

	5600 Jan 04 22:46	0°		max. Earth dist.	5606 Feb 02 01:26	13°	31.27052 AU
evening set	5600 Jan 05 16:38	0°01'38		morning rise	5606 Feb 17 22:22	14°	
max. Earth dist.	5600 Jan 20 11:54	0°34'41	31.30462 AU		5606 Mar 11 06:20	15°	
				retrograde	5606 May 16 09:03	16°	
conjunction	5600 Jan 21 03:58	0°36'12	1°04'33		5606 Jul 26 05:56	15°	
minimum elong	5600 Jan 21 03:58	0°36'12	1°04'33	opposition	5606 Aug 03 11:49	14°	0°53'20
morning rise	5600 Feb 05 13:18	1°10'35		min. Earth dist.	5606 Aug 03 23:30	14°	29.26716 AU
retrograde	5600 May 02 18:33	3°03'28		direct	5606 Oct 23 10:08	13°	
opposition	5600 Jul 20 10:45	1°41'27	1°07'53		5607 Jan 12 12:33	15°	
min. Earth dist.	5600 Jul 21 01:23	1°40'28	29.30395 AU	evening set	5607 Jan 20 13:43	15°	
direct	5600 Oct 09 08:45	0°17'15					
evening set	5601 Jan 07 02:39	2°12'33		conjunction	5607 Feb 04 23:25	15°	0°48'40
				minimum elong	5607 Feb 04 23:25	15°	0°48'41
conjunction	5601 Jan 22 13:52	2°47'07	1°02'31	max. Earth dist.	5607 Feb 04 11:05	15°	31.26339 AU
minimum elong	5601 Jan 22 13:52	2°47'07	1°02'33	morning rise	5607 Feb 20 07:44	16°	
max. Earth dist.	5601 Jan 21 23:10	2°45'44	31.30192 AU	retrograde	5607 May 18 20:05	18°	
morning rise	5601 Feb 06 22:49	3°21'30		opposition	5607 Aug 06 00:07	16°	0°50'38
retrograde	5601 May 05 04:34	5°14'28		min. Earth dist.	5607 Aug 06 11:30	16°	29.26050 AU
opposition	5601 Jul 22 22:56	3°52'26	1°05'41	direct	5607 Oct 25 19:34	15°	
min. Earth dist.	5601 Jul 23 13:46	3°51'26	29.30052 AU	evening set	5608 Jan 22 23:20	17°	
direct	5601 Oct 11 20:49	2°28'16					
evening set	5602 Jan 09 12:42	4°23'32		conjunction	5608 Feb 07 08:58	18°	0°46'06
				minimum elong	5608 Feb 07 08:58	18°	0°46'06
conjunction	5602 Jan 24 23:28	4°58'05	1°00'25	max. Earth dist.	5608 Feb 06 22:20	18°	31.25718 AU
minimum elong	5602 Jan 24 23:28	4°58'05	1°00'26	morning rise	5608 Feb 22 17:02	18°	
max. Earth dist.	5602 Jan 24 08:08	4°56'39	31.29789 AU	retrograde	5608 May 20 05:56	20°	
morning rise	5602 Feb 09 08:26	5°32'28		opposition	5608 Aug 07 12:20	19°	0°47'51
retrograde	5602 May 07 16:50	7°25'31		min. Earth dist.	5608 Aug 07 22:32	19°	29.25460 AU
opposition	5602 Jul 25 11:04	6°03'26	1°03'23	direct	5608 Oct 27 07:58	17°	
min. Earth dist.	5602 Jul 26 00:50	6°02'30	29.29577 AU	evening set	5609 Jan 24 09:05	19°	
direct	5602 Oct 14 08:40	4°39'18					
evening set	5603 Jan 11 22:38	6°34'30		conjunction	5609 Feb 08 18:22	20°	0°43'27
				minimum elong	5609 Feb 08 18:22	20°	0°43'28
conjunction	5603 Jan 27 09:19	7°09'03	0°58'13	max. Earth dist.	5609 Feb 08 07:34	20°	31.25178 AU
minimum elong	5603 Jan 27 09:19	7°09'03	0°58'15	morning rise	5609 Feb 24 02:31	20°	
max. Earth dist.	5603 Jan 26 19:04	7°07'42	31.29238 AU	retrograde	5609 May 22 18:48	22°	
morning rise	5603 Feb 11 17:59	7°43'25		opposition	5609 Aug 10 00:46	21°	0°44'59
retrograde	5603 May 10 03:07	9°36'32		min. Earth dist.	5609 Aug 10 09:59	21°	29.24955 AU
opposition	5603 Jul 27 23:10	8°14'24	1°01'00	direct	5609 Oct 29 17:31	19°	
min. Earth dist.	5603 Jul 28 13:35	8°13'25	29.28958 AU	evening set	5610 Jan 26 18:33	21°	
direct	5603 Oct 16 21:50	6°50'16					
evening set	5604 Jan 14 08:35	8°45'24		conjunction	5610 Feb 11 03:50	22°	0°40'45
				minimum elong	5610 Feb 11 03:50	22°	0°40'45
conjunction	5604 Jan 29 18:58	9°19'56	0°55'57	max. Earth dist.	5610 Feb 10 18:58	22°	31.24692 AU
minimum elong	5604 Jan 29 18:58	9°19'56	0°55'58	morning rise	5610 Feb 26 11:46	22°	
max. Earth dist.	5604 Jan 29 04:33	9°18'35	31.28572 AU	retrograde	5610 May 25 05:14	24°	
morning rise	5604 Feb 14 03:37	9°54'19		opposition	5610 Aug 12 13:18	23°	0°42'03
retrograde	5604 May 11 14:38	11°47'29		min. Earth dist.	5610 Aug 12 22:16	23°	29.24470 AU
opposition	5604 Jul 29 11:18	10°25'16	0°58'32	direct	5610 Nov 01 04:48	22°	
min. Earth dist.	5604 Jul 30 00:13	10°24'24	29.28233 AU	evening set	5611 Jan 29 04:19	24°	
direct	5604 Oct 18 10:35	9°01'07					
evening set	5605 Jan 15 18:21	10°56'11		conjunction	5611 Feb 13 13:18	24°	0°37'58
				minimum elong	5611 Feb 13 13:18	24°	0°38'00
conjunction	5605 Jan 31 04:31	11°30'42	0°53'36	max. Earth dist.	5611 Feb 13 04:15	24°	31.24215 AU
minimum elong	5605 Jan 31 04:31	11°30'42	0°53'37	morning rise	5611 Feb 28 21:21	25°	
max. Earth dist.	5605 Jan 30 14:49	11°29'24	31.27811 AU	retrograde	5611 May 27 18:20	27°	
morning rise	5605 Feb 15 12:59	12°05'04		opposition	5611 Aug 15 01:37	25°	0°39'04
retrograde	5605 May 13 23:26	13°58'18		min. Earth dist.	5611 Aug 15 09:16	25°	29.23976 AU
opposition	5605 Jul 31 23:38	12°36'01	0°55'58	direct	5611 Nov 03 15:58	24°	
min. Earth dist.	5605 Aug 01 12:58	12°35'06	29.27462 AU	evening set	5612 Jan 31 14:02	26°	
direct	5605 Oct 20 21:49	11°11'51					
evening set	5606 Jan 18 04:04	13°06'49		conjunction	5612 Feb 15 22:59	26°	0°35'09
				minimum elong	5612 Feb 15 22:59	26°	0°35'09
conjunction	5606 Feb 02 14:02	13°41'20	0°51'10	max. Earth dist.	5612 Feb 15 15:13	26°	31.23687 AU
minimum elong	5606 Feb 02 14:02	13°41'20	0°51'10	morning rise	5612 Mar 02 06:51	27°	

retrograde	5612 May 29 05:55	29° \approx 14'33	evening set	5619 Feb 15 10:17	11° \approx 32'47	
opposition	5612 Aug 16 14:21	27° \approx 52'01 0°36'01				
min. Earth dist.	5612 Aug 16 22:22	27° \approx 51'28 29.23410 AU	conjunction	5619 Mar 02 18:34	12° \approx 07'19 0°14'11	
direct	5612 Nov 05 04:32	26° \approx 28'12	minimum elong	5619 Mar 02 18:34	12° \approx 07'19 0°14'12	
evening set	5613 Feb 01 23:48	28° \approx 22'57	behind sun begin	5619 Mar 02 15:21	12° \approx 07'02	
			behind sun end	5619 Mar 02 21:48	12° \approx 07'36	
conjunction	5613 Feb 17 08:31	28° \approx 57'28 0°32'16	max. Earth dist.	5619 Mar 02 15:14	12° \approx 07'01 31.17029 AU	
minimum elong	5613 Feb 17 08:31	28° \approx 57'28 0°32'17	morning rise	5619 Mar 18 02:31	12° \approx 41'51	
max. Earth dist.	5613 Feb 17 00:54	28° \approx 56'45 31.23082 AU	retrograde	5619 Jun 14 10:51	14° \approx 36'44	
morning rise	5613 Mar 04 16:25	29° \approx 31'55	opposition	5619 Sep 02 07:44	13° \approx 13'41 0°13'27	
	5613 Mar 17 19:24	0° \approx	min. Earth dist.	5619 Sep 02 11:07	13° \approx 13'28 29.16490 AU	
retrograde	5613 May 31 18:33	1° \approx 26'07	direct	5619 Nov 21 12:48	11° \approx 49'58	
opposition	5613 Aug 19 03:01	0° \approx 03'34 0°32'54	evening set	5620 Feb 17 20:02	13° \approx 44'18	
min. Earth dist.	5613 Aug 19 09:27	0° \approx 03'07 29.22743 AU				
	5613 Aug 21 07:40	30° \approx	conjunction	5620 Mar 04 04:07	14° \approx 18'50 0°11'04	
direct	5613 Nov 07 16:57	28° \approx 39'48	minimum elong	5620 Mar 04 04:07	14° \approx 18'50 0°11'04	
	5614 Jan 19 02:11	0° \approx	behind sun begin	5620 Mar 03 23:16	14° \approx 18'23	
evening set	5614 Feb 04 09:39	0° \approx 34'32	behind sun end	5620 Mar 04 08:57	14° \approx 19'16	
			max. Earth dist.	5620 Mar 04 00:57	14° \approx 18'33 31.15976 AU	
conjunction	5614 Feb 19 18:14	1° \approx 09'02 0°29'20	morning rise	5620 Mar 19 12:15	14° \approx 53'22	
minimum elong	5614 Feb 19 18:15	1° \approx 09'02 0°29'20	retrograde	5620 Jun 16 00:10	16° \approx 48'23	
max. Earth dist.	5614 Feb 19 11:03	1° \approx 08'22 31.22346 AU	opposition	5620 Sep 03 20:31	15° \approx 25'15 0°10'07	
morning rise	5614 Mar 07 02:06	1° \approx 43'30	min. Earth dist.	5620 Sep 03 22:07	15° \approx 25'09 29.15489 AU	
retrograde	5614 Jun 03 04:38	3° \approx 37'51	direct	5620 Nov 23 00:09	14° \approx 01'32	
opposition	5614 Aug 21 15:51	2° \approx 15'15 0°29'45	evening set	5621 Feb 19 05:32	15° \approx 55'50	
min. Earth dist.	5614 Aug 21 22:52	2° \approx 14'46 29.21946 AU				
direct	5614 Nov 10 04:09	0° \approx 51'32	conjunction	5621 Mar 06 13:40	16° \approx 30'22 0°07'57	
evening set	5615 Feb 06 19:26	2° \approx 46'13	minimum elong	5621 Mar 06 13:40	16° \approx 30'22 0°07'58	
			behind sun begin	5621 Mar 06 07:54	16° \approx 29'51	
conjunction	5615 Feb 22 04:00	3° \approx 20'44 0°26'22	behind sun end	5621 Mar 06 19:25	16° \approx 30'53	
minimum elong	5615 Feb 22 04:00	3° \approx 20'44 0°26'23	max. Earth dist.	5621 Mar 06 12:09	16° \approx 30'15 31.15019 AU	
max. Earth dist.	5615 Feb 21 21:39	3° \approx 20'08 31.21481 AU	morning rise	5621 Mar 21 21:45	17° \approx 04'56	
morning rise	5615 Mar 09 11:50	3° \approx 55'12	retrograde	5621 Jun 18 12:12	19° \approx 00'05	
retrograde	5615 Jun 05 15:10	5° \approx 49'40	opposition	5621 Sep 06 09:31	17° \approx 36'53 0°06'46	
opposition	5615 Aug 24 04:34	4° \approx 27'01 0°26'33	min. Earth dist.	5621 Sep 06 10:58	17° \approx 36'47 29.14583 AU	
min. Earth dist.	5615 Aug 24 10:18	4° \approx 26'37 29.20993 AU	direct	5621 Nov 25 12:06	16° \approx 13'12	
direct	5615 Nov 12 17:02	3° \approx 03'19	evening set	5622 Feb 21 15:13	18° \approx 07'27	
evening set	5616 Feb 09 05:20	4° \approx 57'56				
			conjunction	5622 Mar 08 23:17	18° \approx 42'00 0°04'50	
conjunction	5616 Feb 24 13:40	5° \approx 32'28 0°23'22	minimum elong	5622 Mar 08 23:17	18° \approx 42'00 0°04'49	
minimum elong	5616 Feb 24 13:40	5° \approx 32'28 0°23'21	behind sun begin	5622 Mar 08 17:02	18° \approx 41'26	
max. Earth dist.	5616 Feb 24 07:03	5° \approx 31'51 31.20458 AU	behind sun end	5622 Mar 09 05:32	18° \approx 42'34	
morning rise	5616 Mar 10 21:37	6° \approx 06'57	max. Earth dist.	5622 Mar 08 22:29	18° \approx 41'57 31.14167 AU	
retrograde	5616 Jun 07 02:44	8° \approx 01'31	morning rise	5622 Mar 24 07:32	19° \approx 16'35	
opposition	5616 Aug 25 17:23	6° \approx 38'47 0°23'20	retrograde	5622 Jun 21 01:00	21° \approx 11'52	
min. Earth dist.	5616 Aug 25 23:14	6° \approx 38'23 29.19915 AU	opposition	5622 Sep 08 22:14	19° \approx 48'37 0°03'24	
direct	5616 Nov 14 03:13	5° \approx 15'05	min. Earth dist.	5622 Sep 08 21:42	19° \approx 48'39 29.13761 AU	
evening set	5617 Feb 10 15:02	7° \approx 09'38	direct	5622 Nov 27 23:47	18° \approx 24'59	
			evening set	5623 Feb 24 00:55	20° \approx 19'12	
conjunction	5617 Feb 25 23:27	7° \approx 44'09 0°20'19				
minimum elong	5617 Feb 25 23:27	7° \approx 44'09 0°20'20	conjunction	5623 Mar 11 08:58	20° \approx 53'46 0°01'39	
max. Earth dist.	5617 Feb 25 18:23	7° \approx 43'41 31.19337 AU	minimum elong	5623 Mar 11 08:58	20° \approx 53'46 0°01'40	
morning rise	5617 Mar 13 07:17	8° \approx 18'40	behind sun begin	5623 Mar 11 02:34	20° \approx 53'11	
retrograde	5617 Jun 09 12:25	10° \approx 13'20	behind sun end	5623 Mar 11 15:22	20° \approx 54'21	
opposition	5617 Aug 28 06:13	8° \approx 50'30 0°20'04	max. Earth dist.	5623 Mar 11 08:54	20° \approx 53'46 31.13366 AU	
min. Earth dist.	5617 Aug 28 11:02	8° \approx 50'10 29.18753 AU	morning rise	5623 Mar 26 17:21	21° \approx 28'22	
direct	5617 Nov 16 16:05	7° \approx 26'47	retrograde	5623 Jun 23 12:25	23° \approx 23'48	
evening set	5618 Feb 13 00:41	9° \approx 21'15	opposition	5623 Sep 11 11:16	22° \approx 00'30 0°00'01	
			min. Earth dist.	5623 Sep 11 10:56	22° \approx 00'32 29.12980 AU	
conjunction	5618 Feb 28 08:52	9° \approx 55'46 0°17'16	desc. node	5623 Sep 13 08:59	21° \approx 57'24	
minimum elong	5618 Feb 28 08:52	9° \approx 55'46 0°17'15	direct	5623 Nov 30 11:17	20° \approx 36'56	
max. Earth dist.	5618 Feb 28 03:35	9° \approx 55'17 31.18169 AU	evening set	5624 Feb 26 10:38	22° \approx 31'07	
morning rise	5618 Mar 15 16:56	10° \approx 30'17				
retrograde	5618 Jun 12 00:43	12° \approx 25'04	conjunction	5624 Mar 12 18:43	23° \approx 05'41 -0°01'37	
opposition	5618 Aug 30 19:02	11° \approx 02'07 0°16'46	minimum elong	5624 Mar 12 18:44	23° \approx 05'41 0°01'38	
min. Earth dist.	5618 Aug 30 22:54	11° \approx 01'52 29.17597 AU	behind sun begin	5624 Mar 12 12:20	23° \approx 05'07	
direct	5618 Nov 19 01:37	9° \approx 38'23	behind sun end	5624 Mar 13 01:08	23° \approx 06'16	

max. Earth dist.	5624 Mar 12 20:02	23° ✕ 05'45	31.12592 AU	min. Earth dist.	5629 Sep 24 13:10	5° ♀ 15'03	29.07068 AU
morning rise	5624 Mar 28 03:07	23° ✕ 40'19		direct	5629 Dec 13 08:19	3° ♀ 51'17	
retrograde	5624 Jun 25 00:20	25° ✕ 35'53		evening set	5630 Mar 10 22:41	5° ♀ 45'13	
opposition	5624 Sep 13 00:13	24° ✕ 12'33	-0°03'22				
min. Earth dist.	5624 Sep 12 22:18	24° ✕ 12'41	29.12191 AU	conjunction	5630 Mar 26 06:57	6° ♀ 19'52	-0°20'22
direct	5624 Dec 02 00:29	22° ✕ 49'02		minimum elong	5630 Mar 26 06:57	6° ♀ 19'52	0°20'23
evening set	5625 Feb 27 20:36	24° ✕ 43'12		max. Earth dist.	5630 Mar 26 11:44	6° ♀ 20'18	31.06437 AU
				morning rise	5630 Apr 10 16:16	6° ♀ 54'37	
conjunction	5625 Mar 15 04:34	25° ✕ 17'47	-0°04'48	retrograde	5630 Jul 09 00:18	8° ♀ 51'00	
minimum elong	5625 Mar 15 04:33	25° ✕ 17'47	0°04'47	opposition	5630 Sep 27 07:05	7° ♀ 27'13	-0°23'24
behind sun begin	5625 Mar 14 22:18	25° ✕ 17'13		min. Earth dist.	5630 Sep 27 02:26	7° ♀ 27'32	29.05823 AU
behind sun end	5625 Mar 15 10:49	25° ✕ 18'21		direct	5630 Dec 15 19:56	6° ♀ 03'46	
max. Earth dist.	5625 Mar 15 05:47	25° ✕ 17'51	31.11788 AU	evening set	5631 Mar 13 08:41	7° ♀ 57'40	
morning rise	5625 Mar 30 13:10	25° ✕ 52'26					
retrograde	5625 Jun 27 12:44	27° ✕ 48'09		conjunction	5631 Mar 28 17:02	8° ♀ 32'19	-0°23'25
opposition	5625 Sep 15 13:24	26° ✕ 24'47	-0°06'45	minimum elong	5631 Mar 28 17:02	8° ♀ 32'19	0°23'25
min. Earth dist.	5625 Sep 15 11:27	26° ✕ 24'55	29.11374 AU	max. Earth dist.	5631 Mar 28 22:29	8° ♀ 32'49	31.05215 AU
direct	5625 Dec 04 10:53	25° ✕ 01'18		morning rise	5631 Apr 13 02:34	9° ♀ 07'06	
evening set	5626 Mar 02 06:25	26° ✕ 55'26		retrograde	5631 Jul 11 13:23	11° ♀ 03'35	
				opposition	5631 Sep 29 20:05	9° ♀ 39'43	-0°26'39
conjunction	5626 Mar 17 14:33	27° ✕ 30'01	-0°07'56	min. Earth dist.	5631 Sep 29 13:27	9° ♀ 40'10	29.04631 AU
minimum elong	5626 Mar 17 14:33	27° ✕ 30'01	0°07'57	direct	5631 Dec 18 07:41	8° ♀ 16'15	
behind sun begin	5626 Mar 17 08:48	27° ✕ 29'30		evening set	5632 Mar 14 18:42	10° ♀ 10'06	
behind sun end	5626 Mar 17 20:18	27° ✕ 30'33					
max. Earth dist.	5626 Mar 17 17:22	27° ✕ 30'16	31.10928 AU	conjunction	5632 Mar 30 03:03	10° ♀ 44'46	-0°26'26
morning rise	5626 Apr 01 23:09	28° ✕ 04'42		minimum elong	5632 Mar 30 03:03	10° ♀ 44'46	0°26'28
	5626 Jun 24 01:20	0° ♀		max. Earth dist.	5632 Mar 30 09:15	10° ♀ 45'21	31.04057 AU
retrograde	5626 Jun 29 23:04	0° ♀ 00'34		morning rise	5632 Apr 14 12:46	11° ♀ 19'34	
	5626 Jul 05 22:20	30° ♄		retrograde	5632 Jul 13 01:32	13° ♀ 16'12	
opposition	5626 Sep 18 02:31	28° ✕ 37'09	-0°10'07	opposition	5632 Oct 01 09:16	11° ♀ 52'14	-0°29'51
min. Earth dist.	5626 Sep 17 23:41	28° ✕ 37'21	29.10459 AU	min. Earth dist.	5632 Oct 01 02:37	11° ♀ 52'41	29.03540 AU
direct	5626 Dec 06 23:29	27° ✕ 13'43		direct	5632 Dec 19 19:32	10° ♀ 28'48	
evening set	5627 Mar 04 16:36	29° ✕ 07'48		evening set	5633 Mar 17 04:42	12° ♀ 22'37	
conjunction	5627 Mar 20 00:36	29° ✕ 42'25	-0°11'04	conjunction	5633 Apr 01 13:15	12° ♀ 57'18	-0°29'25
minimum elong	5627 Mar 20 00:35	29° ✕ 42'25	0°11'03	minimum elong	5633 Apr 01 13:15	12° ♀ 57'18	0°29'25
behind sun begin	5627 Mar 19 19:45	29° ✕ 41'58		max. Earth dist.	5633 Apr 01 21:06	12° ♀ 58'02	31.03032 AU
behind sun end	5627 Mar 20 05:26	29° ✕ 42'51		morning rise	5633 Apr 16 23:05	13° ♀ 32'08	
max. Earth dist.	5627 Mar 20 02:46	29° ✕ 42'36	31.09962 AU	retrograde	5633 Jul 15 14:40	15° ♀ 28'52	
	5627 Mar 27 18:21	0° ♀		opposition	5633 Oct 03 22:16	14° ♀ 04'51	-0°33'02
morning rise	5627 Apr 04 09:29	0° ♀ 17'06		min. Earth dist.	5633 Oct 03 13:44	14° ♀ 05'26	29.02576 AU
retrograde	5627 Jul 02 11:47	2° ♀ 13'07		direct	5633 Dec 22 08:55	12° ♀ 41'27	
opposition	5627 Sep 20 15:34	0° ♀ 49'38	-0°13'28	evening set	5634 Mar 19 14:49	14° ♀ 35'14	
min. Earth dist.	5627 Sep 20 12:11	0° ♀ 49'52	29.09439 AU				
	5627 Oct 23 04:35	30° ♄		conjunction	5634 Apr 03 23:22	15° ♀ 09'57	-0°32'22
direct	5627 Dec 09 09:19	29° ✕ 26'13		minimum elong	5634 Apr 03 23:22	15° ♀ 09'57	0°32'23
	5628 Jan 23 18:04	0° ♀		max. Earth dist.	5634 Apr 04 07:21	15° ♀ 10'42	31.02127 AU
evening set	5628 Mar 06 02:39	1° ♀ 20'16		morning rise	5634 Apr 19 09:35	15° ♀ 44'49	
				retrograde	5634 Jul 18 03:15	17° ♀ 41'42	
conjunction	5628 Mar 21 10:50	1° ♀ 54'53	-0°14'11	opposition	5634 Oct 06 11:25	16° ♀ 17'38	-0°36'09
minimum elong	5628 Mar 21 10:50	1° ♀ 54'53	0°14'12	min. Earth dist.	5634 Oct 06 02:38	16° ♀ 18'14	29.01735 AU
behind sun begin	5628 Mar 21 07:37	1° ♀ 54'36		direct	5634 Dec 24 19:26	14° ♀ 54'16	
behind sun end	5628 Mar 21 14:03	1° ♀ 55'11		evening set	5635 Mar 22 00:55	16° ♀ 48'03	
max. Earth dist.	5628 Mar 21 14:30	1° ♀ 55'13	31.08873 AU				
morning rise	5628 Apr 05 19:43	2° ♀ 29'36		conjunction	5635 Apr 06 09:45	17° ♀ 22'46	-0°35'16
retrograde	5628 Jul 03 22:41	4° ♀ 25'45		minimum elong	5635 Apr 06 09:45	17° ♀ 22'46	0°35'16
opposition	5628 Sep 22 04:50	3° ♀ 02'11	-0°16'48	max. Earth dist.	5635 Apr 06 19:36	17° ♀ 23'42	31.01329 AU
min. Earth dist.	5628 Sep 22 01:19	3° ♀ 02'25	29.08289 AU	morning rise	5635 Apr 21 20:01	17° ♀ 57'40	
direct	5628 Dec 10 20:58	1° ♀ 38'46		retrograde	5635 Jul 20 13:49	19° ♀ 54'41	
evening set	5629 Mar 08 12:40	3° ♀ 32'45		opposition	5635 Oct 09 00:22	18° ♀ 30'36	-0°39'14
				min. Earth dist.	5635 Oct 08 14:22	18° ♀ 31'17	29.00973 AU
conjunction	5629 Mar 23 20:48	4° ♀ 07'23	-0°17'18	direct	5635 Dec 27 08:00	17° ♀ 07'18	
minimum elong	5629 Mar 23 20:48	4° ♀ 07'23	0°17'17	evening set	5636 Mar 23 11:15	19° ♀ 01'04	
max. Earth dist.	5629 Mar 24 00:20	4° ♀ 07'42	31.07687 AU				
morning rise	5629 Apr 08 06:00	4° ♀ 42'07		conjunction	5636 Apr 07 20:03	19° ♀ 35'48	-0°38'07
retrograde	5629 Jul 06 12:13	6° ♀ 38'23		minimum elong	5636 Apr 07 20:03	19° ♀ 35'48	0°38'08
opposition	5629 Sep 24 18:00	5° ♀ 14'43	-0°20'07	max. Earth dist.	5636 Apr 08 05:39	19° ♀ 36'43	31.00607 AU

morning rise	5636 Apr 23 06:44	20° Υ 10'44	direct	5643 Jan 11 16:26	2° \mathcal{B} 42'47
retrograde	5636 Jul 22 03:04	22° Υ 07'54	evening set	5643 Apr 08 13:42	4° \mathcal{B} 36'21
opposition	5636 Oct 10 13:36	20° Υ 43'48 -0°42'15			
min. Earth dist.	5636 Oct 10 02:48	20° Υ 44'32 29.00282 AU	conjunction	5643 Apr 23 23:49	5° \mathcal{B} 11'14 -0°56'17
direct	5636 Dec 28 17:57	19° Υ 20'33	minimum elong	5643 Apr 23 23:48	5° \mathcal{B} 11'14 0°56'18
evening set	5637 Mar 25 21:27	21° Υ 14'18	max. Earth dist.	5643 Apr 24 12:59	5° \mathcal{B} 12'29 30.94409 AU
			morning rise	5643 May 09 12:25	5° \mathcal{B} 46'20
conjunction	5637 Apr 10 06:33	21° Υ 49'04 -0°40'55	retrograde	5643 Aug 07 21:54	7° \mathcal{B} 44'16
minimum elong	5637 Apr 10 06:33	21° Υ 49'04 0°40'55	opposition	5643 Oct 27 10:15	6° \mathcal{B} 19'41 -1°01'26
max. Earth dist.	5637 Apr 10 17:54	21° Υ 50'08 30.99917 AU	min. Earth dist.	5643 Oct 26 20:44	6° \mathcal{B} 20'37 28.93914 AU
morning rise	5637 Apr 25 17:19	22° Υ 24'01	direct	5644 Jan 14 03:32	4° \mathcal{B} 56'25
retrograde	5637 Jul 24 14:36	24° Υ 21'21	evening set	5644 Apr 10 00:25	6° \mathcal{B} 49'57
opposition	5637 Oct 13 02:53	22° Υ 57'13 -0°45'12			
min. Earth dist.	5637 Oct 12 15:52	22° Υ 57'58 28.99590 AU	conjunction	5644 Apr 25 10:55	7° \mathcal{B} 24'50 -0°58'35
direct	5637 Dec 31 05:37	21° Υ 34'01	minimum elong	5644 Apr 25 10:55	7° \mathcal{B} 24'50 0°58'37
evening set	5638 Mar 28 08:02	23° Υ 27'45	max. Earth dist.	5644 Apr 26 01:50	7° \mathcal{B} 26'15 30.93357 AU
			morning rise	5644 May 10 23:40	7° \mathcal{B} 59'59
conjunction	5638 Apr 12 17:11	24° Υ 02'32 -0°43'39	retrograde	5644 Aug 09 09:44	9° \mathcal{B} 57'58
minimum elong	5638 Apr 12 17:11	24° Υ 02'32 0°43'40	opposition	5644 Oct 28 23:22	8° \mathcal{B} 33'18 -1°03'50
max. Earth dist.	5638 Apr 13 04:23	24° Υ 03'36 30.99218 AU	min. Earth dist.	5644 Oct 28 08:38	8° \mathcal{B} 34'19 28.92906 AU
morning rise	5638 Apr 28 04:20	24° Υ 37'31	direct	5645 Jan 15 17:02	7° \mathcal{B} 10'02
retrograde	5638 Jul 27 04:01	26° Υ 34'59	evening set	5645 Apr 12 11:13	9° \mathcal{B} 03'31
opposition	5638 Oct 15 15:58	25° Υ 10'49 -0°48'06			
min. Earth dist.	5638 Oct 15 03:54	25° Υ 11'39 28.98869 AU	conjunction	5645 Apr 27 21:49	9° \mathcal{B} 38'26 -1°00'47
direct	5639 Jan 02 16:11	23° Υ 47'39	minimum elong	5645 Apr 27 21:49	9° \mathcal{B} 38'25 1°00'48
evening set	5639 Mar 30 18:41	25° Υ 41'23	max. Earth dist.	5645 Apr 28 12:27	9° \mathcal{B} 39'49 30.92402 AU
			morning rise	5645 May 13 11:04	10° \mathcal{B} 13'35
conjunction	5639 Apr 15 04:03	26° Υ 16'11 -0°46'19	retrograde	5645 Aug 11 23:33	12° \mathcal{B} 11'40
minimum elong	5639 Apr 15 04:03	26° Υ 16'11 0°46'19	opposition	5645 Oct 31 12:28	10° \mathcal{B} 46'56 -1°06'09
max. Earth dist.	5639 Apr 15 16:06	26° Υ 17'20 30.98442 AU	min. Earth dist.	5645 Oct 30 21:03	10° \mathcal{B} 48'00 28.92019 AU
morning rise	5639 Apr 30 15:23	26° Υ 51'12	direct	5646 Jan 18 04:04	9° \mathcal{B} 23'39
retrograde	5639 Jul 29 16:15	28° Υ 48'48	evening set	5646 Apr 14 22:04	11° \mathcal{B} 17'07
opposition	5639 Oct 18 05:20	27° Υ 24'35 -0°50'56			
min. Earth dist.	5639 Oct 17 17:47	27° Υ 25'22 28.98050 AU	conjunction	5646 Apr 30 09:05	11° \mathcal{B} 52'03 -1°02'54
direct	5640 Jan 05 02:54	26° Υ 01'26	minimum elong	5646 Apr 30 09:05	11° \mathcal{B} 52'03 1°02'56
evening set	5640 Apr 01 05:20	27° Υ 55'09	max. Earth dist.	5646 May 01 01:25	11° \mathcal{B} 53'36 30.91564 AU
			morning rise	5646 May 15 22:31	12° \mathcal{B} 27'15
conjunction	5640 Apr 16 14:53	28° Υ 29'58 -0°48'56	retrograde	5646 Aug 14 10:46	14° \mathcal{B} 25'25
minimum elong	5640 Apr 16 14:53	28° Υ 29'58 0°48'57	min. Earth dist.	5646 Nov 02 09:35	13° \mathcal{B} 01'44 28.91242 AU
max. Earth dist.	5640 Apr 17 03:10	28° Υ 31'07 30.97571 AU	opposition	5646 Nov 03 01:23	13° \mathcal{B} 00'38 -1°08'21
morning rise	5640 May 02 02:29	29° Υ 05'00	direct	5647 Jan 20 16:08	11° \mathcal{B} 37'22
	5640 May 28 19:42	0° \mathcal{B}	evening set	5647 Apr 17 09:05	13° \mathcal{B} 30'50
retrograde	5640 Jul 31 06:05	1° \mathcal{B} 02'42			
	5640 Oct 06 11:48	30° \mathcal{R} Υ	conjunction	5647 May 02 20:16	14° \mathcal{B} 05'47 -1°04'56
opposition	5640 Oct 19 18:38	29° Υ 38'25 -0°53'41	minimum elong	5647 May 02 20:16	14° \mathcal{B} 05'47 1°04'56
min. Earth dist.	5640 Oct 19 05:38	29° Υ 39'18 28.97119 AU	max. Earth dist.	5647 May 03 12:35	14° \mathcal{B} 07'20 30.90852 AU
direct	5641 Jan 06 14:32	28° Υ 15'15	morning rise	5647 May 18 10:09	14° \mathcal{B} 41'01
	5641 Mar 30 14:43	0° \mathcal{B}		5647 May 27 03:06	15° \mathcal{B}
evening set	5641 Apr 03 16:10	0° \mathcal{B} 08'56	retrograde	5647 Aug 17 00:02	16° \mathcal{B} 39'17
			opposition	5647 Nov 05 14:23	15° \mathcal{B} 14'29 -1°10'28
conjunction	5641 Apr 19 01:52	0° \mathcal{B} 43'46 -0°51'28	min. Earth dist.	5647 Nov 04 21:21	15° \mathcal{B} 15'39 28.90588 AU
minimum elong	5641 Apr 19 01:52	0° \mathcal{B} 43'46 0°51'28		5647 Nov 14 09:44	15° \mathcal{R} \mathcal{B}
max. Earth dist.	5641 Apr 19 14:12	0° \mathcal{B} 44'56 30.96578 AU	direct	5648 Jan 23 02:40	13° \mathcal{B} 51'14
morning rise	5641 May 04 13:49	1° \mathcal{B} 18'50		5648 Mar 28 10:58	15° \mathcal{B}
retrograde	5641 Aug 02 19:25	3° \mathcal{B} 16'38	evening set	5648 Apr 18 19:58	15° \mathcal{B} 44'43
opposition	5641 Oct 22 07:59	1° \mathcal{B} 52'15 -0°56'21			
min. Earth dist.	5641 Oct 21 19:39	1° \mathcal{B} 53'06 28.96086 AU	conjunction	5648 May 04 07:28	16° \mathcal{B} 19'42 -1°06'51
direct	5642 Jan 09 02:45	0° \mathcal{B} 29'04	minimum elong	5648 May 04 07:28	16° \mathcal{B} 19'42 1°06'53
evening set	5642 Apr 06 02:50	2° \mathcal{B} 22'41	max. Earth dist.	5648 May 05 00:58	16° \mathcal{B} 21'21 30.90235 AU
			morning rise	5648 May 19 21:39	16° \mathcal{B} 54'57
conjunction	5642 Apr 21 12:54	2° \mathcal{B} 57'32 -0°53'55	retrograde	5648 Aug 18 12:02	18° \mathcal{B} 53'20
minimum elong	5642 Apr 21 12:54	2° \mathcal{B} 57'32 0°53'57	min. Earth dist.	5648 Nov 06 10:47	17° \mathcal{B} 29'41 28.90017 AU
max. Earth dist.	5642 Apr 22 02:21	2° \mathcal{B} 58'49 30.95512 AU	opposition	5648 Nov 07 03:33	17° \mathcal{B} 28'31 -1°12'28
morning rise	5642 May 07 01:05	3° \mathcal{B} 32'38	direct	5649 Jan 24 12:59	16° \mathcal{B} 05'19
retrograde	5642 Aug 05 09:13	5° \mathcal{B} 30'29	evening set	5649 Apr 21 07:08	17° \mathcal{B} 58'48
opposition	5642 Oct 24 21:07	4° \mathcal{B} 06'00 -0°58'56			
min. Earth dist.	5642 Oct 24 07:26	4° \mathcal{B} 06'57 28.94992 AU	conjunction	5649 May 06 18:57	18° \mathcal{B} 33'49 -1°08'40

minimum elong	5649 May 06 18:57	18° 8 33'49	1°08'41	morning rise	5655 Jun 05 11:09	2° II 37'39	
max. Earth dist.	5649 May 07 12:53	18° 8 35'31	30.89704 AU	retrograde	5655 Sep 04 12:00	4° II 36'30	
morning rise	5649 May 22 09:30	19° 8 09'06		opposition	5655 Nov 23 22:26	3° II 11'28	-1°23'18
retrograde	5649 Aug 21 02:17	21° 8 07'36		min. Earth dist.	5655 Nov 23 04:15	3° II 12'43	28.85286 AU
opposition	5649 Nov 09 16:27	19° 8 42'47	-1°14'22	direct	5656 Feb 10 02:05	1° II 48'13	
min. Earth dist.	5649 Nov 08 22:15	19° 8 44'02	28.89508 AU	evening set	5656 May 06 16:00	3° II 41'42	
direct	5650 Jan 26 23:55	18° 8 19'37					
evening set	5650 Apr 23 18:27	20° 8 13'08		conjunction	5656 May 22 06:12	4° II 16'54	-1°18'24
				minimum elong	5656 May 22 06:12	4° II 16'54	1°18'26
conjunction	5650 May 09 06:30	20° 8 48'10	-1°10'24	max. Earth dist.	5656 May 23 01:11	4° II 18'42	30.84804 AU
minimum elong	5650 May 09 06:30	20° 8 48'10	1°10'26	morning rise	5656 Jun 06 23:33	4° II 52'25	
max. Earth dist.	5650 May 10 00:31	20° 8 49'53	30.89192 AU	retrograde	5656 Sep 06 01:07	6° II 51'17	
morning rise	5650 May 24 21:29	21° 8 23'30		opposition	5656 Nov 25 11:14	5° II 26'09	-1°24'22
retrograde	5650 Aug 23 16:01	23° 8 22'06		min. Earth dist.	5656 Nov 24 16:13	5° II 27'29	28.84479 AU
opposition	5650 Nov 12 05:33	21° 8 57'17	-1°16'09	direct	5657 Feb 11 13:39	4° II 02'51	
min. Earth dist.	5650 Nov 11 12:09	21° 8 58'29	28.88996 AU	evening set	5657 May 09 03:43	5° II 56'19	
direct	5651 Jan 29 11:20	20° 8 34'09					
evening set	5651 Apr 26 05:49	22° 8 27'42		conjunction	5657 May 24 18:20	6° II 31'33	-1°19'20
				minimum elong	5657 May 24 18:20	6° II 31'33	1°19'22
conjunction	5651 May 11 18:18	23° 8 02'46	-1°12'01	max. Earth dist.	5657 May 25 14:14	6° II 33'26	30.84028 AU
minimum elong	5651 May 11 18:18	23° 8 02'46	1°12'01	morning rise	5657 Jun 09 12:03	7° II 07'05	
max. Earth dist.	5651 May 12 13:11	23° 8 04'33	30.88659 AU	retrograde	5657 Sep 08 12:59	9° II 05'57	
morning rise	5651 May 27 09:31	23° 8 38'07		opposition	5657 Nov 27 23:54	7° II 40'46	-1°25'18
retrograde	5651 Aug 26 06:33	25° 8 36'49		min. Earth dist.	5657 Nov 27 05:21	7° II 42'04	28.83766 AU
opposition	5651 Nov 14 18:30	24° 8 12'00	-1°17'49	direct	5658 Feb 14 00:35	6° II 17'25	
min. Earth dist.	5651 Nov 14 00:03	24° 8 13'16	28.88427 AU	evening set	5658 May 11 15:27	8° II 10'52	
direct	5652 Feb 01 00:15	22° 8 48'52					
evening set	5652 Apr 27 17:30	24° 8 42'27		conjunction	5658 May 27 06:30	8° II 46'07	-1°20'09
				minimum elong	5658 May 27 06:30	8° II 46'07	1°20'11
conjunction	5652 May 13 06:08	25° 8 17'33	-1°13'31	max. Earth dist.	5658 May 28 02:40	8° II 48'02	30.83384 AU
minimum elong	5652 May 13 06:08	25° 8 17'33	1°13'33	morning rise	5658 Jun 12 00:39	9° II 21'41	
max. Earth dist.	5652 May 14 00:16	25° 8 19'16	30.88043 AU	retrograde	5658 Sep 11 02:07	11° II 20'34	
morning rise	5652 May 28 21:52	25° 8 52'56		opposition	5658 Nov 30 12:27	9° II 55'21	-1°26'06
retrograde	5652 Aug 27 20:23	27° 8 51'43		min. Earth dist.	5658 Nov 29 16:31	9° II 56'44	28.83187 AU
opposition	5652 Nov 16 07:41	26° 8 26'52	-1°19'22	direct	5659 Feb 16 12:09	8° II 31'57	
min. Earth dist.	5652 Nov 15 13:58	26° 8 28'05	28.87773 AU	evening set	5659 May 14 03:14	10° II 25'24	
direct	5653 Feb 02 11:00	25° 8 03'44					
evening set	5653 Apr 30 05:00	26° 8 57'18		conjunction	5659 May 29 18:35	11° II 00'40	-1°20'51
				minimum elong	5659 May 29 18:35	11° II 00'40	1°20'52
conjunction	5653 May 15 18:11	27° 8 32'26	-1°14'55	max. Earth dist.	5659 May 30 14:55	11° II 02'36	30.82863 AU
minimum elong	5653 May 15 18:11	27° 8 32'26	1°14'55	morning rise	5659 Jun 14 13:11	11° II 36'16	
max. Earth dist.	5653 May 16 13:23	27° 8 34'15	30.87330 AU	retrograde	5659 Sep 13 14:08	13° II 35'11	
morning rise	5653 May 31 10:11	28° 8 07'51		min. Earth dist.	5659 Dec 02 05:45	12° II 11'16	28.82746 AU
	5653 Aug 10 04:55	0° II		opposition	5659 Dec 03 01:07	12° II 09'55	-1°26'46
retrograde	5653 Aug 30 10:00	0° II 06'41		direct	5660 Feb 18 22:55	10° II 46'31	
	5653 Sep 19 19:22	30° R 8		evening set	5660 May 15 15:01	12° II 39'58	
opposition	5653 Nov 18 20:42	28° 8 41'46	-1°20'48				
min. Earth dist.	5653 Nov 18 02:28	28° 8 43'02	28.86999 AU	conjunction	5660 May 31 06:55	13° II 15'16	-1°21'25
direct	5654 Feb 05 01:09	27° 8 18'37		minimum elong	5660 May 31 06:55	13° II 15'16	1°21'27
evening set	5654 May 02 16:48	29° 8 12'11		max. Earth dist.	5660 Jun 01 04:18	13° II 17'17	30.82500 AU
				morning rise	5660 Jun 16 01:51	13° II 50'53	
conjunction	5654 May 18 06:12	29° 8 47'20	-1°16'11	retrograde	5660 Sep 15 03:41	15° II 49'48	
minimum elong	5654 May 18 06:12	29° 8 47'20	1°16'13	opposition	5660 Dec 04 13:36	14° II 24'32	-1°27'19
max. Earth dist.	5654 May 19 00:18	29° 8 49'03	30.86516 AU	min. Earth dist.	5660 Dec 03 16:58	14° II 25'59	28.82445 AU
	5654 May 23 19:44	0° II		direct	5661 Feb 20 10:43	13° II 01'07	
morning rise	5654 Jun 02 22:46	0° II 22'47		evening set	5661 May 18 03:00	14° II 54'36	
retrograde	5654 Sep 02 00:51	2° II 21'38					
opposition	5654 Nov 21 09:33	0° II 56'39	-1°22'07	conjunction	5661 Jun 02 19:11	15° II 29'56	-1°21'51
min. Earth dist.	5654 Nov 20 15:23	0° II 57'55	28.86156 AU	minimum elong	5661 Jun 02 19:11	15° II 29'56	1°21'52
	5654 Dec 28 20:04	30° R 8		max. Earth dist.	5661 Jun 03 16:04	15° II 31'54	30.82258 AU
direct	5655 Feb 07 13:13	29° 8 33'27		morning rise	5661 Jun 18 14:44	16° II 05'35	
	5655 Mar 19 00:19	0° II		retrograde	5661 Sep 17 17:41	18° II 04'32	
evening set	5655 May 05 04:25	1° II 26'59		min. Earth dist.	5661 Dec 06 06:14	16° II 40'39	28.82261 AU
				opposition	5661 Dec 07 02:14	16° II 39'16	-1°27'43
conjunction	5655 May 20 18:19	2° II 02'10	-1°17'22	direct	5662 Feb 22 21:09	15° II 15'51	
minimum elong	5655 May 20 18:19	2° II 02'10	1°17'22	evening set	5662 May 20 15:02	17° II 09'21	
max. Earth dist.	5655 May 21 13:38	2° II 04'00	30.85647 AU				

conjunction	5662 Jun 05 07:49	17°II44'43	-1°22'10	retrograde	5668 Oct 03 15:05	3°☾50'08	
minimum elong	5662 Jun 05 07:49	17°II44'43	1°22'12	opposition	5668 Dec 22 16:55	2°☾24'51	-1°26'48
max. Earth dist.	5662 Jun 06 05:54	17°II46'48	30.82110 AU	min. Earth dist.	5668 Dec 21 22:23	2°☾26'09	28.80633 AU
morning rise	5662 Jun 21 03:36	18°II20'23		direct	5669 Mar 10 09:11	1°☾01'17	
retrograde	5662 Sep 20 07:35	20°II19'21		evening set	5669 Jun 05 06:10	2°☾54'53	
opposition	5662 Dec 09 14:33	18°II54'07	-1°27'59				
min. Earth dist.	5662 Dec 08 18:02	18°II55'33	28.82134 AU	conjunction	5669 Jun 21 02:09	3°☾30'27	-1°20'53
direct	5663 Feb 25 10:36	17°II30'43		minimum elong	5669 Jun 21 02:09	3°☾30'27	1°20'54
evening set	5663 May 23 03:21	19°II24'15		max. Earth dist.	5669 Jun 21 22:54	3°☾32'25	30.80419 AU
				morning rise	5669 Jul 07 01:06	4°☾06'19	
conjunction	5663 Jun 07 20:23	19°II59'39	-1°22'22	retrograde	5669 Oct 06 04:11	6°☾05'08	
minimum elong	5663 Jun 07 20:23	19°II59'39	1°22'23	min. Earth dist.	5669 Dec 24 09:28	4°☾41'12	28.80380 AU
max. Earth dist.	5663 Jun 08 17:22	20°II01'38	30.82002 AU	opposition	5669 Dec 25 04:55	4°☾39'50	-1°26'09
morning rise	5663 Jun 23 16:47	20°II35'21		direct	5670 Mar 12 20:46	3°☾16'12	
retrograde	5663 Sep 22 22:48	22°II34'21		evening set	5670 Jun 07 18:52	5°☾09'50	
min. Earth dist.	5663 Dec 11 06:52	21°II10'32	28.82032 AU				
opposition	5663 Dec 12 03:07	21°II09'07	-1°28'08	conjunction	5670 Jun 23 15:08	5°☾45'25	-1°20'13
direct	5664 Feb 27 22:07	19°II45'44		minimum elong	5670 Jun 23 15:09	5°☾45'25	1°20'14
evening set	5664 May 24 15:33	21°II39'18		max. Earth dist.	5670 Jun 24 11:07	5°☾47'18	30.80214 AU
				morning rise	5670 Jul 09 14:38	6°☾21'18	
conjunction	5664 Jun 09 09:10	22°II14'44	-1°22'26	retrograde	5670 Oct 08 17:05	8°☾20'04	
minimum elong	5664 Jun 09 09:10	22°II14'44	1°22'27	opposition	5670 Dec 27 16:55	6°☾54'46	-1°25'21
max. Earth dist.	5664 Jun 10 07:03	22°II16'48	30.81874 AU	min. Earth dist.	5670 Dec 26 22:19	6°☾56'04	28.80245 AU
morning rise	5664 Jun 25 05:50	22°II50'28		direct	5671 Mar 15 07:11	5°☾31'05	
retrograde	5664 Sep 24 11:17	24°II49'28		evening set	5671 Jun 10 07:23	7°☾24'44	
opposition	5664 Dec 13 15:39	23°II24'16	-1°28'08				
min. Earth dist.	5664 Dec 12 19:48	23°II25'39	28.81871 AU	conjunction	5671 Jun 26 04:18	8°☾00'21	-1°19'25
direct	5665 Mar 01 10:46	22°II00'52		minimum elong	5671 Jun 26 04:18	8°☾00'21	1°19'26
evening set	5665 May 27 04:07	23°II54'28		max. Earth dist.	5671 Jun 27 01:22	8°☾02'20	30.80150 AU
				morning rise	5671 Jul 12 04:04	8°☾36'16	
conjunction	5665 Jun 11 22:06	24°II29'55	-1°22'22	retrograde	5671 Oct 11 06:23	10°☾34'59	
minimum elong	5665 Jun 11 22:06	24°II29'55	1°22'23	min. Earth dist.	5671 Dec 29 09:36	9°☾11'02	28.80248 AU
max. Earth dist.	5665 Jun 12 18:51	24°II31'53	30.81684 AU	opposition	5671 Dec 30 04:50	9°☾09'41	-1°24'26
morning rise	5665 Jun 27 19:21	25°II05'41		direct	5672 Mar 16 20:28	7°☾45'59	
retrograde	5665 Sep 27 02:01	27°II04'40		evening set	5672 Jun 11 20:00	9°☾39'39	
min. Earth dist.	5665 Dec 15 08:02	25°II40'51	28.81637 AU				
opposition	5665 Dec 16 04:00	25°II39'28	-1°28'00	conjunction	5672 Jun 27 17:15	10°☾15'18	-1°18'30
direct	5666 Mar 03 22:43	24°II16'02		minimum elong	5672 Jun 27 17:15	10°☾15'18	1°18'31
evening set	5666 May 29 16:42	26°II09'39		max. Earth dist.	5672 Jun 28 13:15	10°☾17'11	30.80235 AU
				morning rise	5672 Jul 13 17:38	10°☾51'14	
conjunction	5666 Jun 14 11:12	26°II45'08	-1°22'11	retrograde	5672 Oct 12 20:47	12°☾49'55	
minimum elong	5666 Jun 14 11:12	26°II45'08	1°22'13	opposition	5672 Dec 31 16:49	11°☾24'38	-1°23'23
max. Earth dist.	5666 Jun 15 08:09	26°II47'07	30.81397 AU	min. Earth dist.	5672 Dec 30 21:47	11°☾25'58	28.80412 AU
morning rise	5666 Jun 30 08:49	27°II20'56		direct	5673 Mar 19 07:42	10°☾00'54	
retrograde	5666 Sep 29 14:31	29°II19'53		evening set	5673 Jun 14 08:43	11°☾54'37	
opposition	5666 Dec 18 16:27	27°II54'40	-1°27'44				
min. Earth dist.	5666 Dec 17 21:34	27°II55'59	28.81313 AU	conjunction	5673 Jun 30 06:36	12°☾30'18	-1°17'27
direct	5667 Mar 06 10:21	26°II31'12		minimum elong	5673 Jun 30 06:36	12°☾30'18	1°17'28
evening set	5667 Jun 01 05:07	28°II24'48		max. Earth dist.	5673 Jul 01 03:36	12°☾32'16	30.80466 AU
				morning rise	5673 Jul 16 07:15	13°☾06'15	
conjunction	5667 Jun 17 00:05	29°II00'19	-1°21'52	retrograde	5673 Oct 15 09:31	15°☾04'53	
minimum elong	5667 Jun 17 00:05	29°II00'19	1°21'54	min. Earth dist.	5674 Jan 02 09:46	13°☾40'58	28.80701 AU
max. Earth dist.	5667 Jun 17 20:38	29°II02'15	30.81060 AU	opposition	5674 Jan 03 04:34	13°☾39'39	-1°22'12
morning rise	5667 Jul 02 22:10	29°II36'08		direct	5674 Mar 21 19:51	12°☾15'56	
	5667 Jul 13 23:46	0°☾		evening set	5674 Jun 16 21:38	14°☾09'41	
retrograde	5667 Oct 02 03:33	1°☾35'03					
min. Earth dist.	5667 Dec 20 09:01	0°☾11'10	28.80960 AU	conjunction	5674 Jul 02 19:53	14°☾45'23	-1°16'17
opposition	5667 Dec 21 04:41	0°☾09'48	-1°27'20	minimum elong	5674 Jul 02 19:53	14°☾45'23	1°16'19
	5667 Dec 27 01:04	30°☾II		max. Earth dist.	5674 Jul 03 15:52	14°☾47'16	30.80825 AU
direct	5668 Mar 07 22:29	28°II46'17		morning rise	5674 Jul 18 21:05	15°☾21'22	
	5668 May 14 17:55	0°☾		retrograde	5674 Oct 18 01:15	17°☾19'57	
evening set	5668 Jun 02 17:42	0°☾39'53		opposition	5675 Jan 05 16:24	15°☾54'46	-1°20'54
				min. Earth dist.	5675 Jan 04 21:23	15°☾56'06	28.81105 AU
conjunction	5668 Jun 18 13:04	1°☾15'25	-1°21'27	direct	5675 Mar 24 08:19	14°☾31'04	
minimum elong	5668 Jun 18 13:04	1°☾15'25	1°21'29	evening set	5675 Jun 19 10:28	16°☾24'52	
max. Earth dist.	5668 Jun 19 09:18	1°☾17'20	30.80707 AU				
morning rise	5668 Jul 04 11:39	1°☾51'16		conjunction	5675 Jul 05 09:12	17°☾00'36	-1°15'00

minimum elong	5675 Jul 05 09:12	17° Ω 00'36	1°15'02	min. Earth dist.	5682 Jan 20 11:28	1° Ω 42'21	28.83103 AU
max. Earth dist.	5675 Jul 06 05:41	17° Ω 02'32	30.81253 AU	opposition	5682 Jan 21 02:11	1° Ω 41'19	-1°08'24
morning rise	5675 Jul 21 10:43	17° Ω 36'37		direct	5682 Apr 08 17:46	0° Ω 17'19	
retrograde	5675 Oct 20 13:51	19° Ω 35'09		evening set	5682 Jul 05 07:16	2° Ω 11'15	
min. Earth dist.	5676 Jan 07 10:27	18° Ω 11'17	28.81549 AU				
opposition	5676 Jan 08 04:19	18° Ω 10'01	-1°19'28	conjunction	5682 Jul 21 09:13	2° Ω 47'08	-1°02'58
direct	5676 Mar 25 20:18	16° Ω 46'20		minimum elong	5682 Jul 21 09:14	2° Ω 47'08	1°02'59
evening set	5676 Jun 20 23:34	18° Ω 40'10		max. Earth dist.	5682 Jul 22 01:44	2° Ω 48'41	30.83160 AU
				morning rise	5682 Aug 06 13:20	3° Ω 23'14	
conjunction	5676 Jul 06 22:46	19° Ω 15'56	-1°13'36	retrograde	5682 Nov 05 06:14	5° Ω 21'04	
minimum elong	5676 Jul 06 22:47	19° Ω 15'56	1°13'38	opposition	5683 Jan 23 13:32	3° Ω 56'03	-1°06'11
max. Earth dist.	5676 Jul 07 18:28	19° Ω 17'48	30.81709 AU	min. Earth dist.	5683 Jan 22 23:16	3° Ω 57'03	28.83337 AU
morning rise	5676 Jul 23 00:44	19° Ω 51'58		direct	5683 Apr 11 06:23	2° Ω 32'00	
retrograde	5676 Oct 22 03:43	21° Ω 50'27		evening set	5683 Jul 07 20:28	4° Ω 25'57	
opposition	5677 Jan 09 16:02	20° Ω 25'23	-1°17'54				
min. Earth dist.	5677 Jan 08 21:48	20° Ω 26'40	28.81984 AU	conjunction	5683 Jul 23 22:43	5° Ω 01'50	-1°00'50
direct	5677 Mar 28 08:25	19° Ω 01'41		minimum elong	5683 Jul 23 22:43	5° Ω 01'50	1°00'52
evening set	5677 Jun 23 12:52	20° Ω 55'34		max. Earth dist.	5683 Jul 24 13:56	5° Ω 03'16	30.83454 AU
				morning rise	5683 Aug 09 03:18	5° Ω 37'57	
conjunction	5677 Jul 09 12:29	21° Ω 31'21	-1°12'05	retrograde	5683 Nov 07 20:55	7° Ω 35'40	
minimum elong	5677 Jul 09 12:29	21° Ω 31'21	1°12'07	min. Earth dist.	5684 Jan 25 10:26	6° Ω 11'40	28.83687 AU
max. Earth dist.	5677 Jul 10 07:22	21° Ω 33'08	30.82104 AU	opposition	5684 Jan 26 00:51	6° Ω 10'39	-1°03'52
morning rise	5677 Jul 25 14:52	22° Ω 07'25		direct	5684 Apr 12 19:01	4° Ω 46'33	
retrograde	5677 Oct 24 16:00	24° Ω 05'49		evening set	5684 Jul 09 09:45	6° Ω 40'32	
min. Earth dist.	5678 Jan 11 11:19	22° Ω 41'57	28.82337 AU				
opposition	5678 Jan 12 03:56	22° Ω 40'47	-1°16'13	conjunction	5684 Jul 25 12:29	7° Ω 16'27	-0°58'38
direct	5678 Mar 30 19:12	21° Ω 17'03		minimum elong	5684 Jul 25 12:29	7° Ω 16'27	0°58'39
evening set	5678 Jun 26 02:07	23° Ω 10'58		max. Earth dist.	5684 Jul 26 04:10	7° Ω 17'55	30.83859 AU
				morning rise	5684 Aug 10 17:17	7° Ω 52'34	
conjunction	5678 Jul 12 02:17	23° Ω 46'46	-1°10'28	retrograde	5684 Nov 09 08:40	9° Ω 50'11	
minimum elong	5678 Jul 12 02:17	23° Ω 46'46	1°10'29	opposition	5685 Jan 27 12:03	8° Ω 25'12	-1°01'27
max. Earth dist.	5678 Jul 12 20:50	23° Ω 48'31	30.82414 AU	min. Earth dist.	5685 Jan 26 22:44	8° Ω 26'09	28.84157 AU
morning rise	5678 Jul 28 04:58	24° Ω 22'50		direct	5685 Apr 15 07:07	7° Ω 01'05	
retrograde	5678 Oct 27 05:22	26° Ω 21'09		evening set	5685 Jul 11 23:07	8° Ω 55'06	
opposition	5679 Jan 14 15:34	24° Ω 56'08	-1°14'26				
min. Earth dist.	5679 Jan 13 22:38	24° Ω 57'20	28.82588 AU	conjunction	5685 Jul 28 02:15	9° Ω 31'02	-0°56'20
direct	5679 Apr 02 07:07	23° Ω 32'22		minimum elong	5685 Jul 28 02:15	9° Ω 31'02	0°56'21
evening set	5679 Jun 28 15:29	25° Ω 26'16		max. Earth dist.	5685 Jul 28 17:05	9° Ω 32'25	30.84409 AU
				morning rise	5685 Aug 13 07:25	10° Ω 07'10	
conjunction	5679 Jul 14 15:58	26° Ω 02'06	-1°08'45	retrograde	5685 Nov 11 22:45	12° Ω 04'40	
minimum elong	5679 Jul 14 15:58	26° Ω 02'06	1°08'46	opposition	5686 Jan 29 23:11	10° Ω 39'45	-0°58'57
max. Earth dist.	5679 Jul 15 09:06	26° Ω 03'43	30.82628 AU	min. Earth dist.	5686 Jan 29 09:17	10° Ω 40'44	28.84766 AU
morning rise	5679 Jul 30 19:08	26° Ω 38'11		direct	5686 Apr 17 19:23	9° Ω 15'37	
retrograde	5679 Oct 29 16:57	28° Ω 36'23		evening set	5686 Jul 14 12:29	11° Ω 09'41	
min. Earth dist.	5680 Jan 16 11:50	27° Ω 12'27	28.82775 AU				
opposition	5680 Jan 17 03:19	27° Ω 11'22	-1°12'32	conjunction	5686 Jul 30 15:57	11° Ω 45'38	-0°53'56
direct	5680 Apr 03 17:56	25° Ω 47'32		minimum elong	5686 Jul 30 15:57	11° Ω 45'38	0°53'57
evening set	5680 Jun 30 04:35	27° Ω 41'26		max. Earth dist.	5686 Jul 31 06:25	11° Ω 47'00	30.85072 AU
				morning rise	5686 Aug 15 21:21	12° Ω 21'47	
conjunction	5680 Jul 16 05:43	28° Ω 17'17	-1°06'55	retrograde	5686 Nov 14 11:10	14° Ω 19'12	
minimum elong	5680 Jul 16 05:43	28° Ω 17'17	1°06'56	opposition	5687 Feb 01 10:24	12° Ω 54'22	-0°56'21
max. Earth dist.	5680 Jul 16 23:17	28° Ω 18'56	30.82799 AU	min. Earth dist.	5687 Jan 31 21:50	12° Ω 55'15	28.85486 AU
morning rise	5680 Aug 01 09:08	28° Ω 53'22		direct	5687 Apr 20 06:05	11° Ω 30'14	
	5680 Sep 04 00:32	0° Ω		evening set	5687 Jul 17 01:52	13° Ω 24'22	
retrograde	5680 Oct 31 04:51	0° Ω 51'27					
	5680 Dec 29 04:48	30° Ω		conjunction	5687 Aug 02 05:47	14° Ω 00'21	-0°51'28
opposition	5681 Jan 18 14:50	29° Ω 26'26	-1°10'31	minimum elong	5687 Aug 02 05:47	14° Ω 00'21	0°51'29
min. Earth dist.	5681 Jan 17 23:22	29° Ω 27'31	28.82923 AU	max. Earth dist.	5687 Aug 02 20:03	14° Ω 01'41	30.85852 AU
direct	5681 Apr 06 06:54	28° Ω 02'31		morning rise	5687 Aug 18 11:25	14° Ω 36'30	
evening set	5681 Jul 02 18:02	29° Ω 56'26			5687 Aug 29 11:45	15° Ω	
	5681 Jul 04 09:02	0° Ω		retrograde	5687 Nov 17 00:38	16° Ω 33'50	
				opposition	5688 Feb 03 21:25	15° Ω 09'05	-0°53'40
conjunction	5681 Jul 18 19:25	0° Ω 32'18	-1°04'59	min. Earth dist.	5688 Feb 03 08:28	15° Ω 10'00	28.86287 AU
minimum elong	5681 Jul 18 19:25	0° Ω 32'18	1°05'00		5688 Feb 09 06:14	15° Ω	
max. Earth dist.	5681 Jul 19 11:18	0° Ω 33'47	30.82958 AU	direct	5688 Apr 21 17:36	13° Ω 44'58	
morning rise	5681 Aug 03 23:22	1° Ω 08'23			5688 Jun 29 19:53	15° Ω	
retrograde	5681 Nov 02 18:12	3° Ω 06'21		evening set	5688 Jul 18 15:27	15° Ω 39'10	

conjunction	5688 Aug 03 19:36	16°Ω15'10	-0°48'55	retrograde	5694 Dec 02 14:25	2°♊16'29
minimum elong	5688 Aug 03 19:36	16°Ω15'10	0°48'56	opposition	5695 Feb 19 02:07	0°♊52'02 -0°32'53
max. Earth dist.	5688 Aug 04 08:35	16°Ω16'22	30.86667 AU	min. Earth dist.	5695 Feb 18 18:47	0°♊52'33 28.90535 AU
morning rise	5688 Aug 20 01:36	16°Ω51'20			5695 Mar 24 02:13	30°♊Ω
retrograde	5688 Nov 18 11:59	18°Ω48'35		direct	5695 May 08 05:00	29°Ω27'37
opposition	5689 Feb 05 08:37	17°Ω23'56	-0°50'53		5695 Jun 21 11:15	0°♊
min. Earth dist.	5689 Feb 04 21:16	17°Ω24'44	28.87101 AU	evening set	5695 Aug 04 15:06	1°♊22'02
direct	5689 Apr 24 03:59	15°Ω59'50				
evening set	5689 Jul 21 05:07	17°Ω54'05		conjunction	5695 Aug 20 21:18	1°♊58'05 -0°29'18
				minimum elong	5695 Aug 20 21:18	1°♊58'05 0°29'18
conjunction	5689 Aug 06 09:46	18°Ω30'06	-0°46'18	max. Earth dist.	5695 Aug 21 04:32	1°♊58'45 30.90798 AU
minimum elong	5689 Aug 06 09:46	18°Ω30'06	0°46'18	morning rise	5695 Sep 06 04:24	2°♊34'13
max. Earth dist.	5689 Aug 06 22:44	18°Ω31'19	30.87459 AU	retrograde	5695 Dec 05 02:29	4°♊30'31
morning rise	5689 Aug 22 15:49	19°Ω06'16		opposition	5696 Feb 21 12:50	3°♊06'04 -0°29'42
retrograde	5689 Nov 20 23:42	21°Ω03'26		min. Earth dist.	5696 Feb 21 06:58	3°♊06'29 28.91115 AU
opposition	5690 Feb 07 19:35	19°Ω38'51	-0°48'03	direct	5696 May 09 16:55	1°♊41'36
min. Earth dist.	5690 Feb 07 08:36	19°Ω39'38	28.87846 AU	evening set	5696 Aug 06 04:32	3°♊36'01
direct	5690 Apr 26 16:01	18°Ω14'44				
evening set	5690 Jul 23 18:59	20°Ω09'04		conjunction	5696 Aug 22 11:02	4°♊12'04 -0°26'18
				minimum elong	5696 Aug 22 11:02	4°♊12'04 0°26'18
conjunction	5690 Aug 08 23:45	20°Ω45'05	-0°43'36	max. Earth dist.	5696 Aug 22 17:52	4°♊12'42 30.91438 AU
minimum elong	5690 Aug 08 23:45	20°Ω45'05	0°43'36	morning rise	5696 Sep 07 18:14	4°♊48'12
max. Earth dist.	5690 Aug 09 10:37	20°Ω46'06	30.88164 AU	retrograde	5696 Dec 06 14:52	6°♊44'20
morning rise	5690 Aug 25 06:11	21°Ω21'15		opposition	5697 Feb 22 23:20	5°♊19'55 -0°26'28
retrograde	5690 Nov 23 12:46	23°Ω18'18		min. Earth dist.	5697 Feb 22 16:59	5°♊20'22 28.91803 AU
opposition	5691 Feb 10 06:44	21°Ω53'47	-0°45'08	direct	5697 May 12 05:51	3°♊55'23
min. Earth dist.	5691 Feb 09 20:50	21°Ω54'29	28.88507 AU	evening set	5697 Aug 08 18:10	5°♊49'50
direct	5691 Apr 29 02:04	20°Ω29'38				
evening set	5691 Jul 26 08:30	22°Ω23'59		conjunction	5697 Aug 25 00:43	6°♊25'52 -0°23'16
				minimum elong	5697 Aug 25 00:43	6°♊25'52 0°23'16
conjunction	5691 Aug 11 13:45	23°Ω00'01	-0°40'51	max. Earth dist.	5697 Aug 25 06:26	6°♊26'24 30.92187 AU
minimum elong	5691 Aug 11 13:45	23°Ω00'01	0°40'52	morning rise	5697 Sep 10 08:01	7°♊02'00
max. Earth dist.	5691 Aug 12 00:42	23°Ω01'02	30.88772 AU	retrograde	5697 Dec 09 01:41	8°♊57'59
morning rise	5691 Aug 27 20:12	23°Ω36'12		opposition	5698 Feb 25 09:54	7°♊33'37 -0°23'12
retrograde	5691 Nov 26 00:01	25°Ω33'07		min. Earth dist.	5698 Feb 25 04:48	7°♊33'58 28.92630 AU
opposition	5692 Feb 12 17:48	24°Ω08'38	-0°42'09	direct	5698 May 14 16:14	6°♊09'03
min. Earth dist.	5692 Feb 12 08:49	24°Ω09'16	28.89061 AU	evening set	5698 Aug 11 07:37	8°♊03'32
direct	5692 Apr 30 14:47	22°Ω44'26				
evening set	5692 Jul 27 22:18	24°Ω38'48		conjunction	5698 Aug 27 14:29	8°♊39'34 -0°20'11
				minimum elong	5698 Aug 27 14:29	8°♊39'34 0°20'12
conjunction	5692 Aug 13 03:43	25°Ω14'50	-0°38'02	max. Earth dist.	5698 Aug 27 20:35	8°♊40'08 30.93090 AU
minimum elong	5692 Aug 13 03:43	25°Ω14'50	0°38'03	morning rise	5698 Sep 12 21:42	9°♊15'41
max. Earth dist.	5692 Aug 13 12:39	25°Ω15'40	30.89302 AU	retrograde	5698 Dec 11 13:06	11°♊11'32
morning rise	5692 Aug 29 10:31	25°Ω51'00		opposition	5699 Feb 27 20:25	9°♊47'14 -0°19'54
retrograde	5692 Nov 27 13:45	27°Ω47'47		min. Earth dist.	5699 Feb 27 15:12	9°♊47'36 28.93593 AU
opposition	5693 Feb 14 04:36	26°Ω23'18	-0°39'07	direct	5699 May 17 04:03	8°♊22'40
min. Earth dist.	5693 Feb 13 20:03	26°Ω23'54	28.89561 AU	evening set	5699 Aug 13 21:06	10°♊17'11
direct	5693 May 03 03:41	24°Ω59'02				
evening set	5693 Jul 30 11:59	26°Ω53'26		conjunction	5699 Aug 30 03:57	10°♊53'14 -0°17'05
				minimum elong	5699 Aug 30 03:57	10°♊53'14 0°17'06
conjunction	5693 Aug 15 17:47	27°Ω29'28	-0°35'10	max. Earth dist.	5699 Aug 30 08:30	10°♊53'39 30.94123 AU
minimum elong	5693 Aug 15 17:47	27°Ω29'28	0°35'11	morning rise	5699 Sep 15 11:21	11°♊29'20
max. Earth dist.	5693 Aug 16 02:43	27°Ω30'18	30.89780 AU	retrograde	5699 Dec 14 01:04	13°♊25'05
morning rise	5693 Sep 01 00:36	28°Ω05'38		opposition	5700 Mar 02 06:57	12°♊00'52 -0°16'34
	5693 Nov 18 12:45	0°♊		min. Earth dist.	5700 Mar 02 02:31	12°♊01'10 28.94681 AU
retrograde	5693 Nov 30 00:41	0°♊02'15		direct	5700 May 19 13:40	10°♊36'18
	5693 Dec 11 16:07	30°♊Ω		evening set	5700 Aug 16 10:41	12°♊30'53
opposition	5694 Feb 16 15:29	28°Ω37'47	-0°36'02			
min. Earth dist.	5694 Feb 16 08:26	28°Ω38'17	28.90031 AU	conjunction	5700 Sep 01 17:50	13°♊06'55 -0°13'58
direct	5694 May 05 15:57	27°Ω13'26		minimum elong	5700 Sep 01 17:50	13°♊06'55 0°13'58
evening set	5694 Aug 02 01:32	29°Ω07'51		behind sun begin	5700 Sep 01 14:40	13°♊06'39
				behind sun end	5700 Sep 01 21:00	13°♊07'12
conjunction	5694 Aug 18 07:31	29°Ω43'53	-0°32'15	max. Earth dist.	5700 Sep 01 22:44	13°♊07'22 30.95244 AU
minimum elong	5694 Aug 18 07:31	29°Ω43'53	0°32'15	morning rise	5700 Sep 18 01:04	13°♊43'01
max. Earth dist.	5694 Aug 18 15:12	29°Ω44'36	30.90267 AU	retrograde	5700 Dec 16 11:22	15°♊38'39
	5694 Aug 25 12:30	0°♊		opposition	5701 Mar 04 17:21	14°♊14'32 -0°13'13
morning rise	5694 Sep 03 14:32	0°♊20'02		min. Earth dist.	5701 Mar 04 13:50	14°♊14'47 28.95812 AU

direct	5701 May 22 01:40	12° 17 49'59		behind sun end	5706 Sep 16 10:34	26° 17 29'40	
evening set	5701 Aug 19 00:30	14° 17 44'38		max. Earth dist.	5706 Sep 16 02:02	26° 17 28'56	31.00940 AU
				morning rise	5706 Oct 02 11:00	27° 17 05'04	
conjunction	5701 Sep 04 07:36	15° 17 20'41	-0°10'49	retrograde	5706 Dec 30 11:23	28° 17 59'57	
minimum elong	5701 Sep 04 07:35	15° 17 20'41	0°10'50	opposition	5707 Mar 18 08:03	27° 17 36'12	0°07'07
behind sun begin	5701 Sep 04 02:38	15° 17 20'14		min. Earth dist.	5707 Mar 18 10:01	27° 17 36'03	29.01330 AU
behind sun end	5701 Sep 04 12:33	15° 17 21'07		direct	5707 Jun 05 02:04	26° 17 11'30	
max. Earth dist.	5701 Sep 04 10:27	15° 17 20'56	30.96381 AU	evening set	5707 Sep 02 10:14	28° 17 06'24	
morning rise	5701 Sep 20 14:57	15° 17 56'45					
retrograde	5701 Dec 19 00:20	17° 17 52'17		conjunction	5707 Sep 18 17:36	28° 17 42'23	0°08'17
opposition	5702 Mar 07 03:51	16° 17 28'16	-0°09'50	minimum elong	5707 Sep 18 17:36	28° 17 42'23	0°08'17
min. Earth dist.	5702 Mar 07 00:45	16° 17 28'29	28.96935 AU	behind sun begin	5707 Sep 18 11:49	28° 17 41'52	
direct	5702 May 24 13:13	15° 17 03'43		behind sun end	5707 Sep 18 23:24	28° 17 42'54	
evening set	5702 Aug 21 14:07	16° 17 58'27		max. Earth dist.	5707 Sep 18 15:33	28° 17 42'13	31.01722 AU
				morning rise	5707 Oct 05 00:12	29° 17 18'20	
conjunction	5702 Sep 06 21:21	17° 17 34'29	-0°07'40		5707 Oct 25 05:41	0° 17 00	
minimum elong	5702 Sep 06 21:22	17° 17 34'29	0°07'40	retrograde	5708 Jan 01 22:36	1° 17 13'04	
behind sun begin	5702 Sep 06 15:25	17° 17 33'57			5708 Mar 13 11:12	30° 17 00	
behind sun end	5702 Sep 07 03:19	17° 17 35'01		opposition	5708 Mar 19 18:17	29° 17 49'21	0°10'28
max. Earth dist.	5702 Sep 07 00:09	17° 17 34'43	30.97460 AU	min. Earth dist.	5708 Mar 19 20:27	29° 17 49'12	29.02119 AU
morning rise	5702 Sep 23 04:30	18° 17 10'32		direct	5708 Jun 06 14:28	28° 17 24'37	
retrograde	5702 Dec 21 11:05	20° 17 05'58			5708 Aug 25 18:44	0° 17 00	
opposition	5703 Mar 09 14:28	18° 17 42'02	-0°06'27	evening set	5708 Sep 03 23:48	0° 17 19'32	
min. Earth dist.	5703 Mar 09 13:04	18° 17 42'08	28.97972 AU				
direct	5703 May 27 00:43	17° 17 17'28		conjunction	5708 Sep 20 06:59	0° 17 55'31	0°11'25
evening set	5703 Aug 24 03:53	19° 17 12'15		minimum elong	5708 Sep 20 06:58	0° 17 55'30	0°11'25
				behind sun begin	5708 Sep 20 02:16	0° 17 55'05	
conjunction	5703 Sep 09 11:08	19° 17 48'17	-0°04'31	behind sun end	5708 Sep 20 11:41	0° 17 55'56	
minimum elong	5703 Sep 09 11:08	19° 17 48'17	0°04'32	max. Earth dist.	5708 Sep 20 03:12	0° 17 55'11	31.02538 AU
behind sun begin	5703 Sep 09 04:40	19° 17 47'42		morning rise	5708 Oct 06 13:31	1° 17 31'26	
behind sun end	5703 Sep 09 17:35	19° 17 48'51		retrograde	5709 Jan 03 09:25	3° 17 26'01	
max. Earth dist.	5703 Sep 09 12:10	19° 17 48'21	30.98459 AU	opposition	5709 Mar 22 04:26	2° 17 02'21	0°13'49
morning rise	5703 Sep 25 18:18	20° 17 24'19		min. Earth dist.	5709 Mar 22 07:20	2° 17 02'09	29.02984 AU
retrograde	5703 Dec 24 00:34	22° 17 19'37		direct	5709 Jun 09 00:22	0° 17 37'34	
opposition	5704 Mar 11 00:50	20° 17 55'45	-0°03'03	evening set	5709 Sep 06 13:09	2° 17 32'31	
min. Earth dist.	5704 Mar 10 23:29	20° 17 55'50	28.98920 AU				
direct	5704 May 28 13:42	19° 17 31'10		conjunction	5709 Sep 22 20:23	3° 17 08'28	0°14'32
evening set	5704 Aug 25 17:37	21° 17 25'59		minimum elong	5709 Sep 22 20:23	3° 17 08'28	0°14'31
				behind sun begin	5709 Sep 22 17:43	3° 17 08'14	
conjunction	5704 Sep 11 00:58	22° 17 02'01	-0°01'19	behind sun end	5709 Sep 22 23:03	3° 17 08'43	
minimum elong	5704 Sep 11 00:57	22° 17 02'01	0°01'18	max. Earth dist.	5709 Sep 22 17:08	3° 17 08'11	31.03444 AU
behind sun begin	5704 Sep 10 18:21	22° 17 01'26		morning rise	5709 Oct 09 02:33	3° 17 44'22	
behind sun end	5704 Sep 11 07:32	22° 17 02'36		retrograde	5710 Jan 05 18:18	5° 17 38'50	
max. Earth dist.	5704 Sep 11 01:08	22° 17 02'01	30.99351 AU	opposition	5710 Mar 24 14:42	4° 17 15'13	0°17'09
morning rise	5704 Sep 27 07:59	22° 17 38'02		min. Earth dist.	5710 Mar 24 18:12	4° 17 14'58	29.03942 AU
retrograde	5704 Dec 25 12:23	24° 17 33'12		direct	5710 Jun 11 12:30	2° 17 50'25	
asc. node	5705 Feb 04 14:12	24° 17 06'10		evening set	5710 Sep 09 02:25	4° 17 45'24	
opposition	5705 Mar 13 11:24	23° 17 09'22	0°00'20				
min. Earth dist.	5705 Mar 13 11:56	23° 17 09'20	28.99771 AU	conjunction	5710 Sep 25 09:23	5° 17 21'20	0°17'37
direct	5705 May 31 01:55	21° 17 44'46		minimum elong	5710 Sep 25 09:23	5° 17 21'20	0°17'38
evening set	5705 Aug 28 07:17	23° 17 39'37		max. Earth dist.	5710 Sep 25 04:31	5° 17 20'53	31.04469 AU
				morning rise	5710 Oct 11 15:29	5° 17 57'12	
conjunction	5705 Sep 13 14:38	24° 17 15'38	0°01'58	retrograde	5711 Jan 08 05:52	7° 17 51'33	
minimum elong	5705 Sep 13 14:38	24° 17 15'38	0°01'58	opposition	5711 Mar 27 00:54	6° 17 28'00	0°20'27
behind sun begin	5705 Sep 13 08:03	24° 17 15'03		min. Earth dist.	5711 Mar 27 04:15	6° 17 27'46	29.05038 AU
behind sun end	5705 Sep 13 21:14	24° 17 16'13		direct	5711 Jun 13 23:11	5° 17 03'11	
max. Earth dist.	5705 Sep 13 13:50	24° 17 15'36	31.00171 AU	evening set	5711 Sep 11 15:39	6° 17 58'13	
morning rise	5705 Sep 29 21:33	24° 17 51'37					
retrograde	5705 Dec 28 00:28	26° 17 46'39		conjunction	5711 Sep 27 22:38	7° 17 34'08	0°20'41
opposition	5706 Mar 15 21:39	25° 17 22'52	0°03'44	minimum elong	5711 Sep 27 22:38	7° 17 34'08	0°20'41
min. Earth dist.	5706 Mar 15 22:06	25° 17 22'50	29.00556 AU	max. Earth dist.	5711 Sep 27 18:14	7° 17 33'44	31.05622 AU
direct	5706 Jun 02 15:21	23° 17 58'13		morning rise	5711 Oct 14 04:21	8° 17 09'59	
evening set	5706 Aug 30 20:56	25° 17 53'06		retrograde	5712 Jan 10 15:44	10° 17 04'13	
				opposition	5712 Mar 28 11:04	8° 17 40'46	0°23'43
conjunction	5706 Sep 16 04:12	26° 17 29'06	0°05'09	min. Earth dist.	5712 Mar 28 15:45	8° 17 40'26	29.06245 AU
minimum elong	5706 Sep 16 04:11	26° 17 29'06	0°05'09	direct	5712 Jun 15 09:24	7° 17 15'58	
behind sun begin	5706 Sep 15 21:47	26° 17 28'32		evening set	5712 Sep 13 05:02	9° 17 11'04	

conjunction	5712 Sep 29 11:48	9° 0 46'57	0°23'44	direct	5719 Jul 01 23:18	22° 0 44'54	
minimum elong	5712 Sep 29 11:48	9° 0 46'57	0°23'45	evening set	5719 Sep 30 02:05	24° 0 40'13	
max. Earth dist.	5712 Sep 29 06:05	9° 0 46'26	31.06880 AU				
morning rise	5712 Oct 15 17:24	10° 0 22'46		conjunction	5719 Oct 16 07:13	25° 0 15'57	0°43'45
retrograde	5713 Jan 12 04:15	12° 0 16'55		minimum elong	5719 Oct 16 07:12	25° 0 15'57	0°43'45
opposition	5713 Mar 30 21:13	10° 0 53'33	0°26'57	max. Earth dist.	5719 Oct 15 18:43	25° 0 14'48	31.14033 AU
min. Earth dist.	5713 Mar 31 01:37	10° 0 53'15	29.07525 AU	morning rise	5719 Nov 01 10:29	25° 0 51'31	
direct	5713 Jun 17 22:22	9° 0 28'47		retrograde	5720 Jan 28 08:42	27° 0 44'52	
evening set	5713 Sep 15 18:23	11° 0 23'57		opposition	5720 Apr 14 21:00	26° 0 21'54	0°48'08
				min. Earth dist.	5720 Apr 15 07:20	26° 0 21'10	29.14413 AU
conjunction	5713 Oct 02 00:59	11° 0 59'50	0°26'44	direct	5720 Jul 03 10:04	24° 0 57'00	
minimum elong	5713 Oct 02 00:59	11° 0 59'50	0°26'45	evening set	5720 Oct 01 15:04	26° 0 52'20	
max. Earth dist.	5713 Oct 01 18:53	11° 0 59'16	31.08158 AU				
morning rise	5713 Oct 18 06:11	12° 0 35'36		conjunction	5720 Oct 17 20:03	27° 0 28'02	0°46'22
retrograde	5714 Jan 14 15:20	14° 0 29'40		minimum elong	5720 Oct 17 20:03	27° 0 28'02	0°46'24
opposition	5714 Apr 02 07:30	13° 0 06'24	0°30'08	max. Earth dist.	5720 Oct 17 07:51	27° 0 26'54	31.14739 AU
min. Earth dist.	5714 Apr 02 13:40	13° 0 05'58	29.08802 AU	morning rise	5720 Nov 02 22:47	28° 0 03'34	
direct	5714 Jun 20 10:13	11° 0 41'40		retrograde	5721 Jan 29 17:33	29° 0 56'48	
evening set	5714 Sep 18 07:44	13° 0 36'53		opposition	5721 Apr 17 07:16	28° 0 33'51	0°50'54
				min. Earth dist.	5721 Apr 17 19:02	28° 0 33'02	29.15126 AU
conjunction	5714 Oct 04 14:09	14° 0 12'44	0°29'42	direct	5721 Jul 05 20:47	27° 0 08'55	
minimum elong	5714 Oct 04 14:09	14° 0 12'44	0°29'44	evening set	5721 Oct 04 03:57	29° 0 04'16	
max. Earth dist.	5714 Oct 04 07:06	14° 0 12'05	31.09411 AU				
morning rise	5714 Oct 20 19:05	14° 0 48'29		conjunction	5721 Oct 20 08:29	29° 0 39'55	0°48'55
retrograde	5715 Jan 17 03:24	16° 0 42'27		minimum elong	5721 Oct 20 08:29	29° 0 39'55	0°48'56
opposition	5715 Apr 04 17:43	15° 0 19'16	0°33'17	max. Earth dist.	5721 Oct 19 19:08	29° 0 38'41	31.15472 AU
min. Earth dist.	5715 Apr 04 23:48	15° 0 18'50	29.10011 AU		5721 Oct 29 09:41	0° 0	
direct	5715 Jun 22 23:29	13° 0 54'32		morning rise	5721 Nov 05 10:56	0° 0 15'25	
evening set	5715 Sep 20 21:06	15° 0 49'48		retrograde	5722 Feb 01 04:37	2° 0 08'33	
				opposition	5722 Apr 19 17:23	0° 0 45'38	0°53'35
conjunction	5715 Oct 07 03:16	16° 0 25'38	0°32'37	min. Earth dist.	5722 Apr 20 04:33	0° 0 44'51	29.15893 AU
minimum elong	5715 Oct 07 03:16	16° 0 25'38	0°32'37		5722 May 18 09:43	30° 0 15'00	
max. Earth dist.	5715 Oct 06 18:46	16° 0 24'51	31.10561 AU	direct	5722 Jul 08 09:39	29° 0 20'40	
morning rise	5715 Oct 23 07:54	17° 0 01'21			5722 Aug 27 08:54	0° 0	
retrograde	5716 Jan 19 15:00	18° 0 55'12		evening set	5722 Oct 06 16:43	1° 0 16'03	
opposition	5716 Apr 06 04:07	17° 0 32'05	0°36'22				
min. Earth dist.	5716 Apr 06 11:53	17° 0 31'33	29.11111 AU	conjunction	5722 Oct 22 20:59	1° 0 51'40	0°51'24
direct	5716 Jun 24 10:35	16° 0 07'21		minimum elong	5722 Oct 22 20:58	1° 0 51'40	0°51'26
evening set	5716 Sep 22 10:28	18° 0 02'39		max. Earth dist.	5722 Oct 22 07:39	1° 0 50'26	31.16272 AU
				morning rise	5722 Nov 07 22:54	2° 0 27'07	
conjunction	5716 Oct 08 16:31	18° 0 38'27	0°35'29	retrograde	5723 Feb 03 14:43	4° 0 20'10	
minimum elong	5716 Oct 08 16:31	18° 0 38'27	0°35'30	opposition	5723 Apr 22 03:37	2° 0 57'17	0°56'12
max. Earth dist.	5716 Oct 08 07:41	18° 0 37'39	31.11593 AU	min. Earth dist.	5723 Apr 22 16:02	2° 0 56'25	29.16755 AU
morning rise	5716 Oct 24 20:44	19° 0 14'08		direct	5723 Jul 10 20:58	1° 0 32'20	
retrograde	5717 Jan 21 02:23	21° 0 07'52		evening set	5723 Oct 09 05:22	3° 0 27'44	
opposition	5717 Apr 08 14:20	19° 0 44'48	0°39'25				
min. Earth dist.	5717 Apr 08 22:38	19° 0 44'13	29.12072 AU	conjunction	5723 Oct 25 09:19	4° 0 03'20	0°53'48
direct	5717 Jun 27 00:02	18° 0 20'03		minimum elong	5723 Oct 25 09:19	4° 0 03'20	0°53'49
evening set	5717 Sep 24 23:55	20° 0 15'22		max. Earth dist.	5723 Oct 24 19:35	4° 0 02'04	31.17191 AU
				morning rise	5723 Nov 10 10:53	4° 0 38'45	
conjunction	5717 Oct 11 05:34	20° 0 51'09	0°38'18	retrograde	5724 Feb 06 02:00	6° 0 31'43	
minimum elong	5717 Oct 11 05:33	20° 0 51'09	0°38'18	opposition	5724 Apr 23 13:45	5° 0 08'55	0°58'43
max. Earth dist.	5717 Oct 10 18:45	20° 0 50'09	31.12494 AU	min. Earth dist.	5724 Apr 24 01:34	5° 0 08'06	29.17716 AU
morning rise	5717 Oct 27 09:32	21° 0 26'47		direct	5724 Jul 12 09:53	3° 0 43'58	
retrograde	5718 Jan 23 13:00	23° 0 20'24		evening set	5724 Oct 10 18:08	5° 0 39'27	
opposition	5718 Apr 11 00:40	21° 0 57'22	0°42'23				
min. Earth dist.	5718 Apr 11 09:53	21° 0 56'43	29.12929 AU	conjunction	5724 Oct 26 21:40	6° 0 15'01	0°56'08
direct	5718 Jun 29 10:53	20° 0 32'34		minimum elong	5724 Oct 26 21:40	6° 0 15'01	0°56'09
evening set	5718 Sep 27 12:53	22° 0 27'54		max. Earth dist.	5724 Oct 26 07:08	6° 0 13'40	31.18193 AU
				morning rise	5724 Nov 11 22:48	6° 0 50'24	
conjunction	5718 Oct 13 18:27	23° 0 03'39	0°41'03	retrograde	5725 Feb 07 13:24	8° 0 43'18	
minimum elong	5718 Oct 13 18:27	23° 0 03'39	0°41'05	opposition	5725 Apr 25 23:57	7° 0 20'35	1°01'09
max. Earth dist.	5718 Oct 13 07:53	23° 0 02'40	31.13297 AU	min. Earth dist.	5725 Apr 26 12:53	7° 0 19'41	29.18763 AU
morning rise	5718 Oct 29 21:55	23° 0 39'15		direct	5725 Jul 14 20:47	5° 0 55'41	
retrograde	5719 Jan 25 21:43	25° 0 32'44		evening set	5725 Oct 13 06:45	7° 0 51'13	
opposition	5719 Apr 13 10:58	24° 0 09'44	0°45'18				
min. Earth dist.	5719 Apr 13 21:09	24° 0 09'01	29.13689 AU	conjunction	5725 Oct 29 10:01	8° 0 26'46	0°58'22

minimum elong	5725 Oct 29 10:01	8° \mathcal{M} 26'46	0°58'23	morning rise	5731 Nov 28 08:25	22° \mathcal{M} 12'45	
max. Earth dist.	5725 Oct 28 19:47	8° \mathcal{M} 25'27	31.19260 AU	retrograde	5732 Feb 23 11:36	24° \mathcal{M} 05'12	
morning rise	5725 Nov 14 10:38	9° \mathcal{M} 02'07		opposition	5732 May 11 00:30	22° \mathcal{M} 42'51	1°15'31
retrograde	5726 Feb 10 00:52	10° \mathcal{M} 54'58		min. Earth dist.	5732 May 11 17:57	22° \mathcal{M} 41'39	29.24284 AU
opposition	5726 Apr 28 10:14	9° \mathcal{M} 32'21	1°03'30	direct	5732 Jul 30 05:35	21° \mathcal{M} 17'58	
min. Earth dist.	5726 Apr 28 23:19	9° \mathcal{M} 31'26	29.19827 AU	evening set	5732 Oct 28 21:59	23° \mathcal{M} 13'38	
direct	5726 Jul 17 10:07	8° \mathcal{M} 07'30					
evening set	5726 Oct 15 19:20	10° \mathcal{M} 03'05		conjunction	5732 Nov 13 22:20	23° \mathcal{M} 48'58	1°11'29
				minimum elong	5732 Nov 13 22:20	23° \mathcal{M} 48'58	1°11'30
conjunction	5726 Oct 31 22:04	10° \mathcal{M} 38'36	1°00'31	max. Earth dist.	5732 Nov 13 03:18	23° \mathcal{M} 47'12	31.24439 AU
minimum elong	5726 Oct 31 22:03	10° \mathcal{M} 38'36	1°00'33	morning rise	5732 Nov 29 19:44	24° \mathcal{M} 24'04	
max. Earth dist.	5726 Oct 31 06:22	10° \mathcal{M} 37'09	31.20309 AU	retrograde	5733 Feb 24 22:00	26° \mathcal{M} 16'26	
morning rise	5726 Nov 16 22:21	11° \mathcal{M} 13'55		opposition	5733 May 13 10:48	24° \mathcal{M} 54'05	1°17'09
retrograde	5727 Feb 12 11:34	13° \mathcal{M} 06'44		min. Earth dist.	5733 May 14 03:45	24° \mathcal{M} 52'54	29.24708 AU
opposition	5727 Apr 30 20:32	11° \mathcal{M} 44'12	1°05'46	direct	5733 Aug 01 18:28	23° \mathcal{M} 29'08	
min. Earth dist.	5727 May 01 10:16	11° \mathcal{M} 43'15	29.20859 AU	evening set	5733 Oct 31 10:04	25° \mathcal{M} 24'48	
direct	5727 Jul 19 20:49	10° \mathcal{M} 19'23					
evening set	5727 Oct 18 07:54	12° \mathcal{M} 15'01		conjunction	5733 Nov 16 09:55	26° \mathcal{M} 00'05	1°12'57
				minimum elong	5733 Nov 16 09:55	26° \mathcal{M} 00'05	1°12'58
conjunction	5727 Nov 03 10:25	12° \mathcal{M} 50'31	1°02'35	max. Earth dist.	5733 Nov 15 14:13	25° \mathcal{M} 58'16	31.24860 AU
minimum elong	5727 Nov 03 10:25	12° \mathcal{M} 50'31	1°02'36	morning rise	5733 Dec 02 06:51	26° \mathcal{M} 35'09	
max. Earth dist.	5727 Nov 02 19:04	12° \mathcal{M} 49'06	31.21288 AU	retrograde	5734 Feb 27 08:52	28° \mathcal{M} 27'26	
morning rise	5727 Nov 19 10:05	13° \mathcal{M} 25'48		opposition	5734 May 15 21:16	27° \mathcal{M} 05'04	1°18'40
	5728 Jan 12 17:29	15° \mathcal{M}		min. Earth dist.	5734 May 16 15:01	27° \mathcal{M} 03'51	29.25160 AU
retrograde	5728 Feb 14 20:26	15° \mathcal{M} 18'33		direct	5734 Aug 04 06:08	25° \mathcal{M} 40'06	
	5728 Mar 19 12:22	15° \mathcal{R} \mathcal{M}		evening set	5734 Nov 02 21:47	27° \mathcal{M} 35'45	
opposition	5728 May 02 06:51	13° \mathcal{M} 56'06	1°07'55				
min. Earth dist.	5728 May 02 21:37	13° \mathcal{M} 55'04	29.21781 AU	conjunction	5734 Nov 18 21:18	28° \mathcal{M} 11'00	1°14'19
direct	5728 Jul 21 09:01	12° \mathcal{M} 31'18		minimum elong	5734 Nov 18 21:18	28° \mathcal{M} 11'00	1°14'21
evening set	5728 Oct 19 20:38	14° \mathcal{M} 26'58		max. Earth dist.	5734 Nov 18 02:19	28° \mathcal{M} 09'14	31.25338 AU
	5728 Nov 03 20:18	15° \mathcal{M}		morning rise	5734 Dec 04 17:42	28° \mathcal{M} 46'00	
					5735 Jan 12 16:45	0° \mathcal{Z}	
conjunction	5728 Nov 04 22:34	15° \mathcal{M} 02'26	1°04'34	retrograde	5735 Mar 01 19:13	0° \mathcal{Z} 38'14	
minimum elong	5728 Nov 04 22:34	15° \mathcal{M} 02'26	1°04'35		5735 Apr 20 07:48	30° \mathcal{R} \mathcal{M}	
max. Earth dist.	5728 Nov 04 05:17	15° \mathcal{M} 00'50	31.22150 AU	opposition	5735 May 18 07:41	29° \mathcal{M} 15'52	1°20'04
morning rise	5728 Nov 20 21:56	15° \mathcal{M} 37'41		min. Earth dist.	5735 May 19 01:13	29° \mathcal{M} 14'39	29.25671 AU
retrograde	5729 Feb 16 07:43	17° \mathcal{M} 30'22		direct	5735 Aug 06 20:06	27° \mathcal{M} 50'53	
opposition	5729 May 04 17:13	16° \mathcal{M} 07'58	1°09'58	evening set	5735 Nov 05 09:43	29° \mathcal{M} 46'31	
min. Earth dist.	5729 May 05 08:02	16° \mathcal{M} 06'57	29.22586 AU		5735 Nov 11 13:45	0° \mathcal{Z}	
	5729 Jun 21 01:13	15° \mathcal{R} \mathcal{M}					
direct	5729 Jul 23 19:32	14° \mathcal{M} 43'10		conjunction	5735 Nov 21 08:39	0° \mathcal{Z} 21'44	1°15'35
	5729 Aug 25 03:38	15° \mathcal{M}		minimum elong	5735 Nov 21 08:39	0° \mathcal{Z} 21'44	1°15'36
evening set	5729 Oct 22 09:01	16° \mathcal{M} 38'51		max. Earth dist.	5735 Nov 20 12:41	0° \mathcal{Z} 19'53	31.25898 AU
				morning rise	5735 Dec 07 04:40	0° \mathcal{Z} 56'43	
conjunction	5729 Nov 07 10:40	17° \mathcal{M} 14'18	1°06'26	retrograde	5736 Mar 03 05:35	2° \mathcal{Z} 48'52	
minimum elong	5729 Nov 07 10:40	17° \mathcal{M} 14'18	1°06'27	opposition	5736 May 19 17:59	1° \mathcal{Z} 26'33	1°21'22
max. Earth dist.	5729 Nov 06 17:39	17° \mathcal{M} 12'43	31.22876 AU	min. Earth dist.	5736 May 20 11:28	1° \mathcal{Z} 25'20	29.26296 AU
morning rise	5729 Nov 23 09:23	17° \mathcal{M} 49'30		direct	5736 Aug 08 06:54	0° \mathcal{Z} 01'33	
retrograde	5730 Feb 18 16:09	19° \mathcal{M} 42'08		evening set	5736 Nov 06 21:27	1° \mathcal{Z} 57'13	
opposition	5730 May 07 03:46	18° \mathcal{M} 19'46	1°11'55				
min. Earth dist.	5730 May 07 20:06	18° \mathcal{M} 18'38	29.23252 AU	conjunction	5736 Nov 22 20:06	2° \mathcal{Z} 32'24	1°16'44
direct	5730 Jul 26 06:09	16° \mathcal{M} 54'57		minimum elong	5736 Nov 22 20:06	2° \mathcal{Z} 32'24	1°16'46
evening set	5730 Oct 24 21:30	18° \mathcal{M} 50'38		max. Earth dist.	5736 Nov 22 01:13	2° \mathcal{Z} 30'39	31.26571 AU
				morning rise	5736 Dec 08 15:29	3° \mathcal{Z} 07'20	
conjunction	5730 Nov 09 22:38	19° \mathcal{M} 26'02	1°08'13	retrograde	5737 Mar 05 14:35	4° \mathcal{Z} 59'28	
minimum elong	5730 Nov 09 22:37	19° \mathcal{M} 26'02	1°08'15	opposition	5737 May 22 04:33	3° \mathcal{Z} 37'11	1°22'32
max. Earth dist.	5730 Nov 09 04:15	19° \mathcal{M} 24'20	31.23489 AU	min. Earth dist.	5737 May 22 22:26	3° \mathcal{Z} 35'57	29.27011 AU
morning rise	5730 Nov 25 21:01	20° \mathcal{M} 01'13		direct	5737 Aug 10 19:28	2° \mathcal{Z} 12'15	
retrograde	5731 Feb 21 02:14	21° \mathcal{M} 53'45		evening set	5737 Nov 09 09:08	4° \mathcal{Z} 07'55	
opposition	5731 May 09 14:01	20° \mathcal{M} 31'24	1°13'46	max. Earth dist.	5737 Nov 24 11:10	4° \mathcal{Z} 41'13	31.27331 AU
min. Earth dist.	5731 May 10 06:00	20° \mathcal{M} 30'18	29.23812 AU				
direct	5731 Jul 28 18:48	19° \mathcal{M} 06'33		conjunction	5737 Nov 25 07:08	4° \mathcal{Z} 43'04	1°17'47
evening set	5731 Oct 27 09:46	21° \mathcal{M} 02'14		minimum elong	5737 Nov 25 07:08	4° \mathcal{Z} 43'04	1°17'48
				morning rise	5737 Dec 11 02:13	5° \mathcal{Z} 17'59	
conjunction	5731 Nov 12 10:34	21° \mathcal{M} 37'37	1°09'54	retrograde	5738 Mar 08 01:52	7° \mathcal{Z} 10'05	
minimum elong	5731 Nov 12 10:34	21° \mathcal{M} 37'37	1°09'55	opposition	5738 May 24 15:02	5° \mathcal{Z} 47'53	1°23'35
max. Earth dist.	5731 Nov 11 16:00	21° \mathcal{M} 35'53	31.23993 AU	min. Earth dist.	5738 May 25 08:17	5° \mathcal{Z} 46'41	29.27797 AU

direct	5738 Aug 13 06:15	4°♊22'59		retrograde	5745 Mar 23 01:21	22°♊26'01	
evening set	5738 Nov 11 20:44	6°♊18'41		opposition	5745 Jun 08 18:23	21°♊04'03	1°27'32
				min. Earth dist.	5745 Jun 09 14:04	21°♊02'42	29.31095 AU
conjunction	5738 Nov 27 18:26	6°♊53'49	1°18'43	direct	5745 Aug 28 14:45	19°♊39'18	
minimum elong	5738 Nov 27 18:26	6°♊53'49	1°18'45	evening set	5745 Nov 27 04:50	21°♊35'02	
max. Earth dist.	5738 Nov 26 23:16	6°♊52'02	31.28116 AU				
morning rise	5738 Dec 13 12:53	7°♊28'42		conjunction	5745 Dec 12 23:26	22°♊09'58	1°22'00
retrograde	5739 Mar 10 10:24	9°♊20'48		minimum elong	5745 Dec 12 23:26	22°♊09'58	1°22'01
opposition	5739 May 27 01:35	7°♊58'40	1°24'31	max. Earth dist.	5745 Dec 12 02:40	22°♊08'02	31.31064 AU
min. Earth dist.	5739 May 27 20:07	7°♊57'23	29.28577 AU	morning rise	5745 Dec 28 14:44	22°♊44'38	
direct	5739 Aug 15 16:47	6°♊33'49		retrograde	5746 Mar 25 10:21	24°♊36'40	
evening set	5739 Nov 14 08:27	8°♊29'33		opposition	5746 Jun 11 05:22	23°♊14'42	1°27'36
max. Earth dist.	5739 Nov 29 09:30	9°♊02'47	31.28874 AU	min. Earth dist.	5746 Jun 12 01:27	23°♊13'19	29.31195 AU
				direct	5746 Aug 31 04:15	21°♊49'56	
conjunction	5739 Nov 30 05:37	9°♊04'39	1°19'32	evening set	5746 Nov 29 15:55	23°♊45'39	
minimum elong	5739 Nov 30 05:37	9°♊04'39	1°19'33				
morning rise	5739 Dec 15 23:45	9°♊39'30		conjunction	5746 Dec 15 09:55	24°♊20'33	1°22'00
retrograde	5740 Mar 11 20:42	11°♊31'36		minimum elong	5746 Dec 15 09:55	24°♊20'33	1°22'02
opposition	5740 May 28 12:12	10°♊09'32	1°25'20	max. Earth dist.	5746 Dec 14 12:15	24°♊18'32	31.31175 AU
min. Earth dist.	5740 May 29 06:05	10°♊08'18	29.29292 AU	morning rise	5746 Dec 31 00:59	24°♊55'11	
direct	5740 Aug 17 04:30	8°♊44'43		retrograde	5747 Mar 27 21:41	26°♊47'12	
evening set	5740 Nov 15 20:06	10°♊40'29		opposition	5747 Jun 13 16:06	25°♊25'13	1°27'33
				min. Earth dist.	5747 Jun 14 11:16	25°♊23'54	29.31330 AU
conjunction	5740 Dec 01 16:50	11°♊15'34	1°20'14	direct	5747 Sep 02 16:00	24°♊00'26	
minimum elong	5740 Dec 01 16:50	11°♊15'34	1°20'15	evening set	5747 Dec 02 02:50	25°♊56'08	
max. Earth dist.	5740 Nov 30 20:42	11°♊13'42	31.29529 AU				
morning rise	5740 Dec 17 10:22	11°♊50'23		conjunction	5747 Dec 17 20:32	26°♊31'00	1°21'54
retrograde	5741 Mar 14 06:21	13°♊42'29		minimum elong	5747 Dec 17 20:32	26°♊31'00	1°21'55
opposition	5741 May 30 23:03	12°♊20'28	1°26'01	max. Earth dist.	5747 Dec 16 24:00	26°♊29'05	31.31334 AU
min. Earth dist.	5741 May 31 18:14	12°♊19'09	29.29901 AU	morning rise	5748 Jan 02 11:01	27°♊05'37	
direct	5741 Aug 19 14:20	10°♊55'42		retrograde	5748 Mar 29 05:42	28°♊57'38	
evening set	5741 Nov 18 07:41	12°♊51'29		opposition	5748 Jun 15 03:12	27°♊35'39	1°27'23
max. Earth dist.	5741 Dec 03 07:30	13°♊24'37	31.30079 AU	min. Earth dist.	5748 Jun 15 23:02	27°♊34'17	29.31531 AU
				direct	5748 Sep 04 03:22	26°♊10'54	
conjunction	5741 Dec 04 03:57	13°♊26'31	1°20'49	evening set	5748 Dec 03 13:43	28°♊06'34	
minimum elong	5741 Dec 04 03:57	13°♊26'31	1°20'50	max. Earth dist.	5748 Dec 18 10:08	28°♊39'28	31.31588 AU
morning rise	5741 Dec 19 21:04	14°♊01'19					
retrograde	5742 Mar 16 16:55	15°♊53'25		conjunction	5748 Dec 19 06:52	28°♊41'24	1°21'40
opposition	5742 Jun 02 09:50	14°♊31'26	1°26'35	minimum elong	5748 Dec 19 06:52	28°♊41'24	1°21'42
min. Earth dist.	5742 Jun 03 04:29	14°♊30'09	29.30380 AU	morning rise	5749 Jan 03 21:03	29°♊16'00	
direct	5742 Aug 22 02:36	13°♊06'41			5749 Jan 25 06:05	0°♊	
evening set	5742 Nov 20 19:07	15°♊02'28		retrograde	5749 Mar 31 15:05	1°♊08'01	
					5749 Jun 09 01:43	30°♊♊	
conjunction	5742 Dec 06 14:54	15°♊37'29	1°21'17	opposition	5749 Jun 17 14:10	29°♊46'04	1°27'04
minimum elong	5742 Dec 06 14:54	15°♊37'29	1°21'19	min. Earth dist.	5749 Jun 18 08:38	29°♊44'48	29.31825 AU
max. Earth dist.	5742 Dec 05 17:38	15°♊35'30	31.30488 AU	direct	5749 Sep 06 14:48	28°♊21'20	
morning rise	5742 Dec 22 07:37	16°♊12'15			5749 Nov 28 01:48	0°♊	
retrograde	5743 Mar 19 04:12	18°♊04'21		evening set	5749 Dec 06 00:29	0°♊17'00	
opposition	5743 Jun 04 20:42	16°♊42'23	1°27'01				
min. Earth dist.	5743 Jun 05 16:17	16°♊41'02	29.30732 AU	conjunction	5749 Dec 21 17:17	0°♊51'50	1°21'20
direct	5743 Aug 24 13:57	15°♊17'39		minimum elong	5749 Dec 21 17:17	0°♊51'50	1°21'21
evening set	5743 Nov 23 06:29	17°♊13'25		max. Earth dist.	5749 Dec 20 21:10	0°♊49'57	31.31920 AU
max. Earth dist.	5743 Dec 08 05:09	17°♊46'29	31.30775 AU	morning rise	5750 Jan 06 07:00	1°♊26'24	
				retrograde	5750 Apr 03 00:37	3°♊18'27	
conjunction	5743 Dec 09 01:57	17°♊48'25	1°21'38	opposition	5750 Jun 20 01:18	1°♊56'32	1°26'38
minimum elong	5743 Dec 09 01:57	17°♊48'25	1°21'39	min. Earth dist.	5750 Jun 20 20:26	1°♊55'13	29.32195 AU
morning rise	5743 Dec 24 18:08	18°♊23'09		direct	5750 Sep 08 23:45	0°♊31'52	
retrograde	5744 Mar 20 14:40	20°♊15'13		evening set	5750 Dec 08 11:08	2°♊27'31	
opposition	5744 Jun 06 07:28	18°♊53'16	1°27'21	max. Earth dist.	5750 Dec 23 07:51	3°♊00'29	31.32312 AU
min. Earth dist.	5744 Jun 07 03:10	18°♊51'55	29.30950 AU				
direct	5744 Aug 26 03:49	17°♊28'31		conjunction	5750 Dec 24 03:33	3°♊02'19	1°20'52
evening set	5744 Nov 24 17:54	19°♊24'18		minimum elong	5750 Dec 24 03:33	3°♊02'19	1°20'54
				morning rise	5751 Jan 08 16:57	3°♊36'53	
conjunction	5744 Dec 10 12:46	19°♊59'15	1°21'53	retrograde	5751 Apr 05 10:48	5°♊28'58	
minimum elong	5744 Dec 10 12:46	19°♊59'15	1°21'55	opposition	5751 Jun 22 12:23	4°♊07'05	1°26'05
max. Earth dist.	5744 Dec 09 14:51	19°♊57'13	31.30949 AU	min. Earth dist.	5751 Jun 23 06:35	4°♊05'51	29.32571 AU
morning rise	5744 Dec 26 04:38	20°♊33'57		direct	5751 Sep 11 11:41	2°♊42'28	

evening set	5751 Dec 10 21:57	4°38'08		opposition	5758 Jul 07 20:29	19°21'47	1°18'48
				min. Earth dist.	5758 Jul 08 14:23	19°20'34	29.32259 AU
conjunction	5751 Dec 26 13:52	5°312'55	1°20'17	direct	5758 Sep 26 23:34	17°357'17	
minimum elong	5751 Dec 26 13:52	5°312'55	1°20'18	evening set	5758 Dec 25 23:48	19°352'43	
max. Earth dist.	5751 Dec 25 17:43	5°311'02	31.32670 AU				
morning rise	5752 Jan 11 02:55	5°347'27		conjunction	5759 Jan 10 13:12	20°327'22	1°13'04
retrograde	5752 Apr 06 22:02	7°339'36		minimum elong	5759 Jan 10 13:12	20°327'22	1°13'06
opposition	5752 Jun 23 23:36	6°317'44	1°25'24	max. Earth dist.	5759 Jan 09 18:06	20°325'35	31.31967 AU
min. Earth dist.	5752 Jun 24 18:20	6°316'28	29.32909 AU	morning rise	5759 Jan 25 23:58	21°301'47	
direct	5752 Sep 12 22:11	4°353'10		retrograde	5759 Apr 22 21:36	22°354'09	
evening set	5752 Dec 12 08:39	6°348'50		opposition	5759 Jul 10 08:08	21°332'09	1°17'18
max. Earth dist.	5752 Dec 27 05:03	7°321'48	31.32966 AU	min. Earth dist.	5759 Jul 11 02:34	21°330'54	29.31816 AU
				direct	5759 Sep 29 09:28	20°307'38	
conjunction	5752 Dec 28 00:17	7°323'36	1°19'35	evening set	5759 Dec 28 09:58	22°303'02	
minimum elong	5752 Dec 28 00:17	7°323'36	1°19'37				
morning rise	5753 Jan 12 12:52	7°358'07		conjunction	5760 Jan 12 23:02	22°337'39	1°11'37
retrograde	5753 Apr 09 08:30	9°350'18		minimum elong	5760 Jan 12 23:02	22°337'39	1°11'38
opposition	5753 Jun 26 11:02	8°328'28	1°24'36	max. Earth dist.	5760 Jan 12 04:44	22°335'56	31.31539 AU
min. Earth dist.	5753 Jun 27 05:37	8°327'12	29.33143 AU	morning rise	5760 Jan 28 09:31	23°312'04	
direct	5753 Sep 15 10:53	7°303'56		retrograde	5760 Apr 24 07:13	25°304'28	
evening set	5753 Dec 14 19:20	8°359'35		opposition	5760 Jul 11 19:41	23°342'26	1°15'42
				min. Earth dist.	5760 Jul 12 12:44	23°341'16	29.31404 AU
conjunction	5753 Dec 30 10:25	9°334'19	1°18'46	direct	5760 Sep 30 21:46	22°317'56	
minimum elong	5753 Dec 30 10:25	9°334'19	1°18'47	evening set	5760 Dec 29 20:08	24°313'17	
max. Earth dist.	5753 Dec 29 14:15	9°332'26	31.33142 AU				
morning rise	5754 Jan 14 22:47	10°308'50		conjunction	5761 Jan 14 08:46	24°347'53	1°10'04
retrograde	5754 Apr 11 20:01	12°301'03		minimum elong	5761 Jan 14 08:46	24°347'53	1°10'05
opposition	5754 Jun 28 22:27	10°339'13	1°23'40	max. Earth dist.	5761 Jan 13 14:28	24°346'10	31.31169 AU
min. Earth dist.	5754 Jun 29 16:52	10°337'58	29.33257 AU	morning rise	5761 Jan 29 19:02	25°322'18	
direct	5754 Sep 17 21:29	9°314'44		retrograde	5761 Apr 26 18:23	27°314'46	
evening set	5754 Dec 17 05:57	11°310'21		opposition	5761 Jul 14 07:26	25°352'42	1°13'59
				min. Earth dist.	5761 Jul 15 00:14	25°351'34	29.31087 AU
conjunction	5755 Jan 01 20:50	11°345'04	1°17'51	direct	5761 Oct 03 07:37	24°328'15	
minimum elong	5755 Jan 01 20:50	11°345'04	1°17'53	evening set	5762 Jan 01 05:57	26°323'34	
max. Earth dist.	5755 Jan 01 01:40	11°343'17	31.33176 AU				
morning rise	5755 Jan 17 08:42	12°319'33		conjunction	5762 Jan 16 18:25	26°358'10	1°08'24
retrograde	5755 Apr 14 05:57	14°311'48		minimum elong	5762 Jan 16 18:25	26°358'10	1°08'26
opposition	5755 Jul 01 09:53	12°349'58	1°22'37	max. Earth dist.	5762 Jan 16 01:47	26°356'36	31.30899 AU
min. Earth dist.	5755 Jul 02 04:54	12°348'41	29.33208 AU	morning rise	5762 Feb 01 04:22	27°332'33	
direct	5755 Sep 20 11:08	11°325'30		retrograde	5762 Apr 29 04:40	29°325'07	
evening set	5755 Dec 19 16:44	13°321'06		opposition	5762 Jul 16 19:10	28°303'03	1°12'10
max. Earth dist.	5756 Jan 03 10:48	13°353'54	31.33057 AU	min. Earth dist.	5762 Jul 17 11:15	28°301'58	29.30841 AU
				direct	5762 Oct 05 19:25	26°338'39	
conjunction	5756 Jan 04 07:04	13°355'47	1°16'49	evening set	5763 Jan 03 16:03	28°333'58	
minimum elong	5756 Jan 04 07:04	13°355'47	1°16'50	max. Earth dist.	5763 Jan 18 11:03	29°306'57	31.30693 AU
morning rise	5756 Jan 19 18:47	14°330'15					
retrograde	5756 Apr 15 17:53	16°322'32		conjunction	5763 Jan 19 04:04	29°308'33	1°06'39
opposition	5756 Jul 02 21:22	15°300'41	1°21'28	minimum elong	5763 Jan 19 04:04	29°308'33	1°06'41
min. Earth dist.	5756 Jul 03 15:34	14°359'26	29.33011 AU	morning rise	5763 Feb 03 13:57	29°342'57	
direct	5756 Sep 21 23:28	13°336'12			5763 Feb 11 11:45	0°≈	
evening set	5756 Dec 21 03:09	15°331'45		retrograde	5763 May 01 16:33	1°≈35'36	
				opposition	5763 Jul 19 06:46	0°≈13'33	1°10'14
conjunction	5757 Jan 05 17:15	16°306'26	1°15'40	min. Earth dist.	5763 Jul 19 22:06	0°≈12'30	29.30656 AU
minimum elong	5757 Jan 05 17:16	16°306'26	1°15'42		5763 Jul 27 15:00	30°R3	
max. Earth dist.	5757 Jan 04 21:52	16°304'37	31.32784 AU	direct	5763 Oct 08 05:13	28°349'12	
morning rise	5757 Jan 21 04:30	16°340'53			5763 Dec 15 13:11	0°≈	
retrograde	5757 Apr 18 02:27	18°333'11		evening set	5764 Jan 06 02:00	0°≈44'31	
opposition	5757 Jul 05 09:04	17°311'18	1°20'11				
min. Earth dist.	5757 Jul 06 04:11	17°309'59	29.32676 AU	conjunction	5764 Jan 21 13:54	1°≈19'05	1°04'48
direct	5757 Sep 24 11:27	15°346'49		minimum elong	5764 Jan 21 13:54	1°≈19'05	1°04'49
evening set	5757 Dec 23 13:37	17°342'18		max. Earth dist.	5764 Jan 20 22:28	1°≈17'39	31.30511 AU
max. Earth dist.	5758 Jan 07 07:40	18°315'08	31.32410 AU	morning rise	5764 Feb 05 23:23	1°≈53'29	
				retrograde	5764 May 03 03:21	3°≈46'15	
conjunction	5758 Jan 08 03:17	18°316'58	1°14'25	opposition	5764 Jul 20 18:45	2°≈24'12	1°08'12
minimum elong	5758 Jan 08 03:17	18°316'58	1°14'27	min. Earth dist.	5764 Jul 21 10:10	2°≈23'09	29.30460 AU
morning rise	5758 Jan 23 14:22	18°351'24		direct	5764 Oct 09 18:33	0°≈59'56	
retrograde	5758 Apr 20 12:09	20°343'43		evening set	5765 Jan 07 12:01	2°≈55'14	

conjunction	5765 Jan 22 23:26	3° \approx 29'48	1°02'51	retrograde	5771 May 19 04:16	19° \approx 03'14	
minimum elong	5765 Jan 22 23:26	3° \approx 29'48	1°02'52	opposition	5771 Aug 06 07:39	17° \approx 40'53	0°51'26
max. Earth dist.	5765 Jan 22 07:34	3° \approx 28'19	31.30306 AU	min. Earth dist.	5771 Aug 06 20:07	17° \approx 40'03	29.26379 AU
morning rise	5765 Feb 07 08:52	4° \approx 04'11		direct	5771 Oct 26 03:45	16° \approx 16'44	
retrograde	5765 May 05 16:14	5° \approx 57'04		evening set	5772 Jan 23 09:26	18° \approx 11'40	
opposition	5765 Jul 23 06:42	4° \approx 35'01	1°06'04				
min. Earth dist.	5765 Jul 23 20:51	4° \approx 34'03	29.30224 AU	conjunction	5772 Feb 07 19:11	18° \approx 46'11	0°46'53
direct	5765 Oct 12 06:31	3° \approx 10'48		minimum elong	5772 Feb 07 19:11	18° \approx 46'11	0°46'53
evening set	5766 Jan 09 21:59	5° \approx 06'06		max. Earth dist.	5772 Feb 07 06:16	18° \approx 44'58	31.25917 AU
				morning rise	5772 Feb 23 03:36	19° \approx 20'35	
conjunction	5766 Jan 25 09:15	5° \approx 40'40	1°00'49	retrograde	5772 May 20 16:17	21° \approx 14'00	
minimum elong	5766 Jan 25 09:15	5° \approx 40'40	1°00'50	opposition	5772 Aug 07 19:57	19° \approx 51'34	0°48'43
max. Earth dist.	5766 Jan 24 18:27	5° \approx 39'16	31.30024 AU	min. Earth dist.	5772 Aug 08 07:19	19° \approx 50'48	29.25523 AU
morning rise	5766 Feb 09 18:21	6° \approx 15'03		direct	5772 Oct 27 14:15	18° \approx 27'24	
retrograde	5766 May 08 01:34	8° \approx 08'01		evening set	5773 Jan 24 18:55	20° \approx 22'16	
opposition	5766 Jul 25 18:45	6° \approx 45'58	1°03'51				
min. Earth dist.	5766 Jul 26 09:39	6° \approx 44'58	29.29895 AU	conjunction	5773 Feb 09 04:37	20° \approx 56'46	0°44'18
direct	5766 Oct 14 18:04	5° \approx 21'49		minimum elong	5773 Feb 09 04:37	20° \approx 56'46	0°44'20
evening set	5767 Jan 12 08:01	7° \approx 17'05		max. Earth dist.	5773 Feb 08 17:40	20° \approx 55'44	31.25091 AU
				morning rise	5773 Feb 24 12:46	21° \approx 31'10	
conjunction	5767 Jan 27 18:58	7° \approx 51'38	0°58'41	retrograde	5773 May 23 02:55	23° \approx 24'41	
minimum elong	5767 Jan 27 18:58	7° \approx 51'38	0°58'42	opposition	5773 Aug 10 08:21	22° \approx 02'10	0°45'56
max. Earth dist.	5767 Jan 27 04:08	7° \approx 50'14	31.29645 AU	min. Earth dist.	5773 Aug 10 19:18	22° \approx 01'25	29.24740 AU
morning rise	5767 Feb 12 04:00	8° \approx 26'02		direct	5773 Oct 30 02:58	20° \approx 38'01	
retrograde	5767 May 10 12:01	10° \approx 19'05		evening set	5774 Jan 27 04:37	22° \approx 32'49	
opposition	5767 Jul 28 06:48	8° \approx 57'01	1°01'31				
min. Earth dist.	5767 Jul 28 20:24	8° \approx 56'06	29.29439 AU	conjunction	5774 Feb 11 14:00	23° \approx 07'19	0°41'40
direct	5767 Oct 17 06:42	7° \approx 32'53		minimum elong	5774 Feb 11 14:00	23° \approx 07'19	0°41'41
evening set	5768 Jan 14 18:02	9° \approx 28'07		max. Earth dist.	5774 Feb 11 03:06	23° \approx 06'18	31.24373 AU
				morning rise	5774 Feb 26 22:14	23° \approx 41'43	
conjunction	5768 Jan 30 04:44	10° \approx 02'40	0°56'28	retrograde	5774 May 25 15:35	25° \approx 35'20	
minimum elong	5768 Jan 30 04:44	10° \approx 02'40	0°56'29	opposition	5774 Aug 12 20:27	24° \approx 12'46	0°43'05
max. Earth dist.	5768 Jan 29 14:09	10° \approx 01'18	31.29114 AU	min. Earth dist.	5774 Aug 13 05:36	24° \approx 12'09	29.24074 AU
morning rise	5768 Feb 14 13:32	10° \approx 37'04		direct	5774 Nov 01 14:12	22° \approx 48'39	
retrograde	5768 May 11 22:26	12° \approx 30'12		evening set	5775 Jan 29 14:11	24° \approx 43'26	
opposition	5768 Jul 29 19:04	11° \approx 08'06	0°59'07				
min. Earth dist.	5768 Jul 30 09:18	11° \approx 07'08	29.28843 AU	conjunction	5775 Feb 13 23:31	25° \approx 17'56	0°38'58
direct	5768 Oct 18 17:20	9° \approx 43'59		minimum elong	5775 Feb 13 23:32	25° \approx 17'56	0°39'00
evening set	5769 Jan 16 04:00	11° \approx 39'09		max. Earth dist.	5775 Feb 13 14:04	25° \approx 17'03	31.23751 AU
				morning rise	5775 Mar 01 07:35	25° \approx 52'21	
conjunction	5769 Jan 31 14:30	12° \approx 13'42	0°54'11	retrograde	5775 May 28 01:46	27° \approx 46'05	
minimum elong	5769 Jan 31 14:31	12° \approx 13'42	0°54'12	opposition	5775 Aug 15 08:53	26° \approx 23'29	0°40'10
max. Earth dist.	5769 Jan 31 00:38	12° \approx 12'24	31.28456 AU	min. Earth dist.	5775 Aug 15 18:12	26° \approx 22'51	29.23492 AU
morning rise	5769 Feb 15 23:08	12° \approx 48'06		direct	5775 Nov 04 01:38	24° \approx 59'26	
retrograde	5769 May 14 08:00	14° \approx 41'19		evening set	5776 Jan 31 23:45	26° \approx 54'10	
opposition	5769 Aug 01 07:17	13° \approx 19'09	0°56'38				
min. Earth dist.	5769 Aug 01 20:20	13° \approx 18'15	29.28107 AU	conjunction	5776 Feb 16 08:52	27° \approx 28'41	0°36'13
direct	5769 Oct 21 06:04	11° \approx 55'02		minimum elong	5776 Feb 16 08:52	27° \approx 28'41	0°36'13
evening set	5770 Jan 18 13:51	13° \approx 50'07		max. Earth dist.	5776 Feb 16 00:08	27° \approx 27'51	31.23211 AU
max. Earth dist.	5770 Feb 02 09:51	14° \approx 23'19	31.27666 AU	morning rise	5776 Mar 02 16:56	28° \approx 03'06	
				retrograde	5776 May 29 13:11	29° \approx 56'58	
conjunction	5770 Feb 03 00:03	14° \approx 24'39	0°51'49	opposition	5776 Aug 16 21:15	28° \approx 34'21	0°37'11
minimum elong	5770 Feb 03 00:03	14° \approx 24'39	0°51'50	min. Earth dist.	5776 Aug 17 04:44	28° \approx 33'51	29.22964 AU
morning rise	5770 Feb 18 08:41	14° \approx 59'03		direct	5776 Nov 05 14:15	27° \approx 10'22	
	5770 Feb 18 19:00	15° \approx		evening set	5777 Feb 02 09:24	29° \approx 05'05	
retrograde	5770 May 16 18:41	16° \approx 52'21					
opposition	5770 Aug 03 19:32	15° \approx 30'05	0°54'04	conjunction	5777 Feb 17 18:21	29° \approx 39'36	0°33'24
min. Earth dist.	5770 Aug 04 08:38	15° \approx 29'12	29.27274 AU	minimum elong	5777 Feb 17 18:22	29° \approx 39'36	0°33'25
	5770 Aug 22 16:58	15° \approx		max. Earth dist.	5777 Feb 17 10:16	29° \approx 38'51	31.22694 AU
direct	5770 Oct 23 16:01	14° \approx 05'57			5777 Feb 26 19:11	0° \approx	
	5770 Dec 21 11:51	15° \approx		morning rise	5777 Mar 05 02:23	0° \approx 14'02	
evening set	5771 Jan 20 23:36	16° \approx 00'58		retrograde	5777 Jun 01 00:37	2° \approx 08'03	
				opposition	5777 Aug 19 09:53	0° \approx 45'26	0°34'09
conjunction	5771 Feb 05 09:44	16° \approx 35'29	0°49'23	min. Earth dist.	5777 Aug 19 17:35	0° \approx 44'54	29.22453 AU
minimum elong	5771 Feb 05 09:44	16° \approx 35'29	0°49'24		5777 Sep 17 21:34	30° \approx	
max. Earth dist.	5771 Feb 04 21:03	16° \approx 34'18	31.26800 AU	direct	5777 Nov 08 00:46	29° \approx 21'31	
morning rise	5771 Feb 20 18:07	17° \approx 09'53			5777 Dec 27 00:06	0° \approx	




























































































































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				max. Earth dist.	5784 Mar 04 10:18	15° 00 '11	31.16934 AU
conjunction	5778 Feb 20 03:53	1° 50 '44	0°30'32	morning rise	5784 Mar 19 22:04	15° 35 '03	
minimum elong	5778 Feb 20 03:53	1° 50 '44	0°30'32	retrograde	5784 Jun 16 09:11	17° 30 '00	
max. Earth dist.	5778 Feb 19 20:59	1° 50 '05	31.22174 AU	opposition	5784 Sep 04 03:24	16° 06 '58	0°11'43
morning rise	5778 Mar 07 11:50	2° 25 '11		min. Earth dist.	5784 Sep 04 07:02	16° 06 '44	29.16384 AU
retrograde	5778 Jun 03 10:53	4° 19 '21		direct	5784 Nov 23 08:01	14° 43 '17	
opposition	5778 Aug 21 22:27	2° 56 '43	0°31'04	evening set	5785 Feb 19 15:25	16° 37 '39	
min. Earth dist.	5778 Aug 22 04:46	2° 56 '17	29.21894 AU				
direct	5778 Nov 10 13:07	1° 32 '52		conjunction	5785 Mar 06 23:38	17° 12 '12	0°09'28
evening set	5779 Feb 07 04:49	3° 27 '33		minimum elong	5785 Mar 06 23:38	17° 12 '12	0°09'28
				behind sun begin	5785 Mar 06 18:16	17° 11 '42	
conjunction	5779 Feb 22 13:27	4° 02 '04	0°27'37	behind sun end	5785 Mar 07 05:00	17° 12 '41	
minimum elong	5779 Feb 22 13:27	4° 02 '04	0°27'38	max. Earth dist.	5785 Mar 06 20:51	17° 11 '57	31.15849 AU
max. Earth dist.	5779 Feb 22 06:15	4° 01 '24	31.21578 AU	morning rise	5785 Mar 22 07:47	17° 46 '45	
morning rise	5779 Mar 09 21:29	4° 36 '33		retrograde	5785 Jun 18 21:36	19° 41 '47	
retrograde	5779 Jun 05 22:24	6° 30 '51		opposition	5785 Sep 06 16:09	18° 18 '40	0°08'25
opposition	5779 Aug 24 11:07	5° 08 '12	0°27'56	min. Earth dist.	5785 Sep 06 17:46	18° 18 '34	29.15332 AU
min. Earth dist.	5779 Aug 24 17:23	5° 07 '46	29.21259 AU	direct	5785 Nov 25 21:30	16° 54 '59	
direct	5779 Nov 12 22:42	3° 44 '25		evening set	5786 Feb 22 01:05	18° 49 '18	
evening set	5780 Feb 09 14:36	5° 39 '05					
				conjunction	5786 Mar 09 09:14	19° 23 '51	0°06'23
conjunction	5780 Feb 24 23:16	6° 13 '36	0°24'40	minimum elong	5786 Mar 09 09:14	19° 23 '51	0°06'23
minimum elong	5780 Feb 24 23:16	6° 13 '36	0°24'40	behind sun begin	5786 Mar 09 03:11	19° 23 '19	
max. Earth dist.	5780 Feb 24 17:36	6° 13 '05	31.20887 AU	behind sun end	5786 Mar 09 15:17	19° 24 '24	
morning rise	5780 Mar 11 07:07	6° 48 '05		max. Earth dist.	5786 Mar 09 07:09	19° 23 '42	31.14834 AU
retrograde	5780 Jun 07 08:56	8° 42 '33		morning rise	5786 Mar 24 17:29	19° 58 '26	
opposition	5780 Aug 25 23:59	7° 19 '51	0°24'45	retrograde	5786 Jun 21 09:44	21° 53 '36	
min. Earth dist.	5780 Aug 26 05:39	7° 19 '28	29.20497 AU	opposition	5786 Sep 09 05:05	20° 30 '24	0°05'05
direct	5780 Nov 14 10:03	5° 56 '08		min. Earth dist.	5786 Sep 09 06:38	20° 30 '18	29.14374 AU
evening set	5781 Feb 11 00:26	7° 50 '45		direct	5786 Nov 28 08:54	19° 06 '44	
				evening set	5787 Feb 24 10:45	21° 01 '01	
conjunction	5781 Feb 26 08:50	8° 25 '16	0°21'41				
minimum elong	5781 Feb 26 08:50	8° 25 '16	0°21'41	conjunction	5787 Mar 11 18:56	21° 35 '34	0°03'17
max. Earth dist.	5781 Feb 26 02:39	8° 24 '42	31.20067 AU	minimum elong	5787 Mar 11 18:57	21° 35 '34	0°03'17
morning rise	5781 Mar 13 16:53	8° 59 '47		behind sun begin	5787 Mar 11 12:35	21° 35 '00	
retrograde	5781 Jun 09 21:51	10° 54 '23		behind sun end	5787 Mar 12 01:18	21° 36 '09	
opposition	5781 Aug 28 12:51	9° 31 '38	0°21'32	max. Earth dist.	5787 Mar 11 18:26	21° 35 '33	31.13928 AU
min. Earth dist.	5781 Aug 28 17:46	9° 31 '18	29.19614 AU	morning rise	5787 Mar 27 03:10	22° 10 '10	
direct	5781 Nov 16 20:27	8° 07 '56		retrograde	5787 Jun 23 19:40	24° 05 '27	
evening set	5782 Feb 13 10:14	10° 02 '30		opposition	5787 Sep 11 17:51	22° 42 '13	0°01'45
				min. Earth dist.	5787 Sep 11 17:35	22° 42 '14	29.13505 AU
conjunction	5782 Feb 28 18:43	10° 37 '02	0°18'39	direct	5787 Nov 30 21:28	21° 18 '35	
minimum elong	5782 Feb 28 18:43	10° 37 '02	0°18'40	evening set	5788 Feb 26 20:35	23° 12 '50	
max. Earth dist.	5782 Feb 28 13:58	10° 36 '36	31.19111 AU				
morning rise	5782 Mar 16 02:38	11° 11 '33		conjunction	5788 Mar 13 04:37	23° 47 '23	0°00'05
retrograde	5782 Jun 12 09:16	13° 06 '16		minimum elong	5788 Mar 13 04:36	23° 47 '23	0°00'05
opposition	5782 Aug 31 01:37	11° 43 '26	0°18'17	behind sun begin	5788 Mar 12 22:34	23° 46 '51	
min. Earth dist.	5782 Aug 31 06:37	11° 43 '06	29.18593 AU	behind sun end	5788 Mar 13 10:38	23° 47 '56	
direct	5782 Nov 19 08:51	10° 19 '45		max. Earth dist.	5788 Mar 13 04:09	23° 47 '23	31.13108 AU
evening set	5783 Feb 15 20:05	12° 14 '16		desc. node	5788 Mar 22 16:28	24° 08 '55	
				morning rise	5788 Mar 28 13:04	24° 22 '00	
conjunction	5783 Mar 03 04:24	12° 48 '48	0°15'37	retrograde	5788 Jun 25 07:19	26° 17 '27	
minimum elong	5783 Mar 03 04:24	12° 48 '48	0°15'37	opposition	5788 Sep 13 06:54	24° 54 '09	-0°01'35
behind sun begin	5783 Mar 03 02:35	12° 48 '38		min. Earth dist.	5788 Sep 13 06:07	24° 54 '12	29.12730 AU
behind sun end	5783 Mar 03 06:12	12° 48 '58		direct	5788 Dec 02 07:43	23° 30 '35	
max. Earth dist.	5783 Mar 02 23:24	12° 48 '20	31.18054 AU	evening set	5789 Feb 28 06:10	25° 24 '47	
morning rise	5783 Mar 18 12:30	13° 23 '19					
retrograde	5783 Jun 14 22:25	15° 18 '09		conjunction	5789 Mar 15 14:22	25° 59 '22	-0°03'07
opposition	5783 Sep 02 14:24	13° 55 '14	0°15'01	minimum elong	5789 Mar 15 14:22	25° 59 '22	0°03'07
min. Earth dist.	5783 Sep 02 17:52	13° 54 '59	29.17497 AU	behind sun begin	5789 Mar 15 07:59	25° 58 '47	
direct	5783 Nov 21 20:03	12° 31 '32		behind sun end	5789 Mar 15 20:44	25° 59 '56	
evening set	5784 Feb 18 05:43	14° 25 '59		max. Earth dist.	5789 Mar 15 15:56	25° 59 '27	31.12358 AU
				morning rise	5789 Mar 30 22:47	26° 34 '00	
conjunction	5784 Mar 04 14:00	15° 00 '31	0°12'33	retrograde	5789 Jun 27 18:04	28° 29 '35	
minimum elong	5784 Mar 04 14:00	15° 00 '31	0°12'33	opposition	5789 Sep 15 19:55	27° 06 '16	-0°04'56
behind sun begin	5784 Mar 04 09:48	15° 00 '08		min. Earth dist.	5789 Sep 15 18:13	27° 06 '23	29.11987 AU

direct	5789 Dec 04 19:28	25° ℔ 42'45	morning rise	5795 Apr 13 12:14	9° ℔ 49'08
evening set	5790 Mar 02 16:09	27° ℔ 36'55	retrograde	5795 Jul 11 22:24	11° ℔ 45'33
			opposition	5795 Sep 30 02:53	10° ℔ 21'51 -0°24'43
conjunction	5790 Mar 18 00:11	28° ℔ 11'30 -0°06'14	min. Earth dist.	5795 Sep 29 22:19	10° ℔ 22'09 29.06230 AU
minimum elong	5790 Mar 18 00:11	28° ℔ 11'30 0°06'14	direct	5795 Dec 18 16:13	8° ℔ 58'28
behind sun begin	5790 Mar 17 18:07	28° ℔ 10'57	evening set	5796 Mar 15 04:41	10° ℔ 52'24
behind sun end	5790 Mar 18 06:15	28° ℔ 12'03			
max. Earth dist.	5790 Mar 18 01:32	28° ℔ 11'36 31.11627 AU	conjunction	5796 Mar 30 13:08	11° ℔ 27'04 -0°24'38
morning rise	5790 Apr 02 08:53	28° ℔ 46'10	minimum elong	5796 Mar 30 13:08	11° ℔ 27'04 0°24'39
	5790 May 10 06:36	0° ℔	max. Earth dist.	5796 Mar 30 18:44	11° ℔ 27'35 31.05587 AU
retrograde	5790 Jun 30 06:57	0° ℔ 41'54	morning rise	5796 Apr 14 22:37	12° ℔ 01'51
	5790 Aug 22 17:33	30° ℔	retrograde	5796 Jul 13 09:29	13° ℔ 58'23
opposition	5790 Sep 18 08:48	29° ℔ 18'32 -0°08'16	opposition	5796 Oct 01 16:05	12° ℔ 34'34 -0°27'55
min. Earth dist.	5790 Sep 18 06:12	29° ℔ 18'43 29.11256 AU	min. Earth dist.	5796 Oct 01 09:55	12° ℔ 34'59 29.04947 AU
direct	5790 Dec 07 05:35	27° ℔ 55'04	direct	5796 Dec 20 05:30	11° ℔ 11'10
evening set	5791 Mar 05 02:03	29° ℔ 49'13	evening set	5797 Mar 17 14:48	13° ℔ 05'03
	5791 Mar 09 22:00	0° ℔			
conjunction	5791 Mar 20 10:14	0° ℔ 23'49 -0°09'21	conjunction	5797 Apr 01 23:12	13° ℔ 39'43 -0°27'36
minimum elong	5791 Mar 20 10:14	0° ℔ 23'49 0°09'21	minimum elong	5797 Apr 01 23:12	13° ℔ 39'43 0°27'37
behind sun begin	5791 Mar 20 04:49	0° ℔ 23'19	max. Earth dist.	5797 Apr 02 04:42	13° ℔ 40'14 31.04309 AU
behind sun end	5791 Mar 20 15:38	0° ℔ 24'18	morning rise	5797 Apr 17 09:03	14° ℔ 14'32
max. Earth dist.	5791 Mar 20 13:10	0° ℔ 24'04 31.10867 AU	retrograde	5797 Jul 15 21:46	16° ℔ 11'10
morning rise	5791 Apr 04 18:54	0° ℔ 58'30	opposition	5797 Oct 04 05:18	14° ℔ 47'15 -0°31'04
retrograde	5791 Jul 02 18:17	2° ℔ 54'24	min. Earth dist.	5797 Oct 03 22:48	14° ℔ 47'41 29.03703 AU
opposition	5791 Sep 20 21:59	1° ℔ 30'59 -0°11'36	direct	5797 Dec 22 16:38	13° ℔ 23'51
min. Earth dist.	5791 Sep 20 19:20	1° ℔ 31'10 29.10467 AU	evening set	5798 Mar 20 00:54	15° ℔ 17'40
direct	5791 Dec 09 16:54	0° ℔ 07'35			
evening set	5792 Mar 06 12:05	2° ℔ 01'41	conjunction	5798 Apr 04 09:33	15° ℔ 52'21 -0°30'32
			minimum elong	5798 Apr 04 09:33	15° ℔ 52'21 0°30'32
conjunction	5792 Mar 21 20:10	2° ℔ 36'18 -0°12'26	max. Earth dist.	5798 Apr 04 17:01	15° ℔ 53'04 31.03093 AU
minimum elong	5792 Mar 21 20:10	2° ℔ 36'18 0°12'27	morning rise	5798 Apr 19 19:25	16° ℔ 27'12
behind sun begin	5792 Mar 21 15:55	2° ℔ 35'55	retrograde	5798 Jul 18 08:40	18° ℔ 23'57
behind sun end	5792 Mar 22 00:25	2° ℔ 36'41	opposition	5798 Oct 06 18:16	16° ℔ 59'57 -0°34'11
max. Earth dist.	5792 Mar 21 22:59	2° ℔ 36'33 31.10046 AU	min. Earth dist.	5798 Oct 06 10:42	17° ℔ 00'28 29.02531 AU
morning rise	5792 Apr 06 05:04	3° ℔ 11'00	direct	5798 Dec 25 05:01	15° ℔ 36'33
retrograde	5792 Jul 04 07:57	5° ℔ 07'03	evening set	5799 Mar 22 11:10	17° ℔ 30'20
opposition	5792 Sep 22 11:10	3° ℔ 43'36 -0°14'55			
min. Earth dist.	5792 Sep 22 07:05	3° ℔ 43'52 29.09597 AU	conjunction	5799 Apr 06 19:45	18° ℔ 05'02 -0°33'25
direct	5792 Dec 11 03:28	2° ℔ 20'13	minimum elong	5799 Apr 06 19:45	18° ℔ 05'02 0°33'25
evening set	5793 Mar 08 22:13	4° ℔ 14'18	max. Earth dist.	5799 Apr 07 03:11	18° ℔ 05'44 31.01980 AU
			morning rise	5799 Apr 22 05:59	18° ℔ 39'55
conjunction	5793 Mar 24 06:23	4° ℔ 48'55 -0°15'32	retrograde	5799 Jul 20 21:22	20° ℔ 36'48
minimum elong	5793 Mar 24 06:23	4° ℔ 48'55 0°15'31	opposition	5799 Oct 09 07:25	19° ℔ 12'43 -0°37'15
behind sun begin	5793 Mar 24 04:27	4° ℔ 48'45	min. Earth dist.	5799 Oct 08 22:43	19° ℔ 13'19 29.01485 AU
behind sun end	5793 Mar 24 08:19	4° ℔ 49'06	direct	5799 Dec 27 15:23	17° ℔ 49'21
max. Earth dist.	5793 Mar 24 10:03	4° ℔ 49'16 31.09107 AU	evening set	5800 Mar 24 21:11	19° ℔ 43'06
morning rise	5793 Apr 08 15:23	5° ℔ 23'39			
retrograde	5793 Jul 06 20:04	7° ℔ 19'51	conjunction	5800 Apr 09 06:02	20° ℔ 17'50 -0°36'15
opposition	5793 Sep 25 00:26	5° ℔ 56'19 -0°18'13	minimum elong	5800 Apr 09 06:01	20° ℔ 17'50 0°36'16
min. Earth dist.	5793 Sep 24 20:54	5° ℔ 56'33 29.08601 AU	max. Earth dist.	5800 Apr 09 15:20	20° ℔ 18'43 31.00981 AU
direct	5793 Dec 13 15:11	4° ℔ 32'57	morning rise	5800 Apr 24 16:21	20° ℔ 52'44
evening set	5794 Mar 11 08:23	6° ℔ 27'00	retrograde	5800 Jul 23 08:24	22° ℔ 49'46
			opposition	5800 Oct 11 20:39	21° ℔ 25'38 -0°40'15
conjunction	5794 Mar 26 16:39	7° ℔ 01'38 -0°18'35	min. Earth dist.	5800 Oct 11 11:29	21° ℔ 26'16 29.00543 AU
minimum elong	5794 Mar 26 16:39	7° ℔ 01'38 0°18'36	direct	5800 Dec 30 02:23	20° ℔ 02'18
max. Earth dist.	5794 Mar 26 20:46	7° ℔ 02'01 31.08050 AU	evening set	5801 Mar 27 07:29	21° ℔ 56'03
morning rise	5794 Apr 11 01:49	7° ℔ 36'23			
retrograde	5794 Jul 09 09:44	9° ℔ 32'41	conjunction	5801 Apr 11 16:23	22° ℔ 30'47 -0°39'03
opposition	5794 Sep 27 13:36	8° ℔ 09'05 -0°21'29	minimum elong	5801 Apr 11 16:23	22° ℔ 30'47 0°39'03
min. Earth dist.	5794 Sep 27 08:35	8° ℔ 09'25 29.07469 AU	max. Earth dist.	5801 Apr 12 01:56	22° ℔ 31'42 31.00099 AU
direct	5794 Dec 16 04:32	6° ℔ 45'43	morning rise	5801 Apr 27 03:04	23° ℔ 05'43
evening set	5795 Mar 13 18:36	8° ℔ 39'43	retrograde	5801 Jul 25 22:10	25° ℔ 02'54
			opposition	5801 Oct 14 09:39	23° ℔ 38'44 -0°43'13
conjunction	5795 Mar 29 02:51	9° ℔ 14'22 -0°21'38	min. Earth dist.	5801 Oct 13 22:49	23° ℔ 39'29 28.99707 AU
minimum elong	5795 Mar 29 02:50	9° ℔ 14'22 0°21'38	direct	5802 Jan 01 12:05	22° ℔ 15'26
max. Earth dist.	5795 Mar 29 07:04	9° ℔ 14'45 31.06851 AU	evening set	5802 Mar 29 17:48	24° ℔ 09'11

conjunction	5802 Apr 14 02:54	24° Υ 43'57 -0°41'47	retrograde	5808 Aug 10 18:05	10° \mathcal{B} 39'28
minimum elong	5802 Apr 14 02:54	24° Υ 43'57 0°41'48	opposition	5808 Oct 30 06:17	9° \mathcal{B} 14'55 -1°01'54
max. Earth dist.	5802 Apr 14 13:33	24° Υ 44'57 30.99287 AU	min. Earth dist.	5808 Oct 29 16:28	9° \mathcal{B} 15'51 28.93397 AU
morning rise	5802 Apr 29 13:48	25° Υ 18'54	direct	5809 Jan 17 00:42	7° \mathcal{B} 51'40
retrograde	5802 Jul 28 10:43	27° Υ 16'14	evening set	5809 Apr 13 20:43	9° \mathcal{B} 45'15
opposition	5802 Oct 16 22:53	25° Υ 52'02 -0°46'06			
min. Earth dist.	5802 Oct 16 12:20	25° Υ 52'46 28.98924 AU	conjunction	5809 Apr 29 07:15	10° \mathcal{B} 20'09 -0°58'59
direct	5803 Jan 03 23:25	24° Υ 28'47	minimum elong	5809 Apr 29 07:15	10° \mathcal{B} 20'09 0°59'00
evening set	5803 Apr 01 04:11	26° Υ 22'32	max. Earth dist.	5809 Apr 29 21:46	10° \mathcal{B} 21'32 30.92801 AU
			morning rise	5809 May 14 20:06	10° \mathcal{B} 55'19
conjunction	5803 Apr 16 13:27	26° Υ 57'19 -0°44'27	retrograde	5809 Aug 13 04:40	12° \mathcal{B} 53'20
minimum elong	5803 Apr 16 13:26	26° Υ 57'19 0°44'28	opposition	5809 Nov 01 19:18	11° \mathcal{B} 28'41 -1°04'13
max. Earth dist.	5803 Apr 17 00:56	26° Υ 58'24 30.98523 AU	min. Earth dist.	5809 Nov 01 05:25	11° \mathcal{B} 29'38 28.92302 AU
morning rise	5803 May 02 00:32	27° Υ 32'18	direct	5810 Jan 19 12:40	10° \mathcal{B} 05'24
retrograde	5803 Jul 31 01:17	29° Υ 29'46	evening set	5810 Apr 16 07:37	11° \mathcal{B} 58'56
opposition	5803 Oct 19 12:02	28° Υ 05'33 -0°48'56			
min. Earth dist.	5803 Oct 18 23:50	28° Υ 06'23 28.98163 AU	conjunction	5810 May 01 18:20	12° \mathcal{B} 33'51 -1°01'07
direct	5804 Jan 06 12:00	26° Υ 42'20	minimum elong	5810 May 01 18:20	12° \mathcal{B} 33'51 1°01'08
evening set	5804 Apr 02 14:49	28° Υ 36'05	max. Earth dist.	5810 May 02 08:51	12° \mathcal{B} 35'14 30.91744 AU
			morning rise	5810 May 17 07:35	13° \mathcal{B} 09'02
conjunction	5804 Apr 18 00:09	29° Υ 10'54 -0°47'03		5810 Jul 25 21:53	15° \mathcal{B}
minimum elong	5804 Apr 18 00:09	29° Υ 10'54 0°47'05	retrograde	5810 Aug 15 18:23	15° \mathcal{B} 07'08
max. Earth dist.	5804 Apr 18 11:49	29° Υ 12'00 30.97749 AU		5810 Sep 05 21:26	15° $\mathcal{R}\mathcal{B}$
morning rise	5804 May 03 11:35	29° Υ 45'55	opposition	5810 Nov 04 08:17	13° \mathcal{B} 42'23 -1°06'28
	5804 May 09 21:38	0° \mathcal{B}	min. Earth dist.	5810 Nov 03 16:55	13° \mathcal{B} 43'26 28.91295 AU
retrograde	5804 Aug 01 14:51	1° \mathcal{B} 43'31	direct	5811 Jan 21 23:27	12° \mathcal{B} 19'04
opposition	5804 Oct 21 01:24	0° \mathcal{B} 19'16 -0°51'41	evening set	5811 Apr 18 18:25	14° \mathcal{B} 12'34
min. Earth dist.	5804 Oct 20 13:44	0° \mathcal{B} 20'04 28.97383 AU			
	5804 Nov 01 21:16	30° $\mathcal{R}\Upsilon$	conjunction	5811 May 04 05:22	14° \mathcal{B} 47'30 -1°03'10
direct	5805 Jan 07 22:46	28° Υ 56'05	minimum elong	5811 May 04 05:22	14° \mathcal{B} 47'30 1°03'11
	5805 Mar 12 00:15	0° \mathcal{B}	max. Earth dist.	5811 May 04 20:58	14° \mathcal{B} 48'59 30.90778 AU
evening set	5805 Apr 05 01:24	0° \mathcal{B} 49'50		5811 May 09 16:56	15° \mathcal{B}
			morning rise	5811 May 19 18:54	15° \mathcal{B} 22'43
conjunction	5805 Apr 20 11:04	1° \mathcal{B} 24'40 -0°49'36	retrograde	5811 Aug 18 05:48	17° \mathcal{B} 20'53
minimum elong	5805 Apr 20 11:04	1° \mathcal{B} 24'40 0°49'37	opposition	5811 Nov 06 21:25	15° \mathcal{B} 56'04 -1°08'36
max. Earth dist.	5805 Apr 20 23:54	1° \mathcal{B} 25'53 30.96935 AU	min. Earth dist.	5811 Nov 06 06:13	15° \mathcal{B} 57'07 28.90401 AU
morning rise	5805 May 05 22:40	1° \mathcal{B} 59'42		5811 Dec 14 00:05	15° $\mathcal{R}\mathcal{B}$
retrograde	5805 Aug 04 03:35	3° \mathcal{B} 57'26	direct	5812 Jan 24 10:45	14° \mathcal{B} 32'44
opposition	5805 Oct 23 14:35	2° \mathcal{B} 33'08 -0°54'21		5812 Mar 04 15:19	15° \mathcal{B}
min. Earth dist.	5805 Oct 23 01:42	2° \mathcal{B} 34'01 28.96522 AU	evening set	5812 Apr 20 05:20	16° \mathcal{B} 26'12
direct	5806 Jan 10 12:10	1° \mathcal{B} 09'58			
evening set	5806 Apr 07 12:21	3° \mathcal{B} 03'42	conjunction	5812 May 05 16:37	17° \mathcal{B} 01'10 -1°05'07
			minimum elong	5812 May 05 16:37	17° \mathcal{B} 01'10 1°05'08
conjunction	5806 Apr 22 22:02	3° \mathcal{B} 38'33 -0°52'04	max. Earth dist.	5812 May 06 09:08	17° \mathcal{B} 02'44 30.89960 AU
minimum elong	5806 Apr 22 22:02	3° \mathcal{B} 38'33 0°52'05	morning rise	5812 May 21 06:27	17° \mathcal{B} 36'24
max. Earth dist.	5806 Apr 23 10:09	3° \mathcal{B} 39'42 30.96021 AU	retrograde	5812 Aug 19 19:40	19° \mathcal{B} 34'39
morning rise	5806 May 08 10:03	4° \mathcal{B} 13'37	opposition	5812 Nov 08 10:20	18° \mathcal{B} 09'47 -1°10'38
retrograde	5806 Aug 06 17:49	6° \mathcal{B} 11'27	min. Earth dist.	5812 Nov 07 17:23	18° \mathcal{B} 10'57 28.89655 AU
opposition	5806 Oct 26 03:48	4° \mathcal{B} 47'05 -0°56'57	direct	5813 Jan 25 22:28	16° \mathcal{B} 46'27
min. Earth dist.	5806 Oct 25 15:09	4° \mathcal{B} 47'57 28.95564 AU	evening set	5813 Apr 22 16:20	18° \mathcal{B} 39'55
direct	5807 Jan 13 00:09	3° \mathcal{B} 23'55			
evening set	5807 Apr 09 23:09	5° \mathcal{B} 17'36	conjunction	5813 May 08 03:50	19° \mathcal{B} 14'55 -1°06'58
			minimum elong	5813 May 08 03:50	19° \mathcal{B} 14'55 1°07'00
conjunction	5807 Apr 25 09:13	5° \mathcal{B} 52'29 -0°54'27	max. Earth dist.	5813 May 08 20:38	19° \mathcal{B} 16'30 30.89273 AU
minimum elong	5807 Apr 25 09:13	5° \mathcal{B} 52'29 0°54'28	morning rise	5813 May 23 18:09	19° \mathcal{B} 50'10
max. Earth dist.	5807 Apr 25 22:44	5° \mathcal{B} 53'46 30.95006 AU	retrograde	5813 Aug 22 08:59	21° \mathcal{B} 48'31
morning rise	5807 May 10 21:21	6° \mathcal{B} 27'35	opposition	5813 Nov 10 23:24	20° \mathcal{B} 23'37 -1°12'34
retrograde	5807 Aug 09 05:28	8° \mathcal{B} 25'29	min. Earth dist.	5813 Nov 10 06:49	20° \mathcal{B} 24'46 28.89040 AU
opposition	5807 Oct 28 17:03	7° \mathcal{B} 01'02 -0°59'28	direct	5814 Jan 28 08:40	19° \mathcal{B} 00'18
min. Earth dist.	5807 Oct 28 03:47	7° \mathcal{B} 01'57 28.94499 AU	evening set	5814 Apr 25 03:22	20° \mathcal{B} 53'47
direct	5808 Jan 15 13:31	5° \mathcal{B} 37'50			
evening set	5808 Apr 11 09:55	7° \mathcal{B} 31'28	conjunction	5814 May 10 15:18	21° \mathcal{B} 28'48 -1°08'44
			minimum elong	5814 May 10 15:18	21° \mathcal{B} 28'48 1°08'45
conjunction	5808 Apr 26 20:05	8° \mathcal{B} 06'22 -0°56'46	max. Earth dist.	5814 May 11 09:29	21° \mathcal{B} 30'31 30.88715 AU
minimum elong	5808 Apr 26 20:05	8° \mathcal{B} 06'22 0°56'47	morning rise	5814 May 26 05:49	22° \mathcal{B} 04'05
max. Earth dist.	5808 Apr 27 09:07	8° \mathcal{B} 07'36 30.93916 AU	retrograde	5814 Aug 24 22:36	24° \mathcal{B} 02'31
morning rise	5808 May 12 08:43	8° \mathcal{B} 41'30	opposition	5814 Nov 13 12:12	22° \mathcal{B} 37'37 -1°14'24

min. Earth dist.	5814 Nov 12 18:12	22° 8 38'52	28.88528 AU	conjunction	5821 May 26 02:30	7° II 11'18	-1°17'59
direct	5815 Jan 30 21:45	21° 8 14'20		minimum elong	5821 May 26 02:30	7° II 11'18	1°18'02
evening set	5815 Apr 27 14:39	23° 8 07'50		max. Earth dist.	5821 May 26 22:00	7° II 13'09	30.85004 AU
				morning rise	5821 Jun 10 19:49	7° II 46'49	
conjunction	5815 May 13 02:42	23° 8 42'53	-1°10'23	retrograde	5821 Sep 09 19:35	9° II 45'43	
minimum elong	5815 May 13 02:42	23° 8 42'53	1°10'25	min. Earth dist.	5821 Nov 28 11:48	8° II 22'00	28.84713 AU
max. Earth dist.	5815 May 13 20:28	23° 8 44'34	30.88248 AU	opposition	5821 Nov 29 07:01	8° II 20'40	-1°23'53
morning rise	5815 May 28 17:45	24° 8 18'13		direct	5822 Feb 15 07:38	6° II 57'24	
retrograde	5815 Aug 27 13:51	26° 8 16'45		evening set	5822 May 13 00:00	8° II 50'56	
min. Earth dist.	5815 Nov 15 07:24	24° 8 53'04	28.88104 AU				
opposition	5815 Nov 16 01:18	24° 8 51'50	-1°16'06	conjunction	5822 May 28 14:35	9° II 26'10	-1°18'51
direct	5816 Feb 02 09:07	23° 8 28'36		minimum elong	5822 May 28 14:35	9° II 26'10	1°18'53
evening set	5816 Apr 29 01:47	25° 8 22'07		max. Earth dist.	5822 May 29 09:57	9° II 28'00	30.84284 AU
				morning rise	5822 Jun 13 08:23	10° II 01'42	
conjunction	5816 May 14 14:21	25° 8 57'12	-1°11'56	retrograde	5822 Sep 12 08:11	12° II 00'37	
minimum elong	5816 May 14 14:20	25° 8 57'12	1°11'57	opposition	5822 Dec 01 19:45	10° II 35'30	-1°24'45
max. Earth dist.	5816 May 15 09:41	25° 8 59'02	30.87838 AU	min. Earth dist.	5822 Dec 01 01:20	10° II 36'47	28.84030 AU
morning rise	5816 May 30 05:36	26° 8 32'34		direct	5823 Feb 17 17:34	9° II 12'11	
retrograde	5816 Aug 29 02:27	28° 8 31'12		evening set	5823 May 15 11:43	11° II 05'42	
opposition	5816 Nov 17 14:18	27° 8 06'18	-1°17'42				
min. Earth dist.	5816 Nov 16 19:51	27° 8 07'34	28.87696 AU	conjunction	5823 May 31 02:50	11° II 40'57	-1°19'36
direct	5817 Feb 03 22:03	25° 8 43'06		minimum elong	5823 May 31 02:50	11° II 40'57	1°19'38
evening set	5817 May 01 13:24	27° 8 36'39		max. Earth dist.	5823 May 31 23:18	11° II 42'53	30.83645 AU
				morning rise	5823 Jun 15 20:54	12° II 16'31	
conjunction	5817 May 17 02:08	28° 8 11'45	-1°13'22	retrograde	5823 Sep 14 21:46	14° II 15'26	
minimum elong	5817 May 17 02:08	28° 8 11'45	1°13'24	opposition	5823 Dec 04 08:21	12° II 50'16	-1°25'29
max. Earth dist.	5817 May 17 20:43	28° 8 13'31	30.87425 AU	min. Earth dist.	5823 Dec 03 12:41	12° II 51'38	28.83438 AU
morning rise	5817 Jun 01 17:56	28° 8 47'09		direct	5824 Feb 20 07:15	11° II 26'55	
	5817 Jul 08 17:44	0° II		evening set	5824 May 16 23:34	13° II 20'25	
retrograde	5817 Aug 31 16:36	0° II 45'52					
	5817 Oct 26 16:07	30° 8		conjunction	5824 Jun 01 14:57	13° II 55'41	-1°20'14
min. Earth dist.	5817 Nov 19 08:40	29° 8 22'15	28.87268 AU	minimum elong	5824 Jun 01 14:57	13° II 55'41	1°20'15
opposition	5817 Nov 20 03:12	29° 8 20'59	-1°19'11	max. Earth dist.	5824 Jun 02 10:50	13° II 57'34	30.83110 AU
direct	5818 Feb 06 09:00	27° 8 57'49		morning rise	5824 Jun 17 09:38	14° II 31'17	
evening set	5818 May 04 01:01	29° 8 51'23		retrograde	5824 Sep 16 12:36	16° II 30'13	
	5818 May 07 21:39	0° II		opposition	5824 Dec 05 21:03	15° II 05'00	-1°26'05
				min. Earth dist.	5824 Dec 05 01:39	15° II 06'21	28.82976 AU
conjunction	5818 May 19 14:12	0° II 26'31	-1°14'42	direct	5825 Feb 21 18:36	13° II 41'36	
minimum elong	5818 May 19 14:12	0° II 26'31	1°14'43	evening set	5825 May 19 11:26	15° II 35'07	
max. Earth dist.	5818 May 20 09:45	0° II 28'22	30.86947 AU				
morning rise	5818 Jun 04 06:15	1° II 01'57		conjunction	5825 Jun 04 03:24	16° II 10'26	-1°20'44
retrograde	5818 Sep 03 04:41	3° II 00'45		minimum elong	5825 Jun 04 03:23	16° II 10'26	1°20'46
opposition	5818 Nov 22 16:16	1° II 35'50	-1°20'32	max. Earth dist.	5825 Jun 05 00:42	16° II 12'27	30.82707 AU
min. Earth dist.	5818 Nov 21 22:06	1° II 37'06	28.86746 AU	morning rise	5825 Jun 19 22:20	16° II 46'03	
direct	5819 Feb 08 21:14	0° II 12'41		retrograde	5825 Sep 19 00:57	18° II 44'58	
evening set	5819 May 06 12:40	2° II 06'15		opposition	5825 Dec 08 09:25	17° II 19'45	-1°26'33
				min. Earth dist.	5825 Dec 07 13:23	17° II 21'08	28.82635 AU
conjunction	5819 May 22 02:09	2° II 41'25	-1°15'55	direct	5826 Feb 24 07:19	15° II 56'20	
minimum elong	5819 May 22 02:09	2° II 41'25	1°15'56	evening set	5826 May 21 23:30	17° II 49'51	
max. Earth dist.	5819 May 22 21:03	2° II 43'13	30.86382 AU				
morning rise	5819 Jun 06 18:40	3° II 16'53		conjunction	5826 Jun 06 15:44	18° II 25'11	-1°21'07
retrograde	5819 Sep 05 19:10	5° II 15'44		minimum elong	5826 Jun 06 15:44	18° II 25'11	1°21'08
min. Earth dist.	5819 Nov 24 10:20	3° II 52'07	28.86131 AU	max. Earth dist.	5826 Jun 07 12:21	18° II 27'08	30.82439 AU
opposition	5819 Nov 25 05:18	3° II 50'48	-1°21'47	morning rise	5826 Jun 22 11:16	19° II 00'50	
direct	5820 Feb 11 08:32	2° II 27'38		retrograde	5826 Sep 21 15:59	20° II 59'46	
evening set	5820 May 08 00:27	4° II 21'11		opposition	5826 Dec 10 22:00	19° II 34'32	-1°26'54
				min. Earth dist.	5826 Dec 10 01:43	19° II 35'57	28.82433 AU
conjunction	5820 May 23 14:19	4° II 56'22	-1°17'00	direct	5827 Feb 26 18:51	18° II 11'08	
minimum elong	5820 May 23 14:19	4° II 56'22	1°17'02	evening set	5827 May 24 11:22	20° II 04'39	
max. Earth dist.	5820 May 24 09:34	4° II 58'12	30.85713 AU				
morning rise	5820 Jun 08 07:13	5° II 31'52		conjunction	5827 Jun 09 04:09	20° II 40'01	-1°21'22
retrograde	5820 Sep 07 06:08	7° II 30'45		minimum elong	5827 Jun 09 04:09	20° II 40'01	1°21'24
opposition	5820 Nov 26 18:16	6° II 05'46	-1°22'53	max. Earth dist.	5827 Jun 10 02:03	20° II 42'06	30.82285 AU
min. Earth dist.	5820 Nov 26 00:10	6° II 07'01	28.85433 AU	morning rise	5827 Jun 24 23:59	21° II 15'42	
direct	5821 Feb 12 19:59	4° II 42'33		retrograde	5827 Sep 24 04:57	23° II 14'39	
evening set	5821 May 10 12:10	6° II 36'06		opposition	5827 Dec 13 10:36	21° II 49'25	-1°27'06
				min. Earth dist.	5827 Dec 12 14:29	21° II 50'49	28.82326 AU

direct	5828 Feb 29 07:46	20°II26'02		conjunction	5834 Jun 24 22:57	6°☾26'22	-1°19'39
evening set	5828 May 25 23:35	22°II19'34		minimum elong	5834 Jun 24 22:57	6°☾26'22	1°19'41
				max. Earth dist.	5834 Jun 25 19:32	6°☾28'18	30.81121 AU
conjunction	5828 Jun 10 16:45	22°II54'58	-1°21'30	morning rise	5834 Jul 10 21:52	7°☾02'14	
minimum elong	5828 Jun 10 16:45	22°II54'58	1°21'32	retrograde	5834 Oct 10 01:05	9°☾01'02	
max. Earth dist.	5828 Jun 11 14:06	22°II57'00	30.82228 AU	min. Earth dist.	5834 Dec 28 06:24	7°☾37'07	28.81030 AU
morning rise	5828 Jun 26 13:09	23°II30'41		opposition	5834 Dec 29 01:12	7°☾35'48	-1°24'48
retrograde	5828 Sep 25 19:22	25°II29'38		direct	5835 Mar 16 17:25	6°☾12'12	
opposition	5828 Dec 14 23:00	24°II04'26	-1°27'10	evening set	5835 Jun 11 15:30	8°☾05'50	
min. Earth dist.	5828 Dec 14 02:15	24°II05'53	28.82295 AU				
direct	5829 Mar 02 19:17	22°II41'03		conjunction	5835 Jun 27 11:50	8°☾41'26	-1°18'55
evening set	5829 May 28 11:58	24°II34'37		minimum elong	5835 Jun 27 11:50	8°☾41'26	1°18'58
				max. Earth dist.	5835 Jun 28 07:21	8°☾43'16	30.80813 AU
conjunction	5829 Jun 13 05:35	25°II10'03	-1°21'30	morning rise	5835 Jul 13 11:23	9°☾17'19	
minimum elong	5829 Jun 13 05:35	25°II10'03	1°21'32	retrograde	5835 Oct 12 16:02	11°☾16'04	
max. Earth dist.	5829 Jun 14 03:13	25°II12'06	30.82195 AU	opposition	5835 Dec 31 13:20	9°☾50'48	-1°23'57
morning rise	5829 Jun 29 02:23	25°II45'48		min. Earth dist.	5835 Dec 30 18:43	9°☾52'06	28.80763 AU
retrograde	5829 Sep 28 07:00	27°II44'46		direct	5836 Mar 18 05:23	8°☾27'08	
opposition	5829 Dec 17 11:32	26°II19'36	-1°27'06	evening set	5836 Jun 13 04:08	10°☾20'47	
min. Earth dist.	5829 Dec 16 15:51	26°II20'58	28.82258 AU				
direct	5830 Mar 05 06:30	24°II56'13		conjunction	5836 Jun 29 01:05	10°☾56'25	-1°18'04
evening set	5830 May 31 00:23	26°II49'49		minimum elong	5836 Jun 29 01:05	10°☾56'25	1°18'06
				max. Earth dist.	5836 Jun 29 21:35	10°☾58'21	30.80585 AU
conjunction	5830 Jun 15 18:28	27°II25'17	-1°21'23	morning rise	5836 Jul 15 00:55	11°☾32'19	
minimum elong	5830 Jun 15 18:29	27°II25'17	1°21'24	retrograde	5836 Oct 14 04:52	13°☾31'00	
max. Earth dist.	5830 Jun 16 15:55	27°II27'18	30.82143 AU	min. Earth dist.	5837 Jan 01 07:00	12°☾07'00	28.80590 AU
morning rise	5830 Jul 01 15:39	28°II01'03		opposition	5837 Jan 02 01:14	12°☾05'43	-1°22'59
	5830 Sep 29 22:25	0°☾		direct	5837 Mar 20 18:39	10°☾42'01	
retrograde	5830 Sep 30 21:09	0°☾00'01		evening set	5837 Jun 15 16:53	12°☾35'41	
	5830 Oct 01 19:55	30°☾II					
opposition	5830 Dec 19 23:55	28°II34'51	-1°26'54	conjunction	5837 Jul 01 14:13	13°☾11'20	-1°17'06
min. Earth dist.	5830 Dec 19 03:32	28°II36'17	28.82168 AU	minimum elong	5837 Jul 01 14:13	13°☾11'20	1°17'09
direct	5831 Mar 07 18:05	27°II11'28		max. Earth dist.	5837 Jul 02 09:54	13°☾13'11	30.80486 AU
evening set	5831 Jun 02 13:03	29°II05'06		morning rise	5837 Jul 17 14:36	13°☾47'16	
				retrograde	5837 Oct 16 18:56	15°☾45'53	
conjunction	5831 Jun 18 07:30	29°II40'35	-1°21'08	opposition	5838 Jan 04 13:05	14°☾20'36	-1°21'53
minimum elong	5831 Jun 18 07:30	29°II40'35	1°21'10	min. Earth dist.	5838 Jan 03 18:15	14°☾21'56	28.80560 AU
max. Earth dist.	5831 Jun 19 04:14	29°II42'33	30.82004 AU	direct	5838 Mar 23 06:29	12°☾56'52	
	5831 Jun 26 21:10	0°☾		evening set	5838 Jun 18 05:31	14°☾50'34	
morning rise	5831 Jul 04 05:11	0°☾16'23					
retrograde	5831 Oct 03 09:36	2°☾15'21		conjunction	5838 Jul 04 03:19	15°☾26'14	-1°16'01
opposition	5831 Dec 22 12:30	0°☾50'11	-1°26'34	minimum elong	5838 Jul 04 03:19	15°☾26'14	1°16'02
min. Earth dist.	5831 Dec 21 17:30	0°☾51'31	28.81987 AU	max. Earth dist.	5838 Jul 04 23:28	15°☾28'08	30.80517 AU
	5832 Jan 23 13:49	30°☾II		morning rise	5838 Jul 20 04:02	16°☾02'12	
direct	5832 Mar 09 04:13	29°II26'46		retrograde	5838 Oct 19 06:43	18°☾00'46	
	5832 Apr 22 14:01	0°☾		min. Earth dist.	5839 Jan 06 06:56	16°☾36'47	28.80667 AU
evening set	5832 Jun 04 01:34	1°☾20'24		opposition	5839 Jan 07 01:00	16°☾35'30	-1°20'39
				direct	5839 Mar 25 18:01	15°☾11'46	
conjunction	5832 Jun 19 20:39	1°☾55'55	-1°20'46	evening set	5839 Jun 20 18:15	17°☾05'28	
minimum elong	5832 Jun 19 20:39	1°☾55'55	1°20'47				
max. Earth dist.	5832 Jun 20 17:42	1°☾57'54	30.81779 AU	conjunction	5839 Jul 06 16:35	17°☾41'11	-1°14'49
morning rise	5832 Jul 05 18:42	2°☾31'44		minimum elong	5839 Jul 06 16:35	17°☾41'11	1°14'51
retrograde	5832 Oct 04 22:45	4°☾30'39		max. Earth dist.	5839 Jul 07 12:36	17°☾43'04	30.80713 AU
min. Earth dist.	5832 Dec 23 05:18	3°☾06'51	28.81704 AU	morning rise	5839 Jul 22 17:43	18°☾17'10	
opposition	5832 Dec 24 00:50	3°☾05'29	-1°26'07	retrograde	5839 Oct 21 21:23	20°☾15'41	
direct	5833 Mar 11 17:38	1°☾42'00		opposition	5840 Jan 09 12:41	18°☾50'27	-1°19'18
evening set	5833 Jun 06 14:21	3°☾35'39		min. Earth dist.	5840 Jan 08 17:44	18°☾51'47	28.80927 AU
				direct	5840 Mar 27 05:28	17°☾26'42	
conjunction	5833 Jun 22 09:45	4°☾11'11	-1°20'16	evening set	5840 Jun 22 07:07	19°☾20'27	
minimum elong	5833 Jun 22 09:45	4°☾11'11	1°20'18				
max. Earth dist.	5833 Jun 23 05:26	4°☾13'03	30.81462 AU	conjunction	5840 Jul 08 05:51	19°☾56'12	-1°13'30
morning rise	5833 Jul 08 08:24	4°☾47'02		minimum elong	5840 Jul 08 05:51	19°☾56'12	1°13'31
retrograde	5833 Oct 07 12:29	6°☾45'54		max. Earth dist.	5840 Jul 09 01:31	19°☾58'03	30.81034 AU
opposition	5833 Dec 26 13:03	5°☾20'41	-1°25'31	morning rise	5840 Jul 24 07:29	20°☾32'12	
min. Earth dist.	5833 Dec 25 18:32	5°☾21'59	28.81369 AU	retrograde	5840 Oct 23 08:47	22°☾30'41	
direct	5834 Mar 14 04:36	3°☾57'09		min. Earth dist.	5841 Jan 10 06:50	21°☾06'45	28.81301 AU
evening set	5834 Jun 09 02:55	5°☾50'48		opposition	5841 Jan 11 00:31	21°☾05'31	-1°17'50

direct	5841 Mar 29 15:18	19°  41'46	minimum elong	5847 Jul 25 05:30	5°  42'30	1°01'17
evening set	5841 Jun 24 20:05	21°  35'34	max. Earth dist.	5847 Jul 25 21:35	5°  44'01	30.83310 AU
			morning rise	5847 Aug 10 09:39	6°  18'37	
conjunction	5841 Jul 10 19:24	22°  11'19 -1°12'04	retrograde	5847 Nov 09 03:53	8°  16'26	
minimum elong	5841 Jul 10 19:24	22°  11'19 1°12'05	opposition	5848 Jan 27 09:36	6°  51'25	-1°04'21
max. Earth dist.	5841 Jul 11 15:24	22°  13'12 30.81453 AU	min. Earth dist.	5848 Jan 26 19:47	6°  52'24	28.83474 AU
morning rise	5841 Jul 26 21:18	22°  47'21	direct	5848 Apr 14 03:43	5°  27'23	
retrograde	5841 Oct 25 21:09	24°  45'46	evening set	5848 Jul 10 16:50	7°  21'19	
opposition	5842 Jan 13 12:04	23°  20'40 -1°16'14				
min. Earth dist.	5842 Jan 12 17:55	23°  21'57 28.81734 AU	conjunction	5848 Jul 26 19:12	7°  57'13	-0°59'07
direct	5842 Apr 01 03:46	21°  56'56	minimum elong	5848 Jul 26 19:12	7°  57'13	0°59'07
evening set	5842 Jun 27 09:18	23°  50'48	max. Earth dist.	5848 Jul 27 10:36	7°  58'40	30.83572 AU
			morning rise	5848 Aug 11 23:44	8°  33'20	
conjunction	5842 Jul 13 08:53	24°  26'35 -1°10'31	retrograde	5848 Nov 10 18:01	10°  21'01	
minimum elong	5842 Jul 13 08:53	24°  26'35 1°10'32	opposition	5849 Jan 28 20:46	9°  06'00	-1°02'01
max. Earth dist.	5842 Jul 14 03:31	24°  28'20 30.81896 AU	min. Earth dist.	5849 Jan 28 06:25	9°  07'01	28.83768 AU
morning rise	5842 Jul 29 11:19	25°  02'37	direct	5849 Apr 16 16:28	7°  41'54	
retrograde	5842 Oct 28 10:21	27°  01'00	evening set	5849 Jul 13 06:11	9°  35'51	
opposition	5843 Jan 15 23:52	25°  35'57 -1°14'31				
min. Earth dist.	5843 Jan 15 06:55	25°  37'09 28.82177 AU	conjunction	5849 Jul 29 08:51	10°  11'46	-0°56'53
direct	5843 Apr 03 13:20	24°  02'11	minimum elong	5849 Jul 29 08:51	10°  11'46	0°56'55
evening set	5843 Jun 29 22:20	26°  06'06	max. Earth dist.	5849 Jul 29 23:43	10°  13'10	30.83908 AU
			morning rise	5849 Aug 14 13:41	10°  47'54	
conjunction	5843 Jul 15 22:33	26°  41'55 -1°08'52	retrograde	5849 Nov 13 04:55	12°  45'27	
minimum elong	5843 Jul 15 22:34	26°  41'55 1°08'54	opposition	5850 Jan 31 07:59	11°  20'27	-0°59'35
max. Earth dist.	5843 Jul 16 17:37	26°  43'42 30.82314 AU	min. Earth dist.	5850 Jan 30 18:58	11°  21'23	28.84169 AU
morning rise	5843 Aug 01 01:13	27°  17'58	direct	5850 Apr 19 03:04	9°  56'18	
retrograde	5843 Oct 30 23:00	29°  16'16	evening set	5850 Jul 15 19:22	11°  50'16	
opposition	5844 Jan 18 11:35	27°  51'16 -1°12'42				
min. Earth dist.	5844 Jan 17 18:50	27°  52'27 28.82549 AU	conjunction	5850 Jul 31 22:32	12°  26'12	-0°54'35
direct	5844 Apr 05 01:45	26°  27'29	minimum elong	5850 Jul 31 22:33	12°  26'12	0°54'35
evening set	5844 Jul 01 11:47	28°  21'25	max. Earth dist.	5850 Aug 01 13:38	12°  27'37	30.84385 AU
			morning rise	5850 Aug 17 03:36	13°  02'20	
conjunction	5844 Jul 17 12:18	28°  57'15 -1°07'06	retrograde	5850 Nov 15 17:09	14°  59'46	
minimum elong	5844 Jul 17 12:19	28°  57'15 1°07'07	opposition	5851 Feb 02 19:03	13°  34'49	-0°57'04
max. Earth dist.	5844 Jul 18 05:30	28°  58'51 30.82652 AU	min. Earth dist.	5851 Feb 02 05:24	13°  35'47	28.84710 AU
morning rise	5844 Aug 02 15:31	29°  33'20	direct	5851 Apr 21 15:22	12°  10'37	
	5844 Aug 15 03:14	0°  0	evening set	5851 Jul 18 08:38	14°  04'38	
retrograde	5844 Nov 01 13:17	1°  31'32				
opposition	5845 Jan 19 23:11	0°  06'32 -1°10'46	conjunction	5851 Aug 03 12:03	14°  40'34	-0°52'11
min. Earth dist.	5845 Jan 19 07:15	0°  07'39 28.82845 AU	minimum elong	5851 Aug 03 12:04	14°  40'34	0°52'13
	5845 Jan 23 20:01	30°  R 	max. Earth dist.	5851 Aug 04 02:01	14°  41'53	30.85002 AU
direct	5845 Apr 07 13:43	28°  42'42		5851 Aug 12 04:06	15°  0	
	5845 Jun 16 14:16	0°  0	morning rise	5851 Aug 19 17:33	15°  16'43	
evening set	5845 Jul 04 01:05	0°  36'39	retrograde	5851 Nov 18 05:31	17°  14'03	
			opposition	5852 Feb 05 06:15	15°  49'09	-0°54'28
conjunction	5845 Jul 20 02:12	1°  12'30 -1°05'15	min. Earth dist.	5852 Feb 04 17:35	15°  50'02	28.85405 AU
minimum elong	5845 Jul 20 02:12	1°  12'30 1°05'17		5852 Mar 07 03:43	15°  R 	
max. Earth dist.	5845 Jul 20 19:43	1°  14'09 30.82904 AU	direct	5852 Apr 23 00:44	14°  24'57	
morning rise	5845 Aug 05 05:37	1°  48'35		5852 Jun 08 00:17	15°  0	
retrograde	5845 Nov 04 01:29	3°  46'40	evening set	5852 Jul 19 21:57	16°  19'00	
opposition	5846 Jan 22 10:47	2°  21'41 -1°08'43				
min. Earth dist.	5846 Jan 21 19:47	2°  22'44 28.83058 AU	conjunction	5852 Aug 05 01:55	16°  54'58	-0°49'43
direct	5846 Apr 10 03:02	0°  57'47	minimum elong	5852 Aug 05 01:55	16°  54'58	0°49'43
evening set	5846 Jul 06 14:19	2°  51'44	max. Earth dist.	5852 Aug 05 16:26	16°  56'19	30.85769 AU
			morning rise	5852 Aug 21 07:30	17°  31'06	
conjunction	5846 Jul 22 15:45	3°  27'36 -1°03'18	retrograde	5852 Nov 19 17:07	19°  28'20	
minimum elong	5846 Jul 22 15:45	3°  27'36 1°03'19	opposition	5853 Feb 06 17:09	18°  03'31	-0°51'47
max. Earth dist.	5846 Jul 23 07:49	3°  29'06 30.83110 AU	min. Earth dist.	5853 Feb 06 04:28	18°  04'25	28.86223 AU
morning rise	5846 Aug 07 19:39	4°  03'42	direct	5853 Apr 25 12:39	16°  39'20	
retrograde	5846 Nov 06 15:34	6°  01'39	evening set	5853 Jul 22 11:29	18°  33'27	
opposition	5847 Jan 24 22:14	4°  36'39 -1°06'35				
min. Earth dist.	5847 Jan 24 07:09	4°  37'43 28.83255 AU	conjunction	5853 Aug 07 15:37	19°  09'26	-0°47'10
direct	5847 Apr 12 15:11	3°  12'40	minimum elong	5853 Aug 07 15:38	19°  09'26	0°47'12
evening set	5847 Jul 09 03:35	5°  06'37	max. Earth dist.	5853 Aug 08 04:33	19°  10'38	30.86651 AU
			morning rise	5853 Aug 23 21:38	19°  45'35	
conjunction	5847 Jul 25 05:30	5°  42'30 -1°01'15	retrograde	5853 Nov 22 06:30	21°  42'44	

opposition	5854 Feb 09 04:14	20°Ω18'01	-0°49'01	conjunction	5860 Aug 23 17:10	4°♊52'03	-0°27'33
min. Earth dist.	5854 Feb 08 16:11	20°Ω18'52	28.87147 AU	minimum elong	5860 Aug 23 17:10	4°♊52'03	0°27'33
direct	5854 Apr 27 23:30	18°Ω53'50		max. Earth dist.	5860 Aug 23 23:57	4°♊52'41	30.92050 AU
evening set	5854 Jul 25 00:48	20°Ω48'02		morning rise	5860 Sep 09 00:18	5°♊28'11	
				retrograde	5860 Dec 07 23:07	7°♊24'29	
conjunction	5854 Aug 10 05:24	21°Ω24'01	-0°44'32	opposition	5861 Feb 24 08:28	6°♊00'08	-0°27'50
minimum elong	5854 Aug 10 05:24	21°Ω24'01	0°44'33	min. Earth dist.	5861 Feb 24 02:29	6°♊00'34	28.92370 AU
max. Earth dist.	5854 Aug 10 18:52	21°Ω25'17	30.87594 AU	direct	5861 May 13 11:14	4°♊35'46	
morning rise	5854 Aug 26 11:27	22°Ω00'10		evening set	5861 Aug 10 00:36	6°♊30'12	
retrograde	5854 Nov 24 18:20	23°Ω57'16					
opposition	5855 Feb 11 15:17	22°Ω32'38	-0°46'10	conjunction	5861 Aug 26 07:04	7°♊06'14	-0°24'34
min. Earth dist.	5855 Feb 11 04:14	22°Ω33'25	28.88088 AU	minimum elong	5861 Aug 26 07:04	7°♊06'14	0°24'35
direct	5855 Apr 30 11:45	21°Ω08'29		max. Earth dist.	5861 Aug 26 14:06	7°♊06'53	30.92683 AU
evening set	5855 Jul 27 14:29	23°Ω02'45		morning rise	5861 Sep 11 14:08	7°♊42'22	
				retrograde	5861 Dec 10 09:06	9°♊38'30	
conjunction	5855 Aug 12 19:17	23°Ω38'45	-0°41'51	opposition	5862 Feb 26 19:05	8°♊14'11	-0°24'38
minimum elong	5855 Aug 12 19:17	23°Ω38'45	0°41'52	min. Earth dist.	5862 Feb 26 13:14	8°♊14'36	28.93026 AU
max. Earth dist.	5855 Aug 13 06:58	23°Ω39'50	30.88533 AU	direct	5862 May 15 23:57	6°♊49'45	
morning rise	5855 Aug 29 01:41	24°Ω14'55		evening set	5862 Aug 12 14:05	8°♊44'11	
retrograde	5855 Nov 27 08:40	26°Ω11'55					
opposition	5856 Feb 14 02:12	24°Ω47'22	-0°43'15	conjunction	5862 Aug 28 20:34	9°♊20'13	-0°21'33
min. Earth dist.	5856 Feb 13 15:26	24°Ω48'08	28.89000 AU	minimum elong	5862 Aug 28 20:34	9°♊20'13	0°21'33
direct	5856 May 01 23:15	23°Ω23'12		max. Earth dist.	5862 Aug 29 01:55	9°♊20'43	30.93386 AU
evening set	5856 Jul 29 04:15	25°Ω17'33		morning rise	5862 Sep 14 03:51	9°♊56'21	
				retrograde	5862 Dec 12 20:31	11°♊52'20	
conjunction	5856 Aug 14 09:25	25°Ω53'34	-0°39'05	opposition	5863 Mar 01 05:42	10°♊28'02	-0°21'23
minimum elong	5856 Aug 14 09:25	25°Ω53'34	0°39'06	min. Earth dist.	5863 Mar 01 00:24	10°♊28'25	28.93786 AU
max. Earth dist.	5856 Aug 14 20:41	25°Ω54'37	30.89393 AU	direct	5863 May 18 10:27	9°♊03'33	
morning rise	5856 Aug 30 15:53	26°Ω29'43		evening set	5863 Aug 15 03:33	10°♊58'01	
retrograde	5856 Nov 28 21:27	28°Ω26'37					
opposition	5857 Feb 15 13:17	27°Ω02'08	-0°40'16	conjunction	5863 Aug 31 10:22	11°♊34'03	-0°18'30
min. Earth dist.	5857 Feb 15 04:13	27°Ω02'47	28.89808 AU	minimum elong	5863 Aug 31 10:22	11°♊34'03	0°18'31
direct	5857 May 04 12:06	25°Ω37'58		max. Earth dist.	5863 Aug 31 16:18	11°♊34'36	30.94196 AU
evening set	5857 Jul 31 17:58	27°Ω32'20		morning rise	5863 Sep 16 17:32	12°♊10'09	
				retrograde	5863 Dec 15 07:03	14°♊06'00	
conjunction	5857 Aug 16 23:23	28°Ω08'22	-0°36'16	opposition	5864 Mar 02 16:11	12°♊41'45	-0°18'06
minimum elong	5857 Aug 16 23:24	28°Ω08'22	0°36'17	min. Earth dist.	5864 Mar 02 11:42	12°♊42'04	28.94651 AU
max. Earth dist.	5857 Aug 17 09:12	28°Ω09'17	30.90160 AU	direct	5864 May 19 21:54	11°♊17'13	
morning rise	5857 Sep 02 06:04	28°Ω44'31		evening set	5864 Aug 16 17:12	13°♊11'44	
	5857 Oct 11 15:22	0°♊					
retrograde	5857 Dec 01 11:26	0°♊41'17		conjunction	5864 Sep 02 00:02	13°♊47'45	-0°15'25
	5858 Jan 22 06:21	30°♊Ω		minimum elong	5864 Sep 02 00:02	13°♊47'45	0°15'25
opposition	5858 Feb 18 00:08	29°Ω16'51	-0°37'14	behind sun begin	5864 Sep 01 22:37	13°♊47'38	
min. Earth dist.	5858 Feb 17 14:59	29°Ω17'30	28.90519 AU	behind sun end	5864 Sep 02 01:27	13°♊47'53	
direct	5858 May 07 01:25	27°Ω52'39		max. Earth dist.	5864 Sep 02 04:22	13°♊48'09	30.95134 AU
evening set	5858 Aug 03 07:43	29°Ω47'03		morning rise	5864 Sep 18 07:22	14°♊23'51	
	5858 Aug 09 05:05	0°♊		retrograde	5864 Dec 16 19:53	16°♊19'34	
				opposition	5865 Mar 05 02:40	14°♊55'23	-0°14'48
conjunction	5858 Aug 19 13:22	0°♊23'06	-0°33'25	min. Earth dist.	5865 Mar 04 22:04	14°♊55'42	28.95649 AU
minimum elong	5858 Aug 19 13:22	0°♊23'06	0°33'25	direct	5865 May 22 09:14	13°♊30'50	
max. Earth dist.	5858 Aug 19 22:11	0°♊23'55	30.90827 AU	evening set	5865 Aug 19 06:39	15°♊25'23	
morning rise	5858 Sep 04 20:11	0°♊59'15					
retrograde	5858 Dec 03 22:39	2°♊55'52		conjunction	5865 Sep 04 13:41	16°♊01'25	-0°12'19
opposition	5859 Feb 20 11:05	1°♊31'28	-0°34'09	minimum elong	5865 Sep 04 13:41	16°♊01'25	0°12'20
min. Earth dist.	5859 Feb 20 03:47	1°♊31'59	28.91158 AU	behind sun begin	5865 Sep 04 09:25	16°♊01'02	
direct	5859 May 09 12:31	0°♊07'13		behind sun end	5865 Sep 04 17:56	16°♊01'47	
evening set	5859 Aug 05 21:16	2°♊01'37		max. Earth dist.	5865 Sep 04 18:12	16°♊01'49	30.96179 AU
				morning rise	5865 Sep 20 20:51	16°♊37'29	
conjunction	5859 Aug 22 03:17	2°♊37'40	-0°30'30	retrograde	5865 Dec 19 07:13	18°♊33'05	
minimum elong	5859 Aug 22 03:18	2°♊37'40	0°30'31	opposition	5866 Mar 07 13:13	17°♊08'59	-0°11'28
max. Earth dist.	5859 Aug 22 11:40	2°♊38'26	30.91453 AU	min. Earth dist.	5866 Mar 07 09:59	17°♊09'12	28.96740 AU
morning rise	5859 Sep 07 10:13	3°♊13'49		direct	5866 May 24 21:45	15°♊44'27	
retrograde	5859 Dec 06 11:18	5°♊10'16		evening set	5866 Aug 21 20:14	17°♊39'03	
opposition	5860 Feb 22 21:48	3°♊45'54	-0°31'01				
min. Earth dist.	5860 Feb 22 14:25	3°♊46'25	28.91758 AU	conjunction	5866 Sep 07 03:20	18°♊15'05	-0°09'12
direct	5860 May 11 01:28	2°♊21'35		minimum elong	5866 Sep 07 03:19	18°♊15'05	0°09'12
evening set	5860 Aug 07 11:03	4°♊16'00		behind sun begin	5866 Sep 06 21:47	18°♊14'35	

behind sun end	5866 Sep 07 08:51	18° 11 15'34		min. Earth dist.	5872 Mar 20 05:31	0° 0 30'20	29.02537 AU
max. Earth dist.	5866 Sep 07 06:39	18° 11 15'22	30.97316 AU		5872 Apr 07 13:17	30° 8 11	
morning rise	5866 Sep 23 10:34	18° 11 51'08		direct	5872 Jun 06 20:26	29° 11 05'49	
retrograde	5866 Dec 21 20:30	20° 11 46'37			5872 Aug 04 12:59	0° 0	
opposition	5867 Mar 09 23:34	19° 11 22'36	-0°08'07	evening set	5872 Sep 04 06:11	1° 0 00'41	
min. Earth dist.	5867 Mar 09 20:07	19° 11 22'51	28.97889 AU				
direct	5867 May 27 10:35	17° 11 58'05		conjunction	5872 Sep 20 13:29	1° 0 36'39	0°09'42
evening set	5867 Aug 24 09:54	19° 11 52'46		minimum elong	5872 Sep 20 13:29	1° 0 36'39	0°09'42
				behind sun begin	5872 Sep 20 08:06	1° 0 36'11	
conjunction	5867 Sep 09 17:03	20° 11 28'47	-0°06'05	behind sun end	5872 Sep 20 18:52	1° 0 37'08	
minimum elong	5867 Sep 09 17:03	20° 11 28'47	0°06'05	max. Earth dist.	5872 Sep 20 11:15	1° 0 36'28	31.02888 AU
behind sun begin	5867 Sep 09 10:47	20° 11 28'13		morning rise	5872 Oct 06 19:58	2° 0 12'35	
behind sun end	5867 Sep 09 23:18	20° 11 29'20		retrograde	5873 Jan 03 16:01	4° 0 07'18	
max. Earth dist.	5867 Sep 09 19:33	20° 11 28'59	30.98455 AU	opposition	5873 Mar 22 14:11	2° 0 43'39	0°11'58
morning rise	5867 Sep 26 00:13	21° 11 04'49		min. Earth dist.	5873 Mar 22 17:01	2° 0 43'27	29.03235 AU
retrograde	5867 Dec 24 08:13	23° 11 00'12		direct	5873 Jun 09 07:47	1° 0 18'57	
opposition	5868 Mar 11 10:10	21° 11 36'17	-0°04'46	evening set	5873 Sep 06 19:39	3° 0 13'51	
min. Earth dist.	5868 Mar 11 08:38	21° 11 36'23	28.99011 AU				
direct	5868 May 28 21:37	20° 11 11'46		conjunction	5873 Sep 23 02:43	3° 0 49'47	0°12'47
evening set	5868 Aug 25 23:39	22° 11 06'30		minimum elong	5873 Sep 23 02:43	3° 0 49'47	0°12'47
				behind sun begin	5873 Sep 22 22:43	3° 0 49'26	
conjunction	5868 Sep 11 06:55	22° 11 42'31	-0°02'57	behind sun end	5873 Sep 23 06:43	3° 0 50'09	
minimum elong	5868 Sep 11 06:54	22° 11 42'31	0°02'57	max. Earth dist.	5873 Sep 22 22:44	3° 0 49'26	31.03590 AU
behind sun begin	5868 Sep 11 00:20	22° 11 41'56		morning rise	5873 Oct 09 09:10	4° 0 25'42	
behind sun end	5868 Sep 11 13:29	22° 11 43'06		retrograde	5874 Jan 06 03:33	6° 0 20'17	
max. Earth dist.	5868 Sep 11 08:38	22° 11 42'37	30.99542 AU	opposition	5874 Mar 25 00:22	4° 0 56'39	0°15'16
morning rise	5868 Sep 27 13:57	23° 11 18'32		min. Earth dist.	5874 Mar 25 03:13	4° 0 56'27	29.03952 AU
retrograde	5868 Dec 25 21:11	25° 11 13'48		direct	5874 Jun 11 19:14	3° 0 31'54	
opposition	5869 Mar 13 20:33	23° 11 49'57	-0°01'24	evening set	5874 Sep 09 08:58	5° 0 26'49	
min. Earth dist.	5869 Mar 13 19:09	23° 11 50'03	29.00043 AU				
direct	5869 May 31 10:48	22° 11 25'26		conjunction	5874 Sep 25 16:04	6° 0 02'45	0°15'51
asc. node	5869 Aug 13 18:23	23° 11 49'15		minimum elong	5874 Sep 25 16:04	6° 0 02'45	0°15'52
evening set	5869 Aug 28 13:28	24° 11 20'12		max. Earth dist.	5874 Sep 25 12:14	6° 0 02'24	31.04320 AU
				morning rise	5874 Oct 11 22:10	6° 0 38'38	
conjunction	5869 Sep 13 20:36	24° 11 56'13	0°00'17	retrograde	5875 Jan 08 13:38	8° 0 33'05	
minimum elong	5869 Sep 13 20:37	24° 11 56'13	0°00'16	opposition	5875 Mar 27 10:34	7° 0 09'28	0°18'32
behind sun begin	5869 Sep 13 14:05	24° 11 55'38		min. Earth dist.	5875 Mar 27 14:48	7° 0 09'10	29.04722 AU
behind sun end	5869 Sep 14 03:10	24° 11 56'48		direct	5875 Jun 14 07:44	5° 0 44'41	
max. Earth dist.	5869 Sep 13 20:34	24° 11 56'13	31.00518 AU	evening set	5875 Sep 11 22:17	7° 0 39'38	
morning rise	5869 Sep 30 03:38	25° 11 32'13					
retrograde	5869 Dec 28 08:57	27° 11 27'22		conjunction	5875 Sep 28 05:15	8° 0 15'33	0°18'53
opposition	5870 Mar 16 07:08	26° 11 03'35	0°01'58	minimum elong	5875 Sep 28 05:15	8° 0 15'32	0°18'54
min. Earth dist.	5870 Mar 16 07:19	26° 11 03'34	29.00974 AU	max. Earth dist.	5875 Sep 28 00:15	8° 0 15'05	31.05140 AU
direct	5870 Jun 02 21:08	24° 11 39'02		morning rise	5875 Oct 14 11:16	8° 0 51'23	
evening set	5870 Aug 31 02:54	26° 11 33'50		retrograde	5876 Jan 11 01:43	10° 0 45'43	
				opposition	5876 Mar 28 20:40	9° 0 22'09	0°21'46
conjunction	5870 Sep 16 10:15	27° 11 09'50	0°03'29	min. Earth dist.	5876 Mar 29 00:23	9° 0 21'53	29.05589 AU
minimum elong	5870 Sep 16 10:15	27° 11 09'50	0°03'29	direct	5876 Jun 15 20:34	7° 0 57'20	
behind sun begin	5870 Sep 16 03:42	27° 11 09'15		evening set	5876 Sep 13 11:36	9° 0 52'19	
behind sun end	5870 Sep 16 16:47	27° 11 10'25					
max. Earth dist.	5870 Sep 16 10:00	27° 11 09'50	31.01394 AU	conjunction	5876 Sep 29 18:26	10° 0 28'13	0°21'54
morning rise	5870 Oct 02 17:02	27° 11 45'49		minimum elong	5876 Sep 29 18:26	10° 0 28'13	0°21'55
retrograde	5870 Dec 30 19:02	29° 11 40'49		max. Earth dist.	5876 Sep 29 13:02	10° 0 27'43	31.06057 AU
opposition	5871 Mar 18 17:35	28° 11 17'06	0°05'19	morning rise	5876 Oct 16 00:06	11° 0 04'02	
min. Earth dist.	5871 Mar 18 18:18	28° 11 17'03	29.01789 AU	retrograde	5877 Jan 12 12:40	12° 0 58'14	
direct	5871 Jun 05 10:05	26° 11 52'31		opposition	5877 Mar 31 06:52	11° 0 34'44	0°24'59
evening set	5871 Sep 02 16:39	28° 11 47'21		min. Earth dist.	5877 Mar 31 12:00	11° 0 34'22	29.06580 AU
				direct	5877 Jun 18 07:35	10° 0 09'55	
conjunction	5871 Sep 18 23:49	29° 11 23'20	0°06'36	evening set	5877 Sep 16 00:48	12° 0 04'57	
minimum elong	5871 Sep 18 23:49	29° 11 23'20	0°06'35				
behind sun begin	5871 Sep 18 17:39	29° 11 22'47		conjunction	5877 Oct 02 07:32	12° 0 40'49	0°24'53
behind sun end	5871 Sep 19 06:00	29° 11 23'53		minimum elong	5877 Oct 02 07:32	12° 0 40'49	0°24'54
max. Earth dist.	5871 Sep 18 21:24	29° 11 23'08	31.02170 AU	max. Earth dist.	5877 Oct 02 01:55	12° 0 40'18	31.07118 AU
morning rise	5871 Oct 05 06:38	29° 11 59'17		morning rise	5877 Oct 18 12:56	13° 0 16'36	
	5871 Oct 05 14:29	0° 0		retrograde	5878 Jan 15 01:25	15° 0 10'42	
retrograde	5872 Jan 02 06:11	1° 0 54'09		opposition	5878 Apr 02 16:59	13° 0 47'17	0°28'09
opposition	5872 Mar 20 03:50	0° 0 30'27	0°08'39	min. Earth dist.	5878 Apr 02 21:42	13° 0 46'57	29.07694 AU

direct	5878 Jun 20 21:04	12° <u>♂</u> 22'29			5884 Dec 13 04:33	0° <u>♂</u>	
evening set	5878 Sep 18 13:56	14° <u>♂</u> 17'34		retrograde	5885 Jan 30 03:01	0° <u>♂</u> 37'48	
					5885 Mar 20 06:26	30° <u>♂</u> <u>♂</u>	
conjunction	5878 Oct 04 20:25	14° <u>♂</u> 53'25 0°27'50		opposition	5885 Apr 17 16:22	29° <u>♂</u> 14'51 0°48'53	
minimum elong	5878 Oct 04 20:25	14° <u>♂</u> 53'25 0°27'51		min. Earth dist.	5885 Apr 18 02:24	29° <u>♂</u> 14'08 29.14920 AU	
max. Earth dist.	5878 Oct 04 13:43	14° <u>♂</u> 52'49 31.08281 AU		direct	5885 Jul 06 05:06	27° <u>♂</u> 49'59	
morning rise	5878 Oct 21 01:38	15° <u>♂</u> 29'11		evening set	5885 Oct 04 10:12	29° <u>♂</u> 45'18	
retrograde	5879 Jan 17 12:49	17° <u>♂</u> 23'12			5885 Oct 11 03:46	0° <u>♂</u>	
opposition	5879 Apr 05 03:11	15° <u>♂</u> 59'52 0°31'17					
min. Earth dist.	5879 Apr 05 09:05	15° <u>♂</u> 59'27 29.08900 AU		conjunction	5885 Oct 20 15:01	0° <u>♂</u> 20'59 0°47'02	
direct	5879 Jun 23 07:46	14° <u>♂</u> 35'05		minimum elong	5885 Oct 20 15:01	0° <u>♂</u> 20'59 0°47'04	
evening set	5879 Sep 21 03:09	16° <u>♂</u> 30'14		max. Earth dist.	5885 Oct 20 02:29	0° <u>♂</u> 19'49 31.15258 AU	
				morning rise	5885 Nov 05 17:43	0° <u>♂</u> 56'30	
conjunction	5879 Oct 07 09:35	17° <u>♂</u> 06'05 0°30'44		retrograde	5886 Feb 01 13:13	2° <u>♂</u> 49'44	
minimum elong	5879 Oct 07 09:35	17° <u>♂</u> 06'05 0°30'45		opposition	5886 Apr 20 02:38	1° <u>♂</u> 26'48 0°51'35	
max. Earth dist.	5879 Oct 07 03:00	17° <u>♂</u> 05'28 31.09502 AU		min. Earth dist.	5886 Apr 20 14:15	1° <u>♂</u> 25'59 29.15652 AU	
morning rise	5879 Oct 23 14:24	17° <u>♂</u> 41'49		direct	5886 Jul 08 16:32	0° <u>♂</u> 01'54	
retrograde	5880 Jan 19 22:49	19° <u>♂</u> 35'43		evening set	5886 Oct 06 22:54	1° <u>♂</u> 57'13	
opposition	5880 Apr 06 13:14	18° <u>♂</u> 12'30 0°34'22					
min. Earth dist.	5880 Apr 06 19:36	18° <u>♂</u> 12'03 29.10112 AU		conjunction	5886 Oct 23 03:28	2° <u>♂</u> 32'51 0°49'32	
direct	5880 Jun 24 20:19	16° <u>♂</u> 47'45		minimum elong	5886 Oct 23 03:28	2° <u>♂</u> 32'51 0°49'33	
evening set	5880 Sep 22 16:34	18° <u>♂</u> 42'57		max. Earth dist.	5886 Oct 22 14:36	2° <u>♂</u> 31'40 31.15989 AU	
				morning rise	5886 Nov 08 05:49	3° <u>♂</u> 08'20	
conjunction	5880 Oct 08 22:37	19° <u>♂</u> 18'46 0°33'36		retrograde	5887 Feb 04 00:42	5° <u>♂</u> 01'27	
minimum elong	5880 Oct 08 22:37	19° <u>♂</u> 18'46 0°33'37		opposition	5887 Apr 22 12:41	3° <u>♂</u> 38'32 0°54'12	
max. Earth dist.	5880 Oct 08 14:03	19° <u>♂</u> 17'59 31.10695 AU		min. Earth dist.	5887 Apr 23 00:04	3° <u>♂</u> 37'44 29.16382 AU	
morning rise	5880 Oct 25 03:14	19° <u>♂</u> 54'29		direct	5887 Jul 11 06:33	2° <u>♂</u> 13'35	
retrograde	5881 Jan 21 10:22	21° <u>♂</u> 48'17		evening set	5887 Oct 09 11:44	4° <u>♂</u> 08'55	
opposition	5881 Apr 08 23:30	20° <u>♂</u> 25'09 0°37'23					
min. Earth dist.	5881 Apr 09 06:38	20° <u>♂</u> 24'39 29.11284 AU		conjunction	5887 Oct 25 15:53	4° <u>♂</u> 44'32 0°51'57	
direct	5881 Jun 27 06:29	19° <u>♂</u> 00'24		minimum elong	5887 Oct 25 15:53	4° <u>♂</u> 44'32 0°51'58	
evening set	5881 Sep 25 05:39	20° <u>♂</u> 55'39		max. Earth dist.	5887 Oct 25 01:59	4° <u>♂</u> 43'15 31.16732 AU	
				morning rise	5887 Nov 10 17:52	5° <u>♂</u> 19'59	
conjunction	5881 Oct 11 11:37	21° <u>♂</u> 31'28 0°36'24		retrograde	5888 Feb 06 11:21	7° <u>♂</u> 12'59	
minimum elong	5881 Oct 11 11:37	21° <u>♂</u> 31'28 0°36'25		opposition	5888 Apr 23 22:47	5° <u>♂</u> 50'05 0°56'45	
max. Earth dist.	5881 Oct 11 03:16	21° <u>♂</u> 30'41 31.11811 AU		min. Earth dist.	5888 Apr 24 11:07	5° <u>♂</u> 49'14 29.17172 AU	
morning rise	5881 Oct 27 15:43	22° <u>♂</u> 07'08		direct	5888 Jul 12 17:49	4° <u>♂</u> 25'07	
retrograde	5882 Jan 23 19:55	24° <u>♂</u> 00'51		evening set	5888 Oct 11 00:22	6° <u>♂</u> 20'28	
opposition	5882 Apr 11 09:50	22° <u>♂</u> 37'47 0°40'21					
min. Earth dist.	5882 Apr 11 18:15	22° <u>♂</u> 37'11 29.12347 AU		conjunction	5888 Oct 27 04:18	6° <u>♂</u> 56'03 0°54'17	
direct	5882 Jun 29 17:37	21° <u>♂</u> 13'02		minimum elong	5888 Oct 27 04:18	6° <u>♂</u> 56'03 0°54'18	
evening set	5882 Sep 27 18:57	23° <u>♂</u> 08'18		max. Earth dist.	5888 Oct 26 14:53	6° <u>♂</u> 54'49 31.17561 AU	
				morning rise	5888 Nov 12 05:44	7° <u>♂</u> 31'27	
conjunction	5882 Oct 14 00:32	23° <u>♂</u> 44'05 0°39'09		retrograde	5889 Feb 07 21:01	9° <u>♂</u> 24'22	
minimum elong	5882 Oct 14 00:32	23° <u>♂</u> 44'05 0°39'10		opposition	5889 Apr 26 08:59	8° <u>♂</u> 01'31 0°59'12	
max. Earth dist.	5882 Oct 13 14:10	23° <u>♂</u> 43'07 31.12823 AU		min. Earth dist.	5889 Apr 26 21:17	8° <u>♂</u> 00'40 29.18048 AU	
morning rise	5882 Oct 30 04:28	24° <u>♂</u> 19'43		direct	5889 Jul 15 06:40	6° <u>♂</u> 36'33	
retrograde	5883 Jan 26 06:34	26° <u>♂</u> 13'19		evening set	5889 Oct 13 12:55	8° <u>♂</u> 31'55	
opposition	5883 Apr 13 19:56	24° <u>♂</u> 50'18 0°43'16					
min. Earth dist.	5883 Apr 14 04:33	24° <u>♂</u> 49'42 29.13308 AU		conjunction	5889 Oct 29 16:19	9° <u>♂</u> 07'29 0°56'33	
direct	5883 Jul 02 05:01	23° <u>♂</u> 25'31		minimum elong	5889 Oct 29 16:19	9° <u>♂</u> 07'29 0°56'34	
evening set	5883 Sep 30 08:07	25° <u>♂</u> 20'49		max. Earth dist.	5889 Oct 29 01:35	9° <u>♂</u> 06'07 31.18495 AU	
				morning rise	5889 Nov 14 17:27	9° <u>♂</u> 42'51	
conjunction	5883 Oct 16 13:35	25° <u>♂</u> 56'34 0°41'51		retrograde	5890 Feb 10 08:12	11° <u>♂</u> 35'41	
minimum elong	5883 Oct 16 13:34	25° <u>♂</u> 56'34 0°41'52		opposition	5890 Apr 28 19:10	10° <u>♂</u> 12'55 1°01'34	
max. Earth dist.	5883 Oct 16 03:04	25° <u>♂</u> 55'36 31.13718 AU		min. Earth dist.	5890 Apr 29 07:32	10° <u>♂</u> 12'03 29.19050 AU	
morning rise	5883 Nov 01 17:00	26° <u>♂</u> 32'10		direct	5890 Jul 17 17:07	8° <u>♂</u> 47'58	
retrograde	5884 Jan 28 15:41	28° <u>♂</u> 25'39		evening set	5890 Oct 16 01:23	10° <u>♂</u> 43'23	
opposition	5884 Apr 15 06:17	27° <u>♂</u> 02'40 0°46'07					
min. Earth dist.	5884 Apr 15 16:35	27° <u>♂</u> 01'57 29.14154 AU		conjunction	5890 Nov 01 04:37	11° <u>♂</u> 18'55 0°58'43	
direct	5884 Jul 03 16:47	25° <u>♂</u> 37'51		minimum elong	5890 Nov 01 04:37	11° <u>♂</u> 18'55 0°58'44	
evening set	5884 Oct 01 21:14	27° <u>♂</u> 33'10		max. Earth dist.	5890 Oct 31 14:41	11° <u>♂</u> 17'38 31.19544 AU	
				morning rise	5890 Nov 17 05:10	11° <u>♂</u> 54'15	
conjunction	5884 Oct 18 02:19	28° <u>♂</u> 08'53 0°44'29		retrograde	5891 Feb 12 17:25	13° <u>♂</u> 47'02	
minimum elong	5884 Oct 18 02:19	28° <u>♂</u> 08'53 0°44'30		opposition	5891 May 01 05:17	12° <u>♂</u> 24'21 1°03'51	
max. Earth dist.	5884 Oct 17 14:20	28° <u>♂</u> 07'46 31.14523 AU		min. Earth dist.	5891 May 01 18:34	12° <u>♂</u> 23'25 29.20135 AU	
morning rise	5884 Nov 03 05:29	28° <u>♂</u> 44'27		direct	5891 Jul 20 04:04	10° <u>♂</u> 59'27	

evening set	5891 Oct 18 14:03	12° \mathbb{M} .54'56		max. Earth dist.	5897 Nov 15 22:33	26° \mathbb{M} .38'57	31.25719 AU
				morning rise	5897 Dec 02 14:12	27° \mathbb{M} .15'44	
conjunction	5891 Nov 03 16:45	13° \mathbb{M} .30'26	1°00'49	retrograde	5898 Feb 27 18:49	29° \mathbb{M} .08'08	
minimum elong	5891 Nov 03 16:45	13° \mathbb{M} .30'26	1°00'51	opposition	5898 May 16 06:00	27° \mathbb{M} .45'53	1°17'00
max. Earth dist.	5891 Nov 03 01:23	13° \mathbb{M} .29'00	31.20661 AU	min. Earth dist.	5898 May 16 23:10	27° \mathbb{M} .44'42	29.26010 AU
morning rise	5891 Nov 19 17:02	14° \mathbb{M} .05'44		direct	5898 Aug 04 14:51	26° \mathbb{M} .21'04	
	5891 Dec 16 18:36	15° \mathbb{M} .		evening set	5898 Nov 03 04:44	28° \mathbb{M} .16'45	
retrograde	5892 Feb 15 04:02	15° \mathbb{M} .58'28		max. Earth dist.	5898 Nov 18 08:39	28° \mathbb{M} .50'11	31.26166 AU
	5892 Apr 18 00:30	15° \mathbb{R} \mathbb{M} .					
opposition	5892 May 02 15:28	14° \mathbb{M} .35'54	1°06'02	conjunction	5898 Nov 19 04:32	28° \mathbb{M} .52'02	1°12'47
min. Earth dist.	5892 May 03 04:29	14° \mathbb{M} .35'00	29.21263 AU	minimum elong	5898 Nov 19 04:32	28° \mathbb{M} .52'02	1°12'49
direct	5892 Jul 21 14:55	13° \mathbb{M} .11'02		morning rise	5898 Dec 05 01:32	29° \mathbb{M} .27'05	
	5892 Oct 17 01:00	15° \mathbb{M} .			5898 Dec 20 19:50	0° \mathbb{Z} .	
evening set	5892 Oct 20 02:31	15° \mathbb{M} .06'35		retrograde	5899 Mar 02 06:16	1° \mathbb{Z} .19'24	
					5899 May 16 23:06	30° \mathbb{R} \mathbb{M} .	
conjunction	5892 Nov 05 04:56	15° \mathbb{M} .42'04	1°02'49	opposition	5899 May 18 16:16	29° \mathbb{M} .57'09	1°18'27
minimum elong	5892 Nov 05 04:56	15° \mathbb{M} .42'04	1°02'50	min. Earth dist.	5899 May 19 09:40	29° \mathbb{M} .55'56	29.26439 AU
max. Earth dist.	5892 Nov 04 13:55	15° \mathbb{M} .40'41	31.21765 AU	direct	5899 Aug 07 02:50	28° \mathbb{M} .32'17	
morning rise	5892 Nov 21 04:34	16° \mathbb{M} .17'20			5899 Oct 23 09:04	0° \mathbb{Z} .	
retrograde	5893 Feb 16 13:04	18° \mathbb{M} .10'02		evening set	5899 Nov 05 16:42	0° \mathbb{Z} .27'57	
opposition	5893 May 05 01:52	16° \mathbb{M} .47'34	1°08'07				
min. Earth dist.	5893 May 05 16:24	16° \mathbb{M} .46'33	29.22348 AU	conjunction	5899 Nov 21 16:14	1° \mathbb{Z} .03'13	1°14'06
direct	5893 Jul 24 01:34	15° \mathbb{M} .22'45		minimum elong	5899 Nov 21 16:13	1° \mathbb{Z} .03'13	1°14'08
evening set	5893 Oct 22 15:06	17° \mathbb{M} .18'21		max. Earth dist.	5899 Nov 20 21:08	1° \mathbb{Z} .01'26	31.26573 AU
				morning rise	5899 Dec 07 12:35	1° \mathbb{Z} .38'13	
conjunction	5893 Nov 07 17:01	17° \mathbb{M} .53'48	1°04'43	retrograde	5900 Mar 04 14:46	3° \mathbb{Z} .30'28	
minimum elong	5893 Nov 07 17:00	17° \mathbb{M} .53'48	1°04'45	opposition	5900 May 21 02:48	2° \mathbb{Z} .08'12	1°19'48
max. Earth dist.	5893 Nov 07 00:44	17° \mathbb{M} .52'18	31.22814 AU	min. Earth dist.	5900 May 21 21:03	2° \mathbb{Z} .06'56	29.26846 AU
morning rise	5893 Nov 23 16:18	18° \mathbb{M} .29'03		direct	5900 Aug 09 15:16	0° \mathbb{Z} .43'19	
retrograde	5894 Feb 19 00:24	20° \mathbb{M} .21'42		evening set	5900 Nov 08 04:35	2° \mathbb{Z} .38'58	
opposition	5894 May 07 12:09	18° \mathbb{M} .59'18	1°10'07	max. Earth dist.	5900 Nov 23 07:20	3° \mathbb{Z} .12'18	31.26998 AU
min. Earth dist.	5894 May 08 02:18	18° \mathbb{M} .58'19	29.23346 AU				
direct	5894 Jul 26 12:41	17° \mathbb{M} .34'31		conjunction	5900 Nov 24 03:29	3° \mathbb{Z} .14'10	1°15'17
evening set	5894 Oct 25 03:32	19° \mathbb{M} .30'10		minimum elong	5900 Nov 24 03:29	3° \mathbb{Z} .14'10	1°15'19
				morning rise	5900 Dec 09 23:30	3° \mathbb{Z} .49'09	
conjunction	5894 Nov 10 05:06	20° \mathbb{M} .05'35	1°06'32	retrograde	5901 Mar 07 00:23	5° \mathbb{Z} .41'19	
minimum elong	5894 Nov 10 05:05	20° \mathbb{M} .05'35	1°06'33	opposition	5901 May 23 13:14	4° \mathbb{Z} .19'04	1°21'01
max. Earth dist.	5894 Nov 09 12:14	20° \mathbb{M} .04'02	31.23739 AU	min. Earth dist.	5901 May 24 06:41	4° \mathbb{Z} .17'51	29.27307 AU
morning rise	5894 Nov 26 03:52	20° \mathbb{M} .40'48		direct	5901 Aug 12 02:40	2° \mathbb{Z} .54'09	
retrograde	5895 Feb 21 10:44	22° \mathbb{M} .33'25		evening set	5901 Nov 10 16:15	4° \mathbb{Z} .49'47	
opposition	5895 May 09 22:40	21° \mathbb{M} .11'05	1°12'00				
min. Earth dist.	5895 May 10 14:29	21° \mathbb{M} .09'59	29.24213 AU	conjunction	5901 Nov 26 14:50	5° \mathbb{Z} .24'58	1°16'23
direct	5895 Jul 29 00:01	19° \mathbb{M} .46'18		minimum elong	5901 Nov 26 14:50	5° \mathbb{Z} .24'58	1°16'25
evening set	5895 Oct 27 16:01	21° \mathbb{M} .41'59		max. Earth dist.	5901 Nov 25 19:32	5° \mathbb{Z} .23'11	31.27490 AU
				morning rise	5901 Dec 12 10:14	5° \mathbb{Z} .59'54	
conjunction	5895 Nov 12 17:11	22° \mathbb{M} .17'22	1°08'15	retrograde	5902 Mar 09 08:39	7° \mathbb{Z} .52'01	
minimum elong	5895 Nov 12 17:11	22° \mathbb{M} .17'22	1°08'16	opposition	5902 May 25 23:45	6° \mathbb{Z} .29'48	1°22'07
max. Earth dist.	5895 Nov 11 23:46	22° \mathbb{M} .15'45	31.24535 AU	min. Earth dist.	5902 May 26 18:07	6° \mathbb{Z} .28'31	29.27853 AU
morning rise	5895 Nov 28 15:29	22° \mathbb{M} .52'32		direct	5902 Aug 14 13:02	5° \mathbb{Z} .04'53	
retrograde	5896 Feb 23 22:15	24° \mathbb{M} .45'05		evening set	5902 Nov 13 03:54	7° \mathbb{Z} .00'30	
opposition	5896 May 11 09:00	23° \mathbb{M} .22'48	1°13'46	max. Earth dist.	5902 Nov 28 06:08	7° \mathbb{Z} .33'49	31.28090 AU
min. Earth dist.	5896 May 12 00:47	23° \mathbb{M} .21'42	29.24931 AU				
direct	5896 Jul 30 14:03	21° \mathbb{M} .58'01		conjunction	5902 Nov 29 01:59	7° \mathbb{Z} .35'40	1°17'21
evening set	5896 Oct 29 04:29	23° \mathbb{M} .53'43		minimum elong	5902 Nov 29 01:59	7° \mathbb{Z} .35'40	1°17'23
max. Earth dist.	5896 Nov 13 10:29	24° \mathbb{M} .27'21	31.25181 AU	morning rise	5902 Dec 14 21:04	8° \mathbb{Z} .10'34	
				retrograde	5903 Mar 11 19:11	10° \mathbb{Z} .02'39	
conjunction	5896 Nov 14 05:08	24° \mathbb{M} .29'04	1°09'52	opposition	5903 May 28 10:13	8° \mathbb{Z} .40'28	1°23'06
minimum elong	5896 Nov 14 05:08	24° \mathbb{M} .29'04	1°09'53	min. Earth dist.	5903 May 29 03:34	8° \mathbb{Z} .39'16	29.28486 AU
morning rise	5896 Nov 30 03:00	25° \mathbb{M} .04'12		direct	5903 Aug 16 24:00	7° \mathbb{Z} .15'34	
retrograde	5897 Feb 25 09:03	26° \mathbb{M} .56'41		evening set	5903 Nov 15 15:33	9° \mathbb{Z} .11'13	
opposition	5897 May 13 19:32	25° \mathbb{M} .34'25	1°15'27				
min. Earth dist.	5897 May 14 12:22	25° \mathbb{M} .33'15	29.25528 AU	conjunction	5903 Dec 01 13:13	9° \mathbb{Z} .46'21	1°18'13
direct	5897 Aug 02 01:28	24° \mathbb{M} .09'38		minimum elong	5903 Dec 01 13:12	9° \mathbb{Z} .46'21	1°18'15
evening set	5897 Oct 31 16:31	26° \mathbb{M} .05'19		max. Earth dist.	5903 Nov 30 17:26	9° \mathbb{Z} .44'31	31.28750 AU
				morning rise	5903 Dec 17 07:44	10° \mathbb{Z} .21'14	
conjunction	5897 Nov 16 16:53	26° \mathbb{M} .40'38	1°11'23	retrograde	5904 Mar 13 04:45	12° \mathbb{Z} .13'18	
minimum elong	5897 Nov 16 16:53	26° \mathbb{M} .40'38	1°11'24	opposition	5904 May 29 20:48	10° \mathbb{Z} .51'10	1°23'58

min. Earth dist.	5904 May 30 15:14	10° \nearrow 49'54	29.29173 AU	morning rise	5911 Jan 01 09:39	25° \nearrow 36'51	
direct	5904 Aug 18 10:42	9° \nearrow 26'19		retrograde	5911 Mar 29 04:14	27° \nearrow 28'53	
evening set	5904 Nov 17 03:08	11° \nearrow 22'00		opposition	5911 Jun 15 00:34	26° \nearrow 06'57	1°26'35
max. Earth dist.	5904 Dec 02 04:45	11° \nearrow 55'16	31.29446 AU	min. Earth dist.	5911 Jun 15 21:05	26° \nearrow 05'32	29.31661 AU
				direct	5911 Sep 03 22:09	24° \nearrow 42'13	
conjunction	5904 Dec 03 00:21	11° \nearrow 57'05	1°18'58	evening set	5911 Dec 03 10:47	26° \nearrow 37'54	
minimum elong	5904 Dec 03 00:21	11° \nearrow 57'05	1°19'00	max. Earth dist.	5911 Dec 18 07:13	27° \nearrow 10'47	31.31561 AU
morning rise	5904 Dec 18 18:26	12° \nearrow 31'56					
retrograde	5905 Mar 15 15:34	14° \nearrow 24'00		conjunction	5911 Dec 19 04:52	27° \nearrow 12'48	1°21'01
opposition	5905 Jun 01 07:27	13° \nearrow 01'56	1°24'42	minimum elong	5911 Dec 19 04:52	27° \nearrow 12'48	1°21'04
min. Earth dist.	5905 Jun 02 01:24	13° \nearrow 00'42	29.29851 AU	morning rise	5912 Jan 03 19:55	27° \nearrow 47'28	
direct	5905 Aug 20 23:22	11° \nearrow 37'08		retrograde	5912 Mar 30 14:13	29° \nearrow 39'28	
evening set	5905 Nov 19 14:37	13° \nearrow 32'50		opposition	5912 Jun 16 11:24	28° \nearrow 17'31	1°26'28
				min. Earth dist.	5912 Jun 17 06:52	28° \nearrow 16'11	29.31612 AU
conjunction	5905 Dec 05 11:19	14° \nearrow 07'54	1°19'37	direct	5912 Sep 05 09:24	26° \nearrow 52'45	
minimum elong	5905 Dec 05 11:19	14° \nearrow 07'54	1°19'39	evening set	5912 Dec 04 21:43	28° \nearrow 48'25	
max. Earth dist.	5905 Dec 04 14:57	14° \nearrow 06'00	31.30095 AU				
morning rise	5905 Dec 21 05:00	14° \nearrow 42'43		conjunction	5912 Dec 20 15:24	29° \nearrow 23'17	1°20'52
retrograde	5906 Mar 18 02:39	16° \nearrow 34'48		minimum elong	5912 Dec 20 15:24	29° \nearrow 23'17	1°20'53
opposition	5906 Jun 03 18:13	15° \nearrow 12'46	1°25'20	max. Earth dist.	5912 Dec 19 18:00	29° \nearrow 21'18	31.31509 AU
min. Earth dist.	5906 Jun 04 12:53	15° \nearrow 11'29	29.30472 AU	morning rise	5913 Jan 05 05:59	29° \nearrow 57'55	
direct	5906 Aug 23 09:54	13° \nearrow 48'00			5913 Jan 06 04:57	0° \rightarrow	
evening set	5906 Nov 22 02:08	15° \nearrow 43'44		retrograde	5913 Apr 01 23:24	1° \rightarrow 49'55	
				opposition	5913 Jun 18 22:28	0° \rightarrow 27'57	1°26'14
conjunction	5906 Dec 07 22:31	16° \nearrow 18'46	1°20'08	min. Earth dist.	5913 Jun 19 18:37	0° \rightarrow 26'34	29.31590 AU
minimum elong	5906 Dec 07 22:31	16° \nearrow 18'46	1°20'09		5913 Jul 06 05:33	30° \nwarrow	
max. Earth dist.	5906 Dec 07 02:40	16° \nearrow 16'56	31.30659 AU	direct	5913 Sep 07 20:13	29° \nearrow 03'10	
morning rise	5906 Dec 23 15:37	16° \nearrow 53'33			5913 Nov 07 19:52	0° \rightarrow	
retrograde	5907 Mar 20 12:44	18° \nearrow 45'38		evening set	5913 Dec 07 08:24	0° \rightarrow 58'48	
opposition	5907 Jun 06 04:55	17° \nearrow 23'39	1°25'49	max. Earth dist.	5913 Dec 22 05:02	1° \rightarrow 31'43	31.31522 AU
min. Earth dist.	5907 Jun 06 23:54	17° \nearrow 22'21	29.30968 AU				
direct	5907 Aug 25 23:05	15° \nearrow 58'55		conjunction	5913 Dec 23 01:42	1° \rightarrow 33'39	1°20'35
evening set	5907 Nov 24 13:48	17° \nearrow 54'40		minimum elong	5913 Dec 23 01:42	1° \rightarrow 33'39	1°20'37
				morning rise	5914 Jan 07 15:54	2° \rightarrow 08'15	
conjunction	5907 Dec 10 09:34	18° \nearrow 29'40	1°20'32	retrograde	5914 Apr 04 09:27	4° \rightarrow 00'16	
minimum elong	5907 Dec 10 09:34	18° \nearrow 29'40	1°20'35	opposition	5914 Jun 21 09:25	2° \rightarrow 38'16	1°25'53
max. Earth dist.	5907 Dec 09 12:14	18° \nearrow 27'42	31.31091 AU	min. Earth dist.	5914 Jun 22 04:34	2° \rightarrow 36'57	29.31634 AU
morning rise	5907 Dec 26 02:21	19° \nearrow 04'26		direct	5914 Sep 10 08:16	1° \rightarrow 13'30	
retrograde	5908 Mar 22 00:45	20° \nearrow 56'30		evening set	5914 Dec 09 19:14	3° \rightarrow 09'07	
opposition	5908 Jun 07 15:48	19° \nearrow 34'33	1°26'12				
min. Earth dist.	5908 Jun 08 10:50	19° \nearrow 33'15	29.31340 AU	conjunction	5914 Dec 25 12:01	3° \rightarrow 43'57	1°20'11
direct	5908 Aug 27 11:03	18° \nearrow 09'50		minimum elong	5914 Dec 25 12:01	3° \rightarrow 43'57	1°20'12
evening set	5908 Nov 26 01:05	20° \nearrow 05'35		max. Earth dist.	5914 Dec 24 15:04	3° \rightarrow 42'00	31.31615 AU
				morning rise	5915 Jan 10 01:53	4° \rightarrow 18'32	
conjunction	5908 Dec 11 20:33	20° \nearrow 40'34	1°20'50	retrograde	5915 Apr 06 20:15	6° \rightarrow 10'34	
minimum elong	5908 Dec 11 20:33	20° \nearrow 40'34	1°20'51	opposition	5915 Jun 23 20:21	4° \rightarrow 48'35	1°25'24
max. Earth dist.	5908 Dec 11 00:02	20° \nearrow 38'40	31.31384 AU	min. Earth dist.	5915 Jun 24 15:30	4° \rightarrow 47'16	29.31787 AU
morning rise	5908 Dec 27 12:43	21° \nearrow 15'18		direct	5915 Sep 12 17:56	3° \rightarrow 23'50	
retrograde	5909 Mar 24 09:42	23° \nearrow 07'22		evening set	5915 Dec 12 05:54	5° \rightarrow 19'28	
opposition	5909 Jun 10 02:49	21° \nearrow 45'26	1°26'27				
min. Earth dist.	5909 Jun 10 22:47	21° \nearrow 44'04	29.31560 AU	conjunction	5915 Dec 27 22:25	5° \rightarrow 54'16	1°19'41
direct	5909 Aug 29 23:39	20° \nearrow 20'44		minimum elong	5915 Dec 27 22:25	5° \rightarrow 54'16	1°19'43
evening set	5909 Nov 28 12:31	22° \nearrow 16'28		max. Earth dist.	5915 Dec 27 02:46	5° \rightarrow 52'26	31.31816 AU
max. Earth dist.	5909 Dec 13 09:38	22° \nearrow 49'24	31.31546 AU	morning rise	5916 Jan 12 11:47	6° \rightarrow 28'49	
				retrograde	5916 Apr 08 06:30	8° \rightarrow 20'53	
conjunction	5909 Dec 14 07:23	22° \nearrow 51'25	1°21'01	opposition	5916 Jun 25 07:29	6° \rightarrow 58'56	1°24'48
minimum elong	5909 Dec 14 07:23	22° \nearrow 51'25	1°21'03	min. Earth dist.	5916 Jun 26 02:16	6° \rightarrow 57'39	29.32014 AU
morning rise	5909 Dec 29 23:18	23° \nearrow 26'08		direct	5916 Sep 14 07:00	5° \rightarrow 34'15	
retrograde	5910 Mar 26 19:46	25° \nearrow 18'10		evening set	5916 Dec 13 16:30	7° \rightarrow 29'52	
opposition	5910 Jun 12 13:33	23° \nearrow 56'15	1°26'35				
min. Earth dist.	5910 Jun 13 08:57	23° \nearrow 54'55	29.31663 AU	conjunction	5916 Dec 29 08:26	8° \rightarrow 04'39	1°19'03
direct	5910 Sep 01 11:15	22° \nearrow 31'31		minimum elong	5916 Dec 29 08:26	8° \rightarrow 04'39	1°19'05
evening set	5910 Nov 30 23:40	24° \nearrow 27'15		max. Earth dist.	5916 Dec 28 12:06	8° \rightarrow 02'45	31.32078 AU
				morning rise	5917 Jan 13 21:36	8° \rightarrow 39'11	
conjunction	5910 Dec 16 18:17	25° \nearrow 02'11	1°21'04	retrograde	5917 Apr 10 19:05	10° \rightarrow 31'18	
minimum elong	5910 Dec 16 18:17	25° \nearrow 02'11	1°21'06	opposition	5917 Jun 27 18:38	9° \rightarrow 09'23	1°24'04
max. Earth dist.	5910 Dec 15 21:06	25° \nearrow 00'13	31.31588 AU	min. Earth dist.	5917 Jun 28 12:47	9° \rightarrow 08'08	29.32292 AU

direct	5917 Sep 16 18:51	7°344'45		retrograde	5924 Apr 25 16:46	25°345'38	
evening set	5917 Dec 16 03:01	9°340'23		opposition	5924 Jul 13 02:53	24°323'39	1°15'42
				min. Earth dist.	5924 Jul 13 20:48	24°322'26	29.31808 AU
conjunction	5917 Dec 31 18:45	10°315'08	1°18'19	direct	5924 Oct 02 02:34	22°359'09	
minimum elong	5917 Dec 31 18:45	10°315'08	1°18'22	evening set	5924 Dec 31 04:10	24°354'32	
max. Earth dist.	5917 Dec 30 23:43	10°313'22	31.32349 AU				
morning rise	5918 Jan 16 07:24	10°349'40		conjunction	5925 Jan 15 17:22	25°329'10	1°10'06
retrograde	5918 Apr 13 04:18	12°341'50		minimum elong	5925 Jan 15 17:23	25°329'10	1°10'07
opposition	5918 Jun 30 05:50	11°319'56	1°23'13	max. Earth dist.	5925 Jan 14 23:28	25°327'29	31.31528 AU
min. Earth dist.	5918 Jul 01 00:39	11°318'39	29.32544 AU	morning rise	5925 Jan 31 03:54	26°303'35	
direct	5918 Sep 19 06:50	9°355'21		retrograde	5925 Apr 28 02:40	27°356'01	
evening set	5918 Dec 18 13:43	11°350'59		opposition	5925 Jul 15 14:34	26°333'58	1°14'04
max. Earth dist.	5919 Jan 02 09:05	12°323'53	31.32578 AU	min. Earth dist.	5925 Jul 16 08:04	26°332'47	29.31369 AU
				direct	5925 Oct 04 15:46	25°309'29	
conjunction	5919 Jan 03 04:54	12°325'44	1°17'28	evening set	5926 Jan 02 14:23	27°304'48	
minimum elong	5919 Jan 03 04:55	12°325'44	1°17'29	max. Earth dist.	5926 Jan 17 08:40	27°337'41	31.31109 AU
morning rise	5919 Jan 18 17:23	13°300'14					
retrograde	5919 Apr 15 15:08	14°352'26		conjunction	5926 Jan 18 03:05	27°339'25	1°08'31
opposition	5919 Jul 02 17:06	13°330'34	1°22'15	minimum elong	5926 Jan 18 03:05	27°339'25	1°08'33
min. Earth dist.	5919 Jul 03 10:58	13°329'21	29.32728 AU	morning rise	5926 Feb 02 13:32	28°313'49	
direct	5919 Sep 21 18:46	12°306'02			5926 Apr 11 07:21	0°≈	
evening set	5919 Dec 21 00:14	14°301'39		retrograde	5926 Apr 30 14:57	0°≈06'17	
					5926 May 20 02:00	30°R3	
conjunction	5920 Jan 05 15:08	14°336'23	1°16'30	opposition	5926 Jul 18 02:03	28°344'12	1°12'19
minimum elong	5920 Jan 05 15:08	14°336'23	1°16'32	min. Earth dist.	5926 Jul 18 18:34	28°343'05	29.30983 AU
max. Earth dist.	5920 Jan 04 20:05	14°334'36	31.32702 AU	direct	5926 Oct 07 03:10	27°319'43	
morning rise	5920 Jan 21 03:07	15°310'52		evening set	5927 Jan 05 00:24	29°315'01	
retrograde	5920 Apr 17 00:35	17°303'07					
opposition	5920 Jul 04 04:40	15°341'16	1°21'10	conjunction	5927 Jan 20 12:57	29°349'37	1°06'51
min. Earth dist.	5920 Jul 04 23:29	15°339'59	29.32798 AU	minimum elong	5927 Jan 20 12:57	29°349'37	1°06'52
direct	5920 Sep 23 06:15	14°316'46		max. Earth dist.	5927 Jan 19 20:11	29°348'03	31.30756 AU
evening set	5920 Dec 22 10:50	16°312'21			5927 Jan 25 03:49	0°≈	
max. Earth dist.	5921 Jan 06 05:56	16°345'15	31.32716 AU	morning rise	5927 Feb 04 22:58	0°≈24'01	
				retrograde	5927 May 03 00:24	2°≈16'33	
conjunction	5921 Jan 07 01:18	16°347'04	1°15'26	opposition	5927 Jul 20 13:51	0°≈54'26	1°10'29
minimum elong	5921 Jan 07 01:18	16°347'04	1°15'27	min. Earth dist.	5927 Jul 21 06:26	0°≈53'19	29.30668 AU
morning rise	5921 Jan 22 13:03	17°321'32			5927 Aug 25 19:11	30°R3	
retrograde	5921 Apr 19 10:53	19°313'49		direct	5927 Oct 09 15:05	29°329'59	
opposition	5921 Jul 06 16:07	17°351'58	1°19'58		5927 Nov 22 01:40	0°≈	
min. Earth dist.	5921 Jul 07 09:50	17°350'45	29.32739 AU	evening set	5928 Jan 07 10:25	1°≈25'16	
direct	5921 Sep 25 18:10	16°327'29					
evening set	5921 Dec 24 21:16	18°323'02		conjunction	5928 Jan 22 22:31	1°≈59'51	1°05'04
				minimum elong	5928 Jan 22 22:31	1°≈59'51	1°05'06
conjunction	5922 Jan 09 11:24	18°357'43	1°14'15	max. Earth dist.	5928 Jan 22 05:41	1°≈58'16	31.30498 AU
minimum elong	5922 Jan 09 11:24	18°357'43	1°14'17	morning rise	5928 Feb 07 08:27	2°≈34'15	
max. Earth dist.	5922 Jan 08 16:00	18°355'54	31.32585 AU	retrograde	5928 May 04 11:38	4°≈26'51	
morning rise	5922 Jan 24 22:50	19°332'11		opposition	5928 Jul 22 01:35	3°≈04'45	1°08'32
retrograde	5922 Apr 21 20:07	21°324'31		min. Earth dist.	5928 Jul 22 16:31	3°≈03'44	29.30448 AU
opposition	5922 Jul 09 03:44	20°302'37	1°18'39	direct	5928 Oct 11 03:07	1°≈40'22	
min. Earth dist.	5922 Jul 09 22:19	20°301'21	29.32543 AU	evening set	5929 Jan 08 20:21	3°≈35'37	
direct	5922 Sep 28 04:41	18°338'09					
evening set	5922 Dec 27 07:43	20°333'39		conjunction	5929 Jan 24 08:15	4°≈10'12	1°03'12
				minimum elong	5929 Jan 24 08:15	4°≈10'12	1°03'13
conjunction	5923 Jan 11 21:33	21°308'19	1°12'58	max. Earth dist.	5929 Jan 23 16:41	4°≈08'45	31.30310 AU
minimum elong	5923 Jan 11 21:33	21°308'19	1°12'59	morning rise	5929 Feb 08 17:52	4°≈44'36	
max. Earth dist.	5923 Jan 11 02:41	21°306'33	31.32327 AU	retrograde	5929 May 06 21:51	6°≈37'19	
morning rise	5923 Jan 27 08:39	21°342'46		opposition	5929 Jul 24 13:27	5°≈15'13	1°06'28
retrograde	5923 Apr 24 05:41	23°335'07		min. Earth dist.	5929 Jul 25 04:48	5°≈14'11	29.30286 AU
opposition	5923 Jul 11 15:12	22°313'11	1°17'14	direct	5929 Oct 13 14:26	3°≈50'54	
min. Earth dist.	5923 Jul 12 09:06	22°311'58	29.32211 AU	evening set	5930 Jan 11 06:14	5°≈46'09	
direct	5923 Sep 30 16:37	20°348'43					
evening set	5923 Dec 29 18:10	22°344'09		conjunction	5930 Jan 26 17:51	6°≈20'44	1°01'14
				minimum elong	5930 Jan 26 17:51	6°≈20'44	1°01'15
conjunction	5924 Jan 14 07:32	23°318'48	1°11'35	max. Earth dist.	5930 Jan 26 02:38	6°≈19'18	31.30168 AU
minimum elong	5924 Jan 14 07:32	23°318'48	1°11'37	morning rise	5930 Feb 11 03:21	6°≈55'08	
max. Earth dist.	5924 Jan 13 12:11	23°317'00	31.31953 AU	retrograde	5930 May 09 08:30	8°≈47'57	
morning rise	5924 Jan 29 18:27	23°353'15		opposition	5930 Jul 27 01:17	7°≈25'53	1°04'19

min. Earth dist.	5930 Jul 27 15:07	7°24'56"	29.30127 AU	evening set	5937 Jan 26 03:58	21°03'28"	
direct	5930 Oct 16 02:18	6°01'38"					
evening set	5931 Jan 13 16:15	7°56'53"		conjunction	5937 Feb 10 13:51	21°37'59"	0°45'09"
				minimum elong	5937 Feb 10 13:51	21°37'59"	0°45'10"
conjunction	5931 Jan 29 03:33	8°31'27"	0°59'10"	max. Earth dist.	5937 Feb 10 01:04	21°36'47"	31.26578 AU
minimum elong	5931 Jan 29 03:33	8°31'27"	0°59'11"	morning rise	5937 Feb 25 22:21	22°12'24"	
max. Earth dist.	5931 Jan 28 12:35	8°30'03"	31.29988 AU	retrograde	5937 May 24 13:31	24°05'53"	
morning rise	5931 Feb 13 12:50	9°05'51"		opposition	5937 Aug 11 14:46	22°43'32"	0°46'52"
retrograde	5931 May 11 18:15	10°58'48"		min. Earth dist.	5937 Aug 12 02:03	22°42'46"	29.26137 AU
opposition	5931 Jul 29 13:18	9°36'44"	1°02'05"	direct	5937 Oct 31 09:40	21°19'28"	
min. Earth dist.	5931 Jul 30 03:40	9°35'46"	29.29923 AU	evening set	5938 Jan 28 13:38	23°14'24"	
direct	5931 Oct 18 12:19	8°12'34"					
evening set	5932 Jan 16 02:14	10°07'48"		conjunction	5938 Feb 12 23:25	23°48'55"	0°42'34"
				minimum elong	5938 Feb 12 23:25	23°48'55"	0°42'35"
conjunction	5932 Jan 31 13:20	10°42'22"	0°57'01"	max. Earth dist.	5938 Feb 12 11:48	23°47'50"	31.25646 AU
minimum elong	5932 Jan 31 13:20	10°42'22"	0°57'03"	morning rise	5938 Feb 28 07:46	24°23'20"	
max. Earth dist.	5932 Jan 30 23:22	10°41'03"	31.29751 AU	retrograde	5938 May 27 00:26	26°16'54"	
morning rise	5932 Feb 15 22:22	11°16'46"		opposition	5938 Aug 14 03:12	24°54'27"	0°44'05"
retrograde	5932 May 13 04:18	13°09'49"		min. Earth dist.	5938 Aug 14 14:44	24°53'40"	29.25215 AU
opposition	5932 Jul 31 01:27	11°47'45"	0°59'45"	direct	5938 Nov 02 22:06	23°30'23"	
min. Earth dist.	5932 Jul 31 14:52	11°46'51"	29.29625 AU	evening set	5939 Jan 30 23:19	25°25'14"	
direct	5932 Oct 19 23:29	10°23'39"					
evening set	5933 Jan 17 12:13	12°18'51"		conjunction	5939 Feb 15 08:52	25°59'44"	0°39'56"
				minimum elong	5939 Feb 15 08:52	25°59'44"	0°39'56"
conjunction	5933 Feb 01 22:57	12°53'25"	0°54'48"	max. Earth dist.	5939 Feb 14 22:01	25°58'43"	31.24753 AU
minimum elong	5933 Feb 01 22:57	12°53'25"	0°54'48"	morning rise	5939 Mar 02 17:08	26°34'09"	
max. Earth dist.	5933 Feb 01 08:32	12°52'04"	31.29395 AU	retrograde	5939 May 29 10:44	28°27'48"	
morning rise	5933 Feb 17 07:57	13°27'49"		opposition	5939 Aug 16 15:30	27°05'17"	0°41'14"
	5933 Apr 10 06:04	15°		min. Earth dist.	5939 Aug 17 01:04	27°04'38"	29.24350 AU
retrograde	5933 May 15 16:10	15°20'59"		direct	5939 Nov 05 10:48	25°41'12"	
	5933 Jun 21 05:38	15°		evening set	5940 Feb 02 09:02	27°36'00"	
opposition	5933 Aug 02 13:41	13°58'55"	0°57'19"				
min. Earth dist.	5933 Aug 03 03:05	13°58'00"	29.29210 AU	conjunction	5940 Feb 17 18:21	28°10'30"	0°37'14"
direct	5933 Oct 22 08:56	12°34'51"		minimum elong	5940 Feb 17 18:21	28°10'30"	0°37'15"
evening set	5934 Jan 19 22:11	14°30'01"		max. Earth dist.	5940 Feb 17 08:05	28°09'32"	31.23933 AU
	5934 Feb 02 08:16	15°		morning rise	5940 Mar 04 02:34	28°44'56"	
					5940 Apr 12 03:48	0°	
conjunction	5934 Feb 04 08:49	15°04'34"	0°52'29"	retrograde	5940 May 30 20:41	0°38'41"	
minimum elong	5934 Feb 04 08:50	15°04'34"	0°52'31"		5940 Jul 20 17:23	30°	
max. Earth dist.	5934 Feb 03 19:39	15°03'20"	31.28904 AU	opposition	5940 Aug 18 04:02	29°16'06"	0°38'19"
morning rise	5934 Feb 19 17:31	15°38'59"		min. Earth dist.	5940 Aug 18 13:29	29°15'27"	29.23585 AU
retrograde	5934 May 18 02:37	17°32'14"		direct	5940 Nov 06 21:20	27°52'04"	
opposition	5934 Aug 05 01:49	16°10'08"	0°54'49"	evening set	5941 Feb 03 18:31	29°46'47"	
min. Earth dist.	5934 Aug 05 15:01	16°09'14"	29.28631 AU		5941 Feb 09 17:10	0°	
	5934 Sep 25 00:30	15°					
direct	5934 Oct 24 21:44	14°46'05"		conjunction	5941 Feb 19 03:48	0°21'18"	0°34'29"
	5934 Nov 23 04:57	15°		minimum elong	5941 Feb 19 03:48	0°21'18"	0°34'29"
evening set	5935 Jan 22 08:18	16°41'13"		max. Earth dist.	5941 Feb 18 19:10	0°20'30"	31.23218 AU
				morning rise	5941 Mar 06 11:54	0°55'44"	
conjunction	5935 Feb 06 18:33	17°15'46"	0°50'07"	retrograde	5941 Jun 02 06:33	2°49'36"	
minimum elong	5935 Feb 06 18:34	17°15'46"	0°50'08"	opposition	5941 Aug 20 16:27	1°26'59"	0°35'21"
max. Earth dist.	5935 Feb 06 04:33	17°14'27"	31.28257 AU	min. Earth dist.	5941 Aug 21 00:26	1°26'27"	29.22895 AU
morning rise	5935 Feb 22 03:17	17°50'10"		direct	5941 Nov 09 09:14	0°03'00"	
retrograde	5935 May 20 15:40	19°43'31"		evening set	5942 Feb 06 04:15	1°57'41"	
opposition	5935 Aug 07 14:08	18°21'21"	0°52'14"				
min. Earth dist.	5935 Aug 08 02:33	18°20'30"	29.27910 AU	conjunction	5942 Feb 21 13:15	2°32'12"	0°31'41"
direct	5935 Oct 27 08:46	16°57'19"		minimum elong	5942 Feb 21 13:15	2°32'12"	0°31'42"
evening set	5936 Jan 24 18:05	18°52'23"		max. Earth dist.	5942 Feb 21 04:34	2°31'23"	31.22562 AU
				morning rise	5942 Mar 08 21:27	3°06'39"	
conjunction	5936 Feb 09 04:17	19°26'55"	0°47'40"	retrograde	5942 Jun 04 18:32	5°00'39"	
minimum elong	5936 Feb 09 04:17	19°26'55"	0°47'42"	opposition	5942 Aug 23 04:50	3°38'00"	0°32'19"
max. Earth dist.	5936 Feb 08 15:39	19°25'44"	31.27464 AU	min. Earth dist.	5942 Aug 23 12:22	3°37'30"	29.22263 AU
morning rise	5936 Feb 24 12:44	20°01'20"		direct	5942 Nov 11 18:46	2°14'04"	
retrograde	5936 May 22 01:28	21°54'46"		evening set	5943 Feb 08 13:53	4°08'44"	
opposition	5936 Aug 09 02:35	20°32'30"	0°49'35"				
min. Earth dist.	5936 Aug 09 15:20	20°31'38"	29.27054 AU	conjunction	5943 Feb 23 22:54	4°43'15"	0°28'50"
direct	5936 Oct 28 20:35	19°08'28"		minimum elong	5943 Feb 23 22:54	4°43'15"	0°28'50"

max. Earth dist.	5943 Feb 23 16:01	4° ✕ 42'37	31.21938 AU	opposition	5949 Sep 07 22:24	18° ✕ 59'18	0°10'02
morning rise	5943 Mar 11 06:54	5° ✕ 17'43		min. Earth dist.	5949 Sep 08 02:09	18° ✕ 59'03	29.16055 AU
retrograde	5943 Jun 07 04:57	7° ✕ 11'52		direct	5949 Nov 27 04:47	17° ✕ 35'37	
opposition	5943 Aug 25 17:30	5° ✕ 49'11	0°29'15	evening set	5950 Feb 23 10:25	19° ✕ 30'01	
min. Earth dist.	5943 Aug 26 00:21	5° ✕ 48'43	29.21627 AU				
direct	5943 Nov 14 06:41	4° ✕ 25'19		conjunction	5950 Mar 10 18:47	20° ✕ 04'34	0°07'55
evening set	5944 Feb 10 23:36	6° ✕ 19'58		minimum elong	5950 Mar 10 18:48	20° ✕ 04'34	0°07'56
				behind sun begin	5950 Mar 10 13:02	20° ✕ 04'03	
conjunction	5944 Feb 26 08:19	6° ✕ 54'29	0°25'56	behind sun end	5950 Mar 11 00:33	20° ✕ 05'06	
minimum elong	5944 Feb 26 08:19	6° ✕ 54'29	0°25'57	max. Earth dist.	5950 Mar 10 15:56	20° ✕ 04'20	31.15445 AU
max. Earth dist.	5944 Feb 26 01:06	6° ✕ 53'49	31.21298 AU	morning rise	5950 Mar 26 02:57	20° ✕ 39'08	
morning rise	5944 Mar 12 16:27	7° ✕ 28'57		retrograde	5950 Jun 22 14:37	22° ✕ 34'12	
retrograde	5944 Jun 08 18:15	9° ✕ 23'16		opposition	5950 Sep 10 11:06	21° ✕ 11'05	0°06'46
opposition	5944 Aug 27 06:12	8° ✕ 00'33	0°26'08	min. Earth dist.	5950 Sep 10 13:28	21° ✕ 10'55	29.14835 AU
min. Earth dist.	5944 Aug 27 11:56	8° ✕ 00'10	29.20966 AU	direct	5950 Nov 29 17:32	19° ✕ 47'23	
direct	5944 Nov 15 16:40	6° ✕ 36'45		evening set	5951 Feb 25 20:14	21° ✕ 41'43	
evening set	5945 Feb 12 09:20	8° ✕ 31'23					
				conjunction	5951 Mar 13 04:24	22° ✕ 16'17	0°04'52
conjunction	5945 Feb 27 18:04	9° ✕ 05'54	0°22'59	minimum elong	5951 Mar 13 04:23	22° ✕ 16'17	0°04'51
minimum elong	5945 Feb 27 18:05	9° ✕ 05'54	0°23'00	behind sun begin	5951 Mar 12 22:08	22° ✕ 15'43	
max. Earth dist.	5945 Feb 27 12:22	9° ✕ 05'22	31.20596 AU	behind sun end	5951 Mar 13 10:38	22° ✕ 16'51	
morning rise	5945 Mar 15 02:03	9° ✕ 40'23		max. Earth dist.	5951 Mar 13 01:33	22° ✕ 16'03	31.14249 AU
retrograde	5945 Jun 11 05:05	11° ✕ 34'51		morning rise	5951 Mar 28 12:45	22° ✕ 50'52	
opposition	5945 Aug 29 18:55	10° ✕ 12'06	0°22'58	retrograde	5951 Jun 25 02:36	24° ✕ 46'03	
min. Earth dist.	5945 Aug 30 00:56	10° ✕ 11'42	29.20220 AU	opposition	5951 Sep 13 00:02	23° ✕ 22'50	0°03'29
direct	5945 Nov 18 03:46	8° ✕ 48'21		min. Earth dist.	5951 Sep 13 01:41	23° ✕ 22'43	29.13687 AU
evening set	5946 Feb 14 19:14	10° ✕ 42'58		direct	5951 Dec 02 03:48	21° ✕ 59'09	
				evening set	5952 Feb 28 05:45	23° ✕ 53'25	
conjunction	5946 Mar 02 03:47	11° ✕ 17'29	0°20'01				
minimum elong	5946 Mar 02 03:46	11° ✕ 17'29	0°20'02	conjunction	5952 Mar 14 14:02	24° ✕ 27'59	0°01'46
max. Earth dist.	5946 Mar 01 21:55	11° ✕ 16'57	31.19804 AU	minimum elong	5952 Mar 14 14:02	24° ✕ 27'59	0°01'47
morning rise	5946 Mar 17 11:52	11° ✕ 51'59		behind sun begin	5952 Mar 14 07:38	24° ✕ 27'24	
retrograde	5946 Jun 13 18:23	13° ✕ 46'35		behind sun end	5952 Mar 14 20:26	24° ✕ 28'33	
opposition	5946 Sep 01 07:39	12° ✕ 23'48	0°19'46	max. Earth dist.	5952 Mar 14 13:18	24° ✕ 27'57	31.13144 AU
min. Earth dist.	5946 Sep 01 12:16	12° ✕ 23'30	29.19362 AU	morning rise	5952 Mar 29 22:18	25° ✕ 02'35	
direct	5946 Nov 20 16:22	11° ✕ 00'05		retrograde	5952 Jun 26 12:24	26° ✕ 57'54	
evening set	5947 Feb 17 05:04	12° ✕ 54'40		opposition	5952 Sep 14 12:59	25° ✕ 34'36	0°00'11
				min. Earth dist.	5952 Sep 14 13:33	25° ✕ 34'34	29.12633 AU
conjunction	5947 Mar 04 13:32	13° ✕ 29'13	0°17'01	desc. node	5952 Oct 05 07:00	25° ✕ 01'40	
minimum elong	5947 Mar 04 13:32	13° ✕ 29'13	0°17'01	direct	5952 Dec 03 15:42	24° ✕ 10'56	
max. Earth dist.	5947 Mar 04 08:28	13° ✕ 28'45	31.18871 AU	evening set	5953 Mar 01 15:34	26° ✕ 05'09	
morning rise	5947 Mar 19 21:34	14° ✕ 03'44					
retrograde	5947 Jun 16 06:32	15° ✕ 58'28		conjunction	5953 Mar 16 23:40	26° ✕ 39'44	-0°01'25
opposition	5947 Sep 03 20:39	14° ✕ 35'37	0°16'33	minimum elong	5953 Mar 16 23:40	26° ✕ 39'44	0°01'25
min. Earth dist.	5947 Sep 04 01:46	14° ✕ 35'16	29.18366 AU	behind sun begin	5953 Mar 16 17:17	26° ✕ 39'09	
direct	5947 Nov 23 04:34	13° ✕ 11'56		behind sun end	5953 Mar 17 06:04	26° ✕ 40'19	
evening set	5948 Feb 19 14:57	15° ✕ 06'28		max. Earth dist.	5953 Mar 16 22:55	26° ✕ 39'43	31.12157 AU
				morning rise	5953 Apr 01 08:13	27° ✕ 14'21	
conjunction	5948 Mar 05 23:22	15° ✕ 41'00	0°14'00	retrograde	5953 Jun 29 01:21	29° ✕ 09'48	
minimum elong	5948 Mar 05 23:22	15° ✕ 41'00	0°14'01	opposition	5953 Sep 17 01:42	27° ✕ 46'27	-0°03'07
behind sun begin	5948 Mar 05 20:01	15° ✕ 40'42		min. Earth dist.	5953 Sep 17 00:49	27° ✕ 46'31	29.11710 AU
behind sun end	5948 Mar 06 02:43	15° ✕ 41'18		direct	5953 Dec 06 00:56	26° ✕ 22'48	
max. Earth dist.	5948 Mar 05 18:49	15° ✕ 40'35	31.17822 AU	evening set	5954 Mar 04 01:15	28° ✕ 17'00	
morning rise	5948 Mar 21 07:26	16° ✕ 15'32					
retrograde	5948 Jun 17 17:52	18° ✕ 10'23		conjunction	5954 Mar 19 09:30	28° ✕ 51'36	-0°04'31
opposition	5948 Sep 05 09:28	16° ✕ 47'28	0°13'18	minimum elong	5954 Mar 19 09:29	28° ✕ 51'36	0°04'31
min. Earth dist.	5948 Sep 05 12:58	16° ✕ 47'14	29.17250 AU	behind sun begin	5954 Mar 19 03:12	28° ✕ 51'01	
direct	5948 Nov 24 17:27	15° ✕ 23'47		behind sun end	5954 Mar 19 15:46	28° ✕ 52'10	
evening set	5949 Feb 21 00:42	17° ✕ 18'16		max. Earth dist.	5954 Mar 19 10:34	28° ✕ 51'40	31.11278 AU
				morning rise	5954 Apr 03 18:00	29° ✕ 26'14	
conjunction	5949 Mar 08 09:01	17° ✕ 52'48	0°10'58		5954 Apr 19 14:20	0° °	
minimum elong	5949 Mar 08 09:01	17° ✕ 52'48	0°10'57	retrograde	5954 Jul 01 12:25	1° ° 21'50	
behind sun begin	5949 Mar 08 04:08	17° ✕ 52'22			5954 Sep 18 15:40	30° ° ✕	
behind sun end	5949 Mar 08 13:54	17° ✕ 53'15		opposition	5954 Sep 19 14:41	29° ✕ 58'26	-0°06'25
max. Earth dist.	5949 Mar 08 04:37	17° ✕ 52'25	31.16656 AU	min. Earth dist.	5954 Sep 19 13:35	29° ✕ 58'31	29.10874 AU
morning rise	5949 Mar 23 17:14	18° ✕ 27'22		direct	5954 Dec 08 11:47	28° ✕ 34'51	
retrograde	5949 Jun 20 04:32	20° ✕ 22'19			5955 Feb 20 21:56	0° °	

evening set	5955 Mar 06 11:01	0°♈29'01	conjunction	5961 Apr 03 07:59	14°♈19'06 -0°25'43
			minimum elong	5961 Apr 03 07:59	14°♈19'05 0°25'44
conjunction	5955 Mar 21 19:09	1°♈03'36 -0°07'35	max. Earth dist.	5961 Apr 03 13:56	14°♈19'39 31.05244 AU
minimum elong	5955 Mar 21 19:09	1°♈03'36 0°07'36	morning rise	5961 Apr 18 17:30	14°♈53'54
behind sun begin	5955 Mar 21 13:20	1°♈03'05	retrograde	5961 Jul 17 02:46	16°♈50'28
behind sun end	5955 Mar 22 00:59	1°♈04'08	opposition	5961 Oct 05 10:43	15°♈26'40 -0°29'03
max. Earth dist.	5955 Mar 21 20:41	1°♈03'44 31.10490 AU	min. Earth dist.	5961 Oct 05 04:53	15°♈27'04 29.04661 AU
morning rise	5955 Apr 06 03:52	1°♈38'16	direct	5961 Dec 23 23:50	14°♈03'18
retrograde	5955 Jul 04 02:21	3°♈34'01	evening set	5962 Mar 21 09:47	15°♈57'13
opposition	5955 Sep 22 03:39	2°♈10'35 -0°09'42			
min. Earth dist.	5955 Sep 22 00:43	2°♈10'47 29.10113 AU	conjunction	5962 Apr 05 18:14	16°♈31'54 -0°28'38
direct	5955 Dec 10 23:49	0°♈47'03	minimum elong	5962 Apr 05 18:14	16°♈31'54 0°28'38
evening set	5956 Mar 07 20:53	2°♈41'12	max. Earth dist.	5962 Apr 05 23:46	16°♈32'25 31.04061 AU
			morning rise	5962 Apr 21 04:06	17°♈06'43
conjunction	5956 Mar 23 05:04	3°♈15'48 -0°10'39	retrograde	5962 Jul 19 15:51	19°♈03'24
minimum elong	5956 Mar 23 05:03	3°♈15'48 0°10'39	opposition	5962 Oct 07 23:54	17°♈39'30 -0°32'09
behind sun begin	5956 Mar 23 00:03	3°♈15'21	min. Earth dist.	5962 Oct 07 17:00	17°♈39'58 29.03466 AU
behind sun end	5956 Mar 23 10:03	3°♈16'15	direct	5962 Dec 26 10:06	16°♈16'06
max. Earth dist.	5956 Mar 23 07:41	3°♈16'02 31.09741 AU	evening set	5963 Mar 23 19:51	18°♈09'57
morning rise	5956 Apr 07 13:51	3°♈50'29			
retrograde	5956 Jul 05 15:15	5°♈46'24	conjunction	5963 Apr 08 04:29	18°♈44'39 -0°31'31
opposition	5956 Sep 23 16:48	4°♈22'55 -0°12'59	minimum elong	5963 Apr 08 04:29	18°♈44'39 0°31'33
min. Earth dist.	5956 Sep 23 14:07	4°♈23'06 29.09380 AU	max. Earth dist.	5963 Apr 08 11:40	18°♈45'20 31.02857 AU
direct	5956 Dec 12 10:51	2°♈59'26	morning rise	5963 Apr 23 14:25	19°♈19'30
evening set	5957 Mar 10 06:45	4°♈53'34	retrograde	5963 Jul 22 02:47	21°♈16'17
			opposition	5963 Oct 10 13:11	19°♈52'17 -0°35'13
conjunction	5957 Mar 25 15:01	5°♈28'11 -0°13'42	min. Earth dist.	5963 Oct 10 06:06	19°♈52'46 29.02287 AU
minimum elong	5957 Mar 25 15:01	5°♈28'11 0°13'44	direct	5963 Dec 28 21:41	18°♈28'53
behind sun begin	5957 Mar 25 11:28	5°♈27'52	evening set	5964 Mar 25 06:05	20°♈22'41
behind sun end	5957 Mar 25 18:33	5°♈28'31			
max. Earth dist.	5957 Mar 25 18:32	5°♈28'30 31.09009 AU	conjunction	5964 Apr 09 14:47	20°♈57'24 -0°34'21
morning rise	5957 Apr 09 23:57	6°♈02'54	minimum elong	5964 Apr 09 14:47	20°♈57'24 0°34'22
retrograde	5957 Jul 08 03:42	7°♈58'57	max. Earth dist.	5964 Apr 09 22:26	20°♈58'07 31.01722 AU
opposition	5957 Sep 26 05:50	6°♈35'26 -0°16'15	morning rise	5964 Apr 25 01:00	21°♈32'16
min. Earth dist.	5957 Sep 26 01:27	6°♈35'44 29.08623 AU	retrograde	5964 Jul 23 16:32	23°♈29'10
direct	5957 Dec 14 23:22	5°♈12'00	opposition	5964 Oct 12 02:12	22°♈05'05 -0°38'13
evening set	5958 Mar 12 16:54	7°♈06'07	min. Earth dist.	5964 Oct 11 17:20	22°♈05'41 29.01204 AU
			direct	5964 Dec 30 09:14	20°♈41'41
conjunction	5958 Mar 28 01:04	7°♈40'45 -0°16'45	evening set	5965 Mar 27 16:20	22°♈35'28
minimum elong	5958 Mar 28 01:04	7°♈40'45 0°16'45			
max. Earth dist.	5958 Mar 28 04:37	7°♈41'04 31.08215 AU	conjunction	5965 Apr 12 01:10	23°♈10'11 -0°37'08
morning rise	5958 Apr 12 10:12	8°♈15'29	minimum elong	5965 Apr 12 01:09	23°♈10'11 0°37'10
retrograde	5958 Jul 10 16:17	10°♈11'41	max. Earth dist.	5965 Apr 12 09:52	23°♈11'00 31.00679 AU
opposition	5958 Sep 28 19:01	8°♈48'07 -0°19'30	morning rise	5965 Apr 27 11:36	23°♈45'05
min. Earth dist.	5958 Sep 28 14:59	8°♈48'24 29.07799 AU	retrograde	5965 Jul 26 05:12	25°♈42'07
direct	5958 Dec 17 11:00	7°♈24'44	opposition	5965 Oct 14 15:24	24°♈17'58 -0°41'10
evening set	5959 Mar 15 03:02	9°♈18'49	min. Earth dist.	5965 Oct 14 06:38	24°♈18'34 29.00227 AU
			direct	5966 Jan 01 19:52	22°♈54'35
conjunction	5959 Mar 30 11:23	9°♈53'28 -0°19'46	evening set	5966 Mar 30 02:33	24°♈48'21
minimum elong	5959 Mar 30 11:22	9°♈53'28 0°19'47			
max. Earth dist.	5959 Mar 30 16:17	9°♈53'55 31.07343 AU	conjunction	5966 Apr 14 11:34	25°♈23'05 -0°39'52
morning rise	5959 Apr 14 20:31	10°♈28'13	minimum elong	5966 Apr 14 11:34	25°♈23'05 0°39'53
retrograde	5959 Jul 13 04:15	12°♈24'33	max. Earth dist.	5966 Apr 14 21:24	25°♈24'01 30.99761 AU
opposition	5959 Oct 01 08:17	11°♈00'56 -0°22'43	morning rise	5966 Apr 29 22:10	25°♈58'01
min. Earth dist.	5959 Oct 01 03:04	11°♈01'17 29.06865 AU	retrograde	5966 Jul 28 18:16	27°♈55'10
direct	5959 Dec 20 00:29	9°♈37'34	opposition	5966 Oct 17 04:24	26°♈30'59 -0°44'04
evening set	5960 Mar 16 13:16	11°♈31'36	min. Earth dist.	5966 Oct 16 17:39	26°♈31'43 28.99360 AU
			direct	5967 Jan 04 08:12	25°♈07'38
conjunction	5960 Mar 31 21:31	12°♈06'16 -0°22'45	evening set	5967 Apr 01 12:58	27°♈01'24
minimum elong	5960 Mar 31 21:31	12°♈06'16 0°22'45			
max. Earth dist.	5960 Apr 01 01:57	12°♈06'40 31.06351 AU	conjunction	5967 Apr 16 22:00	27°♈36'10 -0°42'33
morning rise	5960 Apr 16 07:00	12°♈41'03	minimum elong	5967 Apr 16 22:00	27°♈36'10 0°42'34
retrograde	5960 Jul 14 16:41	14°♈37'30	max. Earth dist.	5967 Apr 17 08:07	27°♈37'07 30.98944 AU
opposition	5960 Oct 02 21:37	13°♈13'48 -0°25'54	morning rise	5967 May 02 08:58	28°♈11'07
min. Earth dist.	5960 Oct 02 16:17	13°♈14'10 29.05821 AU			
direct	5960 Dec 21 11:14	11°♈50'27	retrograde	5967 Jul 31 08:04	0°♈8'25
evening set	5961 Mar 18 23:28	13°♈44'25		5967 Aug 23 06:08	30°♈♈

opposition	5967 Oct 19 17:43	28° Υ 44'12 -0°46'54	conjunction	5974 May 02 02:39	13° \mathcal{B} 13'13 -0°59'20
min. Earth dist.	5967 Oct 19 06:59	28° Υ 44'55 28.98598 AU	minimum elong	5974 May 02 02:39	13° \mathcal{B} 13'13 0°59'21
direct	5968 Jan 06 19:44	27° Υ 20'54	max. Earth dist.	5974 May 02 16:34	13° \mathcal{B} 14'32 30.93217 AU
evening set	5968 Apr 02 23:13	29° Υ 14'39	morning rise	5974 May 17 15:34	13° \mathcal{B} 48'23
				5974 Jun 22 21:16	15° \mathcal{B}
conjunction	5968 Apr 18 08:36	29° Υ 49'27 -0°45'10	retrograde	5974 Aug 16 00:12	15° \mathcal{B} 46'30
minimum elong	5968 Apr 18 08:36	29° Υ 49'27 0°45'10		5974 Oct 11 15:35	15° \mathcal{R} \mathcal{B}
max. Earth dist.	5968 Apr 18 20:28	29° Υ 50'34 30.98218 AU	opposition	5974 Nov 04 14:31	14° \mathcal{B} 21'57 -1°04'34
	5968 Apr 22 23:42	0° \mathcal{B}	min. Earth dist.	5974 Nov 04 01:00	14° \mathcal{B} 22'53 28.92708 AU
morning rise	5968 May 03 19:41	0° \mathcal{B} 24'26	direct	5975 Jan 22 04:30	12° \mathcal{B} 58'46
retrograde	5968 Aug 01 21:16	2° \mathcal{B} 21'52	evening set	5975 Apr 19 03:06	14° \mathcal{B} 52'23
opposition	5968 Oct 21 06:52	0° \mathcal{B} 57'38 -0°49'39		5975 Apr 22 13:06	15° \mathcal{B}
min. Earth dist.	5968 Oct 20 18:47	0° \mathcal{B} 58'28 28.97893 AU			
	5968 Nov 28 23:29	30° \mathcal{R} Υ	conjunction	5975 May 04 13:55	15° \mathcal{B} 27'19 -1°01'24
direct	5969 Jan 08 09:08	29° Υ 34'24	minimum elong	5975 May 04 13:55	15° \mathcal{B} 27'19 1°01'26
	5969 Feb 16 08:28	0° \mathcal{B}	max. Earth dist.	5975 May 05 04:37	15° \mathcal{B} 28'43 30.92117 AU
evening set	5969 Apr 05 09:53	1° \mathcal{B} 28'09	morning rise	5975 May 20 03:06	16° \mathcal{B} 02'30
			retrograde	5975 Aug 18 13:47	18° \mathcal{B} 00'41
conjunction	5969 Apr 20 19:16	2° \mathcal{B} 02'58 -0°47'43	opposition	5975 Nov 07 03:37	16° \mathcal{B} 36'02 -1°06'43
minimum elong	5969 Apr 20 19:16	2° \mathcal{B} 02'58 0°47'44	min. Earth dist.	5975 Nov 06 12:31	16° \mathcal{B} 37'04 28.91613 AU
max. Earth dist.	5969 Apr 21 06:48	2° \mathcal{B} 04'04 30.97529 AU	direct	5976 Jan 24 17:27	15° \mathcal{B} 12'47
morning rise	5969 May 06 06:47	2° \mathcal{B} 38'00	evening set	5976 Apr 20 14:05	17° \mathcal{B} 06'21
retrograde	5969 Aug 04 10:12	4° \mathcal{B} 35'34			
opposition	5969 Oct 23 20:00	3° \mathcal{B} 11'19 -0°52'21	conjunction	5976 May 06 01:02	17° \mathcal{B} 41'18 -1°03'23
min. Earth dist.	5969 Oct 23 07:49	3° \mathcal{B} 12'09 28.97218 AU	minimum elong	5976 May 06 01:02	17° \mathcal{B} 41'18 1°03'24
direct	5970 Jan 10 19:29	1° \mathcal{B} 48'08	max. Earth dist.	5976 May 06 15:45	17° \mathcal{B} 42'42 30.91035 AU
evening set	5970 Apr 07 20:31	3° \mathcal{B} 41'53	morning rise	5976 May 21 14:41	18° \mathcal{B} 16'31
			retrograde	5976 Aug 20 03:39	20° \mathcal{B} 14'45
conjunction	5970 Apr 23 06:13	4° \mathcal{B} 16'44 -0°50'11	opposition	5976 Nov 08 16:49	18° \mathcal{B} 50'00 -1°08'48
minimum elong	5970 Apr 23 06:13	4° \mathcal{B} 16'44 0°50'12	min. Earth dist.	5976 Nov 08 02:00	18° \mathcal{B} 51'01 28.90577 AU
max. Earth dist.	5970 Apr 23 19:22	4° \mathcal{B} 17'58 30.96836 AU	direct	5977 Jan 26 05:13	17° \mathcal{B} 26'43
morning rise	5970 May 08 17:50	4° \mathcal{B} 51'47	evening set	5977 Apr 23 01:03	19° \mathcal{B} 20'15
retrograde	5970 Aug 06 21:20	6° \mathcal{B} 49'30			
opposition	5970 Oct 26 09:18	5° \mathcal{B} 25'13 -0°54'58	conjunction	5977 May 08 12:27	19° \mathcal{B} 55'14 -1°05'16
min. Earth dist.	5970 Oct 25 20:36	5° \mathcal{B} 26'06 28.96502 AU	minimum elong	5977 May 08 12:26	19° \mathcal{B} 55'14 1°05'18
direct	5971 Jan 13 08:17	4° \mathcal{B} 02'05	max. Earth dist.	5977 May 09 04:44	19° \mathcal{B} 56'46 30.90042 AU
evening set	5971 Apr 10 07:18	5° \mathcal{B} 55'50	morning rise	5977 May 24 02:16	20° \mathcal{B} 30'28
			retrograde	5977 Aug 22 16:40	22° \mathcal{B} 28'45
conjunction	5971 Apr 25 17:03	6° \mathcal{B} 30'42 -0°52'36	opposition	5977 Nov 11 05:39	21° \mathcal{B} 03'55 -1°10'45
minimum elong	5971 Apr 25 17:02	6° \mathcal{B} 30'42 0°52'38	min. Earth dist.	5977 Nov 10 13:28	21° \mathcal{B} 05'02 28.89638 AU
max. Earth dist.	5971 Apr 26 05:38	6° \mathcal{B} 31'54 30.96091 AU	direct	5978 Jan 28 18:38	19° \mathcal{B} 40'37
morning rise	5971 May 11 05:04	7° \mathcal{B} 05'47	evening set	5978 Apr 25 12:12	21° \mathcal{B} 34'08
retrograde	5971 Aug 09 11:40	9° \mathcal{B} 03'38			
opposition	5971 Oct 28 22:40	7° \mathcal{B} 39'19 -0°57'30	conjunction	5978 May 10 23:42	22° \mathcal{B} 09'07 -1°07'03
min. Earth dist.	5971 Oct 28 09:14	7° \mathcal{B} 40'15 28.95721 AU	minimum elong	5978 May 10 23:42	22° \mathcal{B} 09'07 1°07'04
direct	5972 Jan 15 18:49	6° \mathcal{B} 16'12	max. Earth dist.	5978 May 11 15:42	22° \mathcal{B} 10'38 30.89165 AU
evening set	5972 Apr 11 18:13	8° \mathcal{B} 09'57	morning rise	5978 May 26 14:01	22° \mathcal{B} 44'24
			retrograde	5978 Aug 25 06:07	24° \mathcal{B} 42'45
conjunction	5972 Apr 27 04:17	8° \mathcal{B} 44'50 -0°54'55	opposition	5978 Nov 13 18:44	23° \mathcal{B} 17'51 -1°12'37
minimum elong	5972 Apr 27 04:16	8° \mathcal{B} 44'50 0°54'56	min. Earth dist.	5978 Nov 13 02:19	23° \mathcal{B} 18'59 28.88837 AU
max. Earth dist.	5972 Apr 27 17:55	8° \mathcal{B} 46'08 30.95244 AU	direct	5979 Jan 31 05:23	21° \mathcal{B} 54'32
morning rise	5972 May 12 16:29	9° \mathcal{B} 19'57	evening set	5979 Apr 27 23:06	23° \mathcal{B} 48'02
retrograde	5972 Aug 10 22:44	11° \mathcal{B} 17'55			
opposition	5972 Oct 30 11:58	9° \mathcal{B} 53'32 -0°59'56	conjunction	5979 May 13 11:04	24° \mathcal{B} 23'03 -1°08'44
min. Earth dist.	5972 Oct 29 22:55	9° \mathcal{B} 54'26 28.94819 AU	minimum elong	5979 May 13 11:04	24° \mathcal{B} 23'03 1°08'46
direct	5973 Jan 17 06:42	8° \mathcal{B} 30'25	max. Earth dist.	5979 May 14 04:53	24° \mathcal{B} 24'45 30.88421 AU
evening set	5973 Apr 14 05:13	10° \mathcal{B} 24'08	morning rise	5979 May 29 01:35	24° \mathcal{B} 58'21
			retrograde	5979 Aug 27 18:24	26° \mathcal{B} 56'46
conjunction	5973 Apr 29 15:30	10° \mathcal{B} 59'02 -0°57'10	opposition	5979 Nov 16 07:45	25° \mathcal{B} 31'50 -1°14'22
minimum elong	5973 Apr 29 15:30	10° \mathcal{B} 59'02 0°57'12	min. Earth dist.	5979 Nov 15 14:34	25° \mathcal{B} 33'02 28.88154 AU
max. Earth dist.	5973 Apr 30 04:56	11° \mathcal{B} 00'18 30.94289 AU	direct	5980 Feb 02 18:49	24° \mathcal{B} 08'32
morning rise	5973 May 15 04:06	11° \mathcal{B} 34'11	evening set	5980 Apr 29 10:23	26° \mathcal{B} 02'01
retrograde	5973 Aug 13 12:08	13° \mathcal{B} 32'13			
min. Earth dist.	5973 Nov 01 11:03	12° \mathcal{B} 08'45 28.93805 AU	conjunction	5980 May 14 22:31	26° \mathcal{B} 37'04 -1°10'19
opposition	5973 Nov 02 01:12	12° \mathcal{B} 07'46 -1°02'18	minimum elong	5980 May 14 22:31	26° \mathcal{B} 37'04 1°10'20
direct	5974 Jan 19 18:07	10° \mathcal{B} 44'37	max. Earth dist.	5980 May 15 15:59	26° \mathcal{B} 38'44 30.87805 AU
evening set	5974 Apr 16 16:11	12° \mathcal{B} 38'18	morning rise	5980 May 30 13:35	27° \mathcal{B} 12'24

retrograde	5980 Aug 29 08:56	29° 8 10'54	evening set	5987 May 15 19:42	11° II 44'29
opposition	5980 Nov 17 20:35	27° 8 45'57 -1°16'00			
min. Earth dist.	5980 Nov 17 02:36	27° 8 47'12 28.87598 AU	conjunction	5987 May 31 10:19	12° II 19'44 -1°18'19
direct	5981 Feb 04 05:41	26° 8 22'40	minimum elong	5987 May 31 10:19	12° II 19'44 1°18'21
evening set	5981 May 01 21:38	28° 8 16'10	max. Earth dist.	5987 Jun 01 05:13	12° II 21'32 30.83922 AU
			morning rise	5987 Jun 16 04:11	12° II 55'17
conjunction	5981 May 17 10:12	28° 8 51'15 -1°11'48	retrograde	5987 Sep 15 06:03	14° II 54'12
minimum elong	5981 May 17 10:12	28° 8 51'15 1°11'50	opposition	5987 Dec 04 15:08	13° II 29'06 -1°24'07
max. Earth dist.	5981 May 18 04:56	28° 8 53'02 30.87282 AU	min. Earth dist.	5987 Dec 03 20:36	13° II 30'23 28.83639 AU
morning rise	5981 Jun 02 01:31	29° 8 26'37	direct	5988 Feb 20 14:17	12° II 05'46
	5981 Jun 17 16:07	0° II	evening set	5988 May 17 07:29	13° II 59'19
retrograde	5981 Aug 31 20:10	1° II 25'12			
opposition	5981 Nov 20 09:34	0° II 00'15 -1°17'31	conjunction	5988 Jun 01 22:40	14° II 34'36 -1°19'00
min. Earth dist.	5981 Nov 19 15:45	0° II 01'29 28.87111 AU	minimum elong	5988 Jun 01 22:40	14° II 34'36 1°19'01
	5981 Nov 20 13:07	30° 8	max. Earth dist.	5988 Jun 02 18:56	14° II 36'31 30.83216 AU
direct	5982 Feb 06 17:25	28° 8 36'59	morning rise	5988 Jun 17 16:48	15° II 10'10
	5982 Apr 20 03:18	0° II	retrograde	5988 Sep 16 19:27	17° II 09'05
evening set	5982 May 04 09:00	0° II 30'30	min. Earth dist.	5988 Dec 05 08:46	15° II 45'14 28.82960 AU
			opposition	5988 Dec 06 03:39	15° II 43'55 -1°24'47
conjunction	5982 May 19 21:50	1° II 05'37 -1°13'10	direct	5989 Feb 22 04:28	14° II 20'32
minimum elong	5982 May 19 21:50	1° II 05'37 1°13'11	evening set	5989 May 19 19:26	16° II 14'05
max. Earth dist.	5982 May 20 16:35	1° II 07'23 30.86826 AU			
morning rise	5982 Jun 04 13:35	1° II 41'01	conjunction	5989 Jun 04 10:54	16° II 49'23 -1°19'33
retrograde	5982 Sep 03 09:52	3° II 39'41	minimum elong	5989 Jun 04 10:54	16° II 49'23 1°19'36
opposition	5982 Nov 22 22:29	2° II 14'44 -1°18'56	max. Earth dist.	5989 Jun 05 06:25	16° II 51'14 30.82585 AU
min. Earth dist.	5982 Nov 22 03:35	2° II 16'03 28.86667 AU	morning rise	5989 Jun 20 05:36	17° II 24'59
direct	5983 Feb 09 04:20	0° II 51'30	retrograde	5989 Sep 19 09:51	19° II 23'54
evening set	5983 May 06 20:36	2° II 45'03	opposition	5989 Dec 08 16:16	17° II 58'41 -1°25'20
			min. Earth dist.	5989 Dec 07 20:51	18° II 00'01 28.82388 AU
conjunction	5983 May 22 09:44	3° II 20'11 -1°14'25	direct	5990 Feb 24 16:10	16° II 35'15
minimum elong	5983 May 22 09:44	3° II 20'11 1°14'28	evening set	5990 May 22 07:11	18° II 28'47
max. Earth dist.	5983 May 23 04:54	3° II 22'00 30.86371 AU			
morning rise	5983 Jun 07 01:52	3° II 55'37	conjunction	5990 Jun 06 23:07	19° II 04'07 -1°20'00
retrograde	5983 Sep 05 22:27	5° II 54'23	minimum elong	5990 Jun 06 23:07	19° II 04'07 1°20'01
opposition	5983 Nov 25 11:32	4° II 29'26 -1°20'13	max. Earth dist.	5990 Jun 07 19:53	19° II 06'05 30.82061 AU
min. Earth dist.	5983 Nov 24 17:32	4° II 30'41 28.86207 AU	morning rise	5990 Jun 22 18:07	19° II 39'45
direct	5984 Feb 11 14:08	3° II 06'13	retrograde	5990 Sep 21 21:04	21° II 38'40
evening set	5984 May 08 08:14	4° II 59'48	min. Earth dist.	5990 Dec 10 09:34	20° II 14'45 28.81936 AU
			opposition	5990 Dec 11 04:52	20° II 13'24 -1°25'44
conjunction	5984 May 23 21:50	5° II 34'57 -1°15'34	direct	5991 Feb 27 04:30	18° II 49'58
minimum elong	5984 May 23 21:50	5° II 34'57 1°15'35	evening set	5991 May 24 19:08	20° II 43'29
max. Earth dist.	5984 May 24 17:19	5° II 36'48 30.85886 AU			
morning rise	5984 Jun 08 14:19	6° II 10'25	conjunction	5991 Jun 09 11:29	21° II 18'50 -1°20'19
retrograde	5984 Sep 07 12:31	8° II 09'15	minimum elong	5991 Jun 09 11:29	21° II 18'50 1°20'22
min. Earth dist.	5984 Nov 26 05:22	6° II 45'37 28.85678 AU	max. Earth dist.	5991 Jun 10 08:08	21° II 20'48 30.81694 AU
opposition	5984 Nov 27 00:27	6° II 44'18 -1°21'22	morning rise	5991 Jun 25 06:59	21° II 54'30
direct	5985 Feb 13 02:44	5° II 21'05	retrograde	5991 Sep 24 10:57	23° II 53'25
evening set	5985 May 10 20:09	7° II 14'40	opposition	5991 Dec 13 17:17	22° II 28'08 -1°26'01
			min. Earth dist.	5991 Dec 12 20:53	22° II 29'34 28.81646 AU
conjunction	5985 May 26 09:59	7° II 49'51 -1°16'36	direct	5992 Feb 29 15:54	21° II 04'41
minimum elong	5985 May 26 09:59	7° II 49'51 1°16'38	evening set	5992 May 26 07:09	22° II 58'12
max. Earth dist.	5985 May 27 04:46	7° II 51'38 30.85300 AU			
morning rise	5985 Jun 11 02:58	8° II 25'21	conjunction	5992 Jun 10 23:55	23° II 33'36 -1°20'31
retrograde	5985 Sep 10 02:28	10° II 24'14	minimum elong	5992 Jun 10 23:55	23° II 33'35 1°20'33
opposition	5985 Nov 29 13:23	8° II 59'14 -1°22'25	max. Earth dist.	5992 Jun 11 21:07	23° II 35'36 30.81468 AU
min. Earth dist.	5985 Nov 28 19:16	9° II 00'30 28.85053 AU	morning rise	5992 Jun 26 19:53	24° II 09'17
direct	5986 Feb 15 13:57	7° II 36'00	retrograde	5992 Sep 25 23:17	26° II 08'12
evening set	5986 May 13 07:54	9° II 29'36	min. Earth dist.	5992 Dec 14 10:09	24° II 44'18 28.81493 AU
			opposition	5992 Dec 15 05:49	24° II 42'56 -1°26'10
conjunction	5986 May 28 22:17	10° II 04'49 -1°17'31	direct	5993 Mar 03 02:04	23° II 19'28
minimum elong	5986 May 28 22:17	10° II 04'49 1°17'32	evening set	5993 May 28 19:12	25° II 13'01
max. Earth dist.	5986 May 29 17:59	10° II 06'41 30.84638 AU			
morning rise	5986 Jun 13 15:32	10° II 40'20	conjunction	5993 Jun 13 12:29	25° II 48'25 -1°20'36
retrograde	5986 Sep 12 15:55	12° II 39'14	minimum elong	5993 Jun 13 12:29	25° II 48'25 1°20'38
min. Earth dist.	5986 Dec 01 07:16	11° II 15'31 28.84351 AU	max. Earth dist.	5993 Jun 14 10:08	25° II 50'28 30.81387 AU
opposition	5986 Dec 02 02:14	11° II 14'12 -1°23'20	morning rise	5993 Jun 29 08:48	26° II 24'08
direct	5987 Feb 18 03:10	9° II 50'55	retrograde	5993 Sep 28 11:58	28° II 23'03

opposition	5993 Dec 17 18:06	26° Π 57'49	-1°26'10	conjunction	6000 Jun 29 07:27	11° \mathfrak{C} 34'43	-1°17'40
min. Earth dist.	5993 Dec 16 21:13	26° Π 59'16	28.81465 AU	minimum elong	6000 Jun 29 07:27	11° \mathfrak{C} 34'43	1°17'41
direct	5994 Mar 05 14:15	25° Π 34'21		max. Earth dist.	6000 Jun 30 03:16	11° \mathfrak{C} 36'35	30.81196 AU
evening set	5994 May 31 07:28	27° Π 27'55		morning rise	6000 Jul 15 06:57	12° \mathfrak{C} 10'36	
				retrograde	6000 Oct 14 12:14	14° \mathfrak{C} 09'20	
conjunction	5994 Jun 16 01:03	28° Π 03'21	-1°20'33	opposition	6001 Jan 02 08:18	12° \mathfrak{C} 44'06	-1°22'34
minimum elong	5994 Jun 16 01:03	28° Π 03'21	1°20'34	min. Earth dist.	6001 Jan 01 13:17	12° \mathfrak{C} 45'26	28.81180 AU
max. Earth dist.	5994 Jun 16 22:18	28° Π 05'22	30.81406 AU	direct	6001 Mar 21 02:02	11° \mathfrak{C} 20'29	
morning rise	5994 Jul 01 21:55	28° Π 39'06		evening set	6001 Jun 15 23:43	13° \mathfrak{C} 14'08	
	5994 Aug 13 04:31	0° \mathfrak{C}					
retrograde	5994 Oct 01 00:53	0° \mathfrak{C} 38'03		conjunction	6001 Jul 01 20:36	13° \mathfrak{C} 49'46	-1°16'46
	5994 Nov 20 09:22	30° \mathfrak{R} Π		minimum elong	6001 Jul 01 20:36	13° \mathfrak{C} 49'46	1°16'48
min. Earth dist.	5994 Dec 19 10:38	29° Π 14'13	28.81529 AU	max. Earth dist.	6001 Jul 02 16:35	13° \mathfrak{C} 51'39	30.81028 AU
opposition	5994 Dec 20 06:38	29° Π 12'49	-1°26'03	morning rise	6001 Jul 17 20:29	14° \mathfrak{C} 25'41	
direct	5995 Mar 08 00:11	27° Π 49'22		retrograde	6001 Oct 17 00:03	16° \mathfrak{C} 24'21	
evening set	5995 Jun 02 19:38	29° Π 42'58		opposition	6002 Jan 04 20:20	14° \mathfrak{C} 59'06	-1°21'33
	5995 Jun 10 10:35	0° \mathfrak{C}		min. Earth dist.	6002 Jan 04 02:27	15° \mathfrak{C} 00'22	28.81046 AU
				direct	6002 Mar 23 13:07	13° \mathfrak{C} 35'26	
conjunction	5995 Jun 18 13:50	0° \mathfrak{C} 18'26	-1°20'22	evening set	6002 Jun 18 12:24	15° \mathfrak{C} 29'06	
minimum elong	5995 Jun 18 13:50	0° \mathfrak{C} 18'26	1°20'24				
max. Earth dist.	5995 Jun 19 11:59	0° \mathfrak{C} 20'32	30.81497 AU	conjunction	6002 Jul 04 09:49	16° \mathfrak{C} 04'44	-1°15'45
morning rise	5995 Jul 04 11:01	0° \mathfrak{C} 54'12		minimum elong	6002 Jul 04 09:49	16° \mathfrak{C} 04'44	1°15'46
retrograde	5995 Oct 03 14:25	2° \mathfrak{C} 53'09		max. Earth dist.	6002 Jul 05 05:51	16° \mathfrak{C} 06'38	30.80949 AU
opposition	5995 Dec 22 18:58	1° \mathfrak{C} 27'57	-1°25'48	morning rise	6002 Jul 20 10:06	16° \mathfrak{C} 40'41	
min. Earth dist.	5995 Dec 21 22:20	1° \mathfrak{C} 29'24	28.81617 AU	retrograde	6002 Oct 19 12:38	18° \mathfrak{C} 39'16	
direct	5996 Mar 09 12:18	0° \mathfrak{C} 04'31		opposition	6003 Jan 07 08:11	17° \mathfrak{C} 14'02	-1°20'24
evening set	5996 Jun 04 08:18	1° \mathfrak{C} 58'09		min. Earth dist.	6003 Jan 06 13:21	17° \mathfrak{C} 15'21	28.81016 AU
				direct	6003 Mar 26 01:29	15° \mathfrak{C} 50'18	
conjunction	5996 Jun 20 02:46	2° \mathfrak{C} 33'39	-1°20'04	evening set	6003 Jun 21 01:08	17° \mathfrak{C} 43'59	
minimum elong	5996 Jun 20 02:46	2° \mathfrak{C} 33'39	1°20'05				
max. Earth dist.	5996 Jun 20 23:42	2° \mathfrak{C} 35'37	30.81575 AU	conjunction	6003 Jul 06 22:56	18° \mathfrak{C} 19'39	-1°14'37
morning rise	5996 Jul 06 00:33	3° \mathfrak{C} 09'27		minimum elong	6003 Jul 06 22:56	18° \mathfrak{C} 19'39	1°14'39
retrograde	5996 Oct 05 04:52	5° \mathfrak{C} 08'23		max. Earth dist.	6003 Jul 07 18:26	18° \mathfrak{C} 21'30	30.80973 AU
min. Earth dist.	5996 Dec 23 11:37	3° \mathfrak{C} 44'35	28.81678 AU	morning rise	6003 Jul 22 23:45	18° \mathfrak{C} 55'37	
opposition	5996 Dec 24 07:18	3° \mathfrak{C} 43'13	-1°25'24	retrograde	6003 Oct 22 00:47	20° \mathfrak{C} 54'09	
direct	5997 Mar 11 23:14	2° \mathfrak{C} 19'46		opposition	6004 Jan 09 20:10	19° \mathfrak{C} 28'55	-1°19'08
evening set	5997 Jun 06 20:55	4° \mathfrak{C} 13'26		min. Earth dist.	6004 Jan 09 02:19	19° \mathfrak{C} 30'10	28.81109 AU
				direct	6004 Mar 27 11:18	18° \mathfrak{C} 05'10	
conjunction	5997 Jun 22 16:00	4° \mathfrak{C} 48'57	-1°19'39	evening set	6004 Jun 22 13:55	19° \mathfrak{C} 58'52	
minimum elong	5997 Jun 22 16:01	4° \mathfrak{C} 48'57	1°19'41				
max. Earth dist.	5997 Jun 23 13:40	4° \mathfrak{C} 51'00	30.81593 AU	conjunction	6004 Jul 08 12:20	20° \mathfrak{C} 34'34	-1°13'23
morning rise	5997 Jul 08 14:02	5° \mathfrak{C} 24'46		minimum elong	6004 Jul 08 12:20	20° \mathfrak{C} 34'34	1°13'24
retrograde	5997 Oct 07 18:36	7° \mathfrak{C} 23'41		max. Earth dist.	6004 Jul 09 08:30	20° \mathfrak{C} 36'28	30.81136 AU
opposition	5997 Dec 26 19:40	5° \mathfrak{C} 58'31	-1°24'53	morning rise	6004 Jul 24 13:26	21° \mathfrak{C} 10'33	
min. Earth dist.	5997 Dec 26 00:09	5° \mathfrak{C} 59'53	28.81645 AU	retrograde	6004 Oct 23 13:32	23° \mathfrak{C} 09'01	
direct	5998 Mar 14 13:00	4° \mathfrak{C} 35'03		opposition	6005 Jan 11 07:47	21° \mathfrak{C} 43'49	-1°17'45
evening set	5998 Jun 09 09:33	6° \mathfrak{C} 28'43		min. Earth dist.	6005 Jan 10 13:12	21° \mathfrak{C} 45'08	28.81331 AU
				direct	6005 Mar 29 22:54	20° \mathfrak{C} 20'03	
conjunction	5998 Jun 25 04:57	7° \mathfrak{C} 04'16	-1°19'06	evening set	6005 Jun 25 02:52	22° \mathfrak{C} 13'48	
minimum elong	5998 Jun 25 04:57	7° \mathfrak{C} 04'16	1°19'08				
max. Earth dist.	5998 Jun 26 01:10	7° \mathfrak{C} 06'11	30.81522 AU	conjunction	6005 Jul 11 01:35	22° \mathfrak{C} 49'31	-1°12'01
morning rise	5998 Jul 11 03:35	7° \mathfrak{C} 40'07		minimum elong	6005 Jul 11 01:35	22° \mathfrak{C} 49'31	1°12'03
retrograde	5998 Oct 10 09:05	9° \mathfrak{C} 38'59		max. Earth dist.	6005 Jul 11 20:42	22° \mathfrak{C} 51'19	30.81431 AU
opposition	5998 Dec 29 08:03	8° \mathfrak{C} 13'48	-1°24'15	morning rise	6005 Jul 27 03:15	23° \mathfrak{C} 25'31	
min. Earth dist.	5998 Dec 28 12:42	8° \mathfrak{C} 15'10	28.81533 AU	retrograde	6005 Oct 26 02:55	25° \mathfrak{C} 23'57	
direct	5999 Mar 17 00:49	6° \mathfrak{C} 50'17		opposition	6006 Jan 13 19:39	23° \mathfrak{C} 58'47	-1°16'14
evening set	5999 Jun 11 22:15	8° \mathfrak{C} 43'58		min. Earth dist.	6006 Jan 13 01:45	24° \mathfrak{C} 00'03	28.81696 AU
				direct	6006 Apr 01 09:30	22° \mathfrak{C} 35'01	
conjunction	5999 Jun 27 18:15	9° \mathfrak{C} 19'32	-1°18'26	evening set	6006 Jun 27 15:34	24° \mathfrak{C} 28'48	
minimum elong	5999 Jun 27 18:15	9° \mathfrak{C} 19'32	1°18'29				
max. Earth dist.	5999 Jun 28 14:57	9° \mathfrak{C} 21'30	30.81371 AU	conjunction	6006 Jul 13 14:55	25° \mathfrak{C} 04'34	-1°10'33
morning rise	5999 Jul 13 17:13	9° \mathfrak{C} 55'25		minimum elong	6006 Jul 13 14:55	25° \mathfrak{C} 04'34	1°10'35
retrograde	5999 Oct 12 21:34	11° \mathfrak{C} 54'13		max. Earth dist.	6006 Jul 14 11:05	25° \mathfrak{C} 06'27	30.81856 AU
opposition	5999 Dec 31 20:14	10° \mathfrak{C} 29'01	-1°23'28	morning rise	6006 Jul 29 16:49	25° \mathfrak{C} 40'34	
min. Earth dist.	5999 Dec 31 01:42	10° \mathfrak{C} 30'19	28.81355 AU	retrograde	6006 Oct 28 16:02	27° \mathfrak{C} 38'57	
direct	6000 Mar 18 13:39	9° \mathfrak{C} 05'27		opposition	6007 Jan 16 07:24	26° \mathfrak{C} 13'52	-1°14'36
evening set	6000 Jun 13 10:59	10° \mathfrak{C} 59'06		min. Earth dist.	6007 Jan 15 13:30	26° \mathfrak{C} 15'07	28.82160 AU

direct	6007 Apr 03 22:31	24°☾50'06		minimum elong	6013 Jul 29 15:01	10°♊51'22	0°57'25
evening set	6007 Jun 30 04:43	26°☾43'57		max. Earth dist.	6013 Jul 30 06:32	10°♊52'49	30.84539 AU
				morning rise	6013 Aug 14 19:27	11°♊27'29	
conjunction	6007 Jul 16 04:22	27°☾19'43 -1°08'58		retrograde	6013 Nov 13 12:27	13°♊25'11	
minimum elong	6007 Jul 16 04:22	27°☾19'44 1°09'01		opposition	6014 Jan 31 16:14	12°♊00'16	-1°00'10
max. Earth dist.	6007 Jul 16 23:09	27°☾21'29 30.82367 AU		min. Earth dist.	6014 Jan 31 02:16	12°♊01'16	28.84686 AU
morning rise	6007 Aug 01 06:51	27°☾55'46		direct	6014 Apr 19 10:37	10°♊36'15	
retrograde	6007 Oct 31 06:26	29°☾54'06		evening set	6014 Jul 16 01:54	12°♊30'13	
opposition	6008 Jan 18 19:02	28°☾29'04 -1°12'51					
min. Earth dist.	6008 Jan 18 01:29	28°☾30'18 28.82695 AU		conjunction	6014 Aug 01 04:32	13°♊06'08	-0°55'09
direct	6008 Apr 05 09:18	27°☾05'18		minimum elong	6014 Aug 01 04:32	13°♊06'08	0°55'10
evening set	6008 Jul 01 17:54	28°☾59'13		max. Earth dist.	6014 Aug 01 18:41	13°♊07'27	30.84777 AU
				morning rise	6014 Aug 17 09:27	13°♊42'16	
conjunction	6008 Jul 17 18:07	29°☾35'01 -1°07'17			6014 Sep 27 01:55	15°♊	
minimum elong	6008 Jul 17 18:07	29°☾35'01 1°07'19		retrograde	6014 Nov 15 23:59	15°♊39'50	
max. Earth dist.	6008 Jul 18 13:16	29°☾36'49 30.82899 AU			6015 Jan 06 01:27	15°♊	
	6008 Jul 28 20:40	0°♊		opposition	6015 Feb 03 03:33	14°♊14'54	-0°57'43
morning rise	6008 Aug 02 20:50	0°♊11'05		min. Earth dist.	6015 Feb 02 14:38	14°♊15'49	28.84963 AU
retrograde	6008 Nov 01 19:47	2°♊09'21		direct	6015 Apr 21 21:25	12°♊50'48	
opposition	6009 Jan 20 06:45	0°♊44'23 -1°11'00		evening set	6015 Jul 18 15:10	14°♊44'47	
min. Earth dist.	6009 Jan 19 14:13	0°♊45'33 28.83209 AU			6015 Jul 25 12:32	15°♊	
	6009 Feb 16 22:47	30°♊☾					
direct	6009 Apr 07 22:06	29°☾20'38		conjunction	6015 Aug 03 18:22	15°♊20'43	-0°52'50
	6009 May 26 12:34	0°♊		minimum elong	6015 Aug 03 18:23	15°♊20'43	0°52'51
evening set	6009 Jul 04 07:12	1°♊14'35		max. Earth dist.	6015 Aug 04 09:13	15°♊22'06	30.85096 AU
				morning rise	6015 Aug 19 23:24	15°♊56'50	
conjunction	6009 Jul 20 07:45	1°♊50'25 -1°05'30		retrograde	6015 Nov 18 11:15	17°♊54'16	
minimum elong	6009 Jul 20 07:46	1°♊50'25 1°05'31		opposition	6016 Feb 05 14:33	16°♊29'21	-0°55'12
max. Earth dist.	6009 Jul 21 01:31	1°♊52'05 30.83392 AU		min. Earth dist.	6016 Feb 05 01:48	16°♊30'15	28.85325 AU
morning rise	6009 Aug 05 10:54	2°♊26'30		direct	6016 Apr 23 09:43	15°♊05'11	
retrograde	6009 Nov 04 11:14	4°♊24'42		evening set	6016 Jul 20 04:37	16°♊59'11	
opposition	6010 Jan 22 18:23	2°♊59'46 -1°09'01					
min. Earth dist.	6010 Jan 22 01:48	3°♊00'56 28.83659 AU		conjunction	6016 Aug 05 08:02	17°♊35'07	-0°50'26
direct	6010 Apr 10 11:07	1°♊36'00		minimum elong	6016 Aug 05 08:02	17°♊35'07	0°50'27
evening set	6010 Jul 06 20:34	3°♊29'59		max. Earth dist.	6016 Aug 05 21:20	17°♊36'22	30.85526 AU
				morning rise	6016 Aug 21 13:30	18°♊11'15	
conjunction	6010 Jul 22 21:35	4°♊05'50 -1°03'37		retrograde	6016 Nov 20 00:38	20°♊08'33	
minimum elong	6010 Jul 22 21:35	4°♊05'50 1°03'38		opposition	6017 Feb 07 01:39	18°♊43'40	-0°52'35
max. Earth dist.	6010 Jul 23 14:57	4°♊07'28 30.83789 AU		min. Earth dist.	6017 Feb 06 13:07	18°♊44'33	28.85826 AU
morning rise	6010 Aug 08 01:02	4°♊41'56		direct	6017 Apr 25 20:18	17°♊19'26	
retrograde	6010 Nov 06 23:07	6°♊40'02		evening set	6017 Jul 22 17:47	19°♊13'28	
opposition	6011 Jan 25 06:05	5°♊15'08 -1°06'57					
min. Earth dist.	6011 Jan 24 15:09	5°♊16'11 28.84007 AU		conjunction	6017 Aug 07 21:40	19°♊49'25	-0°47'57
direct	6011 Apr 12 22:56	3°♊51'19		minimum elong	6017 Aug 07 21:40	19°♊49'25	0°47'58
evening set	6011 Jul 09 09:53	5°♊45'18		max. Earth dist.	6017 Aug 08 11:38	19°♊50'43	30.86091 AU
				morning rise	6017 Aug 24 03:13	20°♊25'33	
conjunction	6011 Jul 25 11:25	6°♊21'11 -1°01'38		retrograde	6017 Nov 22 12:29	22°♊22'44	
minimum elong	6011 Jul 25 11:25	6°♊21'11 1°01'39		opposition	6018 Feb 09 12:44	20°♊57'53	-0°49'54
max. Earth dist.	6011 Jul 26 04:00	6°♊22'44 30.84102 AU		min. Earth dist.	6018 Feb 09 00:51	20°♊58'44	28.86460 AU
morning rise	6011 Aug 10 15:15	6°♊57'17		direct	6018 Apr 28 09:00	19°♊33'39	
retrograde	6011 Nov 09 12:26	8°♊55'16		evening set	6018 Jul 25 07:09	21°♊27'43	
opposition	6012 Jan 27 17:35	7°♊30'22 -1°04'47					
min. Earth dist.	6012 Jan 27 02:22	7°♊31'26 28.84266 AU		conjunction	6018 Aug 10 11:19	22°♊03'41	-0°45'24
direct	6012 Apr 14 11:47	6°♊06'30		minimum elong	6018 Aug 10 11:19	22°♊03'41	0°45'26
evening set	6012 Jul 10 23:22	8°♊00'29		max. Earth dist.	6018 Aug 11 00:04	22°♊04'52	30.86812 AU
				morning rise	6018 Aug 26 17:14	22°♊39'49	
conjunction	6012 Jul 27 01:13	8°♊36'22 -0°59'33		retrograde	6018 Nov 25 02:55	24°♊36'54	
minimum elong	6012 Jul 27 01:13	8°♊36'22 0°59'34		opposition	6019 Feb 11 23:37	23°♊12'07	-0°47'08
max. Earth dist.	6012 Jul 27 16:38	8°♊37'49 30.84326 AU		min. Earth dist.	6019 Feb 11 11:25	23°♊12'59	28.87246 AU
morning rise	6012 Aug 12 05:26	9°♊12'29		direct	6019 Apr 30 21:27	21°♊47'52	
retrograde	6012 Nov 11 00:45	11°♊10'20		evening set	6019 Jul 27 20:33	23°♊42'00	
opposition	6013 Jan 29 04:59	9°♊45'25 -1°02'31					
min. Earth dist.	6013 Jan 28 15:22	9°♊46'23 28.84475 AU		conjunction	6019 Aug 13 01:06	24°♊17'59	-0°42'47
direct	6013 Apr 16 22:16	8°♊21'29		minimum elong	6019 Aug 13 01:06	24°♊17'59	0°42'48
evening set	6013 Jul 13 12:37	10°♊15'27		max. Earth dist.	6019 Aug 13 13:54	24°♊19'10	30.87652 AU
				morning rise	6019 Aug 29 07:12	24°♊54'07	
conjunction	6013 Jul 29 15:01	10°♊51'22 -0°57'24		retrograde	6019 Nov 27 14:45	26°♊51'07	

opposition	6020 Feb 14 10:39	25°Ω26'25 -0°44'17	conjunction	6026 Aug 29 02:13	9°♊59'02 -0°22'54
min. Earth dist.	6020 Feb 13 23:56	25°Ω27'10 28.88127 AU	minimum elong	6026 Aug 29 02:13	9°♊59'02 0°22'55
direct	6020 May 02 08:54	24°Ω02'11	max. Earth dist.	6026 Aug 29 09:10	9°♊59'41 30.93069 AU
evening set	6020 Jul 29 10:05	25°Ω56'23	morning rise	6026 Sep 14 09:14	10°♊35'10
			retrograde	6026 Dec 13 02:39	12°♊31'18
conjunction	6020 Aug 14 14:56	26°Ω32'22 -0°40'06	opposition	6027 Mar 01 14:18	11°♊06'59 -0°22'51
minimum elong	6020 Aug 14 14:56	26°Ω32'22 0°40'06	min. Earth dist.	6027 Mar 01 08:58	11°♊07'22 28.93397 AU
max. Earth dist.	6020 Aug 15 02:58	26°Ω33'29 30.88572 AU	direct	6027 May 18 17:38	9°♊42'34
morning rise	6020 Aug 30 21:14	27°Ω08'31	evening set	6027 Aug 15 09:23	11°♊37'00
retrograde	6020 Nov 29 04:40	29°Ω05'25			
opposition	6021 Feb 15 21:25	27°Ω40'49 -0°41'23	conjunction	6027 Aug 31 15:53	12°♊13'02 -0°19'54
min. Earth dist.	6021 Feb 15 10:27	27°Ω41'35 28.89051 AU	minimum elong	6027 Aug 31 15:53	12°♊13'02 0°19'54
direct	6021 May 04 21:21	26°Ω16'36	max. Earth dist.	6027 Aug 31 21:12	12°♊13'31 30.93733 AU
evening set	6021 Jul 31 23:45	28°Ω10'52	morning rise	6027 Sep 16 23:07	12°♊49'08
			retrograde	6027 Dec 15 15:43	14°♊45'07
conjunction	6021 Aug 17 04:48	28°Ω46'52 -0°37'21	opposition	6028 Mar 03 00:45	13°♊20'50 -0°19'38
minimum elong	6021 Aug 17 04:48	28°Ω46'52 0°37'21	min. Earth dist.	6028 Mar 02 19:17	13°♊21'13 28.94091 AU
max. Earth dist.	6021 Aug 17 15:44	28°Ω47'53 30.89487 AU	direct	6028 May 20 06:21	11°♊56'20
morning rise	6021 Sep 02 11:18	29°Ω23'01	evening set	6028 Aug 16 22:51	13°♊50'48
	6021 Sep 20 04:08	0°♊			
retrograde	6021 Dec 01 17:37	1°♊19'50	conjunction	6028 Sep 02 05:33	14°♊26'50 -0°16'53
	6022 Feb 15 14:05	30°♋Ω	minimum elong	6028 Sep 02 05:32	14°♊26'50 0°16'53
opposition	6022 Feb 18 08:28	29°Ω55'18 -0°38'25	max. Earth dist.	6028 Sep 02 10:53	14°♊27'19 30.94459 AU
min. Earth dist.	6022 Feb 17 23:13	29°Ω55'58 28.89953 AU	morning rise	6028 Sep 18 12:40	15°♊02'55
direct	6022 May 07 07:40	28°Ω31'06	retrograde	6028 Dec 17 02:31	16°♊58'46
	6022 Jul 22 13:35	0°♊	opposition	6029 Mar 05 11:17	15°♊34'30 -0°16'23
evening set	6022 Aug 03 13:14	0°♊25'25	min. Earth dist.	6029 Mar 05 07:15	15°♊34'47 28.94874 AU
			direct	6029 May 22 17:50	14°♊09'58
conjunction	6022 Aug 19 18:43	1°♊01'27 -0°34'33	evening set	6029 Aug 19 12:18	16°♊04'27
minimum elong	6022 Aug 19 18:43	1°♊01'27 0°34'33			
max. Earth dist.	6022 Aug 20 05:15	1°♊02'25 30.90358 AU	conjunction	6029 Sep 04 19:06	16°♊40'28 -0°13'50
morning rise	6022 Sep 05 01:18	1°♊37'36	minimum elong	6029 Sep 04 19:07	16°♊40'28 0°13'50
retrograde	6022 Dec 04 05:28	3°♊34'17	behind sun begin	6029 Sep 04 15:50	16°♊40'11
opposition	6023 Feb 20 19:22	2°♊09'51 -0°35'24	behind sun end	6029 Sep 04 22:23	16°♊40'46
min. Earth dist.	6023 Feb 20 10:10	2°♊10'30 28.90768 AU	max. Earth dist.	6029 Sep 04 23:42	16°♊40'53 30.95314 AU
direct	6023 May 09 20:02	0°♊45'38	morning rise	6029 Sep 21 02:18	17°♊16'32
evening set	6023 Aug 06 03:05	2°♊39'59	retrograde	6029 Dec 19 16:02	19°♊12'14
			opposition	6030 Mar 07 21:38	17°♊48'01 -0°13'07
conjunction	6023 Aug 22 08:40	3°♊16'01 -0°31'42	min. Earth dist.	6030 Mar 07 17:02	17°♊48'21 28.95793 AU
minimum elong	6023 Aug 22 08:40	3°♊16'01 0°31'42	direct	6030 May 25 07:02	16°♊23'27
max. Earth dist.	6023 Aug 22 17:15	3°♊16'48 30.91128 AU	evening set	6030 Aug 22 01:40	18°♊17'58
morning rise	6023 Sep 07 15:32	3°♊52'10			
retrograde	6023 Dec 06 16:50	5°♊48'44	conjunction	6030 Sep 07 08:35	18°♊53'59 -0°10'46
opposition	6024 Feb 23 06:12	4°♊24'21 -0°32'19	minimum elong	6030 Sep 07 08:35	18°♊53'59 0°10'47
min. Earth dist.	6024 Feb 22 22:32	4°♊24'53 28.91497 AU	behind sun begin	6030 Sep 07 03:35	18°♊53'33
direct	6024 May 11 06:32	3°♊00'05	behind sun end	6030 Sep 07 13:34	18°♊54'26
evening set	6024 Aug 07 16:43	4°♊54'28	max. Earth dist.	6030 Sep 07 12:32	18°♊54'20 30.96299 AU
			morning rise	6030 Sep 23 15:47	19°♊30'03
conjunction	6024 Aug 23 22:44	5°♊30'30 -0°28'48	retrograde	6030 Dec 22 04:13	21°♊25'37
minimum elong	6024 Aug 23 22:44	5°♊30'30 0°28'49	opposition	6031 Mar 10 08:10	20°♊01'27 -0°09'49
max. Earth dist.	6024 Aug 24 07:23	5°♊31'18 30.91816 AU	min. Earth dist.	6031 Mar 10 04:55	20°♊01'41 28.96851 AU
morning rise	6024 Sep 09 05:33	6°♊06'39	direct	6031 May 27 18:20	18°♊36'53
retrograde	6024 Dec 08 03:43	8°♊03'05	evening set	6031 Aug 24 15:09	20°♊31'27
opposition	6025 Feb 24 17:00	6°♊38'44 -0°29'12			
min. Earth dist.	6025 Feb 24 09:57	6°♊39'14 28.92142 AU	conjunction	6031 Sep 09 22:15	21°♊07'27 -0°07'42
direct	6025 May 13 18:23	5°♊14'25	minimum elong	6031 Sep 09 22:16	21°♊07'27 0°07'42
evening set	6025 Aug 10 06:18	7°♊08'50	behind sun begin	6031 Sep 09 16:19	21°♊06'56
			behind sun end	6031 Sep 10 04:12	21°♊07'59
conjunction	6025 Aug 26 12:21	7°♊44'51 -0°25'52	max. Earth dist.	6031 Sep 10 02:04	21°♊07'47 30.97426 AU
minimum elong	6025 Aug 26 12:21	7°♊44'51 0°25'52	morning rise	6031 Sep 26 05:23	21°♊43'30
max. Earth dist.	6025 Aug 26 19:03	7°♊45'28 30.92448 AU	retrograde	6031 Dec 24 15:36	23°♊38'56
morning rise	6025 Sep 11 19:26	8°♊21'00	opposition	6032 Mar 11 18:25	22°♊14'52 -0°06'31
retrograde	6025 Dec 10 16:06	10°♊17'17	min. Earth dist.	6032 Mar 11 14:57	22°♊15'07 28.98020 AU
opposition	6026 Feb 27 03:43	8°♊52'57 -0°26'03	direct	6032 May 29 06:57	20°♊50'19
min. Earth dist.	6026 Feb 26 21:17	8°♊53'25 28.92767 AU	evening set	6032 Aug 26 04:47	22°♊44'55
direct	6026 May 16 04:40	7°♊28'35			
evening set	6026 Aug 12 19:48	9°♊23'01	conjunction	6032 Sep 11 11:49	23°♊20'56 -0°04'37

minimum elong	6032 Sep 11 11:49	23° <u>00</u> '20'56	0°04'37	behind sun begin	6037 Sep 23 03:03	4° <u>00</u> '27'54	
behind sun begin	6032 Sep 11 05:22	23° <u>00</u> '20'21		behind sun end	6037 Sep 23 12:50	4° <u>00</u> '28'46	
behind sun end	6032 Sep 11 18:16	23° <u>00</u> '21'30		max. Earth dist.	6037 Sep 23 05:49	4° <u>00</u> '28'09	31.04100 AU
max. Earth dist.	6032 Sep 11 14:08	23° <u>00</u> '21'06	30.98640 AU	morning rise	6037 Oct 09 14:21	5° <u>00</u> '04'15	
morning rise	6032 Sep 27 18:59	23° <u>00</u> '56'58		retrograde	6038 Jan 06 10:39	6° <u>00</u> '58'58	
retrograde	6032 Dec 26 03:21	25° <u>00</u> '52'17		opposition	6038 Mar 25 08:54	5° <u>00</u> '35'21	0°13'20
opposition	6033 Mar 14 04:53	24° <u>00</u> '28'19	-0°03'12	min. Earth dist.	6038 Mar 25 11:36	5° <u>00</u> '35'10	29.04526 AU
min. Earth dist.	6033 Mar 14 02:39	24° <u>00</u> '28'29	28.99267 AU	direct	6038 Jun 12 02:24	4° <u>00</u> '10'44	
direct	6033 May 31 16:59	23° <u>00</u> '03'47		evening set	6038 Sep 09 14:16	6° <u>00</u> '05'36	
evening set	6033 Aug 28 18:09	24° <u>00</u> '58'27					
conjunction	6033 Sep 14 01:24	25° <u>00</u> '34'27	-0°01'29	conjunction	6038 Sep 25 21:21	6° <u>00</u> '41'31	0°14'03
minimum elong	6033 Sep 14 01:23	25° <u>00</u> '34'27	0°01'28	minimum elong	6038 Sep 25 21:21	6° <u>00</u> '41'31	0°14'03
behind sun begin	6033 Sep 13 18:47	25° <u>00</u> '33'52		behind sun begin	6038 Sep 25 18:15	6° <u>00</u> '41'15	
behind sun end	6033 Sep 14 07:59	25° <u>00</u> '35'02		behind sun end	6038 Sep 26 00:27	6° <u>00</u> '41'48	
max. Earth dist.	6033 Sep 14 03:58	25° <u>00</u> '34'38	30.99891 AU	max. Earth dist.	6038 Sep 25 17:59	6° <u>00</u> '41'13	31.04936 AU
morning rise	6033 Sep 30 08:19	26° <u>00</u> '10'27		morning rise	6038 Oct 12 03:42	7° <u>00</u> '17'25	
retrograde	6033 Dec 28 14:17	28° <u>00</u> '05'40		retrograde	6039 Jan 08 23:28	9° <u>00</u> '11'59	
asc. node	6034 Mar 02 08:10	27° <u>00</u> '05'41		opposition	6039 Mar 27 19:07	7° <u>00</u> '48'24	0°16'36
opposition	6034 Mar 16 15:19	26° <u>00</u> '41'49	0°00'08	min. Earth dist.	6039 Mar 27 21:41	7° <u>00</u> '48'13	29.05331 AU
min. Earth dist.	6034 Mar 16 13:45	26° <u>00</u> '41'55	29.00498 AU	direct	6039 Jun 14 16:08	6° <u>00</u> '23'44	
direct	6034 Jun 03 04:30	25° <u>00</u> '17'17		evening set	6039 Sep 12 03:48	8° <u>00</u> '18'37	
evening set	6034 Aug 31 07:55	27° <u>00</u> '12'00		conjunction	6039 Sep 28 10:46	8° <u>00</u> '54'32	0°17'04
conjunction	6034 Sep 16 14:59	27° <u>00</u> '48'00	0°01'44	minimum elong	6039 Sep 28 10:46	8° <u>00</u> '54'32	0°17'05
minimum elong	6034 Sep 16 14:59	27° <u>00</u> '48'00	0°01'43	max. Earth dist.	6039 Sep 28 06:28	8° <u>00</u> '54'09	31.05721 AU
behind sun begin	6034 Sep 16 08:24	27° <u>00</u> '47'25		morning rise	6039 Oct 14 16:53	9° <u>00</u> '30'24	
behind sun end	6034 Sep 16 21:35	27° <u>00</u> '48'35		retrograde	6040 Jan 11 10:49	11° <u>00</u> '24'50	
max. Earth dist.	6034 Sep 16 15:27	27° <u>00</u> '48'00	31.01097 AU	opposition	6040 Mar 29 05:20	10° <u>00</u> '01'17	0°19'49
morning rise	6034 Oct 02 21:59	28° <u>00</u> '24'00		min. Earth dist.	6040 Mar 29 09:34	10° <u>00</u> '00'59	29.06125 AU
retrograde	6034 Nov 27 04:47	0° <u>00</u> '00'00		direct	6040 Jun 16 03:56	8° <u>00</u> '36'34	
opposition	6034 Dec 31 02:04	0° <u>00</u> '19'06		evening set	6040 Sep 13 17:07	10° <u>00</u> '31'29	
min. Earth dist.	6035 Feb 03 08:11	30° <u>00</u> '00'00		conjunction	6040 Sep 30 00:04	11° <u>00</u> '07'23	0°20'04
direct	6035 Mar 19 01:40	28° <u>00</u> '55'19	0°03'27	minimum elong	6040 Sep 30 00:04	11° <u>00</u> '07'23	0°20'04
evening set	6035 Mar 19 00:55	28° <u>00</u> '55'22	29.01671 AU	max. Earth dist.	6040 Sep 29 19:27	11° <u>00</u> '06'58	31.06528 AU
conjunction	6035 Jun 05 14:44	27° <u>00</u> '30'47		morning rise	6040 Oct 16 05:54	11° <u>00</u> '43'12	
minimum elong	6035 Sep 02 21:34	29° <u>00</u> '25'33		retrograde	6041 Jan 12 21:44	13° <u>00</u> '37'30	
behind sun begin	6035 Sep 18 12:11	0° <u>00</u> '00'00		opposition	6041 Mar 31 15:30	12° <u>00</u> '13'59	0°23'01
behind sun end	6035 Sep 19 11:15	0° <u>00</u> '02'06		min. Earth dist.	6041 Mar 31 19:31	12° <u>00</u> '13'42	29.06948 AU
max. Earth dist.	6035 Sep 19 05:10	0° <u>00</u> '01'33	31.02207 AU	direct	6041 Jun 18 17:05	10° <u>00</u> '49'15	
morning rise	6035 Oct 05 11:32	0° <u>00</u> '37'30		evening set	6041 Sep 16 06:18	12° <u>00</u> '44'11	
retrograde	6036 Jan 02 11:53	2° <u>00</u> '32'29		conjunction	6041 Oct 02 12:59	13° <u>00</u> '20'03	0°23'02
opposition	6036 Mar 20 12:10	1° <u>00</u> '08'47	0°06'46	minimum elong	6041 Oct 02 12:59	13° <u>00</u> '20'03	0°23'03
min. Earth dist.	6036 Mar 20 12:52	1° <u>00</u> '08'44	29.02721 AU	max. Earth dist.	6041 Oct 02 07:03	13° <u>00</u> '19'31	31.07381 AU
direct	6036 May 07 00:11	30° <u>00</u> '00'00		morning rise	6041 Oct 18 18:41	13° <u>00</u> '55'52	
evening set	6036 Jun 07 03:00	29° <u>00</u> '44'14		retrograde	6042 Jan 15 09:03	15° <u>00</u> '50'02	
conjunction	6036 Jul 08 00:06	0° <u>00</u> '00'00		opposition	6042 Apr 03 01:45	14° <u>00</u> '26'34	0°26'10
minimum elong	6036 Sep 04 11:15	1° <u>00</u> '39'02		min. Earth dist.	6042 Apr 03 06:42	14° <u>00</u> '26'13	29.07857 AU
behind sun begin	6036 Sep 20 18:20	2° <u>00</u> '15'00	0°07'56	direct	6042 Jun 21 03:40	13° <u>00</u> '01'48	
behind sun end	6036 Sep 21 00:13	2° <u>00</u> '15'31		evening set	6042 Sep 18 19:26	14° <u>00</u> '56'45	
max. Earth dist.	6036 Sep 20 16:35	2° <u>00</u> '14'51	31.03207 AU	conjunction	6042 Oct 05 02:09	15° <u>00</u> '32'38	0°25'58
morning rise	6036 Oct 07 01:02	2° <u>00</u> '50'56		minimum elong	6042 Oct 05 02:09	15° <u>00</u> '32'37	0°25'58
retrograde	6037 Jan 04 00:18	4° <u>00</u> '45'47		max. Earth dist.	6042 Oct 04 20:41	15° <u>00</u> '32'07	31.08337 AU
opposition	6037 Mar 22 22:30	3° <u>00</u> '22'08	0°10'04	morning rise	6042 Oct 21 07:27	16° <u>00</u> '08'24	
min. Earth dist.	6037 Mar 22 23:22	3° <u>00</u> '22'04	29.03668 AU	retrograde	6043 Jan 17 19:19	18° <u>00</u> '02'26	
direct	6037 Jun 09 15:03	1° <u>00</u> '57'33		opposition	6043 Apr 05 11:48	16° <u>00</u> '39'03	0°29'17
evening set	6037 Sep 07 00:48	3° <u>00</u> '52'23		min. Earth dist.	6043 Apr 05 17:07	16° <u>00</u> '38'40	29.08860 AU
conjunction	6037 Sep 23 07:57	4° <u>00</u> '28'20	0°11'00	direct	6043 Jun 23 15:18	15° <u>00</u> '14'17	
minimum elong	6037 Sep 23 07:57	4° <u>00</u> '28'20	0°11'01	evening set	6043 Sep 21 08:45	17° <u>00</u> '09'17	
				conjunction	6043 Oct 07 15:08	17° <u>00</u> '45'08	0°28'52
				minimum elong	6043 Oct 07 15:08	17° <u>00</u> '45'08	0°28'53
				max. Earth dist.	6043 Oct 07 08:02	17° <u>00</u> '44'29	31.09399 AU
				morning rise	6043 Oct 23 20:19	18° <u>00</u> '20'53	
				retrograde	6044 Jan 20 06:11	20° <u>00</u> '14'49	

opposition	6044 Apr 06 21:59	18° <u>♏</u> 51'31	0°32'21	conjunction	6050 Oct 23 09:26	3° <u>♍</u> 12'51	0°47'40
min. Earth dist.	6044 Apr 07 03:31	18° <u>♏</u> 51'07	29.09982 AU	minimum elong	6050 Oct 23 09:25	3° <u>♍</u> 12'51	0°47'40
direct	6044 Jun 25 01:29	17° <u>♏</u> 26'45		max. Earth dist.	6050 Oct 22 20:26	3° <u>♍</u> 11'39	31.16577 AU
evening set	6044 Sep 22 21:46	19° <u>♏</u> 21'49		morning rise	6050 Nov 08 12:09	3° <u>♍</u> 48'22	
				retrograde	6051 Feb 04 10:24	5° <u>♍</u> 41'37	
conjunction	6044 Oct 09 04:06	19° <u>♏</u> 57'39	0°31'43	opposition	6051 Apr 22 21:24	4° <u>♍</u> 18'46	0°52'13
minimum elong	6044 Oct 09 04:06	19° <u>♏</u> 57'39	0°31'43	min. Earth dist.	6051 Apr 23 08:46	4° <u>♍</u> 17'58	29.16945 AU
max. Earth dist.	6044 Oct 08 21:34	19° <u>♏</u> 57'03	31.10556 AU	direct	6051 Jul 11 12:42	2° <u>♍</u> 53'57	
morning rise	6044 Oct 25 08:48	20° <u>♏</u> 33'22		evening set	6051 Oct 09 17:38	4° <u>♍</u> 49'17	
retrograde	6045 Jan 21 14:56	22° <u>♏</u> 27'13					
opposition	6045 Apr 09 08:11	21° <u>♏</u> 04'01	0°35'22	conjunction	6051 Oct 25 22:10	5° <u>♍</u> 24'55	0°50'05
min. Earth dist.	6045 Apr 09 14:47	21° <u>♏</u> 03'33	29.11166 AU	minimum elong	6051 Oct 25 22:10	5° <u>♍</u> 24'55	0°50'07
direct	6045 Jun 27 12:51	19° <u>♏</u> 39'17		max. Earth dist.	6051 Oct 25 09:24	5° <u>♍</u> 23'44	31.17235 AU
evening set	6045 Sep 25 10:59	21° <u>♏</u> 34'25		morning rise	6051 Nov 11 00:22	6° <u>♍</u> 00'23	
				retrograde	6052 Feb 06 20:12	7° <u>♍</u> 53'31	
conjunction	6045 Oct 11 16:58	22° <u>♏</u> 10'13	0°34'31	opposition	6052 Apr 24 07:37	6° <u>♍</u> 30'40	0°54'46
minimum elong	6045 Oct 11 16:58	22° <u>♏</u> 10'13	0°34'33	min. Earth dist.	6052 Apr 24 19:37	6° <u>♍</u> 29'50	29.17572 AU
max. Earth dist.	6045 Oct 11 08:45	22° <u>♏</u> 09'28	31.11764 AU	direct	6052 Jul 13 01:49	5° <u>♍</u> 05'49	
morning rise	6045 Oct 27 21:31	22° <u>♏</u> 45'55		evening set	6052 Oct 11 06:24	7° <u>♍</u> 01'08	
retrograde	6046 Jan 24 02:58	24° <u>♏</u> 39'42					
opposition	6046 Apr 11 18:13	23° <u>♏</u> 16'35	0°38'20	conjunction	6052 Oct 27 10:26	7° <u>♍</u> 36'44	0°52'26
min. Earth dist.	6046 Apr 12 00:45	23° <u>♏</u> 16'08	29.12375 AU	minimum elong	6052 Oct 27 10:26	7° <u>♍</u> 36'44	0°52'28
direct	6046 Jun 29 23:27	21° <u>♏</u> 51'52		max. Earth dist.	6052 Oct 26 20:03	7° <u>♍</u> 35'24	31.17852 AU
evening set	6046 Sep 28 00:09	23° <u>♏</u> 47'04		morning rise	6052 Nov 12 12:23	8° <u>♍</u> 12'10	
				retrograde	6053 Feb 08 06:22	10° <u>♍</u> 05'11	
conjunction	6046 Oct 14 06:01	24° <u>♏</u> 22'51	0°37'16	opposition	6053 Apr 26 17:45	8° <u>♍</u> 42'20	0°57'14
minimum elong	6046 Oct 14 06:01	24° <u>♏</u> 22'51	0°37'17	min. Earth dist.	6053 Apr 27 05:56	8° <u>♍</u> 41'29	29.18201 AU
max. Earth dist.	6046 Oct 13 21:38	24° <u>♏</u> 22'05	31.12940 AU	direct	6053 Jul 15 12:54	7° <u>♍</u> 17'26	
morning rise	6046 Oct 30 10:07	24° <u>♏</u> 58'31		evening set	6053 Oct 13 18:58	9° <u>♍</u> 12'45	
retrograde	6047 Jan 26 12:47	26° <u>♏</u> 52'13					
opposition	6047 Apr 14 04:33	25° <u>♏</u> 29'12	0°41'15	conjunction	6053 Oct 29 22:51	9° <u>♍</u> 48'19	0°54'43
min. Earth dist.	6047 Apr 14 12:56	25° <u>♏</u> 28'36	29.13517 AU	minimum elong	6053 Oct 29 22:50	9° <u>♍</u> 48'19	0°54'45
direct	6047 Jul 02 10:03	24° <u>♏</u> 04'30		max. Earth dist.	6053 Oct 29 09:07	9° <u>♍</u> 47'03	31.18485 AU
evening set	6047 Sep 30 13:26	25° <u>♏</u> 59'45		morning rise	6053 Nov 15 00:12	10° <u>♍</u> 23'43	
				retrograde	6054 Feb 10 14:26	12° <u>♍</u> 16'36	
conjunction	6047 Oct 16 19:00	26° <u>♏</u> 35'30	0°39'58	opposition	6054 Apr 29 03:51	10° <u>♍</u> 53'47	0°59'37
minimum elong	6047 Oct 16 19:00	26° <u>♏</u> 35'30	0°39'59	min. Earth dist.	6054 Apr 29 17:01	10° <u>♍</u> 52'52	29.18864 AU
max. Earth dist.	6047 Oct 16 09:15	26° <u>♏</u> 34'36	31.14033 AU	direct	6054 Jul 18 00:25	9° <u>♍</u> 28'50	
morning rise	6047 Nov 01 22:49	27° <u>♏</u> 11'08		evening set	6054 Oct 16 07:37	11° <u>♍</u> 24'09	
retrograde	6048 Jan 29 00:55	29° <u>♏</u> 04'44					
opposition	6048 Apr 15 14:41	27° <u>♏</u> 41'47	0°44'06	conjunction	6054 Nov 01 11:01	11° <u>♍</u> 59'42	0°56'54
min. Earth dist.	6048 Apr 15 23:01	27° <u>♏</u> 41'12	29.14550 AU	minimum elong	6054 Nov 01 11:00	11° <u>♍</u> 59'42	0°56'56
direct	6048 Jul 03 23:55	26° <u>♏</u> 17'04		max. Earth dist.	6054 Oct 31 19:54	11° <u>♍</u> 58'18	31.19190 AU
evening set	6048 Oct 02 02:40	28° <u>♏</u> 12'22		morning rise	6054 Nov 17 12:08	12° <u>♍</u> 35'03	
				retrograde	6055 Feb 13 01:32	14° <u>♍</u> 27'51	
conjunction	6048 Oct 18 07:57	28° <u>♏</u> 48'06	0°42'36	opposition	6055 May 01 13:56	13° <u>♍</u> 05'04	1°01'55
minimum elong	6048 Oct 18 07:57	28° <u>♏</u> 48'06	0°42'36	min. Earth dist.	6055 May 02 02:29	13° <u>♍</u> 04'11	29.19619 AU
max. Earth dist.	6048 Oct 17 21:13	28° <u>♏</u> 47'06	31.14995 AU	direct	6055 Jul 20 11:08	11° <u>♍</u> 40'05	
morning rise	6048 Nov 03 11:21	29° <u>♏</u> 23'41		evening set	6055 Oct 18 20:06	13° <u>♍</u> 35'26	
	6048 Nov 20 23:27	0° <u>♍</u>					
retrograde	6049 Jan 30 11:52	1° <u>♍</u> 17'12		conjunction	6055 Nov 03 23:13	14° <u>♍</u> 10'57	0°59'01
	6049 Apr 14 15:11	30° <u>♏</u> <u>♏</u>		minimum elong	6055 Nov 03 23:13	14° <u>♍</u> 10'57	0°59'03
opposition	6049 Apr 18 01:04	29° <u>♏</u> 54'17	0°46'53	max. Earth dist.	6055 Nov 03 08:31	14° <u>♍</u> 09'35	31.19988 AU
min. Earth dist.	6049 Apr 18 11:06	29° <u>♏</u> 53'34	29.15463 AU	morning rise	6055 Nov 19 23:43	14° <u>♍</u> 46'16	
direct	6049 Jul 06 11:42	28° <u>♏</u> 29'33			6055 Nov 26 10:04	15° <u>♍</u>	
	6049 Sep 22 20:05	0° <u>♍</u>		retrograde	6056 Feb 15 10:14	16° <u>♍</u> 38'59	
evening set	6049 Oct 04 15:36	0° <u>♍</u> 24'52		opposition	6056 May 03 00:09	15° <u>♍</u> 16'15	1°04'08
				min. Earth dist.	6056 May 03 13:56	15° <u>♍</u> 15'18	29.20481 AU
conjunction	6049 Oct 20 20:41	1° <u>♍</u> 00'34	0°45'10		6056 May 12 18:19	15° <u>♏</u> <u>♍</u>	
minimum elong	6049 Oct 20 20:41	1° <u>♍</u> 00'34	0°45'11	direct	6056 Jul 21 21:31	13° <u>♍</u> 51'18	
max. Earth dist.	6049 Oct 20 09:24	0° <u>♍</u> 59'31	31.15847 AU		6056 Sep 27 09:10	15° <u>♍</u>	
morning rise	6049 Nov 05 23:43	1° <u>♍</u> 36'07		evening set	6056 Oct 20 08:33	15° <u>♍</u> 46'40	
retrograde	6050 Feb 01 22:48	3° <u>♍</u> 29'30					
opposition	6050 Apr 20 11:17	2° <u>♍</u> 06'37	0°49'35	conjunction	6056 Nov 05 11:15	16° <u>♍</u> 22'09	1°01'02
min. Earth dist.	6050 Apr 20 21:24	2° <u>♍</u> 05'55	29.16248 AU	minimum elong	6056 Nov 05 11:14	16° <u>♍</u> 22'09	1°01'04
direct	6050 Jul 09 01:05	0° <u>♍</u> 41'52		max. Earth dist.	6056 Nov 04 19:57	16° <u>♍</u> 20'44	31.20913 AU
evening set	6050 Oct 07 04:44	2° <u>♍</u> 37'11		morning rise	6056 Nov 21 11:25	16° <u>♍</u> 57'27	

retrograde	6057 Feb 16 21:29	18° \mathcal{M} 50'06		evening set	6063 Nov 05 22:36	1° \mathcal{Z} 06'49	
opposition	6057 May 05 10:16	17° \mathcal{M} 27'27	1°06'14				
min. Earth dist.	6057 May 05 23:20	17° \mathcal{M} 26'32	29.21448 AU	conjunction	6063 Nov 21 22:22	1° \mathcal{Z} 42'06	1°12'33
direct	6057 Jul 24 10:13	16° \mathcal{M} 02'31		minimum elong	6063 Nov 21 22:22	1° \mathcal{Z} 42'06	1°12'36
evening set	6057 Oct 22 20:49	17° \mathcal{M} 57'57		max. Earth dist.	6063 Nov 21 02:49	1° \mathcal{Z} 40'17	31.26602 AU
				morning rise	6063 Dec 07 19:19	2° \mathcal{Z} 17'09	
conjunction	6057 Nov 07 23:09	18° \mathcal{M} 33'25	1°02'58	retrograde	6064 Mar 03 22:58	4° \mathcal{Z} 09'28	
minimum elong	6057 Nov 07 23:09	18° \mathcal{M} 33'25	1°03'00	opposition	6064 May 20 10:39	2° \mathcal{Z} 47'14	1°18'10
max. Earth dist.	6057 Nov 07 07:35	18° \mathcal{M} 31'59	31.21908 AU	min. Earth dist.	6064 May 21 03:32	2° \mathcal{Z} 46'04	29.26886 AU
morning rise	6057 Nov 23 22:52	19° \mathcal{M} 08'40		direct	6064 Aug 08 19:56	1° \mathcal{Z} 22'24	
retrograde	6058 Feb 19 08:10	21° \mathcal{M} 01'18		evening set	6064 Nov 07 10:32	3° \mathcal{Z} 18'03	
opposition	6058 May 07 20:31	19° \mathcal{M} 38'44	1°08'15				
min. Earth dist.	6058 May 08 10:53	19° \mathcal{M} 37'44	29.22468 AU	conjunction	6064 Nov 23 09:59	3° \mathcal{Z} 53'18	1°13'48
direct	6058 Jul 26 20:56	18° \mathcal{M} 13'51		minimum elong	6064 Nov 23 09:59	3° \mathcal{Z} 53'18	1°13'49
evening set	6058 Oct 25 09:13	20° \mathcal{M} 09'21		max. Earth dist.	6064 Nov 22 14:43	3° \mathcal{Z} 51'31	31.27023 AU
				morning rise	6064 Dec 09 06:21	4° \mathcal{Z} 28'19	
conjunction	6058 Nov 10 11:13	20° \mathcal{M} 44'47	1°04'49	retrograde	6065 Mar 06 06:46	6° \mathcal{Z} 20'34	
minimum elong	6058 Nov 10 11:13	20° \mathcal{M} 44'47	1°04'50	opposition	6065 May 22 21:08	4° \mathcal{Z} 58'20	1°19'26
max. Earth dist.	6058 Nov 09 19:30	20° \mathcal{M} 43'19	31.22925 AU	min. Earth dist.	6065 May 23 15:24	4° \mathcal{Z} 57'04	29.27294 AU
morning rise	6058 Nov 26 10:27	21° \mathcal{M} 20'00		direct	6065 Aug 11 06:37	3° \mathcal{Z} 33'29	
retrograde	6059 Feb 21 19:00	23° \mathcal{M} 12'35		evening set	6065 Nov 09 22:18	5° \mathcal{Z} 29'06	
opposition	6059 May 10 06:39	21° \mathcal{M} 50'07	1°10'10				
min. Earth dist.	6059 May 10 20:56	21° \mathcal{M} 49'07	29.23460 AU	conjunction	6065 Nov 25 21:17	6° \mathcal{Z} 04'19	1°14'56
direct	6059 Jul 29 09:37	20° \mathcal{M} 25'16		minimum elong	6065 Nov 25 21:17	6° \mathcal{Z} 04'18	1°14'58
evening set	6059 Oct 27 21:42	22° \mathcal{M} 20'50		max. Earth dist.	6065 Nov 25 01:30	6° \mathcal{Z} 02'28	31.27427 AU
				morning rise	6065 Dec 11 17:19	6° \mathcal{Z} 39'17	
conjunction	6059 Nov 12 23:10	22° \mathcal{M} 56'14	1°06'33	retrograde	6066 Mar 08 16:43	8° \mathcal{Z} 31'28	
minimum elong	6059 Nov 12 23:10	22° \mathcal{M} 56'14	1°06'36	opposition	6066 May 25 07:29	7° \mathcal{Z} 09'14	1°20'36
max. Earth dist.	6059 Nov 12 06:04	22° \mathcal{M} 54'39	31.23880 AU	min. Earth dist.	6066 May 26 01:01	7° \mathcal{Z} 08'01	29.27693 AU
morning rise	6059 Nov 28 21:59	23° \mathcal{M} 31'25		direct	6066 Aug 13 19:15	5° \mathcal{Z} 44'21	
retrograde	6060 Feb 24 07:07	25° \mathcal{M} 23'58		evening set	6066 Nov 12 10:05	7° \mathcal{Z} 39'57	
opposition	6060 May 11 17:03	24° \mathcal{M} 01'35	1°11'59				
min. Earth dist.	6060 May 12 08:15	24° \mathcal{M} 00'31	29.24385 AU	conjunction	6066 Nov 28 08:37	8° \mathcal{Z} 15'08	1°15'57
direct	6060 Jul 30 21:03	22° \mathcal{M} 36'46		minimum elong	6066 Nov 28 08:37	8° \mathcal{Z} 15'08	1°15'59
evening set	6060 Oct 29 09:51	24° \mathcal{M} 32'22		max. Earth dist.	6066 Nov 27 12:42	8° \mathcal{Z} 13'17	31.27836 AU
				morning rise	6066 Dec 14 04:07	8° \mathcal{Z} 50'04	
conjunction	6060 Nov 14 11:01	25° \mathcal{M} 07'45	1°08'12	retrograde	6067 Mar 11 02:29	10° \mathcal{Z} 42'12	
minimum elong	6060 Nov 14 11:01	25° \mathcal{M} 07'45	1°08'14	opposition	6067 May 27 17:55	9° \mathcal{Z} 19'58	1°21'38
max. Earth dist.	6060 Nov 13 18:19	25° \mathcal{M} 06'12	31.24744 AU	min. Earth dist.	6067 May 28 12:20	9° \mathcal{Z} 18'42	29.28147 AU
morning rise	6060 Nov 30 09:15	25° \mathcal{M} 42'54		direct	6067 Aug 16 05:16	7° \mathcal{Z} 55'03	
retrograde	6061 Feb 25 17:09	27° \mathcal{M} 35'25		evening set	6067 Nov 14 21:43	9° \mathcal{Z} 50'39	
opposition	6061 May 14 03:31	26° \mathcal{M} 13'05	1°13'42				
min. Earth dist.	6061 May 14 19:22	26° \mathcal{M} 11'59	29.25185 AU	conjunction	6067 Nov 30 19:51	10° \mathcal{Z} 25'48	1°16'53
direct	6061 Aug 02 10:13	24° \mathcal{M} 48'18		minimum elong	6067 Nov 30 19:51	10° \mathcal{Z} 25'48	1°16'55
evening set	6061 Oct 31 22:14	26° \mathcal{M} 43'56		max. Earth dist.	6067 Nov 30 00:23	10° \mathcal{Z} 24'00	31.28332 AU
				morning rise	6067 Dec 16 14:51	11° \mathcal{Z} 00'42	
conjunction	6061 Nov 16 22:50	27° \mathcal{M} 19'16	1°09'45	retrograde	6068 Mar 12 12:38	12° \mathcal{Z} 52'47	
minimum elong	6061 Nov 16 22:49	27° \mathcal{M} 19'16	1°09'48	opposition	6068 May 29 04:26	11° \mathcal{Z} 30'35	1°22'34
max. Earth dist.	6061 Nov 16 04:23	27° \mathcal{M} 17'34	31.25484 AU	min. Earth dist.	6068 May 29 22:08	11° \mathcal{Z} 29'21	29.28686 AU
morning rise	6061 Dec 02 20:44	27° \mathcal{M} 54'24		direct	6068 Aug 17 18:10	10° \mathcal{Z} 05'40	
retrograde	6062 Feb 28 03:41	29° \mathcal{M} 46'50		evening set	6068 Nov 16 09:12	12° \mathcal{Z} 01'16	
opposition	6062 May 16 13:47	28° \mathcal{M} 24'34	1°15'18	max. Earth dist.	6068 Dec 01 10:38	12° \mathcal{Z} 34'31	31.28925 AU
min. Earth dist.	6062 May 17 05:54	28° \mathcal{M} 23'27	29.25871 AU				
direct	6062 Aug 04 21:18	26° \mathcal{M} 59'46		conjunction	6068 Dec 02 06:47	12° \mathcal{Z} 36'23	1°17'41
evening set	6062 Nov 03 10:24	28° \mathcal{M} 55'25		minimum elong	6068 Dec 02 06:47	12° \mathcal{Z} 36'23	1°17'43
				morning rise	6068 Dec 18 01:24	13° \mathcal{Z} 11'15	
conjunction	6062 Nov 19 10:46	29° \mathcal{M} 30'44	1°11'12	retrograde	6069 Mar 15 00:31	15° \mathcal{Z} 03'19	
minimum elong	6062 Nov 19 10:46	29° \mathcal{M} 30'44	1°11'14	opposition	6069 May 31 14:59	13° \mathcal{Z} 41'08	1°23'22
max. Earth dist.	6062 Nov 18 16:44	29° \mathcal{M} 29'04	31.26098 AU	min. Earth dist.	6069 Jun 01 08:52	13° \mathcal{Z} 39'54	29.29338 AU
	6062 Dec 02 15:51	0° \mathcal{Z}		direct	6069 Aug 20 05:39	12° \mathcal{Z} 16'16	
morning rise	6062 Dec 05 08:03	0° \mathcal{Z} 05'49		evening set	6069 Nov 18 20:37	14° \mathcal{Z} 11'53	
retrograde	6063 Mar 02 11:53	1° \mathcal{Z} 58'12					
opposition	6063 May 19 00:18	0° \mathcal{Z} 35'58	1°16'47	conjunction	6069 Dec 04 17:56	14° \mathcal{Z} 46'58	1°18'23
min. Earth dist.	6063 May 19 17:38	0° \mathcal{Z} 34'46	29.26424 AU	minimum elong	6069 Dec 04 17:56	14° \mathcal{Z} 46'58	1°18'26
	6063 Jun 10 08:24	30° $\mathcal{R}\mathcal{M}$		max. Earth dist.	6069 Dec 03 22:49	14° \mathcal{Z} 45'12	31.29614 AU
direct	6063 Aug 07 09:08	29° \mathcal{M} 11'10		morning rise	6069 Dec 20 11:59	15° \mathcal{Z} 21'48	
	6063 Oct 02 13:01	0° \mathcal{Z}		retrograde	6070 Mar 17 10:10	17° \mathcal{Z} 13'51	

opposition	6070 Jun 03 01:27	15° \nearrow 51'44	1°24'03	conjunction	6076 Dec 19 22:20	0° \searrow 02'19	1°20'03
min. Earth dist.	6070 Jun 03 19:36	15° \nearrow 50'29	29.30044 AU	minimum elong	6076 Dec 19 22:20	0° \searrow 02'19	1°20'04
direct	6070 Aug 22 18:37	14° \nearrow 26'54		max. Earth dist.	6076 Dec 19 01:26	0° \searrow 00'22	31.32694 AU
evening set	6070 Nov 21 08:15	16° \nearrow 22'34		morning rise	6077 Jan 04 13:23	0° \searrow 36'58	
max. Earth dist.	6070 Dec 06 08:41	16° \nearrow 55'44	31.30336 AU	retrograde	6077 Apr 01 08:06	2° \searrow 29'00	
				opposition	6077 Jun 18 05:31	1° \searrow 07'06	1°25'24
conjunction	6070 Dec 07 04:57	16° \nearrow 57'37	1°18'58	min. Earth dist.	6077 Jun 19 01:06	1° \searrow 05'46	29.32757 AU
minimum elong	6070 Dec 07 04:57	16° \nearrow 57'37	1°19'00		6077 Aug 04 08:28	30° \nwarrow	
morning rise	6070 Dec 22 22:42	17° \nearrow 32'25		direct	6077 Sep 07 02:23	29° \nearrow 42'25	
retrograde	6071 Mar 19 21:19	19° \nearrow 24'27			6077 Oct 10 07:24	0° \searrow	
opposition	6071 Jun 05 12:05	18° \nearrow 02'25	1°24'36	evening set	6077 Dec 06 15:13	1° \searrow 38'04	
min. Earth dist.	6071 Jun 06 05:57	18° \nearrow 01'11	29.30764 AU	max. Earth dist.	6077 Dec 21 11:05	2° \searrow 10'55	31.32652 AU
direct	6071 Aug 25 05:31	16° \nearrow 37'37					
evening set	6071 Nov 23 19:36	18° \nearrow 33'18		conjunction	6077 Dec 22 08:54	2° \searrow 12'56	1°19'50
				minimum elong	6077 Dec 22 08:54	2° \searrow 12'56	1°19'52
conjunction	6071 Dec 09 16:00	19° \nearrow 08'20	1°19'26	morning rise	6078 Jan 06 23:39	2° \searrow 47'34	
minimum elong	6071 Dec 09 16:00	19° \nearrow 08'20	1°19'29	retrograde	6078 Apr 03 19:56	4° \searrow 39'35	
max. Earth dist.	6071 Dec 08 20:40	19° \nearrow 06'33	31.31024 AU	opposition	6078 Jun 20 16:23	3° \searrow 17'40	1°25'07
morning rise	6071 Dec 25 09:07	19° \nearrow 43'07		min. Earth dist.	6078 Jun 21 12:15	3° \searrow 16'18	29.32696 AU
retrograde	6072 Mar 21 06:16	21° \nearrow 35'09		direct	6078 Sep 09 13:53	1° \searrow 52'57	
opposition	6072 Jun 06 22:56	20° \nearrow 13'10	1°25'03	evening set	6078 Dec 09 02:05	3° \searrow 48'35	
min. Earth dist.	6072 Jun 07 17:47	20° \nearrow 11'52	29.31416 AU				
direct	6072 Aug 26 17:41	18° \nearrow 48'26		conjunction	6078 Dec 24 19:30	4° \searrow 23'26	1°19'30
evening set	6072 Nov 25 07:07	20° \nearrow 44'07		minimum elong	6078 Dec 24 19:30	4° \searrow 23'26	1°19'32
max. Earth dist.	6072 Dec 10 06:23	21° \nearrow 17'13	31.31634 AU	max. Earth dist.	6078 Dec 23 22:52	4° \searrow 21'31	31.32576 AU
				morning rise	6079 Jan 09 09:43	4° \searrow 58'02	
conjunction	6072 Dec 11 02:55	21° \nearrow 19'08	1°19'47	retrograde	6079 Apr 06 05:22	6° \searrow 50'03	
minimum elong	6072 Dec 11 02:55	21° \nearrow 19'08	1°19'49	opposition	6079 Jun 23 03:30	5° \searrow 28'06	1°24'42
morning rise	6072 Dec 26 19:45	21° \nearrow 53'53		min. Earth dist.	6079 Jun 23 23:24	5° \searrow 26'44	29.32617 AU
retrograde	6073 Mar 23 17:41	23° \nearrow 45'55		direct	6079 Sep 12 03:06	4° \searrow 03'24	
opposition	6073 Jun 09 09:39	22° \nearrow 23'59	1°25'21	evening set	6079 Dec 11 12:53	5° \searrow 59'00	
min. Earth dist.	6073 Jun 10 03:51	22° \nearrow 22'44	29.31972 AU	max. Earth dist.	6079 Dec 26 08:23	6° \searrow 31'50	31.32521 AU
direct	6073 Aug 29 04:50	20° \nearrow 59'16					
evening set	6073 Nov 27 18:26	22° \nearrow 54'59		conjunction	6079 Dec 27 05:42	6° \searrow 33'49	1°19'03
				minimum elong	6079 Dec 27 05:42	6° \searrow 33'49	1°19'06
conjunction	6073 Dec 13 13:56	23° \nearrow 29'58	1°20'01	morning rise	6080 Jan 11 19:40	7° \searrow 08'23	
minimum elong	6073 Dec 13 13:56	23° \nearrow 29'58	1°20'04	retrograde	6080 Apr 07 16:24	9° \searrow 00'25	
max. Earth dist.	6073 Dec 12 17:38	23° \nearrow 28'04	31.32113 AU	opposition	6080 Jun 24 14:35	7° \searrow 38'28	1°24'10
morning rise	6073 Dec 29 06:13	24° \nearrow 04'41		min. Earth dist.	6080 Jun 25 09:34	7° \searrow 37'10	29.32602 AU
retrograde	6074 Mar 26 02:02	25° \nearrow 56'43		direct	6080 Sep 13 14:16	6° \searrow 13'45	
opposition	6074 Jun 11 20:38	24° \nearrow 34'49	1°25'33	evening set	6080 Dec 12 23:31	8° \searrow 09'21	
min. Earth dist.	6074 Jun 12 16:15	24° \nearrow 33'29	29.32382 AU				
direct	6074 Aug 31 15:33	23° \nearrow 10'09		conjunction	6080 Dec 28 16:05	8° \searrow 44'09	1°18'30
evening set	6074 Nov 30 05:51	25° \nearrow 05'51		minimum elong	6080 Dec 28 16:05	8° \searrow 44'09	1°18'32
max. Earth dist.	6074 Dec 15 03:56	25° \nearrow 38'51	31.32451 AU	max. Earth dist.	6080 Dec 27 20:13	8° \searrow 42'18	31.32543 AU
				morning rise	6081 Jan 13 05:31	9° \searrow 18'42	
conjunction	6074 Dec 16 00:50	25° \nearrow 40'48	1°20'08	retrograde	6081 Apr 10 01:27	11° \searrow 10'44	
minimum elong	6074 Dec 16 00:50	25° \nearrow 40'48	1°20'10	opposition	6081 Jun 27 01:41	9° \searrow 48'48	1°23'31
morning rise	6074 Dec 31 16:45	26° \nearrow 15'30		min. Earth dist.	6081 Jun 27 21:03	9° \searrow 47'29	29.32668 AU
retrograde	6075 Mar 28 12:02	28° \nearrow 07'31		direct	6081 Sep 16 02:57	8° \searrow 24'08	
opposition	6075 Jun 14 07:27	26° \nearrow 45'39	1°25'37	evening set	6081 Dec 15 10:11	10° \searrow 19'43	
min. Earth dist.	6075 Jun 15 02:28	26° \nearrow 44'21	29.32637 AU	max. Earth dist.	6081 Dec 30 05:53	10° \searrow 52'36	31.32661 AU
direct	6075 Sep 03 03:38	25° \nearrow 20'58					
evening set	6075 Dec 02 17:10	27° \nearrow 16'40		conjunction	6081 Dec 31 02:15	10° \searrow 54'30	1°17'50
				minimum elong	6081 Dec 31 02:15	10° \searrow 54'30	1°17'53
conjunction	6075 Dec 18 11:43	27° \nearrow 51'36	1°20'09	morning rise	6082 Jan 15 15:30	11° \searrow 29'02	
minimum elong	6075 Dec 18 11:43	27° \nearrow 51'36	1°20'12	retrograde	6082 Apr 12 13:05	13° \searrow 21'07	
max. Earth dist.	6075 Dec 17 14:26	27° \nearrow 49'37	31.32631 AU	opposition	6082 Jun 29 12:45	11° \searrow 59'12	1°22'45
morning rise	6076 Jan 03 03:10	28° \nearrow 26'17		min. Earth dist.	6082 Jun 30 06:48	11° \searrow 57'58	29.32811 AU
	6076 Feb 26 01:42	0° \searrow		direct	6082 Sep 18 14:33	10° \searrow 34'35	
retrograde	6076 Mar 29 22:11	0° \searrow 18'18		evening set	6082 Dec 17 20:45	12° \searrow 30'10	
	6076 May 02 14:01	30° \nwarrow					
opposition	6076 Jun 15 18:34	28° \nearrow 56'25	1°25'34	conjunction	6083 Jan 02 12:30	13° \searrow 04'56	1°17'03
min. Earth dist.	6076 Jun 16 14:34	28° \nearrow 55'03	29.32760 AU	minimum elong	6083 Jan 02 12:30	13° \searrow 04'56	1°17'05
direct	6076 Sep 04 13:19	27° \nearrow 31'45		max. Earth dist.	6083 Jan 01 16:59	13° \searrow 03'07	31.32820 AU
evening set	6076 Dec 04 04:08	29° \nearrow 27'25		morning rise	6083 Jan 18 01:16	13° \searrow 39'27	
	6076 Dec 18 21:24	0° \searrow		retrograde	6083 Apr 14 21:07	15° \searrow 31'35	

opposition	6083 Jul 02 00:03	14°30'43" 1°21'51"	max. Earth dist.	6090 Jan 16 17:06	28°31'56" 31.31874 AU
min. Earth dist.	6083 Jul 02 18:55	14°30'8"25" 29.32981 AU	morning rise	6090 Feb 01 21:59	28°35'4"04"
direct	6083 Sep 21 01:08	12°34'5"09"		6090 Mar 07 11:53	0°≈≈
evening set	6083 Dec 20 07:21	14°34'0"44"	retrograde	6090 Apr 29 22:26	0°≈≈46'31"
				6090 Jun 24 21:34	30°R3
conjunction	6084 Jan 04 22:40	15°31'5"29" 1°16'10"	opposition	6090 Jul 17 08:41	29°32'4"32" 1°12'25"
minimum elong	6084 Jan 04 22:40	15°31'5"29" 1°16'12"	min. Earth dist.	6090 Jul 18 02:52	29°32'3"17" 29.31646 AU
max. Earth dist.	6084 Jan 04 03:18	15°31'3"40" 31.32996 AU	direct	6090 Oct 06 10:20	28°30'0"05"
morning rise	6084 Jan 20 11:09	15°35'0"00"	evening set	6091 Jan 04 08:17	29°35'5"26"
retrograde	6084 Apr 16 06:55	17°34'2"11"		6091 Jan 06 10:19	0°≈≈
opposition	6084 Jul 03 11:20	16°32'0"20" 1°20'50"			
min. Earth dist.	6084 Jul 04 05:07	16°31'9"07" 29.33131 AU	conjunction	6091 Jan 19 21:07	0°≈≈30'03" 1°06'58"
direct	6084 Sep 22 12:29	14°35'5"50"	minimum elong	6091 Jan 19 21:07	0°≈≈30'03" 1°06'59"
evening set	6084 Dec 21 17:49	16°35'1"24"	max. Earth dist.	6091 Jan 19 02:31	0°≈≈28'18" 31.31298 AU
			morning rise	6091 Feb 04 07:38	1°≈≈04'28"
conjunction	6085 Jan 06 08:44	17°32'6"08" 1°15'09"	retrograde	6091 May 02 09:44	2°≈≈56'56"
minimum elong	6085 Jan 06 08:44	17°32'6"08" 1°15'11"	opposition	6091 Jul 19 20:17	1°≈≈34'53" 1°10'39"
max. Earth dist.	6085 Jan 05 13:22	17°32'4"20" 31.33111 AU	min. Earth dist.	6091 Jul 20 13:00	1°≈≈33'45" 29.31058 AU
morning rise	6085 Jan 21 20:54	18°30'0"38"	direct	6091 Oct 08 22:48	0°≈≈10'24"
retrograde	6085 Apr 18 17:19	19°35'2"54"	evening set	6092 Jan 06 18:18	2°≈≈05'42"
opposition	6085 Jul 05 22:48	18°33'1"04" 1°19'42"			
min. Earth dist.	6085 Jul 06 17:17	18°32'9"48" 29.33210 AU	conjunction	6092 Jan 22 06:53	2°≈≈40'18" 1°05'16"
direct	6085 Sep 24 21:18	17°30'6"36"	minimum elong	6092 Jan 22 06:53	2°≈≈40'18" 1°05'18"
evening set	6085 Dec 24 04:21	19°30'2"10"	max. Earth dist.	6092 Jan 21 13:18	2°≈≈38'39" 31.30716 AU
			morning rise	6092 Feb 06 17:03	3°≈≈14'43"
conjunction	6086 Jan 08 18:59	19°33'6"52" 1°14'03"	retrograde	6092 May 03 18:10	5°≈≈07'14"
minimum elong	6086 Jan 08 18:59	19°33'6"52" 1°14'05"	opposition	6092 Jul 21 08:05	3°≈≈45'07" 1°08'47"
max. Earth dist.	6086 Jan 08 00:14	19°33'5"07" 31.33137 AU	min. Earth dist.	6092 Jul 22 01:12	3°≈≈43'57" 29.30510 AU
morning rise	6086 Jan 24 06:46	20°31'1"22"	direct	6092 Oct 10 09:57	2°≈≈20'38"
retrograde	6086 Apr 21 03:14	22°30'3"40"	evening set	6093 Jan 08 04:10	4°≈≈15'52"
opposition	6086 Jul 08 10:09	20°34'1"50" 1°18'28"			
min. Earth dist.	6086 Jul 09 04:09	20°34'0"37" 29.33163 AU	conjunction	6093 Jan 23 16:27	4°≈≈50'28" 1°03'28"
direct	6086 Sep 27 10:16	19°31'7"24"	minimum elong	6093 Jan 23 16:27	4°≈≈50'28" 1°03'29"
evening set	6086 Dec 26 15:02	21°31'2"57"	max. Earth dist.	6093 Jan 22 23:37	4°≈≈48'53" 31.30215 AU
max. Earth dist.	6087 Jan 10 09:30	21°34'5"48" 31.33025 AU	morning rise	6093 Feb 08 02:27	5°≈≈24'52"
			retrograde	6093 May 06 03:47	7°≈≈17'27"
conjunction	6087 Jan 11 05:09	21°34'7"39" 1°12'50"	opposition	6093 Jul 23 19:46	5°≈≈55'18" 1°06'49"
minimum elong	6087 Jan 11 05:09	21°34'7"39" 1°12'51"	min. Earth dist.	6093 Jul 24 11:13	5°≈≈54'14" 29.30044 AU
morning rise	6087 Jan 26 16:44	22°32'2"07"	direct	6093 Oct 12 21:54	4°≈≈30'50"
retrograde	6087 Apr 23 15:21	24°31'4"28"	evening set	6094 Jan 10 14:09	6°≈≈26'02"
opposition	6087 Jul 10 21:47	22°35'2"38" 1°17'07"	max. Earth dist.	6094 Jan 25 09:38	6°≈≈59'05" 31.29798 AU
min. Earth dist.	6087 Jul 11 15:52	22°35'1"24" 29.32988 AU			
direct	6087 Sep 29 20:49	21°32'8"12"	conjunction	6094 Jan 26 02:06	7°≈≈00'37" 1°01'35"
evening set	6087 Dec 29 01:21	23°32'3"43"	minimum elong	6094 Jan 26 02:06	7°≈≈00'37" 1°01'37"
			morning rise	6094 Feb 10 11:54	7°≈≈35'01"
conjunction	6088 Jan 13 15:17	23°35'8"24" 1°11'31"	retrograde	6094 May 08 14:10	9°≈≈27'41"
minimum elong	6088 Jan 13 15:17	23°35'8"24" 1°11'33"	opposition	6094 Jul 26 07:29	8°≈≈05'31" 1°04'45"
max. Earth dist.	6088 Jan 12 20:46	23°35'6"40" 31.32775 AU	min. Earth dist.	6094 Jul 26 22:59	8°≈≈04'28" 29.29681 AU
morning rise	6088 Jan 29 02:24	24°33'2"51"	direct	6094 Oct 15 06:57	6°≈≈41'07"
retrograde	6088 Apr 25 00:56	26°32'5"15"	evening set	6095 Jan 13 00:02	8°≈≈36'18"
opposition	6088 Jul 12 09:30	25°30'3"22" 1°15'39"			
min. Earth dist.	6088 Jul 13 03:46	25°30'2"08" 29.32656 AU	conjunction	6095 Jan 28 11:48	9°≈≈10'52" 0°59'36"
direct	6088 Oct 01 09:25	23°33'8"57"	minimum elong	6095 Jan 28 11:48	9°≈≈10'52" 0°59'37"
evening set	6088 Dec 30 11:52	25°33'4"26"	max. Earth dist.	6095 Jan 27 20:44	9°≈≈09'27" 31.29484 AU
max. Earth dist.	6089 Jan 14 05:52	26°30'7"16" 31.32384 AU	morning rise	6095 Feb 12 21:18	9°≈≈45'16"
			retrograde	6095 May 11 00:07	11°≈≈38'02"
conjunction	6089 Jan 15 01:18	26°30'9"05" 1°10'06"	opposition	6095 Jul 28 19:23	10°≈≈15'52" 1°02'35"
minimum elong	6089 Jan 15 01:18	26°30'9"05" 1°10'08"	min. Earth dist.	6095 Jul 29 09:42	10°≈≈14'54" 29.29385 AU
morning rise	6089 Jan 30 12:19	26°34'3"32"	direct	6095 Oct 17 19:17	8°≈≈51'32"
retrograde	6089 Apr 27 12:42	28°33'5"57"	evening set	6096 Jan 15 09:53	10°≈≈46'42"
opposition	6089 Jul 14 20:58	27°31'4"01" 1°14'05"			
min. Earth dist.	6089 Jul 15 14:34	27°31'2"49" 29.32205 AU	conjunction	6096 Jan 30 21:14	11°≈≈21'16" 0°57'32"
direct	6089 Oct 03 20:54	25°34'9"35"	minimum elong	6096 Jan 30 21:14	11°≈≈21'16" 0°57'34"
evening set	6090 Jan 01 22:05	27°34'5"00"	max. Earth dist.	6096 Jan 30 05:55	11°≈≈19'50" 31.29218 AU
			morning rise	6096 Feb 15 06:42	11°≈≈55'40"
conjunction	6090 Jan 17 11:22	28°31'9"38" 1°08'35"	retrograde	6096 May 12 12:32	13°≈≈48'34"
minimum elong	6090 Jan 17 11:22	28°31'9"39" 1°08'37"	opposition	6096 Jul 30 07:21	12°≈≈26'24" 1°00'20"

min. Earth dist.	6096 Jul 30 21:11	12° \approx 25'28	29.29133 AU
direct	6096 Oct 19 04:43	11° \approx 02'08	
evening set	6097 Jan 16 19:43	12° \approx 57'18	
conjunction	6097 Feb 01 06:58	13° \approx 31'52	0°55'23
minimum elong	6097 Feb 01 06:58	13° \approx 31'52	0°55'25
max. Earth dist.	6097 Jan 31 17:17	13° \approx 30'35	31.28960 AU
morning rise	6097 Feb 16 16:06	14° \approx 06'16	
	6097 Mar 15 02:32	15° \approx	
retrograde	6097 May 14 22:36	15° \approx 59'17	
	6097 Jul 18 13:31	15° \approx	
opposition	6097 Aug 01 19:17	14° \approx 37'08	0°58'00
min. Earth dist.	6097 Aug 02 09:01	14° \approx 36'12	29.28849 AU
direct	6097 Oct 21 16:03	13° \approx 12'56	
	6098 Jan 15 12:25	15° \approx	
evening set	6098 Jan 19 05:45	15° \approx 08'06	
conjunction	6098 Feb 03 16:35	15° \approx 42'39	0°53'09
minimum elong	6098 Feb 03 16:35	15° \approx 42'39	0°53'11
max. Earth dist.	6098 Feb 03 02:21	15° \approx 41'19	31.28656 AU
morning rise	6098 Feb 19 01:43	16° \approx 17'04	
retrograde	6098 May 17 11:24	18° \approx 10'12	
opposition	6098 Aug 04 07:22	16° \approx 48'02	0°55'34
min. Earth dist.	6098 Aug 04 20:06	16° \approx 47'11	29.28507 AU
direct	6098 Oct 24 03:03	15° \approx 23'54	
evening set	6099 Jan 21 15:36	17° \approx 19'04	
conjunction	6099 Feb 06 02:19	17° \approx 53'37	0°50'51
minimum elong	6099 Feb 06 02:19	17° \approx 53'37	0°50'52
max. Earth dist.	6099 Feb 05 13:23	17° \approx 52'24	31.28257 AU
morning rise	6099 Feb 21 11:07	18° \approx 28'01	
retrograde	6099 May 19 22:29	20° \approx 21'17	
opposition	6099 Aug 06 19:42	18° \approx 59'06	0°53'04
min. Earth dist.	6099 Aug 07 08:53	18° \approx 58'13	29.28051 AU
direct	6099 Oct 26 16:11	17° \approx 35'02	
evening set	6100 Jan 24 01:37	19° \approx 30'10	
conjunction	6100 Feb 08 12:00	20° \approx 04'42	0°48'28
minimum elong	6100 Feb 08 12:00	20° \approx 04'42	0°48'30
max. Earth dist.	6100 Feb 07 22:45	20° \approx 03'28	31.27751 AU
morning rise	6100 Feb 23 20:47	20° \approx 39'07	
retrograde	6100 May 22 10:58	22° \approx 32'29	
opposition	6100 Aug 09 07:53	21° \approx 10'16	0°50'29
min. Earth dist.	6100 Aug 09 19:41	21° \approx 09'28	29.27476 AU
direct	6100 Oct 29 04:25	19° \approx 46'14	
evening set	6101 Jan 26 11:29	21° \approx 41'19	
conjunction	6101 Feb 10 21:43	22° \approx 15'52	0°46'01
minimum elong	6101 Feb 10 21:43	22° \approx 15'52	0°46'02
max. Earth dist.	6101 Feb 10 09:04	22° \approx 14'41	31.27102 AU
morning rise	6101 Feb 26 06:20	22° \approx 50'17	
retrograde	6101 May 24 20:12	24° \approx 43'45	
opposition	6101 Aug 11 20:18	23° \approx 21'29	0°47'50
min. Earth dist.	6101 Aug 12 08:48	23° \approx 20'38	29.26759 AU
direct	6101 Oct 31 16:04	21° \approx 57'28	