55.9	1.281	2.283	4.7	19.7
5 31	15 13.63	-18 10.3	2.077	3.054	6.2	20.8	5 31	15 9.74	-27 16.4	1.292	2.273	8.6	19.9
6 10	15 7.01	-17 34.9	2.134	3.055	9.6	21.0	6 10	15 1.57	-26 31.7	1.327	2.263	13.0	20.1
6 20	15 2.27	-17 6.8	2.215	3.056	12.6	21.2	6 20	14 56.41	-25 49.0	1.382	2.254	17.0	20.4
252177	2001 <i>DE</i> ₂₉		5 14.8 27°07	1°1/15.2	17		408216	2013 <i>EC</i> ₇₁		5 14.8 339°60	7°1/17.3	17	
4 11	15 52.16	-21 34.9	1.186	2.062	17.9	19.8	4 11	15 53.59	-31 16.8	1.145	2.001	19.9	20.8
4 21	15 47.70	-21 40.3	1.131	2.070	13.4	19.5	4 21	15 49.57	-32 12.8	1.074	1.993	16.0	20.5
5 1	15 40.18	-21 34.8	1.095	2.079	8.2	19.3	5 1	15 41.80	-32 50.0	1.021	1.986	11.7	20.2
5 11	15 30.73	-21 19.4	1.082	2.089	2.7	19.0	5 11	15 31.32	-33 3.0	0.989	1.980	8.0	20.0
5 21	15 20.84	-20 57.1	1.092	2.100	3.5	19.0	5 21	15 19.79	-32 49.9	0.978	1.974	7.4	20.0
5 31	15 12.08	-20 32.9	1.126	2.111	8.9	19.4	5 31	15 9.28	-32 14.6	0.989	1.969	10.7	20.1
6 10	15 5.73	-20 12.7	1.182	2.123	13.7	19.7	6 10	15 1.53	-31 26.1	1.022	1.966	15.1	20.4
6 20	15 2.45	-20 0.7	1.256	2.136	17.8	20.0	6 20	14 57.55	-30 34.8	1.072	1.963	19.4	20.6
25092	1998 <i>RV</i> ₄₂		5 14.8 249°70	0°2/14.6	18		35258	1996 <i>HN</i> ₂₃		5 1			

EPHEMERIDES

5 14.8

5 14.8

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
352501	2008 <i>CC</i> ₃₇		5 14.8 26°41'	5°1/18.0	17		231890	2000 <i>WM</i> ₃₉		5 14.8 197°04'	4°5/11.8	18	
4 11	15 51.38	-33 39.4	1.991	2.806	14.2	20.0	4 11	15 52.47	-4 43.9	2.509	3.353	10.7	21.4
4 21	15 46.37	-34 0.3	1.918	2.811	11.4	19.9	4 21	15 46.48	-4 11.8	2.431	3.349	8.2	21.2
5 1	15 39.11	-34 5.2	1.867	2.817	8.4	19.7	5 1	15 38.92	-3 43.6	2.379	3.345	5.8	21.1
5 11	15 30.44	-33 52.6	1.840	2.823	5.8	19.5	5 11	15 30.38	-3 22.4	2.355	3.340	4.5	21.0
5 21	15 21.39	-33 23.3	1.840	2.830	5.3	19.5	5 21	15 21.56	-3 11.0	2.360	3.335	5.5	21.0
5 31	15 13.07	-32 40.7	1.866	2.837	7.2	19.6	5 31	15 13.20	-3 11.3	2.392	3.329	7.9	21.2
6 10	15 6.45	-31 50.6	1.916	2.845	10.1	19.8	6 10	15 5.99	-3 24.1	2.450	3.322	10.5	21.3
6 20	15 2.12	-30 58.8	1.989	2.852	12.9	20.0	6 20	15 0.38	-3 49.0	2.531	3.314	12.8	21.5
438439	2006 <i>WD</i> ₁₃₁		5 14.8 162°22'	9°2/5.9	18		499345	2009 <i>WU</i> ₂₄₂		5 14.8 145°24'	2°1/13.6	17	
4 11	15 49.37	+16 20.2	2.956	3.736	10.9	21.7	4 11	15 53.37	-13 13.5	2.105	2.958	12.1	22.1
4 21	15 43.94	+17 20.8	2.911	3.741	9.9	21.6	4 21	15 47.37	-12 57.2	2.036	2.966	8.9	21.9
5 1	15 37.27	+18 6.6	2.889	3.746	9.3	21.6	5 1	15 39.52	-12 39.6	1.992	2.973	5.4	21.7
5 11	15 29.87	+18 33.5	2.892	3.751	9.3	21.6	5 11	15 30.54	-12 22.9	1.975	2.980	2.4	21.5
5 21	15 22.35	+18 39.2	2.918	3.755	9.9	21.6	5 21	15 21.30	-12 9.7	1.987	2.987	3.7	21.6
5 31	15 15.31	+18 23.5	2.967	3.758	10.9	21.7	5 31	15 12.71	-12 2.3	2.026	2.993	7.1	21.8
6 10	15 9.26	+17 47.4	3.037	3.762	12.1	21.8	6 10	15 5.53	-12 2.9	2.091	2.999	10.4	22.1
6 20	15 4.58	+16 53.6	3.125	3.764	13.2	21.9	6 20	15 0.28	-12 12.3	2.179	3.004	13.3	22.3
4935	Maslachkova		5 14.8 198°70'	3°6/12.9	18		141939	2002 <i>PH</i> ₉₆		5 14.8 257°42'	0°4/14.9	18	
4 11	15 55.61	-11 39.0	1.652	2.513	14.5	17.1	4 11	15 54.13	-21 12.1	1.794	2.644	14.0	20.9
4 21	15 49.54	-11 0.7	1.578	2.511	10.8	16.9	4 21	15 48.62	-20 59.3	1.699	2.626	10.5	20.6
5 1	15 41.05	-10 20.8	1.527	2.508	6.8	16.6	5 1	15 40.63	-20 37.1	1.628	2.608	6.4	20.3
5 11	15 30.99	-9 43.4	1.502	2.504	3.8	16.4	5 11	15 30.94	-20 6.8	1.582	2.589	1.9	20.0
5 21	15 20.48	-9 13.1	1.503	2.499	5.4	16.5	5 21	15 20.57	-19 30.7	1.563	2.570	2.9	20.0
5 31	15 10.71	-8 53.8	1.531	2.494	9.3	16.7	5 31	15 10.75	-18 53.1	1.572	2.551	7.6	20.3
6 10	15 2.73	-8 48.4	1.583	2.488	13.3	17.0	6 10	15 2.57	-18 19.0	1.605	2.530	11.9	20.5
6 20	14 57.19	-8 57.8	1.656	2.482	16.8	17.2	6 20	14 56.80	-17 52.9	1.660	2.510	15.7	20.7
300888	2006 <i>UB</i> ₂₃₂		5 14.8 311°94'	0°1/14.9	17		204846	2007 <i>RD</i> ₄₈		5 14.8 144°66'	1°0/14.1	18	
4 11	15 49.83	-20 0.2	2.073	2.925	12.3	20.5	4 11	15 50.45	-17 29.2	2.080	2.935	12.1	20.9
4 21	15 45.00	-19 53.0	1.989	2.918	9.1	20.3	4 21	15 45.33	-17 3.7	2.006	2.937	8.9	20.7
5 1	15 38.23	-19 39.3	1.930	2.912	5.5	20.1	5 1	15 38.35	-16 32.9	1.956	2.939	5.3	20.4
5 11	15 30.21	-19 20.4	1.897	2.905	1.6	19.8	5 11	15 30.23	-15 59.2	1.933	2.940	1.6	20.2
5 21	15 21.78	-18 58.4	1.891	2.898	2.5	19.9	5 21	15 21.82	-15 25.7	1.937	2.942	2.9	20.3
5 31	15 13.89	-18 36.4	1.913	2.892	6.4	20.1	5 31	15 14.02	-14 55.8	1.970	2.944	6.7	20.5
6 10	15 7.36	-18 17.9	1.961	2.886	10.1	20.3	6 10	15 7.60	-14 32.7	2.028	2.945	10.2	20.7
6 20	15 2.79	-18 5.6	2.030	2.880	13.2	20.5	6 20	15 3.09	-14 18.8	2.108	2.947	13.2	20.9
111944	2002 <i>GS</i> ₅₃		5 14.8 94°40'	4°0/17.0	18		507190	2010 <i>RN</i> ₁₁₂		5 14.8 294°54'	0°3/14.7	17	
4 11	15 57.29	-30 1.7	1.524	2.358	16.8	19.8	4 11	15 52.99	-19 8.7	1.409	2.277	16.0	22.1
4 21	15 51.00	-30 2.1	1.465	2.376	13.1	19.6	4 21	15 48.38	-19 1.1	1.318	2.256	12.1	21.8
5 1	15 41.93	-29 44.2	1.427	2.393	8.9	19.4	5 1	15 40.79	-18 45.3	1.249	2.234	7.4	21.5
5 11	15 31.21	-29 7.8	1.413	2.410	5.0	19.2	5 11	15 31.04	-18 22.6	1.204	2.212	2.1	21.1
5 21	15 20.24	-28 15.6	1.426	2.427	4.5	19.2	5 21	15 20.37	-17 55.9	1.183	2.190	3.6	21.1
5 31	15 10.44	-27 13.6	1.464	2.444	7.9	19.4	5 31	15 10.27	-17 29.8	1.187	2.169	9.1	21.4
6 10	15 2.91	-26 9.9	1.526	2.460	11.8	19.7	6 10	15 2.15	-17 9.9	1.214	2.147	14.2	21.6
6 20	14 58.26	-25 11.4	1.610	2.476	15.3	19.9	6 20	14 56.93	-17 0.3	1.260	2.126	18.7	21.8
353464	2011 <i>SS</i> ₁		5 14.8 143°18'	2°7/12.4	18		317692	2003 <i>OF</i> ₂₄		5 14.8 210°32'	10°8/6.8	16	
4 11	15 48.44	-10 44.2	2.837	3.687	9.4	22.5	4 11	15 54.32	+11 11.8	2.092	2.904	13.7	21.4
4 21	15 43.31	-9 59.4	2.770	3.697	7.0	22.4	4 21	15 48.13	+12 34.0	2.030	2.896	12.1	21.3
5 1	15 36.91	-9 14.4	2.730	3.707	4.4	22.2	5 1	15 40.01	+13 40.8	1.991	2.888	11.0	21.2
5 11	15 29.79	-8 31.9	2.718	3.716	2.8	22.1	5 11	15 30.70	+14 25.3	1.976	2.879	10.9	21.2
5 21	15 22.52	-7 54.8	2.735	3.725	3.8	22.2	5 21	15 21.06	+14 43.2	1.985	2.868	11.9	21.2
5 31	15 15.72	-7 25.5	2.781	3.733	6.2	22.4	5 31	15 12.01	+14 32.4	2.017	2.857	13.6	21.3
6 10	15 9.92	-7 5.9	2.854	3.741	8.7	22.5	6 10	15 4.37	+13 54.6	2.070	2.845	15.5	21.4
6 20	15 5.48	-6 56.6	2.949	3.749	10.8	22.7	6 20	14 58.69	+12 53.4	2.140	2.833	17.4	21.5
427940	2005 <i>WE</i> ₄₂		5 14.8 104°79'	0°9/15.4	15		380166	2000 <i>QM</i> ₁₁₅		5 14.8 281°29'	1°5/15.6	17	
4 11	15 53.64	-24 39.5	1.982	2.821	13.3	22.0	4 11	15 53.35	-24 20.7	1.898	2.741	13.7	21.2
4 21	15 47.59	-23 55.2	1.921	2.841	9.9	22.2	4 21	15 48.10	-24 7.3	1.789	2.710	10.5	20.9
5 1	15 39.60	-22 59.0	1.883	2.861	6.1	21.8	5 1	15 40.38	-23 42.0	1.703	2.679	6.7	20.6
5 11	15 30.53	-21 53.5	1.873	2.880	2.1	21.6	5 11	15 30.90	-23 4.9	1.642	2.648	2.6	20.3
5 21	15 21.36	-20 42.8	1.891	2.898	2.5	21.7	5 21	15 20.63	-22 18.0	1.609	2.616	2.9	20.2
5 31	15 13.06	-19 32.5	1.937	2.916	6.4	21.9	5 31	15 10.76	-21 25.6	1.604	2.584	7.3	20.4
6 10	15 6.41	-18 28.1	2.010	2.933	10.0	22.2	6 10	15 2.42	-20 33.6	1.623	2.551	11.6	20.6
6 20	15 1.87	-17 33.7	2.106	2.950	13.0	22.4	6 20	14 56.42	-19 47.5	1.665	2.517	15.5	20.8
89937	2002 <i>FP</i> ₁		5 14.8 109°45'	9°0/8.3	18		270368	2001 <i>YC</i> ₁₃₀		5 14.8 159°48'	1°2/15.6	17	
4 11	15 49.78	+10 52.6	2.449	3.262	11.9	19.0	4 11	15 54.44	-23 32.5	2.439	3.268	11.4	22.2
4 21	15 44.45	+11 41.5	2.399	3.267	10.4	18.9	4 21	15 48.04	-23 27.0	2.362	3.277	8.6	22.0
5 1	15 37.65	+12 16.0	2.371	3.272	9.3	18.9	5 1	15 39.88	-23 13.3	2.310	3.284	5.3	21.8
5 11	15 30.00	+12 31.7	2.368	3.277	9.1	18.9	5 11	15 30.66	-22 51.9	2.286	3.291	2.0	21.6
5 21	15 22.19	+12 26.2	2.389	3.281	9.8	18.9	5 21	15 21.17	-22 24.7	2.291	3.297	2.3	21.6
5 31	15 14.94	+11 58.7	2.434	3.286	11.2	19.0	5 31	15 12.27	-21 54.6	2.326	3.303	5.6	21.9
6 10	15 8.86	+11 10.9	2.502	3.291	12.8	19.1	6 10	15 4.72	-21 25.0	2.387	3.307	8.8	22.1
6 20	15 4.35	+10 5.9	2.588	3.295	14.4	19.3	6 20	14 59.01	-20 59.2	2.473	3.311	11.5	22.3
408154	2013 <i>CY</i> ₁₂₆		5 14.8 336°91'	6°6/16.9	14 C		172533	2003 <i>UO</i> ₉		5 14.8 118			

EPHEMERIDES

5 14.8

5 14.8

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
463312	2012 <i>JT</i> ₂₆		5 14.8 314 ^o 02		5 ^o 6/11.4 17		169146	2001 <i>QL</i> ₁₂₁		5 14.8 274 ^o 36		1 ^o 1/14.1 18	
4 11	15 47.99	-10 19.6	1.414	2.296	15.2	20.6	4 11	15 50.42	-16 38.5	2.087	2.943	12.1	20.2
4 21	15 44.40	-9 2.0	1.330	2.273	11.5	20.3	4 21	15 45.43	-16 21.3	2.002	2.933	8.9	19.9
5 1	15 38.24	-7 40.0	1.268	2.250	7.7	20.0	5 1	15 38.52	-15 59.6	1.941	2.923	5.3	19.7
5 11	15 30.30	-6 20.8	1.230	2.228	5.6	19.8	5 11	15 30.35	-15 35.7	1.906	2.913	1.7	19.4
5 21	15 21.67	-5 12.4	1.217	2.206	7.6	19.9	5 21	15 21.77	-15 12.0	1.899	2.904	3.0	19.5
5 31	15 13.65	-4 22.4	1.227	2.184	11.7	20.1	5 31	15 13.70	-14 51.7	1.920	2.894	6.9	19.7
6 10	15 7.39	-3 55.4	1.258	2.163	16.0	20.2	6 10	15 6.97	-14 37.8	1.966	2.884	10.5	19.9
6 20	15 3.67	-3 52.6	1.307	2.143	19.8	20.4	6 20	15 2.15	-14 32.5	2.034	2.874	13.6	20.1
204851	2007 <i>RW</i> ₁₃₀		5 14.8 208 ^o 86		0 ^o 6/14.0 18		244952	2003 <i>YH</i> ₁₁₂		5 14.8 100 ^o 28		1 ^o 5/14.0 18	
4 11	15 44.95	-16 46.9	4.121	4.961	6.9	22.2	4 11	15 53.56	-14 6.3	2.136	2.987	12.0	20.3
4 21	15 40.54	-16 27.0	4.030	4.955	5.1	22.0	4 21	15 47.49	-14 7.7	2.072	3.001	8.8	20.2
5 1	15 35.22	-16 4.5	3.967	4.948	3.0	21.9	5 1	15 39.60	-14 7.7	2.033	3.015	5.3	20.0
5 11	15 29.35	-15 40.7	3.933	4.941	0.9	21.7	5 11	15 30.62	-14 8.0	2.021	3.028	1.9	19.8
5 21	15 23.32	-15 17.1	3.930	4.933	1.7	21.8	5 21	15 21.41	-14 10.0	2.038	3.041	3.1	19.9
5 31	15 17.54	-14 55.2	3.956	4.925	3.9	21.9	5 31	15 12.86	-14 15.7	2.083	3.054	6.6	20.1
6 10	15 12.40	-14 36.5	4.010	4.917	5.9	22.0	6 10	15 5.72	-14 26.6	2.154	3.067	9.9	20.3
6 20	15 8.20	-14 22.4	4.090	4.909	7.7	22.2	6 20	15 0.50	-14 43.8	2.248	3.079	12.8	20.6
173451	2000 <i>QN</i> ₈		5 14.8 215 ^o 88		4 ^o 3/10.7 18		329567	2002 <i>VS</i> ₄₂		5 14.8 182 ^o 65		0 ^o 3/14.6 17	
4 11	15 48.04	-4 9.6	3.085	3.929	8.9	21.0	4 11	15 54.16	-19 23.5	2.115	2.960	12.4	21.8
4 21	15 43.02	-3 17.5	3.003	3.919	6.9	20.9	4 21	15 48.08	-19 2.4	2.036	2.961	9.2	21.6
5 1	15 36.79	-2 28.1	2.947	3.909	5.1	20.7	5 1	15 40.04	-18 34.5	1.981	2.962	5.5	21.4
5 11	15 29.80	-1 44.5	2.920	3.898	4.3	20.7	5 11	15 30.77	-18 1.5	1.953	2.961	1.5	21.1
5 21	15 22.59	-1 9.7	2.922	3.887	5.2	20.7	5 21	15 21.15	-17 26.2	1.954	2.960	2.6	21.2
5 31	15 15.72	-0 46.0	2.952	3.875	7.1	20.8	5 31	15 12.16	-16 52.3	1.984	2.959	6.6	21.4
6 10	15 9.70	-0 34.6	3.008	3.863	9.2	20.9	6 10	15 4.63	-16 23.4	2.039	2.956	10.2	21.7
6 20	15 4.93	-0 35.7	3.086	3.850	11.2	21.1	6 20	14 59.11	-16 2.5	2.118	2.953	13.3	21.9
170997	2005 <i>EF</i> ₇		5 14.8 83 ^o 41		1 ^o 6/14.1 18		507334	2011 <i>UX</i> ₁		5 14.8 141 ^o 11		0 ^o 7/15.4 17	
4 11	15 55.36	-16 16.5	1.476	2.341	15.6	20.3	4 11	15 49.59	-22 44.1	2.824	3.658	9.9	22.4
4 21	15 49.39	-15 58.0	1.422	2.357	11.5	20.1	4 21	15 44.28	-22 27.1	2.749	3.668	7.4	22.3
5 1	15 40.92	-15 34.7	1.390	2.374	6.8	19.9	5 1	15 37.58	-22 3.1	2.700	3.676	4.5	22.1
5 11	15 30.96	-15 9.5	1.383	2.390	2.2	19.6	5 11	15 30.05	-21 33.5	2.678	3.685	1.5	21.9
5 21	15 20.77	-14 45.9	1.402	2.407	3.8	19.8	5 21	15 22.34	-21 0.0	2.686	3.693	1.9	21.9
5 31	15 11.62	-14 28.0	1.447	2.423	8.4	20.1	5 31	15 15.12	-20 25.5	2.723	3.700	4.9	22.1
6 10	15 4.51	-14 19.2	1.516	2.439	12.6	20.4	6 10	15 8.97	-19 52.9	2.788	3.708	7.6	22.3
6 20	15 0.01	-14 21.3	1.605	2.455	16.2	20.7	6 20	15 4.31	-19 24.7	2.877	3.715	10.1	22.5
374564	2006 <i>BD</i> ₂₂₆		5 14.8 227 ^o 18		0 ^o 9/15.9 18		441564	2008 <i>UN</i> ₇		5 14.8 156 ^o 99		0 ^o 1/14.9 18	
4 11	15 43.26	-24 35.7	4.407	5.232	6.8	21.1	4 11	15 45.10	-20 33.6	4.364	5.196	6.7	23.0
4 21	15 39.31	-24 28.1	4.318	5.230	5.1	21.0	4 21	15 40.59	-20 14.3	4.285	5.203	4.9	22.9
5 1	15 34.49	-24 15.7	4.256	5.228	3.2	20.9	5 1	15 35.23	-19 51.2	4.232	5.210	3.0	22.7
5 11	15 29.16	-23 58.9	4.223	5.226	1.4	20.7	5 11	15 29.38	-19 25.4	4.209	5.217	0.8	22.5
5 21	15 23.67	-23 38.7	4.219	5.224	1.4	20.7	5 21	15 23.43	-18 58.2	4.217	5.223	1.3	22.6
5 31	15 18.44	-23 16.6	4.245	5.223	3.3	20.9	5 31	15 17.75	-18 31.1	4.255	5.229	3.4	22.8
6 10	15 13.82	-22 54.3	4.299	5.221	5.2	21.0	6 10	15 12.72	-18 5.8	4.321	5.235	5.3	22.9
6 20	15 10.11	-22 33.3	4.379	5.219	6.9	21.1	6 20	15 8.60	-17 43.7	4.414	5.240	7.0	23.0
429708	2011 <i>HA</i> ₉₅		5 14.8 356 ^o 06		2 ^o 9/13.5 17		398732	2012 <i>XG</i> ₁₃₇		5 14.8 179 ^o 21		1 ^o 1/13.9 18	
4 11	15 52.00	-11 50.1	1.671	2.538	14.0	20.9	4 11	15 49.52	-17 26.7	2.617	3.464	10.2	21.3
4 21	15 46.87	-11 41.3	1.600	2.536	10.4	20.7	4 21	15 44.31	-16 45.6	2.538	3.465	7.5	21.2
5 1	15 39.47	-11 32.7	1.553	2.535	6.4	20.5	5 1	15 37.63	-15 59.4	2.484	3.466	4.4	21.0
5 11	15 30.60	-11 27.2	1.530	2.534	3.1	20.3	5 11	15 30.08	-15 10.7	2.459	3.466	1.5	20.7
5 21	15 21.31	-11 27.4	1.534	2.534	4.5	20.3	5 21	15 22.31	-14 22.5	2.463	3.466	2.7	20.8
5 31	15 12.71	-11 35.6	1.564	2.534	8.5	20.6	5 31	15 15.02	-13 38.1	2.496	3.465	5.8	21.0
6 10	15 5.78	-11 53.5	1.617	2.534	12.4	20.8	6 10	15 8.85	-13 0.5	2.556	3.465	8.7	21.2
6 20	15 1.16	-12 21.7	1.692	2.535	15.8	21.0	6 20	15 4.21	-12 31.9	2.640	3.463	11.3	21.4
395645	2011 <i>WF</i> ₃₆		5 14.8 199 ^o 77		0 ^o 5/15.1 18		498678	2008 <i>SU</i> ₂₂₃		5 14.8 147 ^o 04		0 ^o 6/15.3 17	
4 11	15 52.47	-20 7.8	2.892	3.724	9.7	21.7	4 11	15 52.42	-22 30.4	2.380	3.216	11.4	22.4
4 21	15 46.46	-20 21.5	2.803	3.721	7.3	21.5	4 21	15 46.58	-22 11.0	2.306	3.226	8.5	22.2
5 1	15 38.93	-20 31.0	2.739	3.717	4.4	21.3	5 1	15 39.03	-21 43.5	2.258	3.235	5.2	22.0
5 11	15 30.43	-20 36.5	2.705	3.712	1.4	21.1	5 11	15 30.47	-21 9.4	2.237	3.243	1.7	21.8
5 21	15 21.59	-20 38.7	2.701	3.707	1.9	21.1	5 21	15 21.69	-20 30.9	2.245	3.251	2.2	21.9
5 31	15 13.13	-20 39.1	2.727	3.702	5.0	21.3	5 31	15 13.52	-19 51.5	2.281	3.259	5.7	22.1
6 10	15 5.70	-20 39.6	2.780	3.696	7.8	21.5	6 10	15 6.68	-19 14.9	2.345	3.266	8.9	22.3
6 20	14 59.78	-20 42.2	2.858	3.690	10.3	21.7	6 20	15 1.63	-18 44.1	2.433	3.272	11.7	22.5
370085	2001 <i>ST</i> ₂₀₉		5 14.8 202 ^o 46		1 ^o 8/13.6 17		321666	2010 <i>CG</i> ₇₉		5 14.8 327 ^o 90		1 ^o 7/15.7 17	
4 11	15 52.80	-15 5.7	2.238	3.087	11.6	22.4	4 11	15 50.42	-23 49.7	1.681	2.536	14.5	20.4
4 21	15 46.98	-14 32.4	2.154	3.083	8.6	22.2	4 21	15 45.96	-23 49.4	1.599	2.527	11.0	20.1
5 1	15 39.35	-13 55.3	2.096	3.077	5.2	22.0	5 1	15 39.07	-23 38.2	1.539	2.517	7.0	19.9
5 11	15 30.56	-13 17.0	2.066	3.071	2.1	21.8	5 11	15 30.56	-23 16.6	1.503	2.509	2.8	19.6
5 21	15 21.43	-12 40.6	2.064	3.065	3.4	21.8	5 21	15 21.49	-22 46.7	1.493	2.500	3.0	19.6
5 31	15 12.84	-12 9.6	2.091	3.057	6.9	22.0	5 31	15 13.07	-22 12.5	1.509	2.492	7.4	19.8
6 10	15 5.56	-11 47.0	2.143	3.049	10.3	22.2	6 10	15 6.38	-21 39.2	1.550	2.485	11.6	20.0
6 20	15 0.12	-11 34.6	2.219	3.041	13.2	22.4	6 20	15 2.11	-21 11.5	1.			

EPHEMERIDES

5 14.8

5 14.8

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
457602	2009 BA ₄₀		5 14.8 105°72	1°8/15.7 16			165558	2001 DN ₄₇		5 14.8 241°22	2°3/17.1 18		
4 11	15 57.15	-23 56.8	1.524	2.374	16.1	22.2	4 11	15 47.08	-29 39.2	3.614	4.422	8.5	20.6
4 21	15 50.87	-23 57.5	1.464	2.388	12.1	21.9	4 21	15 42.37	-29 37.5	3.516	4.411	6.6	20.5
5 1	15 41.91	-23 46.3	1.425	2.402	7.6	21.7	5 1	15 36.46	-29 27.4	3.442	4.401	4.6	20.3
5 11	15 31.31	-23 23.5	1.410	2.416	3.0	21.5	5 11	15 29.79	-29 9.3	3.397	4.390	2.7	20.2
5 21	15 20.39	-22 51.7	1.423	2.429	3.2	21.5	5 21	15 22.88	-28 43.8	3.381	4.379	2.5	20.1
5 31	15 10.51	-22 15.8	1.461	2.442	7.7	21.8	5 31	15 16.29	-28 12.8	3.394	4.368	4.2	20.2
6 10	15 2.78	-21 41.5	1.524	2.455	12.0	22.1	6 10	15 10.51	-27 38.9	3.435	4.357	6.3	20.4
6 20	14 57.81	-21 13.8	1.607	2.467	15.6	22.3	6 20	15 5.94	-27 4.7	3.501	4.345	8.3	20.5
156303	2001 XU ₂₂		5 14.8 160°43	0°8/15.3 17			309709	2008 GE ₃		5 14.8 248°72	2°1/13.5 18		
4 11	15 54.66	-22 2.6	2.292	3.128	11.9	21.1	4 11	15 50.44	-12 3.7	2.435	3.287	10.7	20.7
4 21	15 48.34	-22 0.2	2.216	3.135	8.9	20.9	4 21	15 45.16	-11 56.2	2.353	3.282	7.9	20.5
5 1	15 40.15	-21 50.5	2.164	3.141	5.4	20.7	5 1	15 38.25	-11 48.6	2.297	3.277	4.9	20.3
5 11	15 30.81	-21 34.1	2.140	3.147	1.8	20.5	5 11	15 30.32	-11 42.8	2.268	3.272	2.3	20.1
5 21	15 21.17	-21 12.6	2.145	3.152	2.3	20.5	5 21	15 22.06	-11 40.6	2.267	3.266	3.4	20.2
5 31	15 12.15	-20 48.9	2.179	3.156	5.9	20.8	5 31	15 14.24	-11 43.9	2.295	3.261	6.5	20.4
6 10	15 4.52	-20 26.5	2.240	3.160	9.2	21.0	6 10	15 7.56	-11 54.1	2.349	3.255	9.5	20.5
6 20	14 58.82	-20 8.3	2.324	3.163	12.1	21.2	6 20	15 2.51	-12 11.9	2.426	3.249	12.2	20.7
176479	2001 XF ₁₇₅		5 14.8 132°78	2°3/16.5 18			109710	2001 RN ₄₅		5 14.8 180°98	0°7/14.3 17		
4 11	15 50.41	-27 50.3	2.405	3.231	11.7	20.5	4 11	15 53.62	-17 48.4	2.479	3.320	10.9	21.0
4 21	15 45.20	-27 37.0	2.326	3.236	9.0	20.3	4 21	15 47.43	-17 28.0	2.398	3.322	8.0	20.8
5 1	15 38.26	-27 12.3	2.272	3.240	5.9	20.1	5 1	15 39.57	-17 2.6	2.342	3.323	4.8	20.6
5 11	15 30.28	-26 37.0	2.244	3.244	3.0	19.9	5 11	15 30.68	-16 34.2	2.315	3.323	1.4	20.3
5 21	15 22.04	-25 53.0	2.244	3.248	2.8	19.9	5 21	15 21.50	-16 4.9	2.317	3.322	2.5	20.4
5 31	15 14.39	-25 3.8	2.273	3.252	5.6	20.1	5 31	15 12.85	-15 37.7	2.349	3.321	5.9	20.6
6 10	15 8.06	-24 13.9	2.328	3.256	8.6	20.3	6 10	15 5.43	-15 15.4	2.408	3.318	9.1	20.8
6 20	15 3.52	-23 27.4	2.408	3.259	11.4	20.5	6 20	14 59.74	-15 0.2	2.490	3.315	11.9	21.0
212663	2006 UB ₂₃₃		5 14.8 244°27	0°1/14.8 17			166730	2002 TG ₂₅₆		5 14.8 219°40	0°4/15.0 17		
4 11	15 50.50	-19 37.2	2.386	3.232	11.1	21.0	4 11	15 51.44	-20 54.5	2.279	3.122	11.6	21.1
4 21	15 45.32	-19 25.8	2.297	3.223	8.3	20.8	4 21	15 46.07	-20 46.0	2.194	3.118	8.7	20.9
5 1	15 38.39	-19 8.6	2.232	3.213	5.0	20.6	5 1	15 38.87	-20 30.6	2.133	3.113	5.3	20.6
5 11	15 30.34	-18 46.9	2.195	3.203	1.4	20.3	5 11	15 30.50	-20 9.6	2.100	3.107	1.6	20.4
5 21	15 21.92	-18 22.7	2.186	3.192	2.3	20.4	5 21	15 21.77	-19 44.7	2.095	3.102	2.3	20.4
5 31	15 13.95	-17 58.7	2.205	3.182	5.9	20.6	5 31	15 13.54	-19 19.1	2.118	3.096	6.0	20.7
6 10	15 7.17	-17 38.0	2.251	3.171	9.2	20.8	6 10	15 6.61	-18 55.9	2.167	3.090	9.4	20.9
6 20	15 2.13	-17 23.3	2.320	3.160	12.1	21.0	6 20	15 1.52	-18 38.2	2.240	3.083	12.4	21.0
218246	2002 XU ₈₁		5 14.8 141°37	2°8/16.5 17			501466	2014 BR ₁₆		5 14.8 181°51	1°1/14.1 17		
4 11	15 55.16	-27 38.0	1.928	2.758	14.0	20.8	4 11	15 52.24	-16 3.9	2.366	3.213	11.1	22.2
4 21	15 49.08	-27 37.8	1.855	2.766	10.7	20.6	4 21	15 46.50	-15 49.7	2.287	3.214	8.2	22.0
5 1	15 40.73	-27 24.5	1.805	2.774	7.1	20.4	5 1	15 39.05	-15 32.2	2.233	3.214	4.9	21.8
5 11	15 30.99	-26 58.0	1.781	2.781	3.6	20.2	5 11	15 30.54	-15 13.1	2.207	3.214	1.6	21.6
5 21	15 20.92	-26 20.3	1.785	2.788	3.4	20.2	5 21	15 21.73	-14 54.6	2.210	3.214	2.8	21.6
5 31	15 11.63	-25 35.4	1.816	2.794	6.7	20.4	5 31	15 13.44	-14 39.2	2.241	3.213	6.2	21.9
6 10	15 4.08	-24 49.0	1.872	2.800	10.3	20.7	6 10	15 6.40	-14 29.3	2.299	3.211	9.4	22.1
6 20	14 58.86	-24 6.1	1.952	2.806	13.5	20.9	6 20	15 1.10	-14 26.7	2.381	3.209	12.2	22.2
504572	2008 TF ₅₀		5 14.8 220°14	1°7/15.7 17			391065	2005 UN ₈₅		5 14.8 277°49	1°1/15.4 17		
4 11	15 53.34	-23 48.8	1.964	2.806	13.3	21.8	4 11	15 52.27	-21 32.4	2.334	3.174	11.5	21.0
4 21	15 47.78	-23 57.0	1.883	2.804	10.1	21.6	4 21	15 46.79	-21 50.8	2.239	3.160	8.7	20.7
5 1	15 40.02	-23 56.1	1.825	2.801	6.4	21.3	5 1	15 39.39	-22 3.8	2.168	3.145	5.4	20.5
5 11	15 30.82	-23 46.0	1.794	2.798	2.6	21.1	5 11	15 30.68	-22 11.1	2.125	3.131	2.0	20.2
5 21	15 21.17	-23 28.2	1.789	2.795	2.8	21.1	5 21	15 21.46	-22 13.3	2.109	3.116	2.4	20.3
5 31	15 12.13	-23 5.6	1.812	2.792	6.6	21.3	5 31	15 12.63	-22 12.2	2.123	3.101	5.9	20.5
6 10	15 4.67	-22 42.4	1.861	2.789	10.4	21.5	6 10	15 5.03	-22 10.3	2.162	3.086	9.4	20.6
6 20	14 59.40	-22 22.6	1.932	2.786	13.6	21.7	6 20	14 59.28	-22 10.4	2.225	3.071	12.4	20.8
309812	2009 BT ₉₄		5 14.8 176°97	2°6/16.2 18			222599	2001 XZ ₁₄		5 14.8 99°04	1°3/14.3 18 R		
4 11	15 56.82	-26 30.1	1.721	2.558	15.1	21.8	4 11	15 55.99	-14 57.8	1.859	2.712	13.5	19.8
4 21	15 50.60	-26 28.6	1.644	2.560	11.6	21.5	4 21	15 49.53	-15 5.9	1.798	2.727	9.9	19.6
5 1	15 41.80	-26 13.4	1.589	2.561	7.5	21.3	5 1	15 40.94	-15 12.0	1.760	2.742	5.9	19.4
5 11	15 31.33	-25 44.5	1.560	2.562	3.5	21.0	5 11	15 31.07	-15 17.3	1.749	2.757	1.9	19.1
5 21	15 20.39	-25 3.9	1.558	2.563	3.4	21.0	5 21	15 20.93	-15 23.4	1.766	2.771	3.2	19.3
5 31	15 10.29	-24 16.3	1.582	2.562	7.4	21.3	5 31	15 11.57	-15 32.1	1.811	2.785	7.2	19.5
6 10	15 2.12	-23 28.0	1.632	2.562	11.5	21.5	6 10	15 3.89	-15 45.5	1.881	2.799	10.9	19.8
6 20	14 56.56	-22 44.7	1.704	2.560	15.1	21.7	6 20	14 58.43	-16 4.8	1.974	2.812	14.0	20.0
405103	2002 AH ₅₅		5 14.8 159°42	2°0/15.9 16			113108	2002 RS ₇₇		5 14.8 338°55	2°5/16.2 17		
4 11	15 55.84	-25 37.3	1.618	2.463	15.5	21.5	4 11	15 51.83	-25 51.6	1.854	2.697	13.9	19.6
4 21	15 49.92	-25 23.6	1.546	2.467	11.8	21.2	4 21	15 46.81	-26 0.1	1.775	2.694	10.7	19.4
5 1	15 41.39	-24 55.9	1.495	2.471	7.5	21.0	5 1	15 39.51	-25 57.4	1.719	2.692	7.0	19.1
5 11	15 31.21	-24 14.8	1.470	2.474	3.2	20.7	5 11	15 30.71	-25 43.3	1.687	2.690	3.3	18.9
5 21	15 20.61	-23 23.4	1.471	2.477	3.2	20.7	5 21	15 21.45	-25 19.1	1.682	2.687	3.3	18.9
5 31	15 10.91	-22 27.2	1.498	2.480	7.6	21.0	5 31	15 12.85	-24 48.4	1.704	2.685	6.9	19.1
6 10	15 3.22	-21 33.1	1.551	2.482	11.8	21.2	6 10	15 5.90	-24 16.1	1.751	2.684	10.6	19.3
6 20	14 58.19	-20 46.6	1.624	2.483	15.5	21.5	6 20	15 1.24	-23 46.7	1.820	2.682	14.0	19.5
348935	2006 TD ₆₇		5 14.8 205°95	2°5/16.7 18			166083	2002 CF ₁₁₂		5 14.8 43°74	0°6/14.5 18		
4 11	15 51.15												

EPHEMERIDES

5 14.8

5 14.8

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
134654	1999 <i>VK</i> ₄₀		5 14.8 268°46'	0.7/15.2	18		238529	2004 <i>TR</i> ₂₆₂		5 14.8 265°85'	0.7/14.3	18	
4 11	15 53.16	-22 37.5	1.633	2.487	14.9	19.9	4 11	15 51.46	-20 1.0	1.999	2.851	12.7	20.6
4 21	15 48.12	-22 12.7	1.542	2.471	11.3	19.6	4 21	15 46.40	-19 14.4	1.902	2.831	9.5	20.4
5 1	15 40.47	-21 35.5	1.474	2.455	7.0	19.3	5 1	15 39.25	-18 17.8	1.828	2.811	5.7	20.1
5 11	15 31.03	-20 47.4	1.431	2.439	2.2	19.0	5 11	15 30.69	-17 13.8	1.782	2.790	1.6	19.8
5 21	15 20.93	-19 51.8	1.414	2.422	3.0	19.0	5 21	15 21.63	-16 6.6	1.763	2.769	3.0	19.8
5 31	15 11.47	-18 54.5	1.424	2.405	8.0	19.2	5 31	15 13.06	-15 1.6	1.772	2.747	7.2	20.1
6 10	15 3.81	-18 1.9	1.458	2.388	12.5	19.5	6 10	15 5.92	-14 4.2	1.807	2.725	11.2	20.3
6 20	14 58.72	-17 19.5	1.512	2.370	16.5	19.7	6 20	15 0.84	-13 18.4	1.864	2.703	14.7	20.4
174783	2003 <i>WY</i> ₉₆		5 14.8 145°54'	1.1/14.2	17		338781	2003 <i>UU</i> ₂₉₃		5 14.8 254°82'	6.9/9.7	18	
4 11	15 54.39	-17 46.0	1.707	2.565	14.2	20.8	4 11	15 51.08	+ 0 44.6	2.284	3.127	11.6	20.8
4 21	15 48.60	-17 19.6	1.639	2.571	10.5	20.6	4 21	15 45.77	+ 1 43.2	2.199	3.107	9.5	20.6
5 1	15 40.50	-16 46.6	1.593	2.577	6.3	20.4	5 1	15 38.72	+ 2 35.1	2.139	3.087	7.6	20.4
5 11	15 30.97	-16 9.8	1.574	2.582	1.9	20.1	5 11	15 30.52	+ 3 15.4	2.104	3.066	7.0	20.4
5 21	15 21.11	-15 32.8	1.582	2.587	3.4	20.2	5 21	15 21.91	+ 3 39.7	2.097	3.045	8.1	20.4
5 31	15 12.06	-15 0.1	1.616	2.591	7.8	20.5	5 31	15 13.71	+ 3 45.4	2.115	3.023	10.3	20.5
6 10	15 4.78	-14 35.7	1.675	2.596	11.8	20.7	6 10	15 6.66	+ 3 31.8	2.157	3.001	12.8	20.6
6 20	14 59.86	-14 22.1	1.756	2.600	15.2	20.9	6 20	15 1.32	+ 3 0.0	2.220	2.978	15.1	20.7
263099	2007 <i>TO</i> ₂₁₇		5 14.8 303°15'	1.3/15.4	17		236861	2007 <i>RC</i> ₁₈₈		5 14.8 171°26'	0.7/15.6	18	
4 11	15 52.11	-22 54.7	1.319	2.187	17.0	20.8	4 11	15 46.16	-23 4.1	3.808	4.637	7.7	21.6
4 21	15 47.95	-22 46.9	1.233	2.168	12.9	20.5	4 21	15 41.56	-22 55.3	3.724	4.639	5.7	21.4
5 1	15 40.67	-22 25.9	1.167	2.150	8.1	20.2	5 1	15 35.93	-22 41.3	3.666	4.641	3.6	21.3
5 11	15 31.16	-21 52.2	1.124	2.131	2.8	19.8	5 11	15 29.69	-22 23.0	3.637	4.642	1.3	21.1
5 21	15 20.75	-21 8.8	1.106	2.113	3.5	19.8	5 21	15 23.29	-22 1.5	3.637	4.644	1.5	21.1
5 31	15 11.03	-20 21.5	1.111	2.096	9.1	20.0	5 31	15 17.19	-21 38.5	3.668	4.645	3.7	21.3
6 10	15 3.45	-19 37.7	1.138	2.079	14.3	20.3	6 10	15 11.84	-21 15.9	3.726	4.646	5.9	21.5
6 20	14 58.94	-19 3.6	1.185	2.062	18.9	20.5	6 20	15 7.55	-20 55.6	3.810	4.647	7.9	21.6
23463	1989 <i>TX</i> ₁₁		5 14.8 211°14'	2.5/11.7	18		69184	6705 <i>P-L</i>		5 14.8 121°27'	2.5/15.9	18	
4 11	15 42.35	- 5 44.4	4.550	5.396	6.2	18.9	4 11	15 58.54	-25 7.9	1.713	2.551	15.1	19.4
4 21	15 38.60	- 5 22.8	4.474	5.394	4.7	18.8	4 21	15 51.77	-25 25.6	1.648	2.565	11.5	19.2
5 1	15 34.11	- 5 3.2	4.425	5.393	3.3	18.7	5 1	15 42.46	-25 32.0	1.606	2.579	7.4	19.0
5 11	15 29.17	- 4 47.2	4.404	5.391	2.5	18.7	5 11	15 31.57	-25 26.4	1.590	2.592	3.4	18.8
5 21	15 24.11	- 4 36.0	4.413	5.389	3.1	18.7	5 21	15 20.32	-25 10.1	1.600	2.605	3.4	18.8
5 31	15 19.27	- 4 30.8	4.450	5.387	4.5	18.8	5 31	15 10.00	-24 46.5	1.638	2.618	7.3	19.1
6 10	15 14.96	- 4 32.2	4.514	5.386	6.1	18.9	6 10	15 1.67	-24 21.0	1.702	2.629	11.2	19.3
6 20	15 11.44	- 4 40.3	4.602	5.384	7.5	19.0	6 20	14 55.96	-23 58.2	1.787	2.641	14.6	19.6
54380	2000 <i>KR</i> ₆₁		5 14.8 207°24'	1.1/14.2	18		230631	Justino		5 14.8 272°96'	3.4/12.9	18	
4 11	15 53.70	-16 57.5	1.985	2.837	12.8	19.5	4 11	15 51.40	-11 36.0	1.864	2.726	13.0	20.4
4 21	15 47.94	-16 41.5	1.903	2.833	9.5	19.3	4 21	15 46.40	-11 0.9	1.778	2.711	9.7	20.2
5 1	15 40.09	-16 20.7	1.846	2.828	5.7	19.0	5 1	15 39.27	-10 24.2	1.715	2.696	6.2	19.9
5 11	15 30.90	-15 57.1	1.816	2.823	1.7	18.8	5 11	15 30.71	- 9 49.6	1.679	2.681	3.5	19.7
5 21	15 21.29	-15 33.3	1.813	2.818	3.1	18.9	5 21	15 21.63	- 9 21.1	1.669	2.665	4.9	19.8
5 31	15 12.27	-15 12.6	1.838	2.812	7.1	19.1	5 31	15 13.08	- 9 2.4	1.686	2.649	8.6	19.9
6 10	15 4.74	-14 58.2	1.889	2.806	10.9	19.3	6 10	15 5.98	- 8 56.3	1.727	2.633	12.3	20.1
6 20	14 59.30	-14 52.3	1.962	2.799	14.1	19.5	6 20	15 0.98	- 9 3.8	1.789	2.617	15.6	20.3
285974	2001 <i>RH</i> ₁₁₂		5 14.8 267°73'	0.2/14.7	16		260204	2004 <i>RE</i> ₁₈₀		5 14.8 286°08'	4.4/10.8	17	
4 11	15 50.56	-19 30.9	2.189	3.039	11.8	21.4	4 11	15 47.26	- 8 36.0	2.333	3.193	10.8	21.0
4 21	15 45.55	-19 14.6	2.097	3.025	8.8	21.2	4 21	15 42.91	- 7 15.9	2.247	3.176	8.2	20.8
5 1	15 38.65	-18 51.7	2.030	3.012	5.3	21.0	5 1	15 36.98	- 5 54.3	2.186	3.159	5.7	20.7
5 11	15 30.50	-18 23.9	1.990	2.998	1.5	20.7	5 11	15 30.03	- 4 36.2	2.153	3.142	4.4	20.5
5 21	15 21.92	-17 53.5	1.977	2.984	2.5	20.7	5 21	15 22.75	- 3 26.7	2.147	3.125	5.8	20.6
5 31	15 13.80	-17 23.8	1.993	2.970	6.4	21.0	5 31	15 15.89	- 2 30.3	2.169	3.108	8.5	20.7
6 10	15 6.97	-16 58.4	2.034	2.956	10.0	21.1	6 10	15 10.14	- 1 49.9	2.216	3.091	11.3	20.9
6 20	15 2.01	-16 40.1	2.098	2.941	13.1	21.3	6 20	15 5.97	- 1 26.6	2.284	3.074	13.9	21.0
370124	2001 <i>VY</i> ₄₅		5 14.8 172°62'	0.2/14.7	17		509863	2008 <i>YO</i> ₁₇₁		5 14.8 220°35'	5.0/18.5	18	
4 11	15 54.28	-19 6.9	2.527	3.364	10.9	22.6	4 11	15 54.79	-36 14.5	2.543	3.326	12.3	21.7
4 21	15 47.91	-18 57.1	2.447	3.368	8.0	22.4	4 21	15 48.68	-36 27.3	2.446	3.317	10.1	21.5
5 1	15 39.88	-18 42.1	2.393	3.372	4.8	22.2	5 1	15 40.53	-36 25.1	2.372	3.307	7.7	21.3
5 11	15 30.81	-18 23.1	2.367	3.375	1.3	22.0	5 11	15 31.04	-36 6.1	2.324	3.297	5.6	21.2
5 21	15 21.47	-18 1.9	2.371	3.377	2.2	22.1	5 21	15 21.11	-35 30.5	2.303	3.286	5.1	21.1
5 31	15 12.65	-17 41.0	2.404	3.378	5.7	22.3	5 31	15 11.71	-34 41.0	2.311	3.274	6.6	21.2
6 10	15 5.07	-17 23.3	2.465	3.379	8.8	22.5	6 10	15 3.74	-33 42.4	2.345	3.262	9.0	21.3
6 20	14 59.22	-17 10.9	2.550	3.378	11.5	22.7	6 20	14 57.79	-32 40.3	2.404	3.249	11.6	21.5
380195	2000 <i>XE</i> ₁₆		5 14.8 210°18'	4.4/17.4	18		251868	1999 <i>VL</i> ₁₇		5 14.8 199°47'	2.1/15.9	17	
4 11	15 57.21	-32 24.0	2.475	3.272	12.3	21.5	4 11	15 56.81	-24 49.4	1.947	2.781	13.7	21.6
4 21	15 50.51	-32 56.4	2.380	3.265	9.8	21.3	4 21	15 50.45	-25 1.0	1.863	2.778	10.5	21.3
5 1	15 41.66	-33 16.8	2.310	3.257	7.2	21.1	5 1	15 41.71	-25 2.7	1.802	2.775	6.7	21.1
5 11	15 31.36	-33 23.0	2.266	3.248	4.9	21.0	5 11	15 31.40	-24 53.7	1.767	2.770	3.0	20.9
5 21	15 20.52	-33 14.5	2.250	3.239	4.6	20.9	5 21	15 20.56	-24 35.2	1.760	2.765	3.1	20.8
5 31	15 10.15	-32 53.3	2.263	3.229	6.5	21.0	5 31	15 10.36	-24 10.2	1.781	2.760	6.9	21.1
6 10	15 1.19	-32 23.2	2.302	3.218	9.2	21.2	6 10	15 1.83	-23 43.3	1.828	2.754	10.7	21.3
6 20	14 54.30	-31 49.2	2.366	3.207	11.9	21.3	6 20	14 55.65	-23 19.0	1.898	2.747	14.0	21.5
376523	2012 <i>PK</i> ₁₄												

EPHEMERIDES

5 14.8

5 14.8

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
416468	2003 <i>WQ</i> ₇₈		5 14.8 211°46'	2°0'/15.8	16		18147	2000 <i>OY</i> ₅₀		5 14.8 273°32'	7°5'/9.4	18	
4 11	15 56.62	-23 56.6	1.768	2.610	14.5	21.7	4 11	15 50.09	-2 30.0	1.841	2.701	13.2	18.3
4 21	15 50.52	-24 11.3	1.685	2.605	11.1	21.5	4 21	15 45.41	-1 2.3	1.761	2.683	10.5	18.0
5 1	15 41.85	-24 16.2	1.625	2.601	7.1	21.3	5 1	15 38.67	+0 21.8	1.705	2.665	8.2	17.9
5 11	15 31.46	-24 10.7	1.591	2.596	3.0	21.0	5 11	15 30.58	+1 35.2	1.675	2.647	7.5	17.8
5 21	15 20.46	-23 55.8	1.584	2.590	3.2	21.0	5 21	15 22.01	+2 31.3	1.670	2.628	9.0	17.8
5 31	15 10.15	-23 34.7	1.604	2.584	7.3	21.2	5 31	15 13.96	+3 5.4	1.690	2.609	11.7	17.9
6 10	15 1.64	-23 12.0	1.649	2.577	11.4	21.4	6 10	15 7.32	+3 15.5	1.732	2.590	14.7	18.1
6 20	14 55.66	-22 52.5	1.716	2.571	15.1	21.7	6 20	15 2.71	+3 2.5	1.793	2.571	17.5	18.2
431372	2007 <i>ES</i> ₂₂		5 14.8 151°71'	10°8'/6.0	17		521339	2015 <i>LQ</i> ₄₄		5 14.8 250°62'	2°7'/16.8	18	
4 11	15 49.81	+6 31.9	1.792	2.636	14.3	21.1	4 11	15 50.22	-28 44.8	2.508	3.330	11.4	21.5
4 21	15 45.03	+8 32.5	1.743	2.637	12.3	20.9	4 21	15 45.17	-28 44.4	2.420	3.325	8.8	21.3
5 1	15 38.30	+10 19.7	1.718	2.638	11.0	20.9	5 1	15 38.37	-28 33.1	2.355	3.319	6.0	21.1
5 11	15 30.40	+11 44.6	1.716	2.640	11.0	20.9	5 11	15 30.46	-28 10.7	2.317	3.314	3.4	21.0
5 21	15 22.24	+12 41.2	1.738	2.641	12.3	20.9	5 21	15 22.22	-27 38.7	2.308	3.309	3.1	20.9
5 31	15 14.77	+13 6.3	1.782	2.642	14.2	21.1	5 31	15 14.46	-26 59.8	2.326	3.304	5.6	21.1
6 10	15 8.80	+13 1.0	1.846	2.643	16.4	21.2	6 10	15 7.94	-26 18.0	2.371	3.298	8.5	21.3
6 20	15 4.85	+12 28.9	1.926	2.643	18.3	21.4	6 20	15 3.18	-25 37.4	2.440	3.293	11.2	21.4
20604	Vrishikpatil		5 14.8 3°42'	0°7'/15.2	18	R	342299	2008 <i>TC</i> ₄₈		5 14.8 224°60'	0°8'/15.2	18	
4 11	15 47.38	-24 34.8	1.104	1.985	18.5	17.0	4 11	15 55.69	-20 9.2	2.150	2.990	12.4	21.1
4 21	15 44.48	-23 38.8	1.041	1.984	13.9	16.7	4 21	15 49.43	-20 32.6	2.062	2.983	9.3	20.9
5 1	15 38.48	-22 22.2	0.998	1.984	8.5	16.4	5 1	15 41.06	-20 51.1	1.998	2.976	5.7	20.6
5 11	15 30.52	-20 49.4	0.977	1.984	2.7	16.0	5 11	15 31.26	-21 4.6	1.962	2.969	1.9	20.4
5 21	15 22.08	-19 8.8	0.978	1.987	3.6	16.1	5 21	15 20.92	-21 13.5	1.954	2.961	2.5	20.4
5 31	15 14.75	-17 31.3	1.003	1.990	9.4	16.4	5 31	15 11.08	-21 19.2	1.976	2.953	6.4	20.6
6 10	15 9.79	-16 7.3	1.049	1.994	14.7	16.7	6 10	15 2.64	-21 24.5	2.023	2.945	10.0	20.8
6 20	15 5.77	-15 3.3	1.113	2.000	19.1	17.0	6 20	14 56.27	-21 31.9	2.094	2.936	13.2	21.0
16032	1999 <i>FU</i> ₃₀		5 14.8 312°71'	1°7'/13.6	18		179440	2002 <i>AM</i> ₁₀₃		5 14.8 100°90'	3°2'/17.2	18	
4 11	15 48.50	-17 7.0	2.005	2.866	12.3	17.7	4 11	15 52.19	-30 18.5	2.475	3.288	11.8	21.2
4 21	15 44.05	-16 13.5	1.926	2.860	9.1	17.5	4 21	15 46.51	-30 23.2	2.405	3.303	9.2	21.0
5 1	15 37.74	-15 13.0	1.870	2.854	5.4	17.3	5 1	15 39.10	-30 16.0	2.359	3.318	6.4	20.9
5 11	15 30.27	-14 9.5	1.841	2.848	2.0	17.0	5 11	15 30.65	-29 56.7	2.340	3.332	3.8	20.7
5 21	15 22.47	-13 7.3	1.840	2.842	3.5	17.1	5 21	15 21.98	-29 26.7	2.348	3.346	3.4	20.7
5 31	15 15.24	-12 11.5	1.866	2.837	7.3	17.4	5 31	15 13.94	-28 49.0	2.385	3.360	5.6	20.9
6 10	15 9.38	-11 26.2	1.917	2.831	10.9	17.6	6 10	15 7.27	-28 7.7	2.449	3.374	8.3	21.1
6 20	15 5.43	-10 54.0	1.990	2.826	14.0	17.7	6 20	15 2.42	-27 27.0	2.536	3.387	10.9	21.3
419775	2010 <i>VW</i> ₁₅₁		5 14.8 8°47'	3°6'/13.4	17		190612	2000 <i>VZ</i> ₄₆		5 14.8 238°91'	1°7'/15.9	18	
4 11	15 53.83	-10 55.8	1.462	2.333	15.4	20.4	4 11	15 54.11	-25 16.0	2.423	3.249	11.6	21.7
4 21	15 48.54	-10 43.2	1.396	2.333	11.5	20.2	4 21	15 48.15	-25 9.0	2.320	3.231	8.9	21.5
5 1	15 40.66	-10 31.8	1.351	2.334	7.2	19.9	5 1	15 40.24	-24 52.3	2.241	3.213	5.7	21.2
5 11	15 31.12	-10 24.9	1.331	2.334	3.8	19.7	5 11	15 31.02	-24 26.0	2.190	3.193	2.5	21.0
5 21	15 21.10	-10 25.7	1.336	2.335	5.3	19.8	5 21	15 21.30	-23 51.5	2.168	3.173	2.5	21.0
5 31	15 11.90	-10 36.8	1.366	2.336	9.5	20.0	5 31	15 12.01	-23 11.8	2.174	3.152	5.9	21.1
6 10	15 4.62	-10 59.7	1.420	2.338	13.7	20.3	6 10	15 3.98	-22 31.1	2.208	3.130	9.3	21.3
6 20	14 59.94	-11 34.4	1.493	2.339	17.3	20.5	6 20	14 57.82	-21 53.6	2.266	3.108	12.3	21.5
182541	2001 <i>TP</i> ₅₁		5 14.8 291°31'	1°7'/12.8	18		199754	2006 <i>JJ</i> ₃₈		5 14.8 115°08'	2°4'/13.2	18	
4 11	15 42.35	-11 43.1	4.192	5.042	6.6	19.8	4 11	15 50.52	-14 31.7	1.948	2.808	12.6	20.2
4 21	15 38.69	-11 14.6	4.111	5.039	4.9	19.7	4 21	15 45.50	-13 44.1	1.879	2.813	9.3	20.0
5 1	15 34.21	-10 45.7	4.057	5.036	3.0	19.6	5 1	15 38.58	-12 52.6	1.835	2.817	5.6	19.8
5 11	15 29.23	-10 18.0	4.032	5.032	1.7	19.5	5 11	15 30.52	-12 1.1	1.817	2.821	2.6	19.6
5 21	15 24.13	-9 53.0	4.036	5.029	2.5	19.5	5 21	15 22.20	-11 13.7	1.826	2.826	4.1	19.7
5 31	15 19.27	-9 32.4	4.069	5.026	4.2	19.6	5 31	15 14.53	-10 34.7	1.863	2.830	7.6	20.0
6 10	15 14.99	-9 17.2	4.130	5.023	6.1	19.8	6 10	15 8.32	-10 7.2	1.925	2.834	11.1	20.2
6 20	15 11.58	-9 8.4	4.215	5.020	7.7	19.9	6 20	15 4.07	-9 52.9	2.008	2.838	14.1	20.4
304366	2006 <i>SP</i> ₃₄₆		5 14.8 238°76'	3°4'/11.9	18		441112	2007 <i>TU</i> ₂₃		5 14.8 17°06'	10°7'/6.9	18	
4 11	15 48.57	-12 1.0	2.326	3.184	10.9	21.1	4 11	15 51.03	-8 12.6	0.986	1.882	19.0	20.1
4 21	15 43.83	-10 45.0	2.246	3.177	8.1	20.9	4 21	15 47.08	-4 36.5	0.937	1.882	14.7	19.9
5 1	15 37.50	-9 25.6	2.191	3.170	5.2	20.7	5 1	15 39.98	-0 54.8	0.910	1.883	11.4	19.7
5 11	15 30.19	-8 7.5	2.165	3.163	3.4	20.6	5 11	15 30.96	+2 31.4	0.906	1.885	11.0	19.6
5 21	15 22.61	-6 55.5	2.167	3.155	4.8	20.7	5 21	15 21.56	+5 22.3	0.926	1.886	13.9	19.8
5 31	15 15.53	-5 54.1	2.197	3.148	7.7	20.8	5 31	15 13.40	+7 24.6	0.966	1.888	18.0	20.0
6 10	15 9.61	-5 6.8	2.253	3.140	10.6	21.0	6 10	15 7.71	+8 35.4	1.024	1.890	21.9	20.3
6 20	15 5.33	-4 35.0	2.330	3.132	13.3	21.2	6 20	15 5.11	+8 59.6	1.095	1.893	25.3	20.5
338513	2003 <i>QD</i> ₃₂		5 14.8 268°82'	2°6'/13.2	18		253128	2002 <i>VP</i> ₁₄		5 14.8 200°31'	3°0'/15.2	18	
4 11	15 51.06	-13 45.1	2.004	2.863	12.4	21.3	4 11	16 10.81	-20 3.6	1.335	2.176	18.4	20.5
4 21	15 46.06	-13 6.1	1.912	2.845	9.2	21.1	4 21	16 2.22	-21 38.6	1.254	2.174	14.1	20.2
5 1	15 39.05	-12 23.3	1.844	2.826	5.7	20.8	5 1	15 49.56	-23 13.2	1.195	2.170	9.0	19.9
5 11	15 30.67	-11 40.0	1.803	2.807	2.7	20.6	5 11	15 33.83	-24 40.8	1.162	2.166	3.9	19.6
5 21	15 21.80	-11 0.1	1.789	2.788	4.2	20.7	5 21	15 16.70	-25 55.5	1.157	2.162	4.6	19.6
5 31	15 13.39	-10 27.7	1.802	2.768	7.9	20.8	5 31	15 0.32	-26 54.6	1.180	2.156	9.9	19.9
6 10	15 6.34	-10 6.2	1.840	2.748	11.6	21.0	6 10	14 46.62	-27 40.7	1.228	2.150	15.1	20.1
6 20	15 1.26	-9 57.5	1.900	2.728	14.9	21.2	6 20	14 36.81	-28 19.2	1.296	2.142	19.4	20.4
217966	2001 <i>VT</i> ₁₀		5 14.8 265°53'	4°3'/17.7	18		320402	2007 <i>UC</i> ₁₁₂		5 14.8 117°82'	1°0'/15.		

EPHEMERIDES

5 14.8

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
312 Pierretta 5 14.8 335°44' 5°1/16.9 18							308456 2005 SK ₂₇₁ 5 14.8 199°48' 1°6/13.4 16						
4 11	15 52.74	-29 25.3	1.583	2.424	16.0	12.7	4 11	15 48.54	-14 54.3	2.832	3.680	9.5	22.2
4 21	15 48.15	-30 12.7	1.501	2.413	12.7	12.4	4 21	15 43.59	-14 16.6	2.749	3.677	7.0	22.0
5 1	15 40.70	-30 47.0	1.439	2.403	9.0	12.2	5 1	15 37.30	-13 35.9	2.692	3.673	4.2	21.9
5 11	15 31.23	-31 5.1	1.401	2.393	5.8	12.0	5 11	15 30.18	-12 54.4	2.664	3.669	1.8	21.7
5 21	15 20.95	-31 5.9	1.387	2.384	5.5	11.9	5 21	15 22.84	-12 15.0	2.665	3.665	2.9	21.7
5 31	15 11.32	-30 51.7	1.399	2.376	8.5	12.1	5 31	15 15.91	-11 40.3	2.696	3.661	5.7	21.9
6 10	15 3.65	-30 27.9	1.433	2.369	12.3	12.3	6 10	15 9.95	-11 12.8	2.753	3.656	8.4	22.1
6 20	14 58.81	-30 0.9	1.489	2.362	15.9	12.5	6 20	15 5.38	-10 54.1	2.833	3.650	10.8	22.3
20648 1999 TF ₁₆₆ 5 14.8 223°22' 6°2/19.0 18							62759 2000 UK ₉ 5 14.8 151°06' 0°1/14.9 18						
4 11	15 54.34	-38 45.9	2.515	3.288	12.7	19.2	4 11	15 52.64	-18 43.4	2.641	3.479	10.4	18.8
4 21	15 48.50	-39 26.3	2.429	3.286	10.7	19.1	4 21	15 46.72	-18 56.5	2.563	3.484	7.7	18.6
5 1	15 40.51	-39 51.4	2.365	3.284	8.5	18.9	5 1	15 39.23	-19 5.9	2.510	3.489	4.6	18.4
5 11	15 31.11	-39 58.8	2.325	3.281	6.8	18.8	5 11	15 30.74	-19 12.0	2.486	3.494	1.3	18.2
5 21	15 21.20	-39 47.7	2.312	3.279	6.3	18.8	5 21	15 21.96	-19 15.8	2.491	3.498	2.0	18.2
5 31	15 11.84	-39 19.9	2.326	3.276	7.4	18.8	5 31	15 13.64	-19 18.7	2.526	3.502	5.3	18.5
6 10	15 3.95	-38 39.7	2.366	3.273	9.4	19.0	6 10	15 6.45	-19 22.7	2.588	3.506	8.3	18.7
6 20	14 58.17	-37 52.7	2.428	3.271	11.6	19.1	6 20	15 0.88	-19 29.5	2.675	3.509	10.9	18.8
134967 2001 DR ₁₀₃ 5 14.8 86°06' 4°7/17.5 18							169514 2002 DT ₁₈ 5 14.8 63°32' 0°4/15.1 18						
4 11	15 56.46	-31 32.4	1.531	2.362	16.9	19.5	4 11	15 53.73	-23 5.4	1.310	2.176	17.2	19.0
4 21	15 50.59	-31 38.0	1.469	2.375	13.3	19.3	4 21	15 48.60	-22 21.9	1.256	2.190	12.8	18.8
5 1	15 41.89	-31 24.3	1.427	2.389	9.3	19.1	5 1	15 40.69	-21 23.9	1.222	2.205	7.7	18.5
5 11	15 31.48	-30 50.4	1.409	2.403	5.7	18.9	5 11	15 31.16	-20 15.1	1.212	2.220	2.3	18.2
5 21	15 20.73	-29 58.5	1.417	2.416	5.0	18.9	5 21	15 21.39	-19 1.6	1.228	2.236	3.3	18.3
5 31	15 11.10	-28 54.7	1.450	2.429	8.0	19.1	5 31	15 12.80	-17 51.2	1.268	2.251	8.5	18.7
6 10	15 3.72	-27 47.1	1.508	2.443	11.8	19.4	6 10	15 6.47	-16 51.3	1.332	2.266	13.1	19.0
6 20	14 59.22	-26 43.3	1.587	2.456	15.3	19.6	6 20	15 2.97	-16 6.4	1.415	2.282	17.0	19.2
510636 2012 TT ₂₀₇ 5 14.8 315°77' 0°7/15.3 17							351901 2006 SO ₂₆₁ 5 14.9 129°96' 3°1/16.9 18						
4 11	15 48.87	-24 7.2	1.633	2.492	14.7	20.9	4 11	15 54.51	-29 29.2	2.791	3.597	10.8	21.9
4 21	15 44.94	-23 19.7	1.543	2.474	11.1	20.6	4 21	15 48.12	-29 55.9	2.717	3.611	8.4	21.7
5 1	15 38.58	-22 16.5	1.475	2.456	6.9	20.3	5 1	15 40.06	-30 12.9	2.667	3.624	5.9	21.6
5 11	15 30.59	-21 0.0	1.431	2.439	2.2	20.0	5 11	15 30.98	-30 19.3	2.645	3.636	3.6	21.5
5 21	15 22.05	-19 35.1	1.414	2.422	2.9	20.0	5 21	15 21.61	-30 15.5	2.653	3.648	3.4	21.5
5 31	15 14.15	-18 9.1	1.423	2.405	7.8	20.2	5 31	15 12.76	-30 3.2	2.689	3.660	5.3	21.6
6 10	15 7.98	-16 49.9	1.456	2.389	12.3	20.4	6 10	15 5.14	-29 45.6	2.753	3.672	7.8	21.8
6 20	15 4.21	-15 43.6	1.510	2.374	16.2	20.6	6 20	14 59.23	-29 25.9	2.842	3.682	10.1	22.0
479155 2013 CD ₆ 5 14.8 126°19' 3°0/12.5 17							142104 2002 QM ₇₈ 5 14.9 190°98' 1°5/13.9 17						
4 11	15 48.80	-10 14.4	2.593	3.446	10.1	22.2	4 11	15 54.55	-15 54.5	2.007	2.858	12.7	21.7
4 21	15 43.78	-9 36.4	2.527	3.455	7.5	22.0	4 21	15 48.55	-15 30.3	1.928	2.857	9.4	21.5
5 1	15 37.38	-8 58.5	2.487	3.464	4.8	21.9	5 1	15 40.49	-15 1.7	1.873	2.855	5.6	21.3
5 11	15 30.17	-8 23.9	2.475	3.473	3.0	21.8	5 11	15 31.13	-14 31.2	1.846	2.853	2.0	21.0
5 21	15 22.79	-7 55.1	2.491	3.481	4.1	21.9	5 21	15 21.40	-14 1.8	1.846	2.850	3.4	21.1
5 31	15 15.91	-7 34.8	2.535	3.490	6.6	22.0	5 31	15 12.28	-13 37.0	1.875	2.846	7.3	21.4
6 10	15 10.09	-7 24.4	2.606	3.498	9.2	22.2	6 10	15 4.65	-13 19.9	1.929	2.842	10.9	21.6
6 20	15 5.75	-7 24.6	2.699	3.505	11.5	22.4	6 20	14 59.09	-13 12.7	2.006	2.837	14.1	21.8
306044 2010 EQ ₁₆₃ 5 14.8 263°30' 1°2/15.8 17							291946 2006 QB ₃₇ 5 14.9 326°51' 2°0/15.6 17						
4 11	15 50.26	-25 2.5	2.269	3.106	11.9	20.9	4 11	15 51.81	-22 21.5	1.213	2.087	17.7	20.2
4 21	15 45.33	-24 32.7	2.175	3.093	9.0	20.6	4 21	15 48.00	-22 44.4	1.133	2.071	13.5	19.9
5 1	15 38.53	-23 51.6	2.105	3.080	5.7	20.4	5 1	15 40.89	-22 57.3	1.073	2.056	8.6	19.6
5 11	15 30.55	-23 0.5	2.062	3.067	2.2	20.2	5 11	15 31.39	-22 59.6	1.035	2.042	3.4	19.3
5 21	15 22.18	-22 2.2	2.047	3.054	2.4	20.1	5 21	15 20.89	-22 52.0	1.020	2.028	3.8	19.2
5 31	15 14.33	-21 1.0	2.060	3.040	6.0	20.4	5 31	15 11.12	-22 38.2	1.029	2.015	9.3	19.5
6 10	15 7.78	-20 1.8	2.100	3.027	9.5	20.5	6 10	15 3.64	-22 24.0	1.059	2.004	14.6	19.8
6 20	15 3.09	-19 9.0	2.164	3.013	12.6	20.7	6 20	14 59.44	-22 15.0	1.107	1.993	19.3	20.0
346240 2008 BF ₄₃ 5 14.8 46°84' 1°3/15.9 18							179468 2002 BA ₁₆ 5 14.9 140°84' 4°5/18.4 18						
4 11	15 52.98	-28 10.5	1.789	2.626	14.6	19.5	4 11	15 54.32	-35 43.4	2.941	3.719	10.9	21.6
4 21	15 47.17	-26 48.9	1.743	2.660	10.9	19.3	4 21	15 48.02	-36 8.1	2.863	3.730	8.9	21.4
5 1	15 39.41	-25 11.2	1.720	2.695	6.8	19.1	5 1	15 40.02	-36 20.3	2.809	3.741	6.8	21.3
5 11	15 30.71	-23 22.1	1.725	2.730	2.6	18.9	5 11	15 30.98	-36 18.7	2.782	3.751	5.0	21.2
5 21	15 22.12	-21 28.5	1.758	2.766	2.6	19.0	5 21	15 21.66	-36 3.3	2.782	3.761	4.6	21.2
5 31	15 14.64	-19 38.4	1.820	2.801	6.5	19.3	5 31	15 12.86	-35 36.2	2.812	3.771	5.8	21.3
6 10	15 8.97	-17 59.0	1.908	2.836	10.2	19.6	6 10	15 5.31	-35 1.1	2.868	3.780	7.8	21.4
6 20	15 5.47	-16 34.9	2.020	2.871	13.2	19.9	6 20	14 59.50	-34 22.0	2.949	3.788	9.8	21.6
179761 2002 RK ₂₄₀ 5 14.8 161°01' 1°1/14.2 17							499491 2010 MN ₅₂ 5 14.9 178°99' 1°1/15.4 17						
4 11	15 54.72	-17 17.8	1.969	2.819	12.9	21.5	4 11	15 55.65	-22 40.1	1.800	2.645	14.2	22.2
4 21	15 48.63	-16 54.6	1.897	2.825	9.5	21.3	4 21	15 49.66	-22 36.0	1.723	2.647	10.7	22.0
5 1	15 40.49	-16 26.0	1.849	2.830	5.7	21.0	5 1	15 41.28	-22 22.3	1.669	2.647	6.6	21.7
5 11	15 31.09	-15 54.5	1.828	2.835	1.8	20.8	5 11	15 31.38	-21 59.5	1.641	2.648	2.3	21.5
5 21	15 21.38	-15 22.8	1.835	2.839	3.1	20.9	5 21	15 21.02	-21 29.9	1.641	2.648	2.8	21.5
5 31	15 12.37	-14 54.8	1.870	2.843	7.1	21.1	5 31	15 11.40	-20 57.4	1.667	2.647	7.1	21.7
6 10	15 4.91	-14 33.8	1.930	2.846	10.7	21.4	6 10	15 3.54	-20 26.8	1.719	2.646	11.1	22.0
6 20	14 59.57	-14 22.1	2.013	2.848	13.9	21.6	6 20	14 58.07	-20 2.3	1.793	2.645	14.6	22.2
45022 1999 WF ₆ 5 14.8 259°03' 2°2/13.8 18							456192 2006 HB ₉₉ 5 14.9 3°63' 1°4/14.2 17						
4 11	15 54.91	-13 54.4	1.683	2.544	14.3	19.5	4 11	15 49.68	-17 59.0	1.090	1.978	18.1	21.1
4 21	15 49.32	-13 42.0	1.596	2.529	10.7	19.2	4 21	15 46.21	-17 31.5	1.029	1.977	13.5	20.8
5 1	15 41.21	-13 27.4	1.532	2.515	6.5	18.9	5 1	15 39.61	-16 54.9	0.989	1.977	8.1	20.5
5 11													

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
512711	2016 <i>UA</i> ₁₂	5 14.9 227°03		0°2/14.7 18			140997	2001 <i>WR</i> ₂₈	5 14.9 69°11		3°4/13.3 18		
4 11	15 48.95	-20 2.2	2.792	3.633	9.8	23.0	4 11	15 53.46	-8 14.9	2.114	2.966	12.1	19.1
4 21	15 44.00	-19 36.6	2.701	3.625	7.3	22.8	4 21	15 47.49	-8 15.6	2.054	2.981	9.0	18.9
5 1	15 37.62	-19 5.2	2.636	3.616	4.4	22.6	5 1	15 39.74	-8 19.7	2.019	2.995	5.8	18.8
5 11	15 30.32	-18 29.4	2.599	3.607	1.2	22.3	5 11	15 30.95	-8 29.2	2.011	3.010	3.5	18.6
5 21	15 22.75	-17 51.4	2.591	3.598	2.0	22.4	5 21	15 21.95	-8 45.5	2.031	3.024	4.5	18.7
5 31	15 15.58	-17 14.3	2.613	3.588	5.2	22.6	5 31	15 13.60	-9 9.8	2.079	3.039	7.4	18.9
6 10	15 9.42	-16 40.8	2.661	3.578	8.1	22.8	6 10	15 6.64	-9 42.2	2.152	3.053	10.5	19.2
6 20	15 4.71	-16 13.4	2.734	3.568	10.7	22.9	6 20	15 1.56	-10 22.4	2.248	3.068	13.1	19.4
438456	2007 <i>BZ</i> ₃₄	5 14.9 224°72		5°7/ 9.9 18			465412	2008 <i>KC</i> ₃	5 14.9 43°03		5°8/12.5 17		
4 11	15 49.19	+ 1 28.5	2.919	3.754	9.6	22.0	4 11	15 52.78	- 6 49.7	1.374	2.248	16.0	20.5
4 21	15 44.04	+ 2 11.9	2.841	3.743	7.8	21.9	4 21	15 47.70	- 6 13.9	1.324	2.261	12.1	20.3
5 1	15 37.58	+ 2 48.7	2.788	3.732	6.3	21.8	5 1	15 40.13	- 5 43.3	1.296	2.273	8.2	20.1
5 11	15 30.31	+ 3 15.7	2.763	3.721	5.7	21.7	5 11	15 31.09	- 5 23.4	1.292	2.287	5.8	20.0
5 21	15 22.79	+ 3 29.9	2.765	3.709	6.6	21.8	5 21	15 21.79	- 5 18.1	1.312	2.300	7.2	20.1
5 31	15 15.63	+ 3 29.9	2.794	3.696	8.3	21.8	5 31	15 13.48	- 5 29.8	1.356	2.315	10.7	20.4
6 10	15 9.37	+ 3 15.2	2.848	3.684	10.2	22.0	6 10	15 7.15	- 5 58.6	1.423	2.329	14.4	20.6
6 20	15 4.44	+ 2 46.7	2.924	3.670	12.1	22.1	6 20	15 3.37	- 6 42.6	1.508	2.344	17.7	20.9
291401	2006 <i>CB</i> ₆₁	5 14.9 165°42		7°0/ 9.2 17			10257	Garecynthia	5 14.9 238°79		1°9/13.3 18		
4 11	15 51.39	+ 2 32.1	2.489	3.323	11.1	21.6	4 11	15 47.74	-13 18.3	2.777	3.629	9.5	18.6
4 21	15 45.72	+ 3 41.6	2.430	3.329	9.1	21.4	4 21	15 43.09	-12 51.2	2.694	3.623	7.0	18.5
5 1	15 38.59	+ 4 43.1	2.397	3.335	7.5	21.4	5 1	15 37.07	-12 22.4	2.637	3.618	4.3	18.3
5 11	15 30.58	+ 5 31.5	2.391	3.340	7.0	21.3	5 11	15 30.21	-11 54.2	2.608	3.612	2.1	18.1
5 21	15 22.40	+ 6 3.4	2.411	3.344	8.0	21.4	5 21	15 23.11	-11 28.9	2.608	3.607	3.1	18.2
5 31	15 14.75	+ 6 16.7	2.458	3.347	9.8	21.5	5 31	15 16.38	-11 8.9	2.637	3.601	5.8	18.3
6 10	15 8.24	+ 6 11.3	2.529	3.350	11.8	21.7	6 10	15 10.63	-10 56.0	2.691	3.595	8.5	18.5
6 20	15 3.29	+ 5 48.7	2.619	3.352	13.6	21.8	6 20	15 6.25	-10 51.6	2.769	3.589	10.9	18.7
476337	2008 <i>AY</i> ₄₄	5 14.9 14°17		9°6/21.6 16			440125	2003 <i>SE</i> ₂₅₄	5 14.9 287°34		2°0/16.5 18		
4 11	15 54.41	-45 24.6	1.946	2.702	16.5	20.6	4 11	15 48.80	-27 25.9	2.547	3.374	11.1	20.9
4 21	15 49.29	-46 12.8	1.873	2.705	14.4	20.4	4 21	15 44.13	-27 10.0	2.455	3.365	8.5	20.7
5 1	15 41.31	-46 37.6	1.818	2.709	12.2	20.3	5 1	15 37.81	-26 43.4	2.387	3.356	5.6	20.5
5 11	15 31.44	-46 34.9	1.785	2.713	10.4	20.2	5 11	15 30.44	-26 6.7	2.347	3.347	2.8	20.3
5 21	15 21.02	-46 3.2	1.775	2.718	9.6	20.1	5 21	15 22.76	-25 21.8	2.334	3.338	2.6	20.2
5 31	15 11.51	-45 5.7	1.789	2.723	10.2	20.2	5 31	15 15.53	-24 31.9	2.350	3.330	5.3	20.4
6 10	15 4.16	-43 49.4	1.826	2.729	11.9	20.3	6 10	15 9.48	-23 41.2	2.392	3.321	8.4	20.6
6 20	14 59.67	-42 23.1	1.884	2.735	14.1	20.5	6 20	15 5.09	-22 53.6	2.459	3.312	11.1	20.7
374390	2005 <i>UQ</i> ₅₂₇	5 14.9 236°65		3°4/12.9 17			248462	2005 <i>UD</i> ₅₄	5 14.9 256°19		0°8/15.3 18		
4 11	15 52.73	-11 2.7	1.969	2.826	12.6	21.3	4 11	15 52.00	-21 5.6	2.455	3.294	11.1	20.2
4 21	15 47.29	-10 26.7	1.885	2.816	9.4	21.0	4 21	15 46.54	-21 18.2	2.364	3.284	8.3	20.0
5 1	15 39.81	- 9 49.6	1.826	2.805	6.0	20.8	5 1	15 39.30	-21 25.5	2.297	3.275	5.1	19.8
5 11	15 31.00	- 9 15.2	1.793	2.794	3.5	20.6	5 11	15 30.88	-21 27.7	2.259	3.265	1.8	19.6
5 21	15 21.74	- 8 47.1	1.788	2.782	4.9	20.7	5 21	15 22.04	-21 25.6	2.249	3.256	2.2	19.6
5 31	15 13.01	- 8 28.9	1.810	2.770	8.3	20.9	5 31	15 13.61	-21 21.0	2.268	3.246	5.6	19.8
6 10	15 5.70	- 8 22.8	1.856	2.757	11.9	21.1	6 10	15 6.35	-21 16.4	2.313	3.236	8.9	20.0
6 20	15 0.40	- 8 30.0	1.924	2.744	15.0	21.2	6 20	15 0.83	-21 14.3	2.382	3.226	11.7	20.1
180490	2004 <i>CM</i> ₇₈	5 14.9 139°78		1°2/15.5 17			321905	2010 <i>TO</i> ₂₂	5 14.9 123°82		2°6/16.0 17		
4 11	15 55.80	-23 17.8	1.891	2.732	13.8	21.5	4 11	15 56.65	-24 57.2	1.614	2.459	15.5	21.2
4 21	15 49.58	-23 9.3	1.821	2.742	10.3	21.3	4 21	15 50.72	-25 17.3	1.543	2.463	11.9	21.0
5 1	15 41.15	-22 50.7	1.775	2.752	6.4	21.0	5 1	15 42.09	-25 26.3	1.494	2.468	7.7	20.8
5 11	15 31.36	-22 23.1	1.755	2.761	2.3	20.8	5 11	15 31.70	-25 23.1	1.469	2.472	3.6	20.5
5 21	15 21.25	-21 48.7	1.763	2.770	2.7	20.8	5 21	15 20.80	-25 8.8	1.472	2.477	3.5	20.5
5 31	15 11.94	-21 11.8	1.798	2.778	6.7	21.1	5 31	15 10.74	-24 46.9	1.500	2.481	7.6	20.8
6 10	15 4.34	-20 36.9	1.859	2.785	10.5	21.3	6 10	15 2.69	-24 22.7	1.553	2.485	11.8	21.0
6 20	14 59.03	-20 8.2	1.943	2.792	13.8	21.6	6 20	14 57.33	-24 1.3	1.627	2.489	15.4	21.3
286445	2002 <i>AK</i> ₆₂	5 14.9 127°01		3°5/17.9 18			394255	2006 <i>UX</i> ₂₁	5 14.9 94°07		2°0/13.2 17		
4 11	15 52.79	-33 21.9	3.035	3.825	10.4	21.3	4 11	15 49.19	-15 42.6	2.267	3.123	11.3	20.9
4 21	15 46.72	-33 24.7	2.962	3.842	8.2	21.2	4 21	15 44.28	-14 42.7	2.202	3.134	8.2	20.8
5 1	15 39.18	-33 15.7	2.914	3.859	6.0	21.0	5 1	15 37.81	-13 38.3	2.162	3.144	5.0	20.6
5 11	15 30.77	-32 54.8	2.893	3.875	4.0	20.9	5 11	15 30.42	-12 33.1	2.150	3.155	2.2	20.4
5 21	15 22.19	-32 22.9	2.901	3.891	3.6	20.9	5 21	15 22.87	-11 31.4	2.166	3.165	3.5	20.5
5 31	15 14.17	-31 42.6	2.938	3.906	5.1	21.0	5 31	15 15.93	-10 37.4	2.211	3.176	6.7	20.7
6 10	15 7.32	-30 57.5	3.003	3.921	7.2	21.2	6 10	15 10.24	- 9 54.2	2.281	3.186	9.8	20.9
6 20	15 2.08	-30 11.4	3.092	3.935	9.3	21.3	6 20	15 6.23	- 9 23.6	2.374	3.196	12.4	21.1
466976	2016 <i>BM</i> ₁₁	5 14.9 88°76		2°9/16.3 16			394669	2008 <i>CM</i> ₃₃	5 14.9 98°41		0°6/14.5 17		
4 11	15 57.98	-26 47.8	1.526	2.368	16.4	21.8	4 11	15 50.62	-18 7.9	2.353	3.201	11.2	21.6
4 21	15 51.54	-26 50.6	1.471	2.389	12.5	21.6	4 21	15 45.35	-17 51.4	2.286	3.213	8.2	21.4
5 1	15 42.42	-26 38.7	1.437	2.410	8.1	21.4	5 1	15 38.46	-17 30.3	2.243	3.225	4.9	21.2
5 11	15 31.72	-26 12.1	1.429	2.430	3.9	21.2	5 11	15 30.62	-17 6.4	2.228	3.236	1.4	21.0
5 21	15 20.78	-25 33.5	1.446	2.451	3.7	21.2	5 21	15 22.57	-16 41.8	2.242	3.248	2.4	21.1
5 31	15 10.99	-24 48.1	1.489	2.471	7.6	21.5	5 31	15 15.10	-16 19.4	2.284	3.259	5.8	21.3
6 10	15 3.41	-24 2.7	1.557	2.490	11.7	21.8	6 10	15 8.87	-16 1.8	2.352	3.270	9.0	21.5
6 20	14 58.61	-23 23.0	1.647	2.509	15.2	22.0	6 20	15 4.35	-15 51.0	2.443	3.281	11.7	21.7
479182	2013 <i>CL</i> ₅₆	5 14.9 214°55		9°1/ 4.8 16			107473	2001 <i>DZ</i> ₃₂	5 14.9 338°04		1°5/14.3 18		
4 11	15 48.29	+14 22.5											

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
518664	2008 <i>SV</i> ₃₁₂		5 14.9 184°04	0°8/14.4	17		520190	2014 <i>DE</i> ₁₂₃		5 14.9 319°19	5°1/11.4	16	
4 11	15 51.41	-18 52.9	2.054	2.906	12.4	21.6	4 11	15 47.82	-7 30.9	1.885	2.753	12.6	20.3
4 21	15 46.22	-18 18.6	1.977	2.906	9.2	21.4	4 21	15 43.76	-6 31.3	1.805	2.738	9.6	20.1
5 1	15 39.12	-17 37.2	1.924	2.906	5.5	21.2	5 1	15 37.76	-5 32.5	1.750	2.724	6.7	19.9
5 11	15 30.84	-16 51.4	1.898	2.906	1.6	20.9	5 11	15 30.52	-4 40.0	1.719	2.710	5.2	19.8
5 21	15 22.24	-16 4.6	1.900	2.906	2.8	21.0	5 21	15 22.85	-3 58.6	1.715	2.697	6.5	19.8
5 31	15 14.26	-15 20.9	1.930	2.905	6.7	21.2	5 31	15 15.70	-3 32.4	1.736	2.684	9.6	20.0
6 10	15 7.69	-14 44.5	1.985	2.904	10.3	21.5	6 10	15 9.90	-3 23.8	1.781	2.672	12.8	20.1
6 20	15 3.08	-14 17.9	2.063	2.903	13.4	21.7	6 20	15 6.01	-3 32.9	1.845	2.660	15.8	20.3
398639	2012 <i>QP</i> ₃₁		5 14.9 119°74	6°0/19.3	17		510405	2011 <i>UH</i> ₁₅₄		5 14.9 180°28	3°9/18.4	18	
4 11	15 56.41	-38 29.2	2.351	3.127	13.4	21.0	4 11	15 52.23	-34 57.7	2.998	3.782	10.6	22.3
4 21	15 49.98	-38 53.4	2.279	3.140	11.1	20.9	4 21	15 46.49	-34 57.7	2.909	3.783	8.6	22.2
5 1	15 41.40	-39 0.4	2.229	3.154	8.7	20.7	5 1	15 39.17	-34 44.9	2.844	3.784	6.4	22.0
5 11	15 31.48	-38 48.2	2.204	3.167	6.7	20.6	5 11	15 30.88	-34 18.7	2.806	3.784	4.5	21.9
5 21	15 21.26	-38 17.1	2.206	3.179	6.0	20.6	5 21	15 22.33	-33 40.1	2.797	3.784	4.0	21.9
5 31	15 11.80	-37 30.2	2.235	3.191	7.2	20.7	5 31	15 14.29	-32 51.7	2.816	3.783	5.4	22.0
6 10	15 4.02	-36 33.0	2.290	3.203	9.4	20.8	6 10	15 7.41	-31 57.3	2.863	3.782	7.5	22.1
6 20	14 58.47	-35 31.6	2.368	3.215	11.7	21.0	6 20	15 2.16	-31 1.2	2.935	3.780	9.7	22.3
420769	2013 <i>GC</i> ₂₁		5 14.9 307°01	0°4/14.8	16		355218	2007 <i>AN</i> ₁		5 14.9 235°94	4°3/11.8	18	
4 11	15 53.39	-18 18.9	1.256	2.131	17.2	20.9	4 11	15 49.34	-5 27.9	2.548	3.399	10.3	21.1
4 21	15 49.09	-18 22.5	1.173	2.113	12.9	20.6	4 21	15 44.37	-4 53.8	2.469	3.391	7.9	21.0
5 1	15 41.56	-18 19.6	1.109	2.095	7.9	20.3	5 1	15 37.91	-4 22.9	2.416	3.384	5.6	20.8
5 11	15 31.69	-18 11.3	1.068	2.077	2.3	19.9	5 11	15 30.53	-3 58.4	2.390	3.377	4.3	20.7
5 21	15 20.80	-18 0.0	1.051	2.059	3.7	19.9	5 21	15 22.86	-3 43.1	2.391	3.369	5.3	20.8
5 31	15 10.55	-17 49.7	1.058	2.042	9.6	20.2	5 31	15 15.61	-3 39.0	2.421	3.361	7.6	20.9
6 10	15 2.48	-17 45.3	1.087	2.025	15.0	20.4	6 10	15 9.40	-3 47.2	2.475	3.353	10.2	21.0
6 20	14 57.58	-17 50.7	1.134	2.009	19.7	20.7	6 20	15 4.69	-4 7.5	2.552	3.345	12.5	21.2
488927	2005 <i>UP</i> ₆₃		5 14.9 266°10	0°3/14.7	18		85193	1991 <i>RD</i> ₁₉		5 14.9 250°16	1°1/15.5	17	
4 11	15 50.09	-18 58.8	2.492	3.337	10.7	21.9	4 11	15 56.60	-23 24.8	1.701	2.546	14.9	20.0
4 21	15 45.11	-18 45.0	2.395	3.321	8.0	21.7	4 21	15 50.82	-23 9.5	1.604	2.527	11.3	19.7
5 1	15 38.45	-18 25.9	2.324	3.304	4.8	21.4	5 1	15 42.31	-22 41.9	1.530	2.507	7.1	19.4
5 11	15 30.69	-18 2.8	2.280	3.288	1.4	21.2	5 11	15 31.88	-22 2.5	1.480	2.487	2.5	19.1
5 21	15 22.52	-17 37.7	2.264	3.271	2.3	21.2	5 21	15 20.68	-21 13.9	1.458	2.466	3.0	19.1
5 31	15 14.73	-17 13.4	2.277	3.253	5.8	21.4	5 31	15 10.03	-20 21.1	1.463	2.443	7.9	19.3
6 10	15 8.04	-16 52.7	2.317	3.236	9.0	21.6	6 10	15 1.18	-19 30.5	1.493	2.421	12.5	19.5
6 20	15 2.99	-16 38.1	2.380	3.218	11.9	21.7	6 20	14 54.95	-18 47.8	1.544	2.397	16.5	19.7
278330	2007 <i>HN</i> ₆₆		5 14.9 211°24	3°5/13.0	18		83165	2001 <i>QH</i> ₂₇₇		5 14.9 147°41	2°3/16.3	18	
4 11	15 53.65	-9 0.1	2.100	2.952	12.1	21.0	4 11	15 54.25	-26 7.9	2.499	3.322	11.4	20.1
4 21	15 47.83	-8 42.7	2.021	2.948	9.1	20.8	4 21	15 48.15	-26 29.1	2.421	3.328	8.7	19.9
5 1	15 40.11	-8 27.3	1.967	2.943	5.9	20.6	5 1	15 40.25	-26 41.8	2.367	3.335	5.8	19.7
5 11	15 31.15	-8 16.5	1.940	2.938	3.6	20.4	5 11	15 31.20	-26 45.5	2.341	3.341	3.0	19.6
5 21	15 21.82	-8 13.0	1.941	2.933	4.8	20.5	5 21	15 21.82	-26 40.6	2.344	3.347	2.8	19.6
5 31	15 13.01	-8 18.9	1.969	2.927	7.9	20.7	5 31	15 12.97	-26 29.1	2.376	3.352	5.5	19.8
6 10	15 5.56	-8 35.3	2.023	2.921	11.2	20.9	6 10	15 5.41	-26 14.2	2.434	3.357	8.5	19.9
6 20	15 0.03	-9 2.3	2.099	2.915	14.1	21.0	6 20	14 59.67	-25 59.2	2.517	3.362	11.1	20.1
87628	2000 <i>RP</i> ₅₄		5 14.9 209°97	7°1/18.9	18		93437	2000 <i>SG</i> ₃₂₇		5 14.9 130°70	6°5/10.6	18	
4 11	15 58.23	-38 43.2	2.136	2.914	14.6	19.0	4 11	15 52.66	-0 8.6	2.253	3.095	11.8	19.5
4 21	15 51.85	-39 30.0	2.049	2.910	12.2	18.8	4 21	15 46.76	+0 46.8	2.201	3.110	9.4	19.4
5 1	15 42.82	-39 59.6	1.984	2.905	9.7	18.6	5 1	15 39.28	+1 34.6	2.174	3.125	7.3	19.3
5 11	15 31.99	-40 8.1	1.942	2.901	7.7	18.5	5 11	15 30.89	+2 10.2	2.173	3.139	6.5	19.3
5 21	15 20.49	-39 54.2	1.927	2.895	7.1	18.5	5 21	15 22.37	+2 30.2	2.199	3.152	7.4	19.3
5 31	15 9.63	-39 20.0	1.938	2.890	8.5	18.5	5 31	15 14.48	+2 32.9	2.252	3.165	9.5	19.5
6 10	15 0.59	-38 30.9	1.974	2.884	10.8	18.7	6 10	15 7.88	+2 18.5	2.329	3.177	11.8	19.7
6 20	14 54.14	-37 34.1	2.033	2.878	13.4	18.8	6 20	15 3.01	+1 48.5	2.426	3.188	13.9	19.8
208679	2002 <i>GD</i> ₉₄		5 14.9 64°53	2°5/16.1	18		215140	1999 <i>TP</i> ₂₆₀		5 14.9 297°49	1°5/15.6	17	
4 11	15 56.10	-25 50.9	1.316	2.172	17.7	20.0	4 11	15 52.61	-23 40.0	1.427	2.289	16.3	20.5
4 21	15 50.51	-25 47.9	1.263	2.190	13.4	19.8	4 21	15 48.27	-23 30.1	1.337	2.268	12.5	20.3
5 1	15 41.97	-25 29.2	1.231	2.208	8.6	19.6	5 1	15 40.96	-23 6.7	1.267	2.248	7.9	19.9
5 11	15 31.69	-24 55.7	1.222	2.226	3.8	19.3	5 11	15 31.53	-22 30.2	1.221	2.228	2.9	19.6
5 21	15 21.13	-24 10.7	1.238	2.244	3.7	19.4	5 21	15 21.22	-21 43.3	1.200	2.207	3.3	19.5
5 31	15 11.79	-23 20.7	1.279	2.263	8.2	19.7	5 31	15 11.54	-20 51.6	1.203	2.187	8.6	19.8
6 10	15 4.85	-22 32.9	1.343	2.281	12.7	20.0	6 10	15 3.86	-20 2.4	1.230	2.168	13.6	20.0
6 20	15 0.89	-21 53.3	1.427	2.300	16.5	20.3	6 20	14 59.07	-19 22.1	1.276	2.149	18.1	20.2
73655	1981 <i>EL</i> ₉		5 14.9 183°32	5°5/19.5	18		166282	2002 <i>GU</i> ₁₂₃		5 14.9 127°11	0°5/14.7	18	
4 11	15 53.10	-39 58.6	3.057	3.814	11.0	19.7	4 11	15 56.83	-18 20.9	1.604	2.460	15.1	20.8
4 21	15 47.28	-40 26.1	2.969	3.814	9.3	19.6	4 21	15 50.65	-18 15.0	1.538	2.469	11.2	20.6
5 1	15 39.72	-40 39.8	2.904	3.814	7.4	19.5	5 1	15 41.97	-18 2.9	1.496	2.478	6.7	20.3
5 11	15 31.05	-40 37.9	2.864	3.814	6.0	19.4	5 11	15 31.71	-17 46.1	1.479	2.487	1.9	20.1
5 21	15 22.01	-40 20.3	2.852	3.813	5.5	19.3	5 21	15 21.08	-17 27.3	1.488	2.495	3.1	20.2
5 31	15 13.45	-39 48.6	2.866	3.812	6.3	19.4	5 31	15 11.33	-17 10.1	1.525	2.503	7.8	20.5
6 10	15 6.11	-39 6.4	2.908	3.811	8.0	19.5	6 10	15 3.51	-16 58.5	1.585	2.510	12.0	20.7
6 20	15 0.51	-38 18.3	2.974	3.810	9.8	19.6	6 20	14 58.26	-16 55.1	1.667	2.518	15.6	21.0
490285	2008 <i>YD</i> ₁₁₃		5 14.9 128°43	0°3/14.7	17		175903	1999 <i>YL</i> ₅		5 14.9 185°00			

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
90273	2003 <i>CC</i> ₁₉		5 14.9 160°55	0°6/14.6	18		354666	2005 <i>MD</i> ₁₇		5 14.9 282°20	3°6/17.3	18	
4 11	15 56.99	-16 52.6	2.124	2.967	12.4	19.9	4 11	15 51.51	-30 46.4	2.214	3.033	12.8	21.3
4 21	15 50.30	-17 0.7	2.049	2.973	9.2	19.7	4 21	15 46.55	-30 45.6	2.116	3.017	10.1	21.1
5 1	15 41.59	-17 5.5	1.999	2.979	5.5	19.5	5 1	15 39.51	-30 30.8	2.041	3.001	7.1	20.9
5 11	15 31.61	-17 7.7	1.976	2.984	1.6	19.3	5 11	15 31.07	-30 1.5	1.992	2.985	4.3	20.7
5 21	15 21.27	-17 8.7	1.983	2.989	2.6	19.3	5 21	15 22.14	-29 18.8	1.970	2.969	3.8	20.6
5 31	15 11.54	-17 10.5	2.018	2.993	6.5	19.6	5 31	15 13.71	-28 26.2	1.976	2.953	6.4	20.7
6 10	15 3.30	-17 15.3	2.080	2.996	10.1	19.8	6 10	15 6.70	-27 28.8	2.007	2.937	9.6	20.9
6 20	14 57.10	-17 25.0	2.165	2.999	13.1	20.0	6 20	15 1.73	-26 32.1	2.062	2.921	12.7	21.1
166046	2002 <i>CL</i> ₁₈		5 14.9 357°49	10°7/17.1	18		67702	2000 <i>TD</i> ₁₄		5 14.9 52°25	1°0/14.3	17	
4 11	15 54.42	-32 57.3	0.999	1.858	21.8	17.9	4 11	15 50.14	-17 5.3	2.119	2.974	11.9	19.3
4 21	15 51.09	-35 7.6	0.937	1.852	18.1	17.6	4 21	15 45.23	-16 47.1	2.049	2.980	8.8	19.1
5 1	15 43.40	-37 1.3	0.892	1.848	14.3	17.4	5 1	15 38.54	-16 24.5	2.003	2.986	5.2	18.9
5 11	15 32.38	-38 27.9	0.867	1.846	11.3	17.2	5 11	15 30.76	-15 59.7	1.985	2.992	1.6	18.7
5 21	15 19.89	-39 19.3	0.862	1.845	11.0	17.2	5 21	15 22.71	-15 35.2	1.994	2.999	2.8	18.8
5 31	15 8.40	-39 35.0	0.877	1.846	13.5	17.3	5 31	15 15.25	-15 14.1	2.030	3.005	6.4	19.0
6 10	15 0.13	-39 23.0	0.911	1.849	17.2	17.5	6 10	15 9.13	-14 59.3	2.092	3.012	9.8	19.2
6 20	14 56.33	-38 54.8	0.961	1.853	21.0	17.8	6 20	15 4.85	-14 52.4	2.176	3.019	12.7	19.4
8080	Intel		5 14.9 258°48	4°0/17.7	18		18638	Nouet		5 14.9 306°09	5°2/16.9	18	
4 11	15 53.95	-32 38.6	2.487	3.288	12.1	18.3	4 11	15 54.67	-29 53.3	1.657	2.491	15.7	17.4
4 21	15 48.24	-32 46.0	2.379	3.266	9.7	18.1	4 21	15 49.73	-30 39.8	1.564	2.472	12.6	17.2
5 1	15 40.49	-32 40.0	2.294	3.244	7.0	17.9	5 1	15 41.86	-31 13.6	1.491	2.453	9.0	16.9
5 11	15 31.34	-32 19.3	2.235	3.221	4.7	17.7	5 11	15 31.85	-31 31.3	1.443	2.434	5.9	16.7
5 21	15 21.63	-31 44.3	2.204	3.198	4.2	17.6	5 21	15 20.86	-31 31.4	1.420	2.416	5.5	16.6
5 31	15 12.34	-30 57.4	2.202	3.174	6.3	17.7	5 31	15 10.38	-31 15.6	1.422	2.398	8.5	16.7
6 10	15 4.36	-30 3.5	2.226	3.149	9.2	17.8	6 10	15 1.79	-30 49.2	1.448	2.380	12.4	16.9
6 20	14 58.34	-29 7.6	2.275	3.124	12.0	18.0	6 20	14 56.02	-30 18.9	1.494	2.363	16.1	17.1
512946	2017 <i>CK</i>		5 14.9 5°75	3°9/10.8	18		144047	2004 <i>BD</i> ₂₈		5 14.9 18°79	1°6/15.6	17	
4 11	15 45.02	+ 1 23.9	4.247	5.076	6.9	20.7	4 11	15 52.51	-22 47.6	1.290	2.159	17.2	19.2
4 21	15 40.67	+ 1 36.2	4.176	5.077	5.6	20.6	4 21	15 48.08	-22 52.5	1.228	2.163	13.0	19.0
5 1	15 35.50	+ 1 43.3	4.132	5.077	4.4	20.5	5 1	15 40.71	-22 45.6	1.185	2.167	8.1	18.7
5 11	15 29.84	+ 1 43.5	4.116	5.077	3.9	20.5	5 11	15 31.44	-22 27.6	1.166	2.173	3.0	18.4
5 21	15 24.05	+ 1 35.6	4.129	5.077	4.4	20.5	5 21	15 21.65	-22 1.3	1.171	2.179	3.4	18.5
5 31	15 18.52	+ 1 19.1	4.170	5.078	5.6	20.6	5 31	15 12.85	-21 31.6	1.200	2.185	8.4	18.8
6 10	15 13.59	+ 0 53.8	4.237	5.078	7.0	20.7	6 10	15 6.29	-21 4.5	1.251	2.193	13.2	19.1
6 20	15 9.53	+ 0 20.3	4.327	5.078	8.4	20.8	6 20	15 2.66	-20 44.8	1.322	2.201	17.2	19.3
161411	2003 <i>UD</i> ₂₃₈		5 14.9 179°29	2°5/13.4	18		414036	2007 <i>RH</i> ₅₆		5 14.9 232°94	4°9/17.3	17	
4 11	15 52.15	-12 1.9	2.247	3.100	11.5	20.2	4 11	15 58.34	-31 13.9	1.755	2.575	15.6	22.1
4 21	15 46.61	-11 41.2	2.172	3.101	8.5	20.0	4 21	15 52.22	-31 39.1	1.664	2.564	12.4	21.9
5 1	15 39.33	-11 19.8	2.122	3.101	5.3	19.8	5 1	15 43.22	-31 48.8	1.595	2.553	8.9	21.7
5 11	15 30.97	-11 0.2	2.099	3.102	2.7	19.7	5 11	15 32.21	-31 40.2	1.550	2.541	5.7	21.4
5 21	15 22.31	-10 45.1	2.104	3.102	3.8	19.7	5 21	15 20.40	-31 13.0	1.532	2.528	5.2	21.4
5 31	15 14.17	-10 36.7	2.137	3.101	7.0	19.9	5 31	15 9.27	-30 30.4	1.540	2.515	8.1	21.5
6 10	15 7.31	-10 37.1	2.196	3.101	10.1	20.1	6 10	15 0.09	-29 39.1	1.573	2.502	11.9	21.7
6 20	15 2.22	-10 46.9	2.278	3.100	12.9	20.3	6 20	14 53.71	-28 46.5	1.628	2.488	15.5	21.9
144588	2004 <i>FY</i> ₃₈		5 14.9 44°44	0°5/14.6	17		133325	2003 <i>SL</i> ₉₂		5 14.9 228°70	0°1/14.9	18	
4 11	15 50.91	-18 39.1	1.875	2.733	13.1	20.1	4 11	15 52.73	-19 49.4	2.076	2.924	12.4	20.7
4 21	15 45.98	-18 25.2	1.810	2.742	9.7	19.9	4 21	15 47.33	-19 41.3	1.993	2.919	9.3	20.4
5 1	15 39.04	-18 5.5	1.769	2.752	5.8	19.7	5 1	15 39.92	-19 26.8	1.933	2.913	5.6	20.2
5 11	15 30.89	-17 41.8	1.754	2.762	1.6	19.4	5 11	15 31.20	-19 7.1	1.899	2.907	1.6	19.9
5 21	15 22.46	-17 17.0	1.766	2.773	2.7	19.5	5 21	15 22.05	-18 44.2	1.894	2.901	2.5	20.0
5 31	15 14.74	-16 54.4	1.805	2.784	6.8	19.8	5 31	15 13.45	-18 21.4	1.916	2.895	6.5	20.2
6 10	15 8.56	-16 37.4	1.869	2.795	10.5	20.1	6 10	15 6.25	-18 2.0	1.965	2.888	10.2	20.4
6 20	15 4.45	-16 28.4	1.955	2.806	13.6	20.3	6 20	15 1.06	-17 49.0	2.035	2.881	13.4	20.6
161351	2003 <i>SR</i> ₁₄₀		5 14.9 275°30	6°8/19.3	18		120976	1998 <i>WL</i> ₂₅		5 14.9 321°44	0°1/14.9	18	
4 11	15 54.61	-38 27.6	1.983	2.772	15.1	20.1	4 11	15 48.77	-20 15.8	1.861	2.720	13.2	19.6
4 21	15 49.25	-38 48.0	1.892	2.763	12.6	19.9	4 21	15 44.81	-20 5.4	1.759	2.692	9.9	19.3
5 1	15 41.30	-38 48.7	1.822	2.753	9.9	19.7	5 1	15 38.63	-19 47.3	1.681	2.663	6.1	19.0
5 11	15 31.60	-38 26.8	1.776	2.743	7.6	19.6	5 11	15 30.89	-19 22.6	1.628	2.636	1.8	18.7
5 21	15 21.31	-37 41.9	1.755	2.733	6.8	19.5	5 21	15 22.46	-18 53.9	1.601	2.609	2.7	18.7
5 31	15 11.72	-36 37.6	1.760	2.723	8.3	19.6	5 31	15 14.44	-18 24.7	1.601	2.582	7.2	18.9
6 10	15 3.98	-35 20.8	1.790	2.713	11.0	19.7	6 10	15 7.82	-17 59.4	1.625	2.556	11.4	19.1
6 20	14 58.82	-33 59.5	1.842	2.703	13.9	19.9	6 20	15 3.34	-17 41.6	1.670	2.531	15.1	19.3
45505	2000 <i>BE</i> ₁₇		5 14.9 192°79	1°1/14.3	18		212798	2007 <i>TK</i> ₂₅₇		5 14.9 148°60	2°0/15.8	17	
4 11	15 55.01	-17 5.1	2.076	2.923	12.5	20.5	4 11	15 57.84	-23 28.0	1.627	2.473	15.4	20.8
4 21	15 48.92	-16 43.0	1.995	2.921	9.2	20.2	4 21	15 51.62	-23 47.5	1.555	2.477	11.7	20.5
5 1	15 40.81	-16 15.9	1.938	2.919	5.5	20.0	5 1	15 42.70	-23 57.1	1.506	2.482	7.4	20.3
5 11	15 31.41	-15 45.7	1.908	2.916	1.7	19.7	5 11	15 32.02	-23 56.4	1.481	2.486	3.1	20.0
5 21	15 21.63	-15 15.2	1.907	2.912	3.0	19.8	5 21	15 20.81	-23 46.1	1.483	2.490	3.3	20.1
5 31	15 12.44	-14 48.1	1.935	2.907	6.9	20.1	5 31	15 10.43	-23 29.6	1.512	2.493	7.6	20.3
6 10	15 4.71	-14 27.4	1.988	2.902	10.6	20.3	6 10	15 2.03	-23 11.7	1.566	2.496	11.8	20.6
6 20	14 59.00	-14 15.8	2.064	2.896	13.7	20.5	6 20	14 56.33	-22 57.0	1.640	2.499	15.4	20.8
164627	1993 <i>UT</i> ₇		5 14.9 246°24	2°8/13.4	17		198195	2004 <i>TY</i> ₁₃₃		5 14.9 266°21	2°4/1		

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
131703	2001 YF ₉	5 14.9 72°01'		2.1°/15.8 18			400542	2008 UX ₂₂₆	5 14.9 288°01'		1.6°/15.6 17		
4 11	15 56.71	-23 21.9	1.372	2.229	17.0	19.8	4 11	15 56.92	-23 25.3	1.399	2.255	16.9	22.0
4 21	15 51.14	-23 39.0	1.306	2.234	12.9	19.6	4 21	15 51.97	-23 21.9	1.290	2.219	13.1	21.6
5 1	15 42.56	-23 45.0	1.261	2.240	8.2	19.3	5 1	15 43.59	-23 5.2	1.202	2.181	8.4	21.3
5 11	15 32.00	-23 39.3	1.240	2.245	3.3	19.0	5 11	15 32.49	-22 34.3	1.137	2.143	3.1	20.8
5 21	15 20.88	-23 23.4	1.243	2.250	3.5	19.1	5 21	15 19.93	-21 50.5	1.097	2.104	3.7	20.8
5 31	15 10.73	-23 1.4	1.272	2.256	8.4	19.4	5 31	15 7.62	-20 58.7	1.082	2.065	9.5	21.0
6 10	15 2.86	-22 39.3	1.324	2.261	13.0	19.6	6 10	14 57.30	-20 6.9	1.089	2.025	15.3	21.2
6 20	14 58.01	-22 22.1	1.396	2.267	17.0	19.9	6 20	14 50.17	-19 23.1	1.116	1.984	20.5	21.3
228618	2002 CC ₄₉	5 14.9 194°53'		1°0'/15.6 17 R			27274	2000 AW ₃₈	5 14.9 7°92'		0°3'/15.0 18		
4 11	15 54.22	-23 22.1	2.410	3.241	11.5	22.0	4 11	15 54.77	-19 6.8	1.126	2.005	18.5	18.4
4 21	15 48.18	-23 10.8	2.322	3.238	8.7	21.8	4 21	15 50.16	-19 19.6	1.063	2.005	13.8	18.1
5 1	15 40.32	-22 51.0	2.260	3.235	5.4	21.6	5 1	15 42.19	-19 24.9	1.020	2.005	8.4	17.8
5 11	15 31.31	-22 23.5	2.225	3.231	2.0	21.3	5 11	15 31.96	-19 23.6	0.998	2.007	2.5	17.5
5 21	15 21.94	-21 50.1	2.219	3.226	2.2	21.3	5 21	15 21.01	-19 17.6	1.000	2.008	3.7	17.6
5 31	15 13.09	-21 13.9	2.243	3.221	5.7	21.6	5 31	15 11.12	-19 11.1	1.025	2.011	9.5	17.9
6 10	15 5.54	-20 38.9	2.293	3.215	9.0	21.7	6 10	15 3.73	-19 9.0	1.072	2.014	14.8	18.2
6 20	14 59.82	-20 8.3	2.368	3.208	11.9	21.9	6 20	14 59.68	-19 15.0	1.136	2.017	19.3	18.5
426842	2013 VJ ₁₀	5 14.9 285°40'		4.4°/11.8 17			286169	2001 UX ₁₅	5 14.9 222°70'		1.4°/15.7 16		
4 11	15 50.27	-12 30.7	1.655	2.525	14.0	20.9	4 11	15 56.64	-24 25.7	1.733	2.575	14.8	21.4
4 21	15 45.87	-11 2.2	1.572	2.510	10.5	20.6	4 21	15 50.71	-24 7.7	1.645	2.566	11.3	21.1
5 1	15 39.19	-9 27.1	1.513	2.494	6.8	20.4	5 1	15 42.18	-23 36.8	1.579	2.556	7.1	20.9
5 11	15 31.02	-7 52.2	1.480	2.479	4.5	20.2	5 11	15 31.92	-22 53.6	1.540	2.545	2.7	20.6
5 21	15 22.35	-6 24.9	1.473	2.463	6.3	20.3	5 21	15 21.05	-22 0.9	1.527	2.534	3.0	20.5
5 31	15 14.30	-5 12.6	1.492	2.448	10.2	20.5	5 31	15 10.88	-21 4.1	1.542	2.522	7.5	20.8
6 10	15 7.84	-4 20.4	1.534	2.433	14.1	20.7	6 10	15 2.53	-20 9.4	1.581	2.510	11.9	21.0
6 20	15 3.63	-3 50.3	1.596	2.417	17.5	20.9	6 20	14 56.74	-19 22.7	1.643	2.496	15.7	21.2
291531	2006 EV ₂₀	5 14.9 121°05'		5.9°/18.5 17			96678	1999 JO ₄₁	5 14.9 16°34'		2.7°/13.9 17		
4 11	15 57.10	-35 48.0	2.031	2.826	14.6	21.0	4 11	15 54.21	-13 47.5	1.294	2.170	16.7	18.5
4 21	15 50.84	-36 19.3	1.958	2.836	11.9	20.8	4 21	15 49.25	-13 32.7	1.231	2.171	12.4	18.3
5 1	15 42.12	-36 33.5	1.907	2.845	9.0	20.7	5 1	15 41.41	-13 15.7	1.188	2.173	7.6	18.0
5 11	15 31.84	-36 28.1	1.881	2.854	6.6	20.6	5 11	15 31.70	-12 59.9	1.169	2.175	3.1	17.7
5 21	15 21.14	-36 3.2	1.881	2.863	6.0	20.5	5 21	15 21.46	-12 48.9	1.174	2.177	4.8	17.8
5 31	15 11.23	-35 21.9	1.907	2.871	7.7	20.6	5 31	15 12.15	-12 46.5	1.203	2.180	9.7	18.1
6 10	15 3.17	-34 30.3	1.959	2.880	10.3	20.8	6 10	15 4.99	-12 55.6	1.255	2.183	14.3	18.4
6 20	14 57.60	-33 35.0	2.034	2.888	13.1	21.0	6 20	15 0.70	-13 17.0	1.325	2.186	18.3	18.7
313291	2002 CB ₁₁₆	5 14.9 108°27'		20°6'/3.5 18			498251	2007 UJ ₉₉	5 14.9 213°87'		0°3'/14.8 17		
4 11	15 57.70	+18 51.4	1.078	1.903	22.9	20.6	4 11	15 56.50	-18 53.0	1.804	2.654	14.0	22.6
4 21	15 51.77	+21 40.2	1.062	1.917	21.3	20.5	4 21	15 50.43	-18 46.5	1.720	2.648	10.4	22.4
5 1	15 42.74	+23 49.0	1.063	1.930	20.6	20.5	5 1	15 41.95	-18 33.7	1.660	2.641	6.3	22.1
5 11	15 31.97	+25 4.8	1.080	1.944	20.8	20.5	5 11	15 31.85	-18 15.6	1.626	2.634	1.8	21.8
5 21	15 21.09	+25 22.2	1.114	1.956	21.9	20.7	5 21	15 21.19	-17 54.5	1.619	2.626	2.9	21.8
5 31	15 11.68	+24 43.5	1.162	1.969	23.4	20.8	5 31	15 11.16	-17 34.0	1.640	2.617	7.5	22.1
6 10	15 4.88	+23 17.7	1.223	1.980	25.1	21.0	6 10	15 2.82	-17 17.9	1.686	2.608	11.6	22.3
6 20	15 1.23	+21 16.4	1.295	1.991	26.7	21.2	6 20	14 56.85	-17 9.4	1.753	2.598	15.2	22.5
379935	2012 LM ₇	5 14.9 263°05'		6°9'/9.8 17			287725	2003 RG	5 14.9 231°35'		1°0'/15.4 17		
4 11	15 50.63	- 4 33.3	1.823	2.685	13.3	21.1	4 11	15 57.74	-21 34.7	1.932	2.772	13.6	21.5
4 21	15 45.91	- 3 0.0	1.745	2.671	10.4	20.9	4 21	15 51.38	-21 43.6	1.838	2.759	10.3	21.3
5 1	15 39.12	- 1 28.3	1.691	2.656	7.9	20.7	5 1	15 42.56	-21 45.1	1.767	2.745	6.4	21.0
5 11	15 30.99	- 0 5.5	1.664	2.641	6.9	20.6	5 11	15 32.05	-21 39.0	1.723	2.730	2.2	20.7
5 21	15 22.42	+ 1 1.6	1.662	2.626	8.4	20.7	5 21	15 20.85	-21 26.4	1.708	2.714	2.7	20.7
5 31	15 14.40	+ 1 47.6	1.686	2.611	11.3	20.8	5 31	15 10.16	-21 10.0	1.720	2.698	7.1	21.0
6 10	15 7.81	+ 2 10.2	1.732	2.596	14.4	21.0	6 10	15 1.05	-20 53.8	1.758	2.681	11.2	21.2
6 20	15 3.27	+ 2 9.7	1.797	2.580	17.3	21.1	6 20	14 54.29	-20 41.7	1.818	2.664	14.7	21.3
305339	2008 AV ₁₁₁	5 14.9 300°19'		6°6'/19.1 16			181958	1999 UL ₇	5 14.9 182°68'		8°8'/21.4 17		
4 11	15 53.95	-38 13.3	2.194	2.979	14.0	21.0	4 11	16 4.78	-47 50.3	2.525	3.231	14.3	20.5
4 21	15 48.60	-38 49.8	2.105	2.971	11.7	20.8	4 21	15 56.65	-48 35.2	2.438	3.232	12.6	20.3
5 1	15 40.87	-39 9.5	2.038	2.964	9.3	20.6	5 1	15 45.72	-48 59.3	2.371	3.233	10.8	20.2
5 11	15 31.52	-39 9.6	1.995	2.957	7.3	20.5	5 11	15 32.93	-48 58.2	2.327	3.232	9.4	20.1
5 21	15 21.60	-38 49.3	1.977	2.949	6.7	20.4	5 21	15 19.55	-48 30.0	2.308	3.231	8.8	20.1
5 31	15 12.26	-38 10.7	1.985	2.942	8.0	20.5	5 31	15 7.00	-47 36.7	2.316	3.228	9.3	20.1
6 10	15 4.56	-37 19.2	2.019	2.935	10.3	20.6	6 10	14 56.49	-46 24.3	2.349	3.225	10.7	20.2
6 20	14 59.20	-36 21.1	2.075	2.928	12.8	20.8	6 20	14 48.77	-45 0.6	2.405	3.220	12.5	20.3
149738	2004 NH ₂	5 14.9 290°43'		8°1°/20.3 18			273075	2006 EX ₁	5 14.9 184°82'		0°8°/14.5 17		
4 11	15 54.98	-43 37.4	2.345	3.096	14.1	20.2	4 11	15 52.84	-17 43.0	2.030	2.882	12.5	21.2
4 21	15 49.53	-44 14.9	2.241	3.075	12.3	20.0	4 21	15 47.38	-17 27.2	1.953	2.882	9.3	21.0
5 1	15 41.53	-44 33.7	2.158	3.054	10.3	19.9	5 1	15 39.93	-17 6.1	1.900	2.882	5.6	20.7
5 11	15 31.74	-44 29.8	2.097	3.032	8.7	19.7	5 11	15 31.24	-16 41.8	1.874	2.882	1.6	20.5
5 21	15 21.23	-44 1.6	2.061	3.011	8.1	19.6	5 21	15 22.18	-16 16.8	1.875	2.881	2.8	20.6
5 31	15 11.25	-43 10.6	2.051	2.989	8.9	19.6	5 31	15 13.71	-15 54.3	1.904	2.880	6.8	20.8
6 10	15 2.94	-42 2.2	2.065	2.968	10.8	19.7	6 10	15 6.69	-15 37.6	1.959	2.879	10.4	21.0
6 20	14 57.09	-40 43.6	2.102	2.946	13.1	19.8	6 20	15 1.67	-15 28.9	2.036	2.877	13.5	21.2
379153	2009 QV ₁	5 14.9 279°16'		1°6°/14.2 17			159503	2000 WQ ₄₄	5 14.9 228°52'		0°6°/14.5 18		
4 11	15 53.68	-16											

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
228555	2001 <i>XU</i> ₉₆		5 14.9 61°42'	3°5'/17.3	18		175740	1998 <i>KR</i> ₁₀		5 14.9 123°35'	4°7'/11.5	18	
4 11	15 55.12	-31 3.9	1.557	2.390	16.6	19.3	4 11	15 49.07	-5 48.3	2.348	3.203	10.9	20.8
4 21	15 49.39	-30 32.8	1.505	2.415	12.8	19.2	4 21	15 44.24	-4 58.4	2.283	3.207	8.4	20.6
5 1	15 41.16	-29 42.0	1.474	2.440	8.6	19.0	5 1	15 37.90	-4 11.6	2.243	3.212	5.9	20.5
5 11	15 31.55	-28 32.9	1.468	2.466	4.7	18.8	5 11	15 30.65	-3 31.8	2.230	3.216	4.7	20.4
5 21	15 21.86	-27 10.5	1.488	2.491	4.0	18.8	5 21	15 23.18	-3 2.4	2.244	3.220	5.7	20.5
5 31	15 13.37	-25 42.2	1.534	2.516	7.3	19.1	5 31	15 16.23	-2 45.9	2.286	3.224	8.1	20.6
6 10	15 7.01	-24 16.7	1.605	2.541	11.1	19.3	6 10	15 10.43	-2 43.6	2.352	3.228	10.7	20.8
6 20	15 3.28	-23 0.7	1.698	2.567	14.5	19.6	6 20	15 6.21	-2 55.0	2.439	3.232	13.0	20.9
401845	1999 <i>VW</i> ₁₁₆		5 14.9 216°85'	0°3'/15.2	17		505327	2012 <i>YY</i> ₈		5 14.9 165°49'	8°2'/8.9	18	
4 11	15 46.54	-20 51.3	3.925	4.757	7.4	23.0	4 11	15 52.71	+12 14.2	2.891	3.684	10.8	21.7
4 21	15 41.98	-20 41.6	3.831	4.749	5.5	22.8	4 21	15 46.61	+12 47.8	2.835	3.688	9.4	21.6
5 1	15 36.40	-20 27.8	3.764	4.741	3.3	22.7	5 1	15 39.19	+13 8.0	2.803	3.692	8.4	21.6
5 11	15 30.20	-20 10.7	3.726	4.733	1.0	22.5	5 11	15 31.00	+13 11.3	2.796	3.696	8.2	21.5
5 21	15 23.80	-19 51.5	3.717	4.724	1.4	22.5	5 21	15 22.67	+12 55.9	2.815	3.699	8.8	21.6
5 31	15 17.65	-19 31.7	3.739	4.715	3.7	22.7	5 31	15 14.83	+12 21.4	2.860	3.701	10.0	21.7
6 10	15 12.20	-19 13.1	3.789	4.706	5.9	22.8	6 10	15 8.02	+11 29.2	2.927	3.704	11.4	21.8
6 20	15 7.76	-18 57.4	3.865	4.697	7.8	23.0	6 20	15 2.65	+10 22.0	3.016	3.705	12.8	21.9
456195	2006 <i>HE</i> ₁₁₉		5 14.9 27°85'	2°1'/14.2	17		9661	Hohmann		5 14.9 274°54'	0°2'/14.8	18	
4 11	15 54.78	-14 16.8	1.188	2.068	17.6	21.4	4 11	15 48.41	-18 7.7	3.301	4.140	8.5	17.7
4 21	15 49.83	-14 18.4	1.131	2.073	13.1	21.1	4 21	15 43.58	-18 8.9	3.199	4.121	6.3	17.5
5 1	15 41.82	-14 18.2	1.093	2.079	7.9	20.8	5 1	15 37.48	-18 7.1	3.123	4.102	3.8	17.3
5 11	15 31.83	-14 18.8	1.079	2.086	2.9	20.6	5 11	15 30.55	-18 3.1	3.076	4.083	1.1	17.1
5 21	15 21.32	-14 22.8	1.088	2.093	4.5	20.7	5 21	15 23.30	-17 58.0	3.058	4.064	1.8	17.1
5 31	15 11.87	-14 33.1	1.121	2.101	9.7	21.0	5 31	15 16.30	-17 53.1	3.069	4.045	4.5	17.3
6 10	15 4.76	-14 52.3	1.175	2.109	14.5	21.3	6 10	15 10.09	-17 50.2	3.109	4.025	7.1	17.4
6 20	15 0.71	-15 21.3	1.249	2.118	18.6	21.6	6 20	15 5.09	-17 50.8	3.173	4.005	9.4	17.5
272734	2005 <i>YW</i> ₉₄		5 14.9 216°73'	8°2'/9.0	18		316673	1995 <i>ST</i> ₂₂		5 14.9 171°90'	2°0'/15.9	16	
4 11	15 53.13	+5 26.6	2.305	3.132	12.1	20.9	4 11	15 57.22	-24 25.3	1.865	2.701	14.1	22.4
4 21	15 47.32	+6 27.2	2.234	3.123	10.2	20.8	4 21	15 50.92	-24 37.4	1.787	2.704	10.7	22.2
5 1	15 39.80	+7 17.3	2.186	3.114	8.7	20.7	5 1	15 42.22	-24 39.6	1.733	2.707	6.9	22.0
5 11	15 31.20	+7 51.7	2.165	3.103	8.2	20.6	5 11	15 31.95	-24 31.3	1.705	2.708	3.0	21.7
5 21	15 22.27	+8 6.5	2.169	3.092	9.2	20.6	5 21	15 21.20	-24 13.8	1.704	2.710	3.0	21.7
5 31	15 13.83	+7 59.8	2.199	3.081	11.0	20.7	5 31	15 11.16	-23 50.2	1.731	2.711	6.9	22.0
6 10	15 6.60	+7 32.1	2.252	3.068	13.2	20.9	6 10	15 2.87	-23 25.3	1.783	2.711	10.8	22.2
6 20	15 1.10	+6 45.6	2.324	3.055	15.2	21.0	6 20	14 56.98	-23 3.3	1.858	2.711	14.2	22.4
478063	2011 <i>UA</i> ₄		5 14.9 199°78'	0°6'/14.4	18		269030	2007 <i>FN</i> ₁₀		5 14.9 357°50'	4°8'/17.1	17	
4 11	15 49.49	-18 57.3	2.607	3.452	10.3	21.7	4 11	15 53.41	-29 15.7	1.480	2.324	16.7	19.9
4 21	15 44.52	-18 22.1	2.524	3.450	7.6	21.5	4 21	15 48.80	-29 52.5	1.407	2.322	13.2	19.6
5 1	15 38.07	-17 41.0	2.466	3.447	4.5	21.3	5 1	15 41.26	-30 14.5	1.354	2.320	9.2	19.4
5 11	15 30.69	-16 56.1	2.436	3.444	1.3	21.1	5 11	15 31.73	-30 19.0	1.325	2.319	5.7	19.2
5 21	15 23.06	-16 10.3	2.436	3.441	2.3	21.2	5 21	15 21.52	-30 6.1	1.319	2.319	5.2	19.2
5 31	15 15.89	-15 26.9	2.464	3.437	5.6	21.4	5 31	15 12.13	-29 39.0	1.339	2.319	8.4	19.3
6 10	15 9.81	-14 49.0	2.519	3.434	8.6	21.6	6 10	15 4.85	-29 4.4	1.382	2.320	12.4	19.6
6 20	15 5.27	-14 19.1	2.597	3.430	11.2	21.7	6 20	15 0.49	-28 29.0	1.445	2.322	16.1	19.8
135176	2001 <i>QG</i> ₂₇₈		5 14.9 202°50'	5°3'/10.9	18		269938	2000 <i>RU</i> ₈₀		5 14.9 248°90'	6°5'/18.5	18	
4 11	15 50.89	-0 44.5	2.773	3.611	10.0	20.8	4 11	15 56.61	-36 2.3	1.927	2.726	15.2	20.4
4 21	15 45.40	-0 9.2	2.698	3.606	7.9	20.7	4 21	15 50.86	-36 39.3	1.839	2.718	12.5	20.2
5 1	15 38.54	+0 20.2	2.648	3.601	6.1	20.6	5 1	15 42.39	-36 59.1	1.772	2.710	9.6	20.0
5 11	15 30.82	+0 40.4	2.626	3.595	5.3	20.5	5 11	15 32.05	-36 58.3	1.729	2.702	7.2	19.9
5 21	15 22.86	+0 49.0	2.632	3.589	6.1	20.6	5 21	15 21.02	-36 35.9	1.712	2.694	6.6	19.8
5 31	15 15.30	+0 44.4	2.665	3.583	8.0	20.7	5 31	15 10.64	-35 54.6	1.721	2.685	8.4	19.9
6 10	15 8.73	+0 26.3	2.724	3.576	10.1	20.8	6 10	15 2.13	-35 0.5	1.754	2.676	11.2	20.1
6 20	15 3.56	-0 4.5	2.804	3.569	12.2	20.9	6 20	14 56.28	-34 1.1	1.810	2.668	14.3	20.2
46545	1988 <i>RY</i> ₁₂		5 14.9 270°71'	0°9'/15.5	18		276149	2002 <i>JL</i> ₉₉		5 14.9 322°57'	8°9'/12.0	16	
4 11	15 51.80	-22 55.4	2.070	2.914	12.6	19.5	4 11	15 54.14	+1 19.7	1.439	2.300	16.2	19.6
4 21	15 46.79	-22 41.9	1.976	2.899	9.5	19.2	4 21	15 49.31	+1 35.8	1.350	2.270	13.3	19.3
5 1	15 39.69	-22 19.0	1.905	2.883	5.9	19.0	5 1	15 41.64	+1 37.4	1.281	2.241	10.4	19.1
5 11	15 31.21	-21 47.6	1.861	2.868	2.1	18.7	5 11	15 31.90	+1 17.9	1.235	2.212	8.9	18.9
5 21	15 22.22	-21 9.9	1.844	2.852	2.5	18.7	5 21	15 21.19	+0 32.9	1.213	2.185	10.0	18.9
5 31	15 13.71	-20 29.6	1.856	2.836	6.5	18.9	5 31	15 10.91	-0 38.9	1.215	2.158	13.2	19.0
6 10	15 6.61	-19 51.3	1.892	2.820	10.3	19.1	6 10	15 2.39	-2 15.3	1.238	2.132	17.0	19.1
6 20	15 1.53	-19 18.9	1.952	2.804	13.6	19.3	6 20	14 56.54	-4 11.2	1.280	2.108	20.7	19.3
204823	2007 <i>PX</i> ₁₃		5 14.9 243°80'	1°8'/14.1	17		402320	2005 <i>TF</i> ₁₄₃		5 14.9 295°35'	0°3'/15.0	16	
4 11	15 55.26	-16 2.0	1.570	2.432	15.0	20.6	4 11	15 56.60	-19 0.1	1.254	2.124	17.5	21.1
4 21	15 49.80	-15 37.0	1.488	2.422	11.2	20.4	4 21	15 51.45	-19 14.9	1.180	2.117	13.2	20.9
5 1	15 41.71	-15 6.5	1.428	2.412	6.8	20.1	5 1	15 43.01	-19 23.1	1.126	2.110	8.1	20.5
5 11	15 31.82	-14 33.3	1.394	2.401	2.4	19.8	5 11	15 32.28	-19 25.2	1.096	2.104	2.4	20.2
5 21	15 21.30	-14 1.2	1.385	2.389	4.0	19.9	5 21	15 20.69	-19 22.6	1.089	2.097	3.5	20.2
5 31	15 11.45	-13 34.9	1.403	2.378	8.8	20.1	5 31	15 9.94	-19 18.8	1.107	2.091	9.3	20.5
6 10	15 3.42	-13 18.5	1.444	2.366	13.3	20.3	6 10	15 1.51	-19 18.4	1.148	2.085	14.5	20.8
6 20	14 57.98	-13 14.6	1.506	2.353	17.1	20.6	6 20	14 56.31	-19 25.1	1.207	2.079	18.9	21.1
429225	2009 <i>YC</i> ₂₄		5 14.9 124°42'	0°5'/14.7									

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
106163	2000 <i>TT</i> ₆₄		5 14.9 285°63	4°9/11.3 18			157824	1997 <i>CP</i> ₂		5 14.9 207°15	1°5/14.1 18		
4 11	15 48.71	- 6 18.7	2.199	3.058	11.4	19.5	4 11	15 52.69	-16 3.4	2.057	2.910	12.3	20.5
4 21	15 44.14	- 5 22.5	2.127	3.054	8.8	19.4	4 21	15 47.28	-15 40.5	1.977	2.907	9.1	20.3
5 1	15 37.93	- 4 28.7	2.080	3.050	6.2	19.2	5 1	15 39.91	-15 13.3	1.922	2.904	5.5	20.1
5 11	15 30.70	- 3 41.5	2.059	3.046	4.9	19.1	5 11	15 31.30	-14 44.4	1.893	2.900	1.9	19.8
5 21	15 23.18	- 3 5.2	2.066	3.043	6.0	19.2	5 21	15 22.31	-14 16.4	1.892	2.896	3.2	19.9
5 31	15 16.17	- 2 42.7	2.098	3.039	8.6	19.3	5 31	15 13.89	-13 52.9	1.919	2.891	7.0	20.1
6 10	15 10.35	- 2 35.7	2.156	3.035	11.4	19.5	6 10	15 6.85	-13 36.7	1.971	2.887	10.6	20.3
6 20	15 6.21	- 2 44.1	2.234	3.032	13.9	19.6	6 20	15 1.78	-13 30.0	2.046	2.882	13.7	20.5
392172	2009 <i>KP</i> ₂		5 14.9 357°81	7°6/10.5 17			474984	2005 <i>TV</i> ₁₁₂		5 14.9 215°57	3°1/12.2 17		
4 11	15 49.24	+ 0 55.2	1.909	2.763	13.1	20.5	4 11	15 48.43	-11 32.1	2.494	3.350	10.4	21.6
4 21	15 44.71	+ 1 44.2	1.847	2.761	10.6	20.3	4 21	15 43.77	-10 29.5	2.417	3.346	7.7	21.4
5 1	15 38.34	+ 2 23.7	1.808	2.760	8.4	20.2	5 1	15 37.65	- 9 24.9	2.365	3.343	5.0	21.2
5 11	15 30.82	+ 2 48.3	1.793	2.759	7.6	20.1	5 11	15 30.63	- 8 22.2	2.341	3.339	3.2	21.1
5 21	15 23.01	+ 2 54.4	1.804	2.759	8.6	20.2	5 21	15 23.37	- 7 25.2	2.346	3.336	4.4	21.2
5 31	15 15.80	+ 2 40.1	1.840	2.759	10.9	20.3	5 31	15 16.57	- 6 37.7	2.379	3.332	7.1	21.3
6 10	15 9.96	+ 2 5.8	1.897	2.760	13.4	20.5	6 10	15 10.85	- 6 2.3	2.438	3.328	9.8	21.5
6 20	15 6.00	+ 1 14.1	1.975	2.761	15.8	20.6	6 20	15 6.64	- 5 40.3	2.519	3.324	12.3	21.7
198010	2004 <i>RU</i> ₁₉₉		5 14.9 185°43	5°2/18.2 18			110563	2001 <i>TQ</i> ₁₀₉		5 14.9 278°24	0°6/15.7 18		
4 11	15 57.28	-34 59.0	2.365	3.154	13.0	20.6	4 11	15 43.81	-22 53.4	4.299	5.128	6.9	20.1
4 21	15 50.81	-35 31.1	2.279	3.154	10.6	20.5	4 21	15 39.95	-22 43.1	4.207	5.123	5.1	20.0
5 1	15 42.11	-35 49.0	2.216	3.153	8.0	20.3	5 1	15 35.20	-22 28.3	4.142	5.117	3.2	19.8
5 11	15 31.94	-35 50.2	2.178	3.152	5.8	20.1	5 11	15 29.91	-22 9.8	4.105	5.111	1.2	19.7
5 21	15 21.28	-35 34.5	2.168	3.151	5.3	20.1	5 21	15 24.46	-21 48.6	4.098	5.105	1.3	19.7
5 31	15 11.21	-35 4.0	2.186	3.149	7.0	20.2	5 31	15 19.25	-21 26.2	4.121	5.099	3.3	19.8
6 10	15 2.67	-34 23.5	2.230	3.146	9.5	20.4	6 10	15 14.65	-21 4.3	4.172	5.093	5.3	20.0
6 20	14 56.33	-33 38.4	2.298	3.143	12.1	20.5	6 20	15 10.95	-20 44.4	4.248	5.088	7.1	20.1
128810	2004 <i>RR</i> ₂₅₅		5 14.9 197°50	0°4/14.8 18			179431	2002 <i>AB</i> ₇₄		5 14.9 149°74	0°1/15.0 18		
4 11	15 56.45	-16 57.4	2.071	2.916	12.6	20.1	4 11	15 50.78	-20 20.8	2.734	3.572	10.1	22.0
4 21	15 50.12	-17 14.6	1.989	2.914	9.4	19.8	4 21	15 45.41	-20 5.1	2.658	3.579	7.5	21.8
5 1	15 41.67	-17 28.9	1.932	2.912	5.6	19.6	5 1	15 38.60	-19 43.8	2.607	3.586	4.5	21.6
5 11	15 31.82	-17 40.9	1.902	2.909	1.6	19.3	5 11	15 30.91	-19 18.3	2.585	3.593	1.3	21.4
5 21	15 21.49	-17 51.3	1.900	2.907	2.6	19.4	5 21	15 23.01	-18 50.4	2.592	3.599	1.9	21.5
5 31	15 11.70	-18 1.7	1.927	2.903	6.6	19.6	5 31	15 15.58	-18 22.8	2.628	3.605	5.1	21.7
6 10	15 3.37	-18 14.3	1.980	2.900	10.3	19.9	6 10	15 9.24	-17 58.1	2.692	3.610	8.0	21.9
6 20	14 57.13	-18 30.9	2.057	2.896	13.5	20.1	6 20	15 4.41	-17 38.6	2.779	3.615	10.5	22.1
435407	2008 <i>AM</i> ₅₉		5 14.9 191°17	6°9/ 9.9 18			508335	2015 <i>NC</i> ₁₃		5 14.9 220°69	7°8/ 8.1 18		
4 11	15 49.97	+ 2 22.7	2.386	3.226	11.3	21.2	4 11	15 50.64	+10 54.6	3.026	3.826	10.2	22.0
4 21	15 44.91	+ 3 13.3	2.322	3.225	9.2	21.1	4 21	15 45.17	+11 38.7	2.957	3.816	8.9	21.9
5 1	15 38.33	+ 3 55.1	2.282	3.224	7.5	21.0	5 1	15 38.41	+12 11.4	2.912	3.806	8.0	21.8
5 11	15 30.81	+ 4 23.9	2.268	3.224	7.0	20.9	5 11	15 30.86	+12 28.7	2.892	3.796	7.8	21.8
5 21	15 23.06	+ 4 36.5	2.281	3.222	7.8	21.0	5 21	15 23.08	+12 28.4	2.899	3.785	8.5	21.8
5 31	15 15.80	+ 4 31.2	2.319	3.221	9.7	21.1	5 31	15 15.68	+12 9.4	2.931	3.774	9.7	21.9
6 10	15 9.68	+ 4 8.1	2.380	3.220	11.8	21.2	6 10	15 9.20	+11 32.6	2.986	3.762	11.2	21.9
6 20	15 5.13	+ 3 29.0	2.463	3.218	13.9	21.4	6 20	15 4.04	+10 39.8	3.061	3.750	12.7	22.0
176464	2001 <i>XB</i> ₁₀₈		5 14.9 155°34	1°5/16.2 18			995	Sternberga		5 14.9 267°96	1°6/13.8 18		
4 11	15 51.47	-25 46.6	3.077	3.896	9.6	21.5	4 11	15 51.42	-18 28.9	1.896	2.753	13.1	14.6
4 21	15 45.80	-25 37.6	2.997	3.904	7.3	21.4	4 21	15 46.59	-17 25.6	1.804	2.736	9.7	14.3
5 1	15 38.77	-25 20.6	2.944	3.913	4.7	21.2	5 1	15 39.63	-16 12.2	1.737	2.720	5.8	14.0
5 11	15 30.93	-24 56.4	2.918	3.920	2.1	21.0	5 11	15 31.27	-14 52.6	1.696	2.703	2.0	13.7
5 21	15 22.89	-24 26.3	2.922	3.927	2.0	21.0	5 21	15 22.44	-13 32.2	1.682	2.686	3.6	13.8
5 31	15 15.31	-23 52.7	2.956	3.934	4.5	21.2	5 31	15 14.16	-12 17.2	1.697	2.668	7.8	14.0
6 10	15 8.75	-23 18.6	3.019	3.940	7.1	21.4	6 10	15 7.35	-11 13.4	1.736	2.651	11.8	14.2
6 20	15 3.62	-22 46.8	3.106	3.945	9.4	21.6	6 20	15 2.63	-10 24.6	1.797	2.633	15.3	14.4
232566	2003 <i>SA</i> ₂₉₀		5 14.9 317°01	1°1/14.4 18			302460	2002 <i>EM</i> ₁₂₁		5 14.9 48°81	2°3/15.9 18		
4 11	15 52.98	-16 9.3	1.843	2.700	13.3	20.0	4 11	15 55.73	-24 10.2	1.212	2.077	18.3	20.0
4 21	15 47.72	-16 6.6	1.766	2.698	9.9	19.7	4 21	15 50.55	-24 20.6	1.161	2.093	13.9	19.7
5 1	15 40.28	-16 0.5	1.713	2.695	5.9	19.5	5 1	15 42.24	-24 17.3	1.129	2.108	8.8	19.5
5 11	15 31.42	-15 52.8	1.686	2.693	1.9	19.2	5 11	15 32.02	-24 0.4	1.120	2.125	3.6	19.2
5 21	15 22.11	-15 45.4	1.685	2.691	3.1	19.3	5 21	15 21.43	-23 32.8	1.135	2.142	3.7	19.3
5 31	15 13.42	-15 41.1	1.712	2.689	7.3	19.5	5 31	15 12.07	-22 59.8	1.174	2.159	8.6	19.6
6 10	15 6.27	-15 42.6	1.764	2.687	11.2	19.8	6 10	15 5.21	-22 28.3	1.235	2.177	13.3	19.9
6 20	15 1.30	-15 51.5	1.838	2.685	14.5	20.0	6 20	15 1.47	-22 3.7	1.316	2.195	17.3	20.2
177130	2003 <i>HG</i> ₄₃		5 14.9 337°25	0°5/15.2 18			181834	1998 <i>SW</i> ₁₁₆		5 14.9 238°14	3°7/16.9 17		
4 11	15 51.71	-19 59.4	2.115	2.963	12.2	20.0	4 11	15 55.92	-29 5.7	1.825	2.654	14.7	20.5
4 21	15 46.60	-20 10.8	2.034	2.960	9.1	19.8	4 21	15 50.25	-29 17.6	1.737	2.645	11.6	20.2
5 1	15 39.54	-20 16.8	1.977	2.957	5.6	19.6	5 1	15 42.00	-29 15.4	1.671	2.635	8.0	20.0
5 11	15 31.20	-20 18.2	1.946	2.953	1.7	19.3	5 11	15 31.99	-28 57.7	1.629	2.626	4.6	19.8
5 21	15 22.44	-20 15.8	1.943	2.951	2.4	19.4	5 21	15 21.34	-28 25.3	1.615	2.616	4.1	19.7
5 31	15 14.19	-20 12.1	1.968	2.948	6.2	19.6	5 31	15 11.34	-27 41.8	1.627	2.606	7.4	19.9
6 10	15 7.29	-20 9.6	2.019	2.945	9.7	19.8	6 10	15 3.12	-26 53.3	1.664	2.595	11.2	20.1
6 20	15 2.34	-20 10.8	2.092	2.943	12.8	20.0	6 20	14 57.44	-26 6.2	1.723	2.584	14.7	20.3
370950	2005 <i>SL</i> ₄₇		5 14.9 186°41	0°7/15.4 17			205471	2001 <i>QY</i> ₁₂₃					

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
333289	1999 <i>TK</i> ₂₂₁		5 14.9 257°65	5°7/10.6	18		156525	2002 <i>CW</i> ₂₅₃		5 14.9 309°21	0°7/14.6	18	
4 11	15 50.60	- 5 48.4	2.081	2.938	12.1	21.0	4 11	15 53.06	-17 48.6	1.748	2.606	13.9	19.9
4 21	15 45.74	- 4 32.1	1.996	2.921	9.3	20.7	4 21	15 47.91	-17 39.7	1.672	2.604	10.3	19.7
5 1	15 39.02	- 3 16.7	1.937	2.904	6.8	20.6	5 1	15 40.47	-17 25.4	1.619	2.602	6.2	19.4
5 11	15 31.09	- 2 7.9	1.904	2.887	5.7	20.5	5 11	15 31.55	-17 7.4	1.592	2.600	1.8	19.1
5 21	15 22.74	- 1 11.1	1.899	2.870	7.0	20.5	5 21	15 22.16	-16 48.3	1.591	2.598	3.0	19.2
5 31	15 14.85	- 0 30.8	1.919	2.852	9.8	20.6	5 31	15 13.43	-16 31.6	1.617	2.596	7.4	19.5
6 10	15 8.22	- 0 9.3	1.964	2.833	12.8	20.8	6 10	15 6.34	-16 20.7	1.668	2.594	11.5	19.7
6 20	15 3.41	- 0 6.9	2.029	2.815	15.5	20.9	6 20	15 1.54	-16 18.1	1.740	2.592	15.0	19.9
419715	2010 <i>UW</i> ₁₀₀		5 14.9 257°59	4°0/17.1	17		511335	2014 <i>EV</i> ₁₃		5 14.9 139°89	7°7/ 8.9	17	
4 11	15 55.67	-29 58.4	1.699	2.529	15.6	21.3	4 11	15 48.91	+ 2 44.3	2.218	3.062	11.9	21.0
4 21	15 50.29	-30 2.2	1.608	2.516	12.3	21.1	4 21	15 44.25	+ 3 58.2	2.159	3.063	9.8	20.8
5 1	15 42.13	-29 49.5	1.537	2.502	8.5	20.8	5 1	15 38.00	+ 5 3.2	2.124	3.063	8.2	20.7
5 11	15 32.05	-29 18.7	1.491	2.487	5.0	20.6	5 11	15 30.79	+ 5 53.6	2.115	3.064	7.8	20.7
5 21	15 21.25	-28 31.1	1.471	2.473	4.4	20.5	5 21	15 23.35	+ 6 25.5	2.131	3.065	8.8	20.8
5 31	15 11.11	-27 31.1	1.478	2.458	7.8	20.7	5 31	15 16.44	+ 6 36.5	2.173	3.066	10.7	20.9
6 10	15 2.88	-26 26.2	1.509	2.442	11.9	20.9	6 10	15 10.72	+ 6 26.6	2.236	3.066	12.8	21.0
6 20	14 57.36	-25 23.6	1.561	2.427	15.7	21.1	6 20	15 6.65	+ 5 57.7	2.319	3.067	14.8	21.2
508163	2015 <i>FM</i> ₁₈₃		5 14.9 242°05	3°9/12.5	17		414034	2007 <i>RE</i> ₂₈		5 14.9 229°03	2°4/13.7	16	
4 11	15 51.03	-10 14.2	1.927	2.789	12.7	21.2	4 11	15 56.32	-14 3.1	1.891	2.743	13.3	22.2
4 21	15 46.11	- 9 27.3	1.854	2.786	9.5	21.0	4 21	15 50.25	-13 34.3	1.801	2.730	9.9	22.0
5 1	15 39.24	- 8 39.9	1.804	2.782	6.2	20.8	5 1	15 41.90	-13 1.9	1.735	2.716	6.1	21.7
5 11	15 31.15	- 7 56.4	1.781	2.779	4.0	20.6	5 11	15 31.99	-12 28.9	1.696	2.701	2.7	21.5
5 21	15 22.70	- 7 20.9	1.784	2.775	5.3	20.7	5 21	15 21.51	-11 58.6	1.685	2.686	4.1	21.6
5 31	15 14.84	- 6 57.1	1.814	2.772	8.5	20.9	5 31	15 11.55	-11 35.0	1.701	2.669	8.1	21.8
6 10	15 8.40	- 6 47.3	1.869	2.768	11.9	21.1	6 10	15 3.13	-11 21.4	1.743	2.652	12.1	22.0
6 20	15 3.92	- 6 52.1	1.944	2.764	14.9	21.3	6 20	14 56.92	-11 19.7	1.806	2.634	15.5	22.1
213915	2003 <i>UX</i> ₁₃₇		5 14.9 252°49	0°6/14.7	18		36814	2000 <i>SX</i> ₇₁		5 14.9 294°72	1°7/13.9	17	
4 11	15 55.92	-18 15.1	1.743	2.597	14.2	20.9	4 11	15 50.33	-14 58.6	2.141	2.997	11.8	19.5
4 21	15 50.24	-18 5.6	1.651	2.580	10.6	20.6	4 21	15 45.54	-14 40.1	2.057	2.989	8.7	19.2
5 1	15 42.02	-17 49.8	1.581	2.563	6.5	20.3	5 1	15 38.92	-14 18.6	1.998	2.980	5.3	19.0
5 11	15 32.02	-17 29.1	1.538	2.545	1.9	20.0	5 11	15 31.10	-13 56.4	1.965	2.972	2.0	18.8
5 21	15 21.30	-17 5.9	1.521	2.527	3.1	20.0	5 21	15 22.88	-13 36.1	1.960	2.963	3.2	18.8
5 31	15 11.10	-16 44.0	1.531	2.509	7.9	20.3	5 31	15 15.15	-13 20.7	1.983	2.955	6.8	19.0
6 10	15 2.57	-16 27.6	1.566	2.490	12.3	20.5	6 10	15 8.68	-13 12.6	2.031	2.947	10.3	19.2
6 20	14 56.47	-16 19.8	1.623	2.470	16.1	20.7	6 20	15 4.04	-13 13.4	2.101	2.939	13.3	19.4
329225	2012 <i>EU</i> ₂		5 14.9 127°04	2°9/13.3	16		338074	2002 <i>PA</i> ₃₉		5 14.9 251°84	2°0/13.7	17	
4 11	15 55.28	-13 25.1	1.810	2.667	13.6	21.7	4 11	15 51.08	-15 1.1	2.111	2.966	12.0	21.1
4 21	15 49.19	-12 41.3	1.751	2.681	10.0	21.5	4 21	15 46.11	-14 26.4	2.026	2.957	8.9	20.9
5 1	15 41.02	-11 54.8	1.715	2.695	6.2	21.3	5 1	15 39.26	-13 47.5	1.965	2.947	5.4	20.7
5 11	15 31.63	-11 9.7	1.705	2.709	3.0	21.1	5 11	15 31.20	-13 7.5	1.931	2.936	2.3	20.4
5 21	15 22.03	-10 30.0	1.723	2.721	4.5	21.2	5 21	15 22.74	-12 29.8	1.925	2.926	3.6	20.5
5 31	15 13.24	- 9 59.9	1.769	2.733	8.1	21.5	5 31	15 14.78	-11 58.0	1.946	2.915	7.2	20.7
6 10	15 6.12	- 9 41.9	1.839	2.745	11.7	21.7	6 10	15 8.11	-11 35.4	1.993	2.904	10.7	20.9
6 20	15 1.18	- 9 37.3	1.930	2.756	14.8	22.0	6 20	15 3.32	-11 23.8	2.062	2.893	13.7	21.1
367955	2012 <i>DV</i> ₆₇		5 14.9 255°58	4°0/17.0	17		232876	2004 <i>VC</i> ₃₇		5 14.9 250°96	0°1/14.9	18	
4 11	15 55.40	-29 20.3	1.582	2.419	16.2	21.5	4 11	15 52.54	-20 22.6	1.941	2.792	13.1	21.4
4 21	15 50.11	-29 31.1	1.504	2.416	12.7	21.3	4 21	15 47.40	-20 3.8	1.856	2.783	9.8	21.2
5 1	15 41.99	-29 25.6	1.447	2.413	8.7	21.0	5 1	15 40.14	-19 37.0	1.794	2.775	5.9	21.0
5 11	15 32.00	-29 2.6	1.414	2.411	5.0	20.8	5 11	15 31.47	-19 3.8	1.759	2.766	1.7	20.7
5 21	15 21.39	-28 23.3	1.406	2.408	4.5	20.7	5 21	15 22.34	-18 27.2	1.751	2.758	2.6	20.7
5 31	15 11.61	-27 32.5	1.424	2.405	7.9	20.9	5 31	15 13.77	-17 50.9	1.770	2.749	6.9	20.9
6 10	15 3.88	-26 37.3	1.466	2.402	12.0	21.2	6 10	15 6.70	-17 19.3	1.814	2.740	10.8	21.2
6 20	14 58.96	-25 44.9	1.529	2.399	15.8	21.4	6 20	15 1.74	-16 55.9	1.881	2.731	14.1	21.4
487552	2014 <i>VT</i> ₂₂		5 14.9 218°32	2°0/12.9	18		122811	2000 <i>SK</i> ₁₀₁		5 14.9 187°52	0°5/14.7	18	
4 11	15 45.64	- 8 9.1	4.454	5.294	6.4	21.2	4 11	15 54.27	-18 12.9	2.351	3.192	11.4	20.9
4 21	15 41.19	- 8 7.4	4.372	5.292	4.8	21.0	4 21	15 48.27	-18 2.0	2.269	3.192	8.5	20.7
5 1	15 35.92	- 8 7.2	4.317	5.290	3.1	20.9	5 1	15 40.47	-17 46.3	2.211	3.191	5.1	20.5
5 11	15 30.15	- 8 9.7	4.292	5.288	2.0	20.8	5 11	15 31.54	-17 27.0	2.181	3.189	1.5	20.2
5 21	15 24.23	- 8 15.8	4.297	5.286	2.6	20.9	5 21	15 22.27	-17 6.3	2.181	3.187	2.4	20.3
5 31	15 18.53	- 8 26.2	4.332	5.284	4.2	21.0	5 31	15 13.50	-16 46.8	2.209	3.184	6.0	20.5
6 10	15 13.40	- 8 41.5	4.394	5.282	5.9	21.1	6 10	15 6.01	-16 31.3	2.264	3.180	9.4	20.7
6 20	15 9.11	- 9 1.8	4.482	5.279	7.4	21.2	6 20	15 0.33	-16 22.1	2.343	3.176	12.2	20.9
385227	2000 <i>JV</i> ₆₇		5 14.9 13°59	3°7/13.0	17		65473	2002 <i>YT</i> ₂₃		5 14.9 139°70	4°0/12.4	18	
4 11	15 51.75	- 9 0.4	1.950	2.809	12.6	21.5	4 11	15 51.24	- 6 51.1	2.390	3.241	10.9	20.0
4 21	15 46.61	- 8 41.3	1.880	2.810	9.5	21.3	4 21	15 45.86	- 6 21.4	2.324	3.247	8.3	19.9
5 1	15 39.53	- 8 24.2	1.833	2.811	6.2	21.1	5 1	15 38.93	- 5 54.6	2.282	3.254	5.6	19.7
5 11	15 31.24	- 8 12.4	1.813	2.812	3.8	21.0	5 11	15 31.08	- 5 33.8	2.268	3.260	4.0	19.6
5 21	15 22.61	- 8 8.6	1.820	2.813	5.0	21.1	5 21	15 23.00	- 5 21.6	2.282	3.266	5.0	19.7
5 31	15 14.58	- 8 15.0	1.854	2.814	8.1	21.3	5 31	15 15.44	- 5 20.0	2.324	3.271	7.5	19.8
6 10	15 7.96	- 8 32.5	1.912	2.815	11.4	21.5	6 10	15 9.05	- 5 29.7	2.391	3.277	10.2	20.0
6 20	15 3.29	- 9 1.2	1.991	2.817	14.4	21.7	6 20	15 4.28	- 5 50.7	2.480	3.282	12.6	20.2
119931	2002 <i>FA</i> ₃₄												

EPHEMERIDES

5 14.9

5 14.9

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
57696	2001 <i>UH</i> ₈₃		5 14.9 149° 07'	0° 6'/14.5 18"			465061	2006 <i>SB</i> ₆₁		5 14.9 284° 10'	4° 4'/12.6 18"		
4 11	15 50.85	-18 4.8	2.546	3.390	10.5	20.6	4 11	15 53.52	-11 3.3	1.609	2.475	14.5	21.2
4 21	15 45.58	-17 43.8	2.471	3.396	7.8	20.5	4 21	15 48.67	-10 11.4	1.511	2.446	11.0	20.9
5 1	15 38.77	-17 18.2	2.421	3.402	4.6	20.3	5 1	15 41.22	-9 15.9	1.436	2.416	7.2	20.6
5 11	15 31.04	-16 49.8	2.399	3.407	1.4	20.0	5 11	15 31.90	-8 22.0	1.387	2.387	4.5	20.4
5 21	15 23.08	-16 20.8	2.407	3.412	2.3	20.1	5 21	15 21.73	-7 35.3	1.363	2.356	6.2	20.4
5 31	15 15.61	-15 54.0	2.443	3.417	5.6	20.4	5 31	15 11.97	-7 1.7	1.364	2.325	10.4	20.6
6 10	15 9.29	-15 32.1	2.505	3.421	8.6	20.6	6 10	15 3.83	-6 45.2	1.389	2.294	14.8	20.7
6 20	15 4.55	-15 16.9	2.592	3.425	11.2	20.7	6 20	14 58.14	-6 47.8	1.432	2.263	18.7	20.9
287265	2002 <i>TA</i> ₁₄₆		5 14.9 223° 10'	0° 2'/14.9 17"			81985	2000 <i>QV</i> ₁₂₂		5 14.9 341° 12'	5° 8'/17.7 18"	R	
4 11	15 54.55	-20 26.0	1.958	2.805	13.1	21.2	4 11	15 50.04	-31 52.4	1.569	2.407	16.3	17.6
4 21	15 48.89	-20 0.0	1.870	2.796	9.8	20.9	4 21	15 46.40	-32 29.2	1.484	2.392	13.1	17.3
5 1	15 41.04	-19 25.2	1.806	2.786	6.0	20.7	5 1	15 39.96	-32 49.8	1.419	2.379	9.6	17.1
5 11	15 31.75	-18 43.6	1.769	2.776	1.7	20.4	5 11	15 31.54	-32 51.4	1.377	2.366	6.6	16.9
5 21	15 21.98	-17 58.3	1.759	2.766	2.7	20.4	5 21	15 22.32	-32 33.3	1.359	2.354	6.0	16.8
5 31	15 12.78	-17 13.6	1.777	2.755	7.0	20.7	5 31	15 13.75	-31 58.6	1.365	2.343	8.6	16.9
6 10	15 5.11	-16 34.3	1.821	2.743	10.9	20.9	6 10	15 7.11	-31 13.6	1.394	2.334	12.2	17.1
6 20	14 59.60	-16 4.0	1.887	2.731	14.4	21.1	6 20	15 3.25	-30 25.7	1.444	2.325	15.9	17.3
262078	2006 <i>RC</i> ₆₃		5 14.9 204° 60'	2° 8'/13.3 17"			491170	2011 <i>UW</i>		5 14.9 170° 08'	2° 6'/12.3 18"		
4 11	15 54.58	-12 47.5	1.980	2.834	12.7	21.5	4 11	15 49.46	-13 5.3	2.891	3.738	9.4	21.6
4 21	15 48.76	-12 11.3	1.900	2.829	9.5	21.3	4 21	15 44.34	-11 50.6	2.815	3.741	6.9	21.4
5 1	15 40.89	-11 32.7	1.844	2.824	5.9	21.0	5 1	15 37.95	-10 32.8	2.766	3.744	4.3	21.3
5 11	15 31.69	-10 55.0	1.815	2.818	3.0	20.9	5 11	15 30.82	-9 15.6	2.747	3.747	2.6	21.1
5 21	15 22.09	-10 21.9	1.814	2.812	4.3	20.9	5 21	15 23.52	-8 3.0	2.758	3.749	3.7	21.2
5 31	15 13.07	-9 57.2	1.841	2.805	7.9	21.1	5 31	15 16.67	-6 58.6	2.799	3.750	6.2	21.4
6 10	15 5.51	-9 43.5	1.892	2.797	11.5	21.3	6 10	15 10.80	-6 5.2	2.867	3.752	8.7	21.6
6 20	15 0.00	-9 42.2	1.966	2.788	14.6	21.5	6 20	15 6.28	-5 24.4	2.958	3.752	10.9	21.7
34640	2000 <i>WN</i> ₁		5 14.9 235° 99'	4° 9'/17.0 18"			338526	2003 <i>QD</i> ₁₁₅		5 14.9 297° 64'	2° 4'/13.2 17"		
4 11	15 59.04	-30 34.5	2.018	2.830	14.1	19.0	4 11	15 50.24	-16 48.8	1.786	2.650	13.4	20.7
4 21	15 52.57	-31 27.3	1.926	2.821	11.3	18.8	4 21	15 45.74	-15 35.4	1.708	2.644	9.9	20.4
5 1	15 43.48	-32 8.6	1.858	2.812	8.2	18.6	5 1	15 39.14	-14 13.3	1.654	2.638	6.0	20.2
5 11	15 32.52	-32 35.3	1.815	2.802	5.5	18.4	5 11	15 31.22	-12 47.8	1.626	2.632	2.6	19.9
5 21	15 20.76	-32 45.8	1.800	2.792	5.2	18.3	5 21	15 22.93	-11 24.9	1.625	2.626	4.3	20.0
5 31	15 9.49	-32 41.0	1.812	2.781	7.6	18.5	5 31	15 15.30	-10 11.2	1.652	2.620	8.3	20.3
6 10	14 59.90	-32 25.5	1.850	2.771	10.8	18.6	6 10	15 9.21	-9 12.0	1.702	2.614	12.1	20.5
6 20	14 52.80	-32 4.6	1.910	2.760	14.0	18.8	6 20	15 5.22	-8 30.1	1.774	2.609	15.5	20.7
13114	Isabelgodin		5 14.9 260° 78'	6° 0'/18.2 18"			379727	2011 <i>GB</i> ₄₆		5 14.9 346° 93'	4° 4'/12.7 17"		
4 11	15 56.09	-34 48.0	2.025	2.827	14.4	18.5	4 11	15 50.16	-10 36.0	1.499	2.375	14.9	20.5
4 21	15 50.35	-35 31.1	1.941	2.823	11.8	18.3	4 21	15 45.99	-9 52.7	1.430	2.370	11.1	20.2
5 1	15 42.08	-35 58.9	1.878	2.819	9.0	18.1	5 1	15 39.43	-9 9.0	1.384	2.365	7.2	20.0
5 11	15 32.09	-36 8.4	1.840	2.815	6.6	18.0	5 11	15 31.33	-8 30.0	1.361	2.361	4.5	19.8
5 21	15 21.46	-35 58.7	1.828	2.811	6.1	17.9	5 21	15 22.76	-8 0.6	1.363	2.358	6.0	19.9
5 31	15 11.45	-35 31.9	1.843	2.808	7.9	18.0	5 31	15 14.91	-7 45.2	1.390	2.356	9.8	20.1
6 10	15 3.17	-34 53.2	1.882	2.804	10.7	18.2	6 10	15 8.80	-7 46.0	1.440	2.354	13.8	20.3
6 20	14 57.36	-34 9.1	1.944	2.800	13.5	18.4	6 20	15 5.07	-8 3.4	1.508	2.352	17.3	20.6
146420	2001 <i>QA</i> ₂₂₀		5 14.9 140° 23'	8° 0'/20.2 18"			127858	2003 <i>FJ</i> ₁₁₅		5 14.9 333° 06'	1° 0'/14.5 18"		
4 11	15 58.54	-41 10.6	1.923	2.696	16.1	19.6	4 11	15 50.35	-16 31.5	1.938	2.798	12.7	19.1
4 21	15 52.32	-41 44.0	1.847	2.701	13.6	19.5	4 21	15 45.80	-16 28.1	1.856	2.789	9.4	18.9
5 1	15 43.29	-41 55.7	1.791	2.706	11.0	19.3	5 1	15 39.20	-16 21.1	1.797	2.780	5.7	18.6
5 11	15 32.42	-41 42.0	1.758	2.711	8.8	19.2	5 11	15 31.26	-16 12.2	1.764	2.772	1.8	18.4
5 21	15 21.03	-41 2.2	1.750	2.715	8.0	19.1	5 21	15 22.85	-16 3.5	1.758	2.764	2.9	18.4
5 31	15 10.57	-40 0.0	1.767	2.719	9.1	19.2	5 31	15 14.95	-15 57.7	1.779	2.756	7.0	18.7
6 10	15 2.23	-38 43.0	1.809	2.723	11.4	19.4	6 10	15 8.45	-15 57.2	1.824	2.749	10.7	18.9
6 20	14 56.73	-37 19.8	1.873	2.727	14.0	19.5	6 20	15 3.96	-16 4.2	1.892	2.743	14.0	19.1
48380	5622 <i>T</i> ₋₃		5 14.9 58° 95'	2° 8'/13.9 18"			10957	Alps		5 14.9 188° 03'	1° 5'/13.9 18"		
4 11	15 55.69	-11 45.6	1.584	2.447	14.9	19.0	4 11	15 50.47	-16 2.7	2.450	3.299	10.7	19.2
4 21	15 49.94	-11 46.5	1.518	2.452	11.1	18.7	4 21	15 45.38	-15 28.9	2.371	3.299	7.9	19.0
5 1	15 41.73	-11 48.3	1.476	2.457	6.8	18.5	5 1	15 38.72	-14 51.0	2.317	3.298	4.8	18.8
5 11	15 31.96	-11 53.4	1.458	2.463	3.1	18.3	5 11	15 31.07	-14 11.6	2.291	3.297	1.8	18.6
5 21	15 21.76	-12 3.8	1.467	2.469	4.4	18.4	5 21	15 23.16	-13 33.6	2.293	3.296	2.9	18.7
5 31	15 12.35	-12 21.4	1.502	2.474	8.6	18.6	5 31	15 15.73	-13 0.1	2.324	3.294	6.1	18.9
6 10	15 4.78	-12 47.4	1.561	2.480	12.6	18.9	6 10	15 9.46	-12 33.8	2.381	3.292	9.2	19.1
6 20	14 59.68	-13 22.3	1.641	2.486	16.1	19.1	6 20	15 4.79	-12 16.8	2.462	3.290	11.9	19.3
5272	Dickinson		5 14.9 259° 44'	3° 2'/13.3 18"			46535	1981 <i>EB</i> ₃₆		5 14.9 104° 02'	1° 0'/15.5 18"		
4 11	15 55.06	-13 42.8	1.558	2.423	15.0	18.1	4 11	15 56.59	-22 38.1	1.717	2.563	14.7	19.5
4 21	15 49.80	-12 58.9	1.470	2.405	11.3	17.8	4 21	15 50.44	-22 31.6	1.655	2.579	11.0	19.3
5 1	15 41.86	-12 9.9	1.404	2.386	7.0	17.5	5 1	15 41.93	-22 15.2	1.617	2.595	6.8	19.1
5 11	15 32.06	-11 20.0	1.363	2.367	3.5	17.3	5 11	15 32.02	-21 49.9	1.604	2.610	2.4	18.9
5 21	15 21.52	-10 34.5	1.348	2.347	5.2	17.3	5 21	15 21.82	-21 18.4	1.618	2.625	2.7	18.9
5 31	15 11.55	-9 58.9	1.358	2.327	9.7	17.5	5 31	15 12.53	-20 45.0	1.659	2.640	7.0	19.2
6 10	15 3.35	-9 37.6	1.392	2.306	14.2	17.7	6 10	15 5.11	-20 14.3	1.726	2.655	11.0	19.5
6 20	14 57.73	-9 33.0	1.446	2.285	18.2	17.9	6 20	15 0.12	-19 50.4	1.814	2.669	14.4	19.7
294586	2007 <i>YU</i> ₆₆		5 14.9 87° 70'	0° 8'/14.6 17"			95627	2002 <i>GK</i> ₃₄		5 14.9 96° 53'	7° 0'/10.		

EPHEMERIDES

5 14.9

5 15.0

2020	α_{2000}	δ_{2000}	Δ	r	β	V	2020	α_{2000}	δ_{2000}	Δ	r	β	V
414121	2007 <i>UF</i> ₆₈	5 14.9 79°43		0°4/15.2 17			437516	2013 <i>YK</i> ₉₁	5 15.0 232°09		8°3/ 9.9 18		
4 11	15 56.30	-20 40.2	1.450	2.309	16.2	21.3	4 11	15 52.81	+ 4 17.8	2.075	2.912	12.9	20.7
4 21	15 50.55	-20 33.0	1.392	2.323	12.0	21.1	4 21	15 47.32	+ 5 8.1	2.007	2.905	10.7	20.5
5 1	15 42.13	-20 16.8	1.356	2.338	7.3	20.8	5 1	15 39.99	+ 5 47.2	1.962	2.899	8.9	20.4
5 11	15 32.09	-19 52.9	1.344	2.352	2.2	20.6	5 11	15 31.49	+ 6 9.8	1.942	2.892	8.3	20.3
5 21	15 21.72	-19 24.7	1.359	2.366	3.0	20.6	5 21	15 22.65	+ 6 12.2	1.948	2.885	9.3	20.4
5 31	15 12.37	-18 56.5	1.399	2.380	7.9	21.0	5 31	15 14.36	+ 5 52.7	1.978	2.877	11.3	20.5
6 10	15 5.13	-18 33.5	1.462	2.395	12.3	21.3	6 10	15 7.40	+ 5 12.2	2.031	2.870	13.6	20.6
6 20	15 0.62	-18 19.1	1.547	2.408	16.0	21.5	6 20	15 2.29	+ 4 13.5	2.104	2.862	15.9	20.8
371720	2007 <i>EU</i> ₇₈	5 14.9 70°96		5°5/12.1 18			326609	2002 <i>RR</i> ₅₃	5 15.0 201°29		1°6/14.0 17 R		
4 11	15 53.31	- 7 13.1	1.610	2.475	14.5	20.6	4 11	15 55.11	-15 38.7	2.190	3.036	12.0	21.7
4 21	15 47.86	- 6 19.1	1.563	2.495	11.0	20.4	4 21	15 49.04	-15 12.9	2.106	3.032	8.9	21.5
5 1	15 40.30	- 5 29.0	1.540	2.514	7.5	20.3	5 1	15 41.04	-14 43.1	2.046	3.026	5.4	21.3
5 11	15 31.52	- 4 48.1	1.541	2.533	5.5	20.2	5 11	15 31.81	-14 11.6	2.014	3.020	2.0	21.1
5 21	15 22.60	- 4 21.0	1.568	2.552	6.8	20.3	5 21	15 22.18	-13 41.2	2.010	3.013	3.2	21.1
5 31	15 14.58	- 4 10.5	1.621	2.571	9.9	20.5	5 31	15 13.08	-13 15.1	2.036	3.005	6.9	21.3
6 10	15 8.30	- 4 17.5	1.696	2.590	13.2	20.8	6 10	15 5.33	-12 56.5	2.087	2.997	10.3	21.5
6 20	15 4.26	- 4 40.7	1.792	2.609	16.0	21.0	6 20	14 59.50	-12 47.2	2.162	2.988	13.4	21.7
258974	2002 <i>SD</i> ₄₄	5 14.9 200°34		0°2/15.1 17			2879	Shimizu	5 15.0 43°56		7°0/11.1 18		
4 11	15 55.14	-21 5.2	2.012	2.855	13.0	21.6	4 11	15 50.63	- 3 48.3	1.613	2.481	14.4	15.7
4 21	15 49.25	-20 46.4	1.928	2.851	9.7	21.3	4 21	15 45.96	- 2 42.6	1.564	2.492	11.2	15.5
5 1	15 41.24	-20 19.2	1.868	2.848	5.9	21.1	5 1	15 39.22	- 1 43.5	1.537	2.504	8.3	15.4
5 11	15 31.85	-19 45.0	1.835	2.843	1.8	20.8	5 11	15 31.26	- 0 57.4	1.534	2.516	7.0	15.3
5 21	15 22.03	-19 6.5	1.831	2.838	2.5	20.9	5 21	15 23.08	- 0 29.1	1.557	2.528	8.2	15.4
5 31	15 12.81	-18 27.6	1.854	2.832	6.7	21.1	5 31	15 15.70	- 0 21.5	1.604	2.541	11.0	15.6
6 10	15 5.12	-17 52.7	1.903	2.825	10.5	21.3	6 10	15 9.97	- 0 34.8	1.673	2.554	14.0	15.9
6 20	14 59.55	-17 25.4	1.975	2.818	13.8	21.5	6 20	15 6.38	- 1 6.9	1.761	2.568	16.7	16.1
247917	2003 <i>WJ</i> ₃₈	5 14.9 224°90		3°0/16.8 17			20565	1999 <i>RR</i> ₁₂₃	5 15.0 42°42		0°5/14.6 18		
4 11	15 56.56	-28 51.8	1.957	2.781	14.1	21.2	4 11	15 49.26	-20 23.4	2.178	3.029	11.8	17.5
4 21	15 50.57	-28 40.4	1.864	2.770	11.0	20.9	4 21	15 44.66	-19 38.1	2.104	3.033	8.7	17.3
5 1	15 42.17	-28 14.0	1.793	2.759	7.4	20.7	5 1	15 38.35	-18 44.7	2.055	3.037	5.2	17.1
5 11	15 32.14	-27 32.2	1.748	2.747	3.9	20.5	5 11	15 31.01	-17 46.1	2.033	3.041	1.5	16.9
5 21	15 21.57	-26 36.9	1.731	2.735	3.5	20.4	5 21	15 23.42	-16 46.1	2.039	3.045	2.5	16.9
5 31	15 11.62	-25 32.7	1.742	2.721	6.9	20.6	5 31	15 16.42	-15 49.1	2.072	3.049	6.2	17.2
6 10	15 3.37	-24 26.2	1.778	2.707	10.7	20.8	6 10	15 10.73	-14 59.2	2.132	3.054	9.6	17.4
6 20	14 57.49	-23 23.6	1.838	2.693	14.2	21.0	6 20	15 6.81	-14 19.6	2.215	3.058	12.5	17.6
123084	2000 <i>SV</i> ₃₁₉	5 14.9 148°94		3°6/17.5 18			215362	2001 <i>XL</i> ₁₉₅	5 15.0 182°95		9°6/22.5 17		
4 11	15 55.37	-31 10.8	2.200	3.011	13.1	20.2	4 11	15 59.35	-47 20.6	1.973	2.710	16.9	19.9
4 21	15 49.32	-31 10.6	2.123	3.019	10.3	20.0	4 21	15 53.12	-47 43.4	1.891	2.710	14.8	19.8
5 1	15 41.21	-30 56.1	2.069	3.026	7.2	19.8	5 1	15 43.85	-47 40.1	1.827	2.710	12.5	19.6
5 11	15 31.83	-30 26.9	2.041	3.033	4.4	19.6	5 11	15 32.66	-47 6.2	1.785	2.710	10.6	19.5
5 21	15 22.12	-29 44.5	2.041	3.039	3.9	19.6	5 21	15 20.98	-46 0.9	1.767	2.710	9.6	19.4
5 31	15 13.12	-28 52.8	2.069	3.045	6.3	19.8	5 31	15 10.38	-44 28.2	1.773	2.709	10.2	19.5
6 10	15 5.69	-27 57.0	2.123	3.050	9.3	20.0	6 10	15 2.12	-42 36.8	1.804	2.709	11.9	19.6
6 20	15 0.39	-27 2.6	2.201	3.055	12.2	20.2	6 20	14 56.90	-40 37.1	1.857	2.708	14.2	19.7
494706	2005 <i>GL</i> ₉	5 14.9 319°94		2°5/13.8 17			393857	2005 <i>SL</i> ₂₀₉	5 15.0 264°90		0°2/14.8 17		
4 11	16 20.01	-19 10.8	1.666	2.476	16.7	20.6	4 11	15 49.78	-20 37.0	2.366	3.212	11.2	20.9
4 21	16 10.68	-17 59.2	1.479	2.385	13.3	20.1	4 21	15 45.06	-20 1.4	2.275	3.200	8.3	20.7
5 1	15 56.35	-16 21.4	1.316	2.289	8.6	19.6	5 1	15 38.63	-19 17.9	2.208	3.188	5.0	20.5
5 11	15 36.96	-14 13.2	1.182	2.188	3.2	19.0	5 11	15 31.11	-18 28.5	2.168	3.176	1.4	20.2
5 21	15 13.28	-11 34.7	1.083	2.082	6.1	18.8	5 21	15 23.24	-17 36.4	2.157	3.164	2.3	20.2
5 31	14 47.28	- 8 35.7	1.020	1.971	14.2	18.9	5 31	15 15.82	-16 45.4	2.175	3.152	5.9	20.4
6 10	14 21.70	- 5 34.4	0.991	1.854	22.7	19.0	6 10	15 9.59	-15 59.5	2.219	3.140	9.3	20.6
6 20	13 59.02	- 2 50.3	0.988	1.731	30.8	19.1	6 20	15 5.05	-15 21.9	2.286	3.127	12.2	20.8
353897	2012 <i>XP</i> ₄₁	5 14.9 277°78		0°3/15.2 17			68544	2001 <i>XO</i> ₁₈	5 15.0 32°79		3°1/13.7 18		
4 11	15 51.11	-21 10.5	2.110	2.958	12.3	20.8	4 11	15 53.44	- 9 30.1	1.904	2.762	13.0	18.8
4 21	15 46.19	-20 55.4	2.028	2.954	9.2	20.6	4 21	15 47.90	- 9 37.1	1.840	2.770	9.7	18.6
5 1	15 39.36	-20 32.6	1.970	2.950	5.6	20.4	5 1	15 40.37	- 9 47.1	1.800	2.779	6.1	18.4
5 11	15 31.31	-20 3.5	1.939	2.946	1.7	20.1	5 11	15 31.61	-10 1.9	1.786	2.788	3.3	18.2
5 21	15 22.87	-19 30.6	1.935	2.942	2.3	20.1	5 21	15 22.54	-10 23.1	1.800	2.798	4.3	18.3
5 31	15 14.98	-18 57.3	1.959	2.939	6.2	20.4	5 31	15 14.12	-10 51.5	1.841	2.808	7.7	18.5
6 10	15 8.46	-18 27.5	2.008	2.935	9.8	20.6	6 10	15 7.21	-11 27.7	1.906	2.818	11.1	18.7
6 20	15 3.86	-18 4.3	2.081	2.931	12.9	20.8	6 20	15 2.33	-12 11.2	1.994	2.829	14.0	19.0
64719	2001 <i>XA</i> ₁₀₁	5 14.9 285°92		2°3/15.9 18			326684	2002 <i>XJ</i> ₉	5 15.0 259°08		0°6/14.7 17		
4 11	15 55.24	-24 19.1	1.395	2.252	16.8	18.7	4 11	15 54.42	-19 3.6	1.823	2.676	13.7	21.2
4 21	15 50.49	-24 26.7	1.306	2.234	13.0	18.4	4 21	15 49.07	-18 41.6	1.729	2.658	10.3	21.0
5 1	15 42.59	-24 21.6	1.237	2.215	8.4	18.1	5 1	15 41.34	-18 11.8	1.658	2.639	6.2	20.7
5 11	15 32.38	-24 3.1	1.192	2.197	3.6	17.7	5 11	15 31.96	-17 36.0	1.612	2.620	1.8	20.4
5 21	15 21.18	-23 32.5	1.171	2.178	3.6	17.7	5 21	15 21.93	-16 57.3	1.594	2.601	3.0	20.4
5 31	15 10.61	-22 54.4	1.176	2.160	8.7	17.9	5 31	15 12.40	-16 19.9	1.603	2.581	7.6	20.6
6 10	15 2.14	-22 15.7	1.202	2.141	13.8	18.1	6 10	15 4.43	-15 48.7	1.637	2.560	11.9	20.8
6 20	14 56.74	-21 42.8	1.249	2.123	18.3	18.4	6 20	14 58.75	-15 27.1	1.693	2.539	15.6	21.0
247778	2003 <i>RF</i>	5 14.9 237°40		12°2/22.3 17			12680	Bogdanovich	5 15.0 25°49		1°2/15.4 18		
4 11	16 6.88	-5											