

evening set	5600 Jan 18 14:18	13° 00 '31	direct	5605 Nov 12 03:07	5° 34 '07
			evening set	5606 Feb 12 12:30	8° 44 '05
conjunction	5600 Feb 03 09:39	13° 57 '41 -0°30'13			
minimum elong	5600 Feb 03 09:39	13° 57 '41 0°30'12	conjunction	5606 Feb 28 04:49	9° 39 '39 -0°43'33
max. Earth dist.	5600 Feb 03 14:01	13° 58 '21 20.13739 AU	minimum elong	5606 Feb 28 04:49	9° 39 '39 0°43'33
morning rise	5600 Feb 19 03:07	14° 54 '37	max. Earth dist.	5606 Feb 28 16:04	9° 41 '20 20.50805 AU
	5600 Feb 20 15:33	15° 	morning rise	5606 Mar 15 20:38	10° 35 '10
retrograde	5600 May 20 14:47	18° 07 '27	retrograde	5606 Jun 15 22:33	13° 44 '42
opposition	5600 Aug 04 10:58	16° 08 '01 -0°35'04	opposition	5606 Aug 31 15:44	11° 45 '46 -0°49'03
min. Earth dist.	5600 Aug 04 06:41	16° 08 '28 18.17014 AU	min. Earth dist.	5606 Aug 31 04:30	11° 46 '54 18.53616 AU
	5600 Sep 02 17:38	15° 00	direct	5606 Nov 16 18:38	9° 46 '13
direct	5600 Oct 20 16:20	14° 06 '35	evening set	5607 Feb 16 21:27	12° 55 '07
	5600 Dec 05 21:28	15° 			
evening set	5601 Jan 22 04:11	17° 22 '09	conjunction	5607 Mar 04 13:20	13° 50 '28 -0°44'58
			minimum elong	5607 Mar 04 13:20	13° 50 '28 0°44'57
conjunction	5601 Feb 06 22:41	18° 19 '02 -0°32'59	max. Earth dist.	5607 Mar 05 00:53	13° 52 '10 20.56377 AU
minimum elong	5601 Feb 06 22:41	18° 19 '02 0°32'59	morning rise	5607 Mar 20 05:17	14° 45 '47
max. Earth dist.	5601 Feb 07 03:12	18° 19 '43 20.20299 AU	retrograde	5607 Jun 20 09:18	17° 54 '51
morning rise	5601 Feb 22 15:51	19° 15 '42	opposition	5607 Sep 05 06:14	15° 55 '56 -0°50'28
retrograde	5601 May 25 06:08	22° 27 '59	min. Earth dist.	5607 Sep 04 18:09	15° 57 '09 18.59130 AU
opposition	5601 Aug 09 05:25	20° 28 '42 -0°38'01	direct	5607 Nov 21 06:56	13° 56 '39
min. Earth dist.	5601 Aug 08 23:34	20° 29 '18 18.23541 AU	evening set	5608 Feb 21 05:35	17° 04 '33
direct	5601 Oct 25 10:13	18° 27 '39			
evening set	5602 Jan 26 16:58	21° 42 '05	conjunction	5608 Mar 07 21:23	17° 59 '40 -0°46'07
			minimum elong	5608 Mar 07 21:23	17° 59 '40 0°46'08
conjunction	5602 Feb 11 11:02	22° 38 '42 -0°35'33	max. Earth dist.	5608 Mar 08 11:04	18° 01 '42 20.61813 AU
minimum elong	5602 Feb 11 11:02	22° 38 '42 0°35'31	morning rise	5608 Mar 23 13:10	18° 54 '49
max. Earth dist.	5602 Feb 11 17:50	22° 39 '43 20.26759 AU	retrograde	5608 Jun 23 19:54	22° 03 '27
morning rise	5602 Feb 27 03:40	23° 35 '06	opposition	5608 Sep 08 20:01	20° 04 '35 -0°51'36
retrograde	5602 May 29 20:17	26° 46 '49	min. Earth dist.	5608 Sep 08 06:17	20° 05 '58 18.64490 AU
opposition	5602 Aug 13 23:15	24° 47 '40 -0°40'44	direct	5608 Nov 24 20:56	18° 05 '37
min. Earth dist.	5602 Aug 13 16:32	24° 48 '22 18.29926 AU	evening set	5609 Feb 24 13:17	21° 12 '33
direct	5602 Oct 30 03:43	22° 46 '59			
evening set	5603 Jan 31 05:13	26° 00 '18	conjunction	5609 Mar 12 04:47	22° 07 '29 -0°47'02
			minimum elong	5609 Mar 12 04:47	22° 07 '29 0°47'01
conjunction	5603 Feb 15 22:35	26° 56 '37 -0°37'53	max. Earth dist.	5609 Mar 12 18:45	22° 09 '32 20.67100 AU
minimum elong	5603 Feb 15 22:35	26° 56 '37 0°37'53	morning rise	5609 Mar 27 20:48	23° 02 '28
max. Earth dist.	5603 Feb 16 05:22	26° 57 '38 20.33059 AU	retrograde	5609 Jun 28 06:26	26° 10 '43
morning rise	5603 Mar 03 15:04	27° 52 '48	opposition	5609 Sep 13 09:24	24° 11 '55 -0°52'27
	5603 Apr 14 00:46	0° 00	min. Earth dist.	5609 Sep 12 19:01	24° 13 '22 18.69708 AU
retrograde	5603 Jun 03 09:53	1° 03 '57	direct	5609 Nov 29 07:21	22° 13 '15
	5603 Jul 26 05:29	30° 00	evening set	5610 Feb 28 20:09	25° 19 '17
opposition	5603 Aug 18 16:15	29° 04 '54 -0°43'12			
min. Earth dist.	5603 Aug 18 08:27	29° 05 '41 18.36143 AU	conjunction	5610 Mar 16 11:45	26° 14 '02 -0°47'42
direct	5603 Nov 03 19:47	27° 04 '31	minimum elong	5610 Mar 16 11:45	26° 14 '02 0°47'42
	5604 Jan 30 21:03	0° 00	max. Earth dist.	5610 Mar 17 03:39	26° 16 '22 20.72219 AU
evening set	5604 Feb 04 16:28	0° 16 '43	morning rise	5610 Apr 01 03:49	27° 08 '54
				5610 Jun 06 18:13	0° 00
conjunction	5604 Feb 20 09:32	1° 12 '47 -0°40'01	retrograde	5610 Jul 02 16:18	0° 16 '48
minimum elong	5604 Feb 20 09:32	1° 12 '47 0°40'00		5610 Jul 29 01:01	30° 00
max. Earth dist.	5604 Feb 20 18:23	1° 14 '06 20.39171 AU	opposition	5610 Sep 17 22:06	28° 18 '05 -0°53'02
morning rise	5604 Mar 07 01:38	2° 08 '43	min. Earth dist.	5610 Sep 17 06:09	28° 19 '41 18.74713 AU
retrograde	5604 Jun 06 22:58	5° 19 '19	direct	5610 Dec 03 19:45	26° 19 '45
opposition	5604 Aug 22 08:47	3° 20 '19 -0°45'25	evening set	5611 Mar 05 02:50	29° 24 '55
min. Earth dist.	5604 Aug 21 23:55	3° 21 '13 18.42145 AU		5611 Mar 15 05:05	0° 00
direct	5604 Nov 07 12:42	1° 20 '14			
evening set	5605 Feb 08 02:57	4° 31 '19	conjunction	5611 Mar 20 18:17	0° 19 '31 -0°48'07
			minimum elong	5611 Mar 20 18:17	0° 19 '31 0°48'07
conjunction	5605 Feb 23 19:26	5° 27 '07 -0°41'54	max. Earth dist.	5611 Mar 21 10:14	0° 21 '51 20.77103 AU
minimum elong	5605 Feb 23 19:26	5° 27 '07 0°41'54	morning rise	5611 Apr 05 10:42	1° 14 '15
max. Earth dist.	5605 Feb 24 04:28	5° 28 '28 20.45075 AU	retrograde	5611 Jul 07 02:17	4° 21 '52
morning rise	5605 Mar 11 11:30	6° 22 '51	opposition	5611 Sep 22 10:15	2° 23 '14 -0°53'21
retrograde	5605 Jun 11 10:49	9° 32 '54	min. Earth dist.	5611 Sep 21 18:11	2° 24 '51 18.79473 AU
opposition	5605 Aug 27 00:40	7° 33 '56 -0°47'22	direct	5611 Dec 08 04:54	0° 25 '13
min. Earth dist.	5605 Aug 26 14:50	7° 34 '56 18.47967 AU	evening set	5612 Mar 08 08:57	3° 29 '36

conjunction	5612 Mar 24 00:36	4° Υ 24'04 -0°48'17	min. Earth dist.	5618 Oct 20 17:48	0° \mathcal{B} 39'53 19.01216 AU
minimum elong	5612 Mar 24 00:36	4° Υ 24'04 0°48'17		5618 Nov 06 16:43	30° $\mathcal{R}\Upsilon$
max. Earth dist.	5612 Mar 24 18:07	4° Υ 26'37 20.81714 AU	direct	5619 Jan 05 17:14	28° Υ 41'23
morning rise	5612 Apr 08 17:09	5° Υ 18'41		5619 Mar 03 13:04	0° \mathcal{B}
retrograde	5612 Jul 10 11:41	8° Υ 26'02	evening set	5619 Apr 05 20:49	1° \mathcal{B} 41'34
opposition	5612 Sep 25 22:00	6° Υ 27'30 -0°53'24			
min. Earth dist.	5612 Sep 25 04:34	6° Υ 29'15 18.83917 AU	conjunction	5619 Apr 21 14:30	2° \mathcal{B} 35'34 -0°42'58
direct	5612 Dec 11 15:50	4° Υ 29'47	minimum elong	5619 Apr 21 14:30	2° \mathcal{B} 35'34 0°42'58
evening set	5613 Mar 12 14:46	7° Υ 33'25	max. Earth dist.	5619 Apr 22 08:43	2° \mathcal{B} 38'11 21.01814 AU
			morning rise	5619 May 07 10:44	3° \mathcal{B} 29'54
conjunction	5613 Mar 28 06:22	8° Υ 27'46 -0°48'14	retrograde	5619 Aug 08 22:12	6° \mathcal{B} 36'15
minimum elong	5613 Mar 28 06:22	8° Υ 27'46 0°48'14	opposition	5619 Oct 25 20:57	4° \mathcal{B} 37'35 -0°46'35
max. Earth dist.	5613 Mar 28 23:48	8° Υ 30'18 20.85981 AU	min. Earth dist.	5619 Oct 25 03:43	4° \mathcal{B} 39'18 19.02377 AU
morning rise	5613 Apr 12 23:24	9° Υ 22'18	direct	5620 Jan 09 23:15	2° \mathcal{B} 40'55
retrograde	5613 Jul 14 20:49	12° Υ 29'26	evening set	5620 Apr 09 01:07	5° \mathcal{B} 40'43
opposition	5613 Sep 30 09:29	10° Υ 30'58 -0°53'11			
min. Earth dist.	5613 Sep 29 16:20	10° Υ 32'41 18.88006 AU	conjunction	5620 Apr 24 19:28	6° \mathcal{B} 34'43 -0°41'19
direct	5613 Dec 16 00:07	8° Υ 33'32	minimum elong	5620 Apr 24 19:28	6° \mathcal{B} 34'43 0°41'21
evening set	5614 Mar 16 20:16	11° Υ 36'29	max. Earth dist.	5620 Apr 25 14:27	6° \mathcal{B} 37'26 21.02773 AU
			morning rise	5620 May 10 16:16	7° \mathcal{B} 29'05
conjunction	5614 Apr 01 12:13	12° Υ 30'44 -0°47'55	retrograde	5620 Aug 12 06:55	10° \mathcal{B} 35'24
minimum elong	5614 Apr 01 12:13	12° Υ 30'44 0°47'55	min. Earth dist.	5620 Oct 28 11:13	8° \mathcal{B} 38'26 19.03135 AU
max. Earth dist.	5614 Apr 02 06:49	12° Υ 33'26 20.89862 AU	opposition	5620 Oct 29 05:32	8° \mathcal{B} 36'37 -0°44'39
morning rise	5614 Apr 17 05:31	13° Υ 25'11	direct	5621 Jan 13 06:21	6° \mathcal{B} 39'58
retrograde	5614 Jul 19 06:08	16° Υ 32'08	evening set	5621 Apr 13 05:25	9° \mathcal{B} 39'27
opposition	5614 Oct 04 20:14	14° Υ 33'43 -0°52'43			
min. Earth dist.	5614 Oct 04 02:04	14° Υ 35'32 18.91662 AU	conjunction	5621 Apr 29 00:14	10° \mathcal{B} 33'28 -0°39'29
direct	5614 Dec 20 10:00	12° Υ 36'32	minimum elong	5621 Apr 29 00:14	10° \mathcal{B} 33'28 0°39'29
evening set	5615 Mar 21 01:42	15° Υ 38'51	max. Earth dist.	5621 Apr 29 18:41	10° \mathcal{B} 36'07 21.03342 AU
			morning rise	5621 May 14 21:53	11° \mathcal{B} 27'53
conjunction	5615 Apr 05 17:46	16° Υ 33'00 -0°47'23	retrograde	5621 Aug 16 14:02	14° \mathcal{B} 34'14
minimum elong	5615 Apr 05 17:46	16° Υ 33'00 0°47'24	opposition	5621 Nov 02 14:01	12° \mathcal{B} 35'20 -0°42'30
max. Earth dist.	5615 Apr 06 11:50	16° Υ 35'37 20.93278 AU	min. Earth dist.	5621 Nov 01 20:40	12° \mathcal{B} 37'04 19.03528 AU
morning rise	5615 Apr 21 11:38	17° Υ 27'24	direct	5622 Jan 17 11:44	10° \mathcal{B} 38'42
retrograde	5615 Jul 23 14:13	20° Υ 34'12	evening set	5622 Apr 17 09:46	13° \mathcal{B} 37'57
opposition	5615 Oct 09 06:51	18° Υ 35'48 -0°51'59			
min. Earth dist.	5615 Oct 08 13:27	18° Υ 37'32 18.94839 AU	conjunction	5622 May 03 05:21	14° \mathcal{B} 32'01 -0°37'27
direct	5615 Dec 24 17:11	16° Υ 38'49	minimum elong	5622 May 03 05:22	14° \mathcal{B} 32'01 0°37'28
evening set	5616 Mar 24 06:42	19° Υ 40'32	max. Earth dist.	5622 May 04 00:26	14° \mathcal{B} 34'45 21.03560 AU
				5622 May 11 08:30	15° \mathcal{B}
conjunction	5616 Apr 08 23:11	20° Υ 34'37 -0°46'37	morning rise	5622 May 19 03:41	15° \mathcal{B} 26'29
minimum elong	5616 Apr 08 23:11	20° Υ 34'37 0°46'37	retrograde	5622 Aug 20 23:05	18° \mathcal{B} 32'54
max. Earth dist.	5616 Apr 09 18:04	20° Υ 37'21 20.96194 AU	opposition	5622 Nov 06 21:56	16° \mathcal{B} 33'54 -0°40'09
morning rise	5616 Apr 24 17:25	21° Υ 28'59	min. Earth dist.	5622 Nov 06 03:39	16° \mathcal{B} 35'44 19.03561 AU
retrograde	5616 Jul 26 23:23	24° Υ 35'37		5622 Dec 22 05:53	15° $\mathcal{R}\mathcal{B}$
opposition	5616 Oct 12 16:58	22° Υ 37'13 -0°51'00	direct	5623 Jan 21 18:24	14° \mathcal{B} 37'17
min. Earth dist.	5616 Oct 11 22:39	22° Υ 39'03 18.97483 AU		5623 Feb 20 15:23	15° \mathcal{B}
direct	5616 Dec 28 02:32	20° Υ 40'23	evening set	5623 Apr 21 14:20	17° \mathcal{B} 36'23
evening set	5617 Mar 28 11:42	23° Υ 41'32			
			conjunction	5623 May 07 10:29	18° \mathcal{B} 30'30 -0°35'14
conjunction	5617 Apr 13 04:26	24° Υ 35'35 -0°45'37	minimum elong	5623 May 07 10:29	18° \mathcal{B} 30'30 0°35'15
minimum elong	5617 Apr 13 04:26	24° Υ 35'35 0°45'38	max. Earth dist.	5623 May 08 04:50	18° \mathcal{B} 33'08 21.03414 AU
max. Earth dist.	5617 Apr 13 22:37	24° Υ 38'12 20.98571 AU	morning rise	5623 May 23 09:42	19° \mathcal{B} 25'04
morning rise	5617 Apr 28 23:22	25° Υ 29'55	retrograde	5623 Aug 25 06:27	22° \mathcal{B} 31'36
retrograde	5617 Jul 31 06:37	28° Υ 36'27	opposition	5623 Nov 11 06:01	20° \mathcal{B} 32'31 -0°37'37
min. Earth dist.	5617 Oct 16 09:27	26° Υ 39'42 18.99605 AU	min. Earth dist.	5623 Nov 10 12:54	20° \mathcal{B} 34'14 19.03240 AU
opposition	5617 Oct 17 02:47	26° Υ 37'59 -0°49'46	direct	5624 Jan 25 22:59	18° \mathcal{B} 35'55
direct	5618 Jan 01 09:01	24° Υ 41'14	evening set	5624 Apr 24 18:49	21° \mathcal{B} 34'55
evening set	5618 Apr 01 16:13	27° Υ 41'53			
			conjunction	5624 May 10 15:49	22° \mathcal{B} 29'08 -0°32'52
conjunction	5618 Apr 17 09:35	28° Υ 35'53 -0°44'24	minimum elong	5624 May 10 15:49	22° \mathcal{B} 29'08 0°32'53
minimum elong	5618 Apr 17 09:34	28° Υ 35'53 0°44'25	max. Earth dist.	5624 May 11 10:41	22° \mathcal{B} 31'50 21.02918 AU
max. Earth dist.	5618 Apr 18 04:26	28° Υ 38'36 21.00440 AU	morning rise	5624 May 26 15:45	23° \mathcal{B} 23'46
morning rise	5618 May 03 05:02	29° Υ 30'13	retrograde	5624 Aug 28 16:19	26° \mathcal{B} 30'29
	5618 May 12 04:35	0° \mathcal{B}	opposition	5624 Nov 14 13:54	24° \mathcal{B} 31'20 -0°34'54
retrograde	5618 Aug 04 15:26	2° \mathcal{B} 36'38	min. Earth dist.	5624 Nov 13 19:58	24° \mathcal{B} 33'08 19.02551 AU
opposition	5618 Oct 21 12:01	0° \mathcal{B} 38'04 -0°48'17	direct	5625 Jan 29 05:50	22° \mathcal{B} 34'45

evening set	5625 Apr 28 23:51	25°♄33'45	conjunction	5631 Jun 08 17:16	20°♄34'34 -0°12'21
			minimum elong	5631 Jun 08 17:16	20°♄34'34 0°12'23
conjunction	5625 May 14 21:28	26°♄28'03 -0°30'19	behind sun begin	5631 Jun 08 12:55	20°♄33'58
minimum elong	5625 May 14 21:28	26°♄28'03 0°30'21	behind sun end	5631 Jun 08 21:38	20°♄35'11
max. Earth dist.	5625 May 15 15:30	26°♄30'38 21.02041 AU	max. Earth dist.	5631 Jun 09 05:57	20°♄36'23 20.87272 AU
morning rise	5625 May 30 22:23	27°♄22'49	morning rise	5631 Jun 24 23:32	21°♄30'19
	5625 Jul 28 20:52	0°♄	retrograde	5631 Sep 27 11:56	24°♄39'15
retrograde	5625 Sep 01 23:59	0°♄29'45	opposition	5631 Dec 13 22:06	22°♄39'19 -0°11'45
	5625 Oct 07 21:14	30°♄	min. Earth dist.	5631 Dec 13 11:12	22°♄40'25 18.85263 AU
opposition	5625 Nov 18 21:48	28°♄30'32 -0°32'00	direct	5632 Feb 26 22:45	20°♄42'00
min. Earth dist.	5625 Nov 18 05:22	28°♄32'11 19.01482 AU	evening set	5632 May 26 22:24	23°♄42'51
direct	5626 Feb 02 09:54	26°♄33'56			
evening set	5626 May 03 05:04	29°♄33'00	conjunction	5632 Jun 12 02:12	24°♄38'18 -0°09'01
	5626 May 11 04:07	0°♄	minimum elong	5632 Jun 12 02:11	24°♄38'18 0°09'02
			behind sun begin	5632 Jun 11 20:31	24°♄37'30
conjunction	5626 May 19 03:38	0°♄27'26 -0°27'38	behind sun end	5632 Jun 12 07:51	24°♄39'06
minimum elong	5626 May 19 03:38	0°♄27'26 0°27'40	max. Earth dist.	5632 Jun 12 14:16	24°♄40'02 20.83163 AU
max. Earth dist.	5626 May 19 21:46	0°♄30'01 21.00775 AU	morning rise	5632 Jun 28 09:18	25°♄34'15
morning rise	5626 Jun 04 05:20	1°♄22'19	retrograde	5632 Sep 30 23:30	28°♄43'36
retrograde	5626 Sep 06 10:30	4°♄29'31	opposition	5632 Dec 17 06:27	26°♄43'27 -0°08'01
opposition	5626 Nov 23 05:35	2°♄30'14 -0°28'57	min. Earth dist.	5632 Dec 16 19:31	26°♄44'34 18.80962 AU
min. Earth dist.	5626 Nov 22 12:45	2°♄31'56 18.99992 AU	direct	5633 Mar 02 06:20	24°♄45'52
direct	5627 Feb 06 16:54	0°♄33'37	evening set	5633 May 31 07:07	27°♄47'14
evening set	5627 May 07 10:51	3°♄32'51			
			conjunction	5633 Jun 16 11:45	28°♄42'54 -0°05'38
conjunction	5627 May 23 10:04	4°♄27'24 -0°24'49	minimum elong	5633 Jun 16 11:45	28°♄42'54 0°05'40
minimum elong	5627 May 23 10:04	4°♄27'24 0°24'50	behind sun begin	5633 Jun 16 05:21	28°♄42'00
max. Earth dist.	5627 May 24 03:00	4°♄29'49 20.99057 AU	behind sun end	5633 Jun 16 18:09	28°♄43'48
morning rise	5627 Jun 08 12:43	5°♄22'26	max. Earth dist.	5633 Jun 16 22:28	28°♄44'26 20.78690 AU
retrograde	5627 Sep 10 18:47	8°♄29'56	morning rise	5633 Jul 02 19:49	29°♄39'04
opposition	5627 Nov 27 13:33	6°♄30'35 -0°25'45		5633 Jul 09 02:19	0°♄
min. Earth dist.	5627 Nov 26 22:33	6°♄32'06 18.98044 AU	retrograde	5633 Oct 05 09:39	2°♄48'51
direct	5628 Feb 10 21:10	4°♄33'55	opposition	5633 Dec 21 14:58	0°♄48'29 -0°04'14
evening set	5628 May 10 17:00	7°♄33'22	min. Earth dist.	5633 Dec 21 06:00	0°♄49'25 18.76340 AU
				5634 Jan 10 21:39	30°♄
conjunction	5628 May 26 17:10	8°♄28'04 -0°21'51	direct	5634 Mar 06 13:06	28°♄50'39
minimum elong	5628 May 26 17:10	8°♄28'04 0°21'52		5634 Apr 28 06:38	0°♄
max. Earth dist.	5628 May 27 09:45	8°♄30'26 20.96877 AU	evening set	5634 Jun 04 16:22	1°♄52'35
morning rise	5628 Jun 11 20:36	9°♄23'15			
retrograde	5628 Sep 14 05:38	12°♄31'05	conjunction	5634 Jun 20 21:58	2°♄48'29 -0°02'12
opposition	5628 Nov 30 21:30	10°♄31'38 -0°22'25	minimum elong	5634 Jun 20 22:00	2°♄48'29 0°02'13
min. Earth dist.	5628 Nov 30 06:24	10°♄33'10 18.95607 AU	behind sun begin	5634 Jun 20 15:20	2°♄47'33
direct	5629 Feb 14 04:25	8°♄34'54	behind sun end	5634 Jun 21 04:40	2°♄49'25
evening set	5629 May 14 23:41	11°♄34'37	max. Earth dist.	5634 Jun 21 07:58	2°♄49'55 20.73939 AU
			morning rise	5634 Jul 07 06:54	3°♄44'52
conjunction	5629 May 31 00:38	12°♄29'29 -0°18'47	retrograde	5634 Oct 09 22:11	6°♄55'08
minimum elong	5629 May 31 00:38	12°♄29'29 0°18'49	opposition	5634 Dec 25 23:38	4°♄54'34 -0°00'25
max. Earth dist.	5629 May 31 15:39	12°♄31'37 20.94179 AU	min. Earth dist.	5634 Dec 25 14:37	4°♄55'30 18.71458 AU
morning rise	5629 Jun 16 05:05	13°♄24'50	asc. node	5635 Feb 03 15:45	3°♄27'21
retrograde	5629 Sep 18 15:03	16°♄33'02	direct	5635 Mar 10 21:12	2°♄56'27
opposition	5629 Dec 05 05:44	14°♄33'27 -0°18'58	evening set	5635 Jun 09 02:13	5°♄59'02
min. Earth dist.	5629 Dec 04 16:42	14°♄34'46 18.92649 AU			
direct	5630 Feb 18 09:27	12°♄36'33	conjunction	5635 Jun 25 08:40	6°♄55'10 0°01'23
evening set	5630 May 19 06:50	15°♄36'36	minimum elong	5635 Jun 25 08:40	6°♄55'10 0°01'22
			behind sun begin	5635 Jun 25 01:59	6°♄54'14
conjunction	5630 Jun 04 08:48	16°♄31'39 -0°15'36	behind sun end	5635 Jun 25 15:21	6°♄56'07
minimum elong	5630 Jun 04 08:48	16°♄31'39 0°15'37	max. Earth dist.	5635 Jun 25 17:26	6°♄56'25 20.68935 AU
behind sun begin	5630 Jun 04 07:18	16°♄31'26	morning rise	5635 Jul 11 18:24	7°♄51'47
behind sun end	5630 Jun 04 10:17	16°♄31'51	retrograde	5635 Oct 14 08:48	11°♄02'34
max. Earth dist.	5630 Jun 04 23:03	16°♄33'41 20.90973 AU	opposition	5635 Dec 30 08:44	9°♄01'49 0°03'25
morning rise	5630 Jun 20 14:04	17°♄27'12	min. Earth dist.	5635 Dec 30 01:32	9°♄02'34 18.66355 AU
retrograde	5630 Sep 23 01:58	20°♄35'44	direct	5636 Mar 14 04:27	7°♄03'26
opposition	5630 Dec 09 13:43	18°♄36'00 -0°15'24	evening set	5636 Jun 12 12:48	10°♄06'43
min. Earth dist.	5630 Dec 09 00:47	18°♄37'18 18.89184 AU			
direct	5631 Feb 22 16:51	16°♄38'55	conjunction	5636 Jun 28 20:13	11°♄03'06 0°04'52
evening set	5631 May 23 14:30	19°♄39'20	minimum elong	5636 Jun 28 20:13	11°♄03'06 0°04'50
			behind sun begin	5636 Jun 28 13:42	11°♄02'11

behind sun end	5636 Jun 29 02:45	11°☾04'02		conjunction	5642 Jul 25 11:22	6°♈23'58	0°24'50
max. Earth dist.	5636 Jun 29 04:08	11°☾04'14	20.63752 AU	minimum elong	5642 Jul 25 11:22	6°♈23'58	0°24'50
morning rise	5636 Jul 15 06:47	11°☾59'58		max. Earth dist.	5642 Jul 25 10:34	6°♈23'51	20.29339 AU
retrograde	5636 Oct 17 22:30	15°☾11'18		morning rise	5642 Aug 11 02:10	7°♈22'23	
opposition	5637 Jan 02 18:00	13°☾10'22	0°07'16	retrograde	5642 Nov 13 13:58	10°♈37'26	
min. Earth dist.	5637 Jan 02 10:51	13°☾11'06	18.61085 AU	opposition	5643 Jan 28 12:01	8°♈35'45	0°29'16
direct	5637 Mar 18 13:44	11°☾11'42		min. Earth dist.	5643 Jan 28 12:47	8°♈35'40	18.26171 AU
evening set	5637 Jun 17 00:12	14°☾15'46		direct	5643 Apr 13 03:27	6°♈35'20	
				evening set	5643 Jul 13 15:47	9°♈45'15	
conjunction	5637 Jul 03 08:31	15°☾12'26	0°08'18				
minimum elong	5637 Jul 03 08:31	15°☾12'26	0°08'18	conjunction	5643 Jul 30 05:01	10°♈43'36	0°27'53
behind sun begin	5637 Jul 03 02:37	15°☾11'35		minimum elong	5643 Jul 30 05:00	10°♈43'36	0°27'51
behind sun end	5637 Jul 03 14:25	15°☾13'16		max. Earth dist.	5643 Jul 30 03:00	10°♈43'18	20.22979 AU
max. Earth dist.	5637 Jul 03 15:14	15°☾13'23	20.58395 AU	morning rise	5643 Aug 15 20:12	11°♈42'16	
morning rise	5637 Jul 19 19:54	16°☾09'32		retrograde	5643 Nov 18 06:00	14°♈57'56	
retrograde	5637 Oct 22 10:00	19°☾21'26		opposition	5644 Feb 02 01:03	12°♈56'05	0°32'34
opposition	5638 Jan 07 03:51	17°☾20'21	0°11'05	min. Earth dist.	5644 Feb 02 03:45	12°♈55'48	18.19733 AU
min. Earth dist.	5638 Jan 06 22:34	17°☾20'54	18.55653 AU	direct	5644 Apr 16 15:34	10°♈55'18	
direct	5638 Mar 22 21:16	15°☾21'25		evening set	5644 Jul 17 09:43	14°♈06'18	
evening set	5638 Jun 21 12:27	18°☾26'21			5644 Aug 01 14:21	15°♈	
conjunction	5638 Jul 07 21:39	19°☾23'16	0°11'44	conjunction	5644 Aug 02 23:34	15°♈04'56	0°30'47
minimum elong	5638 Jul 07 21:40	19°☾23'16	0°11'42	minimum elong	5644 Aug 02 23:33	15°♈04'56	0°30'46
behind sun begin	5638 Jul 07 16:58	19°☾22'36		max. Earth dist.	5644 Aug 02 19:09	15°♈04'17	20.16489 AU
behind sun end	5638 Jul 08 02:21	19°☾23'56		morning rise	5644 Aug 19 15:22	16°♈03'52	
max. Earth dist.	5638 Jul 08 03:11	19°☾24'03	20.52902 AU	retrograde	5644 Nov 22 00:15	19°♈20'09	
morning rise	5638 Jul 24 09:48	20°☾20'37		opposition	5645 Feb 05 14:24	17°♈18'06	0°35'43
retrograde	5638 Oct 27 01:02	23°☾33'07		min. Earth dist.	5645 Feb 05 18:08	17°♈17'43	18.13199 AU
opposition	5639 Jan 11 13:54	21°☾31'55	0°14'52	direct	5645 Apr 21 05:49	15°♈16'54	
min. Earth dist.	5639 Jan 11 08:55	21°☾32'27	18.50085 AU	evening set	5645 Jul 22 04:28	18°♈29'01	
direct	5639 Mar 27 07:56	19°☾32'43					
evening set	5639 Jun 26 01:36	22°☾38'34		conjunction	5645 Aug 07 19:04	19°♈27'56	0°33'31
				minimum elong	5645 Aug 07 19:04	19°♈27'56	0°33'30
conjunction	5639 Jul 12 11:39	23°☾35'46	0°15'06	max. Earth dist.	5645 Aug 07 13:45	19°♈27'09	20.09916 AU
minimum elong	5639 Jul 12 11:39	23°☾35'46	0°15'05	morning rise	5645 Aug 24 11:09	20°♈27'07	
behind sun begin	5639 Jul 12 09:30	23°☾35'28		retrograde	5645 Nov 26 17:30	23°♈43'59	
behind sun end	5639 Jul 12 13:48	23°☾36'04		opposition	5646 Feb 10 04:26	21°♈41'46	0°38'41
max. Earth dist.	5639 Jul 12 16:01	23°☾36'24	20.47258 AU	min. Earth dist.	5646 Feb 10 09:49	21°♈41'12	18.06616 AU
morning rise	5639 Jul 29 00:29	24°☾33'23		direct	5646 Apr 25 19:27	19°♈40'10	
retrograde	5639 Oct 31 13:43	27°☾46'30		evening set	5646 Jul 27 00:07	22°♈53'23	
opposition	5640 Jan 16 00:41	25°☾45'12	0°18'36				
min. Earth dist.	5640 Jan 15 21:41	25°☾45'31	18.44370 AU	conjunction	5646 Aug 12 15:09	23°♈52'35	0°36'05
direct	5640 Mar 30 16:31	23°☾45'44		minimum elong	5646 Aug 12 15:09	23°♈52'35	0°36'04
evening set	5640 Jun 29 15:35	26°☾52'32		max. Earth dist.	5646 Aug 12 07:26	23°♈51'26	20.03350 AU
				morning rise	5646 Aug 29 07:42	24°♈52'01	
conjunction	5640 Jul 16 02:29	27°☾50'01	0°18'26	retrograde	5646 Dec 01 12:39	28°♈09'29	
minimum elong	5640 Jul 16 02:29	27°☾50'01	0°18'25	opposition	5647 Feb 14 18:57	26°♈07'05	0°41'25
max. Earth dist.	5640 Jul 16 05:16	27°☾50'25	20.41477 AU	min. Earth dist.	5647 Feb 15 01:19	26°♈06'24	18.00087 AU
morning rise	5640 Aug 01 16:05	28°☾47'54		direct	5647 Apr 30 11:01	24°♈05'04	
	5640 Aug 23 19:10	0°♈		evening set	5647 Jul 31 20:29	27°♈19'25	
retrograde	5640 Nov 04 06:08	2°♈01'40					
opposition	5641 Jan 19 11:53	0°♈00'15	0°22'15	conjunction	5647 Aug 17 12:10	28°♈18'55	0°38'26
min. Earth dist.	5641 Jan 19 09:33	0°♈00'30	18.38500 AU	minimum elong	5647 Aug 17 12:10	28°♈18'55	0°38'26
	5641 Jan 19 14:19	30°♈☾		max. Earth dist.	5647 Aug 17 04:06	28°♈17'42	19.96860 AU
direct	5641 Apr 04 04:14	28°☾00'30		morning rise	5647 Sep 03 04:49	29°♈18'35	
	5641 Jun 13 09:52	0°♈			5647 Sep 15 06:45	0°♈	
evening set	5641 Jul 04 06:47	1°♈08'19		retrograde	5647 Dec 06 07:14	2°♈36'37	
				opposition	5648 Feb 19 10:03	0°♈34'04	0°43'56
conjunction	5641 Jul 20 18:30	2°♈06'06	0°21'41	min. Earth dist.	5648 Feb 19 17:38	0°♈33'15	17.93669 AU
minimum elong	5641 Jul 20 18:30	2°♈06'06	0°21'40		5648 Mar 03 18:51	30°♈♈	
max. Earth dist.	5641 Jul 20 19:56	2°♈06'18	20.35501 AU	direct	5648 May 04 01:54	28°♈31'39	
morning rise	5641 Aug 06 08:38	3°♈04'14			5648 Jul 02 07:32	0°♈	
retrograde	5641 Nov 08 20:37	6°♈18'39		evening set	5648 Aug 04 17:47	1°♈47'09	
opposition	5642 Jan 23 23:39	4°♈17'07	0°25'49				
min. Earth dist.	5642 Jan 23 23:30	4°♈17'08	18.32430 AU	conjunction	5648 Aug 21 09:47	2°♈46'54	0°40'35
direct	5642 Apr 08 14:34	2°♈17'03		minimum elong	5648 Aug 21 09:47	2°♈46'54	0°40'34
evening set	5642 Jul 08 22:56	5°♈25'55		max. Earth dist.	5648 Aug 20 23:23	2°♈45'21	19.90532 AU

morning rise	5648 Sep 07 02:50	3° <u>♎</u> 46'50	conjunction	5655 Sep 24 14:41	4° <u>♊</u> 51'39	0°48'09
retrograde	5648 Dec 10 03:35	7° <u>♎</u> 05'26	minimum elong	5655 Sep 24 14:41	4° <u>♊</u> 51'39	0°48'10
opposition	5649 Feb 23 01:49	5° <u>♎</u> 02'43 0°46'12	max. Earth dist.	5655 Sep 23 21:57	4° <u>♊</u> 49'04	19.54398 AU
min. Earth dist.	5649 Feb 23 10:25	5° <u>♎</u> 01'47 17.87448 AU	morning rise	5655 Oct 11 06:43	5° <u>♊</u> 52'50	
direct	5649 May 08 18:44	2° <u>♎</u> 59'55	retrograde	5656 Jan 12 10:46	9° <u>♊</u> 14'48	
evening set	5649 Aug 09 15:53	6° <u>♎</u> 16'35	opposition	5656 Mar 26 10:22	7° <u>♊</u> 11'54	0°53'38
			min. Earth dist.	5656 Mar 27 00:41	7° <u>♊</u> 10'20	17.52435 AU
conjunction	5649 Aug 26 08:26	7° <u>♎</u> 16'37 0°42'29	direct	5656 Jun 09 13:23	5° <u>♊</u> 07'16	
minimum elong	5649 Aug 26 08:26	7° <u>♎</u> 16'37 0°42'29	evening set	5656 Sep 12 00:55	8° <u>♊</u> 31'35	
max. Earth dist.	5649 Aug 25 21:58	7° <u>♎</u> 15'02 19.84414 AU				
morning rise	5649 Sep 12 01:23	8° <u>♎</u> 16'46	conjunction	5656 Sep 28 17:55	9° <u>♊</u> 33'04	0°48'03
retrograde	5649 Dec 14 23:22	11° <u>♎</u> 35'55	minimum elong	5656 Sep 28 17:55	9° <u>♊</u> 33'04	0°48'03
opposition	5650 Feb 27 18:05	9° <u>♎</u> 33'05 0°48'11	max. Earth dist.	5656 Sep 27 23:31	9° <u>♊</u> 30'13	19.50492 AU
min. Earth dist.	5650 Feb 28 03:28	9° <u>♎</u> 32'04 17.81463 AU	morning rise	5656 Oct 15 09:34	10° <u>♊</u> 34'22	
direct	5650 May 13 11:15	7° <u>♎</u> 29'57	retrograde	5657 Jan 16 09:04	13° <u>♊</u> 56'36	
evening set	5650 Aug 14 14:55	10° <u>♎</u> 47'47	opposition	5657 Mar 31 07:29	11° <u>♊</u> 53'43	0°53'20
			min. Earth dist.	5657 Mar 31 23:32	11° <u>♊</u> 51'57	17.48692 AU
conjunction	5650 Aug 31 07:36	11° <u>♎</u> 48'03 0°44'08	direct	5657 Jun 14 11:45	9° <u>♊</u> 48'49	
minimum elong	5650 Aug 31 07:36	11° <u>♎</u> 48'03 0°44'07	evening set	5657 Sep 17 04:44	13° <u>♊</u> 14'01	
max. Earth dist.	5650 Aug 30 18:55	11° <u>♎</u> 46'08 19.78579 AU				
morning rise	5650 Sep 17 00:45	12° <u>♎</u> 48'25	conjunction	5657 Oct 03 21:32	14° <u>♊</u> 15'36	0°47'37
retrograde	5650 Dec 19 20:29	16° <u>♎</u> 08'07	minimum elong	5657 Oct 03 21:32	14° <u>♊</u> 15'36	0°47'38
opposition	5651 Mar 04 11:10	14° <u>♎</u> 05'12 0°49'54	max. Earth dist.	5657 Oct 03 02:37	14° <u>♊</u> 12'41	19.46909 AU
min. Earth dist.	5651 Mar 04 21:36	14° <u>♎</u> 04'04 17.75797 AU	morning rise	5657 Oct 20 12:40	15° <u>♊</u> 17'00	
direct	5651 May 18 05:07	12° <u>♎</u> 01'45	retrograde	5658 Jan 21 09:47	18° <u>♊</u> 39'27	
evening set	5651 Aug 19 14:27	15° <u>♎</u> 20'44	opposition	5658 Apr 05 04:55	16° <u>♊</u> 36'32	0°52'42
			min. Earth dist.	5658 Apr 05 20:42	16° <u>♊</u> 34'49	17.45275 AU
conjunction	5651 Sep 05 07:34	16° <u>♎</u> 21'16 0°45'31	direct	5658 Jun 19 12:51	14° <u>♊</u> 31'25	
minimum elong	5651 Sep 05 07:33	16° <u>♎</u> 21'16 0°45'30	evening set	5658 Sep 22 08:55	17° <u>♊</u> 57'23	
max. Earth dist.	5651 Sep 04 19:07	16° <u>♎</u> 19'22 19.73073 AU	max. Earth dist.	5658 Oct 08 05:37	18° <u>♊</u> 56'01	19.43671 AU
morning rise	5651 Sep 22 00:31	17° <u>♎</u> 21'49				
retrograde	5651 Dec 24 17:36	20° <u>♎</u> 42'03	conjunction	5658 Oct 09 01:23	18° <u>♊</u> 59'05	0°46'52
opposition	5652 Mar 08 04:52	18° <u>♎</u> 39'06 0°51'18	minimum elong	5658 Oct 09 01:23	18° <u>♊</u> 59'05	0°46'52
min. Earth dist.	5652 Mar 08 15:42	18° <u>♎</u> 37'55 17.70460 AU	morning rise	5658 Oct 25 15:54	20° <u>♊</u> 00'32	
direct	5652 May 21 24:00	16° <u>♎</u> 35'23	retrograde	5659 Jan 26 08:48	23° <u>♊</u> 23'08	
evening set	5652 Aug 23 15:09	19° <u>♎</u> 55'31	opposition	5659 Apr 10 03:01	21° <u>♊</u> 20'13	0°51'41
			min. Earth dist.	5659 Apr 10 20:20	21° <u>♊</u> 18'19	17.42241 AU
conjunction	5652 Sep 09 08:16	20° <u>♎</u> 56'16 0°46'37	direct	5659 Jun 24 12:09	19° <u>♊</u> 14'51	
minimum elong	5652 Sep 09 08:16	20° <u>♎</u> 56'16 0°46'37	evening set	5659 Sep 27 13:10	22° <u>♊</u> 41'30	
max. Earth dist.	5652 Sep 08 17:42	20° <u>♎</u> 54'03 19.67913 AU	max. Earth dist.	5659 Oct 13 08:55	23° <u>♊</u> 40'06	19.40849 AU
morning rise	5652 Sep 26 01:16	21° <u>♎</u> 57'01				
retrograde	5652 Dec 28 14:54	25° <u>♎</u> 17'45	conjunction	5659 Oct 14 05:15	23° <u>♊</u> 43'16	0°45'47
opposition	5653 Mar 12 23:10	23° <u>♎</u> 14'48 0°52'23	minimum elong	5659 Oct 14 05:15	23° <u>♊</u> 43'16	0°45'48
min. Earth dist.	5653 Mar 13 11:27	23° <u>♎</u> 13'28 17.65482 AU	morning rise	5659 Oct 30 19:15	24° <u>♊</u> 44'46	
direct	5653 May 26 19:09	21° <u>♎</u> 10'50	retrograde	5660 Jan 31 09:39	28° <u>♊</u> 07'27	
evening set	5653 Aug 28 16:32	24° <u>♎</u> 32'06	opposition	5660 Apr 14 01:22	26° <u>♊</u> 04'31	0°50'19
			min. Earth dist.	5660 Apr 14 18:05	26° <u>♊</u> 02'41	17.39629 AU
conjunction	5653 Sep 14 09:54	25° <u>♎</u> 33'05 0°47'26	direct	5660 Jun 28 13:49	23° <u>♊</u> 58'56	
minimum elong	5653 Sep 14 09:54	25° <u>♎</u> 33'05 0°47'25	evening set	5660 Oct 01 17:43	27° <u>♊</u> 26'11	
max. Earth dist.	5653 Sep 13 19:23	25° <u>♎</u> 30'51 19.63098 AU				
morning rise	5653 Oct 01 02:34	26° <u>♎</u> 33'59	conjunction	5660 Oct 18 09:23	28° <u>♊</u> 28'00	0°44'23
retrograde	5654 Jan 02 13:23	29° <u>♎</u> 55'11	minimum elong	5660 Oct 18 09:23	28° <u>♊</u> 28'00	0°44'24
opposition	5654 Mar 17 18:14	27° <u>♎</u> 52'15 0°53'08	max. Earth dist.	5660 Oct 17 13:06	28° <u>♊</u> 24'50	19.38459 AU
min. Earth dist.	5654 Mar 18 06:48	27° <u>♎</u> 50'53 17.60825 AU	morning rise	5660 Nov 03 22:35	29° <u>♊</u> 29'30	
direct	5654 May 31 16:38	25° <u>♎</u> 48'05		5660 Nov 12 10:11	0° <u>♋</u>	
evening set	5654 Sep 02 18:42	29° <u>♎</u> 10'26	retrograde	5661 Feb 04 08:51	2° <u>♋</u> 52'13	
	5654 Sep 16 08:32	0° <u>♋</u>	opposition	5661 Apr 19 00:11	0° <u>♋</u> 49'16	0°48'36
conjunction	5654 Sep 19 11:53	0° <u>♋</u> 11'35 0°47'57	min. Earth dist.	5661 Apr 19 18:08	0° <u>♋</u> 47'18	17.37485 AU
minimum elong	5654 Sep 19 11:53	0° <u>♋</u> 11'35 0°47'58	direct	5661 May 08 06:43	30° <u>♋</u>	
max. Earth dist.	5654 Sep 18 19:24	0° <u>♋</u> 09'03 19.58592 AU		5661 Jul 03 14:12	28° <u>♋</u> 43'30	
morning rise	5654 Oct 06 04:20	1° <u>♋</u> 12'39	evening set	5661 Aug 27 07:49	0° <u>♋</u>	
retrograde	5655 Jan 07 11:04	4° <u>♋</u> 34'16		5661 Oct 06 22:20	2° <u>♋</u> 11'15	
opposition	5655 Mar 22 14:04	2° <u>♋</u> 31'21 0°53'33	conjunction	5661 Oct 23 13:22	3° <u>♋</u> 13'05	0°42'41
min. Earth dist.	5655 Mar 23 04:18	2° <u>♋</u> 29'48 17.56485 AU	minimum elong	5661 Oct 23 13:22	3° <u>♋</u> 13'05	0°42'42
direct	5655 Jun 05 13:39	0° <u>♋</u> 26'57	max. Earth dist.	5661 Oct 22 16:27	3° <u>♋</u> 09'49	19.36576 AU
evening set	5655 Sep 07 21:27	3° <u>♋</u> 50'19	morning rise	5661 Nov 09 01:56	4° <u>♋</u> 14'35	

retrograde	5662 Feb 09 09:22	7° $\overline{\text{M}}$ 37'16		opposition	5668 May 21 23:34	4° $\overline{\text{J}}$ 05'42	0°28'07
opposition	5662 Apr 23 23:18	5° $\overline{\text{M}}$ 34'19	0°46'32	min. Earth dist.	5668 May 22 14:14	4° $\overline{\text{J}}$ 04'07	17.38711 AU
min. Earth dist.	5662 Apr 24 16:18	5° $\overline{\text{M}}$ 32'28	17.35868 AU	direct	5668 Aug 06 08:20	1° $\overline{\text{J}}$ 59'59	
direct	5662 Jul 08 16:37	3° $\overline{\text{M}}$ 28'24		evening set	5668 Nov 10 01:31	5° $\overline{\text{J}}$ 28'46	
evening set	5662 Oct 12 02:38	6° $\overline{\text{M}}$ 56'33					
				conjunction	5668 Nov 26 11:05	6° $\overline{\text{J}}$ 30'02	0°23'29
conjunction	5662 Oct 28 17:09	7° $\overline{\text{M}}$ 58'23	0°40'41	minimum elong	5668 Nov 26 11:05	6° $\overline{\text{J}}$ 30'02	0°23'30
minimum elong	5662 Oct 28 17:09	7° $\overline{\text{M}}$ 58'23	0°40'43	max. Earth dist.	5668 Nov 25 19:06	6° $\overline{\text{J}}$ 27'32	19.39821 AU
max. Earth dist.	5662 Oct 27 21:19	7° $\overline{\text{M}}$ 55'17	19.35233 AU	morning rise	5668 Dec 12 17:07	7° $\overline{\text{J}}$ 30'49	
morning rise	5662 Nov 14 04:45	8° $\overline{\text{M}}$ 59'51		retrograde	5669 Mar 14 05:10	10° $\overline{\text{J}}$ 52'07	
retrograde	5663 Feb 14 08:30	12° $\overline{\text{M}}$ 22'27		opposition	5669 May 27 00:09	8° $\overline{\text{J}}$ 50'13	0°24'15
opposition	5663 Apr 28 22:52	10° $\overline{\text{M}}$ 19'33	0°44'09	min. Earth dist.	5669 May 27 14:06	8° $\overline{\text{J}}$ 48'42	17.41067 AU
min. Earth dist.	5663 Apr 29 16:27	10° $\overline{\text{M}}$ 17'38	17.34819 AU	direct	5669 Aug 11 11:59	6° $\overline{\text{J}}$ 44'39	
direct	5663 Jul 13 18:02	8° $\overline{\text{M}}$ 13'31		evening set	5669 Nov 15 04:10	10° $\overline{\text{J}}$ 13'10	
evening set	5663 Oct 17 07:05	11° $\overline{\text{M}}$ 42'00					
				conjunction	5669 Dec 01 12:37	11° $\overline{\text{J}}$ 14'15	0°19'57
conjunction	5663 Nov 02 20:46	12° $\overline{\text{M}}$ 43'48	0°38'25	minimum elong	5669 Dec 01 12:37	11° $\overline{\text{J}}$ 14'15	0°19'58
minimum elong	5663 Nov 02 20:46	12° $\overline{\text{M}}$ 43'48	0°38'25	max. Earth dist.	5669 Nov 30 20:31	11° $\overline{\text{J}}$ 11'44	19.42395 AU
max. Earth dist.	5663 Nov 02 00:23	12° $\overline{\text{M}}$ 40'36	19.34496 AU	morning rise	5669 Dec 17 17:43	12° $\overline{\text{J}}$ 14'51	
morning rise	5663 Nov 19 07:42	13° $\overline{\text{M}}$ 45'12		retrograde	5670 Mar 19 03:38	15° $\overline{\text{J}}$ 35'47	
	5663 Dec 10 18:17	15° $\overline{\text{M}}$		opposition	5670 Jun 01 00:49	13° $\overline{\text{J}}$ 34'03	0°20'13
retrograde	5664 Feb 19 08:24	17° $\overline{\text{M}}$ 07'41		min. Earth dist.	5670 Jun 01 14:23	13° $\overline{\text{J}}$ 32'35	17.43853 AU
opposition	5664 May 02 22:26	15° $\overline{\text{M}}$ 04'51	0°41'28	direct	5670 Aug 16 14:11	11° $\overline{\text{J}}$ 28'38	
min. Earth dist.	5664 May 03 14:56	15° $\overline{\text{M}}$ 03'03	17.34394 AU	evening set	5670 Nov 20 05:56	14° $\overline{\text{J}}$ 56'47	
	5664 May 04 18:54	15° $\overline{\text{R}}$ $\overline{\text{M}}$					
direct	5664 Jul 17 20:46	12° $\overline{\text{M}}$ 58'46		conjunction	5670 Dec 06 13:30	15° $\overline{\text{J}}$ 57'40	0°16'17
	5664 Sep 26 01:18	15° $\overline{\text{M}}$		minimum elong	5670 Dec 06 13:30	15° $\overline{\text{J}}$ 57'40	0°16'18
evening set	5664 Oct 21 11:17	16° $\overline{\text{M}}$ 27'30		max. Earth dist.	5670 Dec 05 22:58	15° $\overline{\text{J}}$ 55'24	19.45377 AU
max. Earth dist.	5664 Nov 06 05:37	17° $\overline{\text{M}}$ 26'18	19.34382 AU	morning rise	5670 Dec 22 17:33	16° $\overline{\text{J}}$ 58'04	
				retrograde	5671 Mar 24 02:54	20° $\overline{\text{J}}$ 18'32	
conjunction	5664 Nov 07 00:24	17° $\overline{\text{M}}$ 29'15	0°35'52	opposition	5671 Jun 06 01:19	18° $\overline{\text{J}}$ 16'59	0°16'04
minimum elong	5664 Nov 07 00:24	17° $\overline{\text{M}}$ 29'15	0°35'54	min. Earth dist.	5671 Jun 06 13:39	18° $\overline{\text{J}}$ 15'40	17.47006 AU
morning rise	5664 Nov 23 10:16	18° $\overline{\text{M}}$ 30'34		direct	5671 Aug 21 17:26	16° $\overline{\text{J}}$ 11'45	
retrograde	5665 Feb 23 07:55	21° $\overline{\text{M}}$ 52'54		evening set	5671 Nov 25 07:19	19° $\overline{\text{J}}$ 39'25	
opposition	5665 May 07 22:31	19° $\overline{\text{M}}$ 50'12	0°38'30				
min. Earth dist.	5665 May 08 15:04	19° $\overline{\text{M}}$ 48'24	17.34589 AU	conjunction	5671 Dec 11 13:47	20° $\overline{\text{J}}$ 40'04	0°12'31
direct	5665 Jul 22 23:07	17° $\overline{\text{M}}$ 44'09		minimum elong	5671 Dec 11 13:47	20° $\overline{\text{J}}$ 40'04	0°12'32
evening set	5665 Oct 26 15:21	21° $\overline{\text{M}}$ 13'02		behind sun begin	5671 Dec 11 09:28	20° $\overline{\text{J}}$ 39'25	
max. Earth dist.	5665 Nov 11 08:15	22° $\overline{\text{M}}$ 11'41	19.34899 AU	behind sun end	5671 Dec 11 18:05	20° $\overline{\text{J}}$ 40'44	
				max. Earth dist.	5671 Dec 10 23:36	20° $\overline{\text{J}}$ 37'52	19.48712 AU
conjunction	5665 Nov 12 03:28	22° $\overline{\text{M}}$ 14'41	0°33'05	morning rise	5671 Dec 27 16:51	21° $\overline{\text{J}}$ 40'15	
minimum elong	5665 Nov 12 03:28	22° $\overline{\text{M}}$ 14'41	0°33'07	retrograde	5672 Mar 28 00:21	25° $\overline{\text{J}}$ 00'14	
morning rise	5665 Nov 28 12:33	23° $\overline{\text{M}}$ 15'54		opposition	5672 Jun 10 01:34	22° $\overline{\text{J}}$ 58'50	0°11'49
retrograde	5666 Feb 28 07:19	26° $\overline{\text{M}}$ 38'04		min. Earth dist.	5672 Jun 10 13:47	22° $\overline{\text{J}}$ 57'32	17.50521 AU
opposition	5666 May 12 22:43	24° $\overline{\text{M}}$ 35'32	0°35'16	direct	5672 Aug 25 18:24	20° $\overline{\text{J}}$ 53'46	
min. Earth dist.	5666 May 13 14:15	24° $\overline{\text{M}}$ 33'50	17.35412 AU	evening set	5672 Nov 29 07:52	24° $\overline{\text{J}}$ 20'51	
direct	5666 Jul 28 02:11	22° $\overline{\text{M}}$ 29'33					
evening set	5666 Oct 31 19:01	25° $\overline{\text{M}}$ 58'30		conjunction	5672 Dec 15 13:21	25° $\overline{\text{J}}$ 21'16	0°08'41
				minimum elong	5672 Dec 15 13:21	25° $\overline{\text{J}}$ 21'16	0°08'43
conjunction	5666 Nov 17 06:27	27° $\overline{\text{M}}$ 00'04	0°30'05	behind sun begin	5672 Dec 15 07:35	25° $\overline{\text{J}}$ 20'24	
minimum elong	5666 Nov 17 06:27	27° $\overline{\text{M}}$ 00'04	0°30'06	behind sun end	5672 Dec 15 19:07	25° $\overline{\text{J}}$ 22'09	
max. Earth dist.	5666 Nov 16 13:08	26° $\overline{\text{M}}$ 57'21	19.36017 AU	max. Earth dist.	5672 Dec 15 00:29	25° $\overline{\text{J}}$ 19'16	19.52405 AU
morning rise	5666 Dec 03 14:26	28° $\overline{\text{M}}$ 01'09		morning rise	5672 Dec 31 15:26	26° $\overline{\text{J}}$ 21'12	
	5667 Jan 08 12:09	0° $\overline{\text{J}}$		retrograde	5673 Apr 01 23:12	29° $\overline{\text{J}}$ 40'39	
retrograde	5667 Mar 05 06:51	1° $\overline{\text{J}}$ 23'04		opposition	5673 Jun 15 01:39	27° $\overline{\text{J}}$ 39'24	0°07'30
	5667 May 02 14:53	30° $\overline{\text{R}}$ $\overline{\text{M}}$		min. Earth dist.	5673 Jun 15 12:08	27° $\overline{\text{J}}$ 38'17	17.54369 AU
opposition	5667 May 17 23:04	29° $\overline{\text{M}}$ 20'45	0°31'48	direct	5673 Aug 30 21:35	25° $\overline{\text{J}}$ 34'30	
min. Earth dist.	5667 May 18 14:19	29° $\overline{\text{M}}$ 19'06	17.36800 AU	evening set	5673 Dec 04 07:28	29° $\overline{\text{J}}$ 00'54	
direct	5667 Aug 02 05:16	27° $\overline{\text{M}}$ 14'54					
	5667 Oct 24 16:47	0° $\overline{\text{J}}$		conjunction	5673 Dec 20 11:54	0° $\overline{\text{Z}}$ 01'03	0°04'49
evening set	5667 Nov 05 22:30	0° $\overline{\text{J}}$ 43'49		minimum elong	5673 Dec 20 11:54	0° $\overline{\text{Z}}$ 01'03	0°04'50
				behind sun begin	5673 Dec 20 05:24	0° $\overline{\text{Z}}$ 00'04	
conjunction	5667 Nov 22 08:53	1° $\overline{\text{J}}$ 45'14	0°26'52	behind sun end	5673 Dec 20 18:23	0° $\overline{\text{Z}}$ 02'03	
minimum elong	5667 Nov 22 08:53	1° $\overline{\text{J}}$ 45'14	0°26'54	max. Earth dist.	5673 Dec 20 00:09	29° $\overline{\text{J}}$ 59'14	19.56425 AU
max. Earth dist.	5667 Nov 21 15:11	1° $\overline{\text{J}}$ 42'28	19.37677 AU		5673 Dec 20 04:58	0° $\overline{\text{Z}}$	
morning rise	5667 Dec 08 16:03	2° $\overline{\text{J}}$ 46'11		morning rise	5674 Jan 05 12:59	1° $\overline{\text{Z}}$ 00'45	
retrograde	5668 Mar 09 05:49	6° $\overline{\text{J}}$ 07'50		retrograde	5674 Apr 06 18:48	4° $\overline{\text{Z}}$ 19'37	

opposition	5674 Jun 20 01:31	2° $\overline{3}$ 18'29 0°03'09	minimum elong	5680 Jan 17 08:23	27° $\overline{3}$ 24'07 0°17'53
min. Earth dist.	5674 Jun 20 11:48	2° $\overline{3}$ 17'23 17.58566 AU	max. Earth dist.	5680 Jan 17 06:43	27° $\overline{3}$ 23'52 19.88079 AU
direct	5674 Sep 04 21:50	0° $\overline{3}$ 13'46	morning rise	5680 Feb 02 04:20	28° $\overline{3}$ 22'08
evening set	5674 Dec 09 06:13	3° $\overline{3}$ 39'23		5680 Mar 02 16:20	0° \approx
			retrograde	5680 May 03 09:26	1° \approx 37'17
conjunction	5674 Dec 25 09:37	4° $\overline{3}$ 39'16 0°00'53		5680 Jul 08 09:10	30° \overline{R} $\overline{3}$
minimum elong	5674 Dec 25 09:37	4° $\overline{3}$ 39'16 0°00'55	opposition	5680 Jul 17 14:44	29° $\overline{3}$ 37'03 -0°21'46
behind sun begin	5674 Dec 25 02:59	4° $\overline{3}$ 38'16	min. Earth dist.	5680 Jul 17 16:12	29° $\overline{3}$ 36'53 17.91212 AU
behind sun end	5674 Dec 25 16:15	4° $\overline{3}$ 40'16	direct	5680 Oct 02 20:44	27° $\overline{3}$ 34'02
max. Earth dist.	5674 Dec 24 23:07	4° $\overline{3}$ 37'39 19.60803 AU		5680 Dec 20 13:44	0° \approx
morning rise	5675 Jan 10 09:51	5° $\overline{3}$ 38'41	evening set	5681 Jan 05 03:04	0° \approx 53'55
desc. node	5675 Mar 16 01:39	8° $\overline{3}$ 37'35			
retrograde	5675 Apr 11 16:23	8° $\overline{3}$ 56'57	conjunction	5681 Jan 21 00:40	1° \approx 51'59 -0°21'20
opposition	5675 Jun 25 00:40	6° $\overline{3}$ 55'55 -0°01'11	minimum elong	5681 Jan 21 00:40	1° \approx 51'59 0°21'19
min. Earth dist.	5675 Jun 25 08:49	6° $\overline{3}$ 55'03 17.63110 AU	max. Earth dist.	5681 Jan 20 23:39	1° \approx 51'50 19.94428 AU
direct	5675 Sep 10 00:32	4° $\overline{3}$ 51'23	morning rise	5681 Feb 05 20:05	2° \approx 49'43
evening set	5675 Dec 14 04:02	8° $\overline{3}$ 16'09	retrograde	5681 May 08 03:29	6° \approx 04'16
			opposition	5681 Jul 22 11:17	4° \approx 04'15 -0°25'30
conjunction	5675 Dec 30 06:29	9° $\overline{3}$ 15'45 -0°03'06	min. Earth dist.	5681 Jul 22 10:23	4° \approx 04'20 17.97642 AU
minimum elong	5675 Dec 30 06:28	9° $\overline{3}$ 15'45 0°03'05	direct	5681 Oct 07 18:11	2° \approx 01'37
behind sun begin	5675 Dec 29 23:52	9° $\overline{3}$ 14'45	evening set	5682 Jan 09 19:11	5° \approx 20'26
behind sun end	5675 Dec 30 13:04	9° $\overline{3}$ 16'45			
max. Earth dist.	5675 Dec 29 21:45	9° $\overline{3}$ 14'25 19.65527 AU	conjunction	5682 Jan 25 16:07	6° \approx 18'12 -0°24'37
morning rise	5676 Jan 15 05:43	10° $\overline{3}$ 14'54	minimum elong	5682 Jan 25 16:07	6° \approx 18'12 0°24'36
retrograde	5676 Apr 15 10:12	13° $\overline{3}$ 32'32	max. Earth dist.	5682 Jan 25 17:40	6° \approx 18'26 20.00913 AU
opposition	5676 Jun 28 23:43	11° $\overline{3}$ 31'37 -0°05'29	morning rise	5682 Feb 10 10:44	7° \approx 15'40
min. Earth dist.	5676 Jun 29 07:29	11° $\overline{3}$ 30'47 17.68023 AU	retrograde	5682 May 12 18:37	10° \approx 29'37
direct	5676 Sep 14 00:09	9° $\overline{3}$ 27'18	opposition	5682 Jul 27 07:25	8° \approx 29'48 -0°29'04
evening set	5676 Dec 18 00:54	12° $\overline{3}$ 51'10	min. Earth dist.	5682 Jul 27 06:01	8° \approx 29'57 18.04168 AU
			direct	5682 Oct 12 13:56	6° \approx 27'35
conjunction	5677 Jan 03 02:15	13° $\overline{3}$ 50'28 -0°06'56	evening set	5683 Jan 14 10:46	9° \approx 45'18
minimum elong	5677 Jan 03 02:14	13° $\overline{3}$ 50'28 0°06'55			
behind sun begin	5677 Jan 02 20:04	13° $\overline{3}$ 49'32	conjunction	5683 Jan 30 06:45	10° \approx 42'46 -0°27'45
behind sun end	5677 Jan 03 08:23	13° $\overline{3}$ 51'23	minimum elong	5683 Jan 30 06:45	10° \approx 42'46 0°27'43
max. Earth dist.	5677 Jan 02 18:41	13° $\overline{3}$ 49'19 19.70632 AU	max. Earth dist.	5683 Jan 30 08:35	10° \approx 43'02 20.07465 AU
morning rise	5677 Jan 19 00:40	14° $\overline{3}$ 49'19	morning rise	5683 Feb 15 00:58	11° \approx 39'57
retrograde	5677 Apr 20 06:14	18° $\overline{3}$ 06'20	retrograde	5683 May 17 11:13	14° \approx 53'19
opposition	5677 Jul 03 22:09	16° $\overline{3}$ 05'32 -0°09'43	opposition	5683 Aug 01 02:45	12° \approx 53'41 -0°32'26
min. Earth dist.	5677 Jul 04 03:18	16° $\overline{3}$ 04'59 17.73314 AU	min. Earth dist.	5683 Jul 31 23:23	12° \approx 54'02 18.10730 AU
direct	5677 Sep 19 02:03	14° $\overline{3}$ 01'29	direct	5683 Oct 17 09:19	10° \approx 51'50
evening set	5677 Dec 22 20:47	17° $\overline{3}$ 24'24	evening set	5684 Jan 19 01:23	14° \approx 08'29
				5684 Feb 02 07:36	15° \approx
conjunction	5678 Jan 07 21:13	18° $\overline{3}$ 23'23 -0°10'41			
minimum elong	5678 Jan 07 21:13	18° $\overline{3}$ 23'23 0°10'39	conjunction	5684 Feb 03 20:47	15° \approx 05'39 -0°30'41
behind sun begin	5678 Jan 07 16:05	18° $\overline{3}$ 22'37	minimum elong	5684 Feb 03 20:47	15° \approx 05'39 0°30'41
behind sun end	5678 Jan 08 02:22	18° $\overline{3}$ 24'10	max. Earth dist.	5684 Feb 04 00:57	15° \approx 06'16 20.14006 AU
max. Earth dist.	5678 Jan 07 16:04	18° $\overline{3}$ 22'37 19.76111 AU	morning rise	5684 Feb 19 14:18	16° \approx 02'34
morning rise	5678 Jan 23 18:42	19° $\overline{3}$ 21'58	retrograde	5684 May 21 01:30	19° \approx 15'20
retrograde	5678 Apr 24 22:45	22° $\overline{3}$ 38'22	opposition	5684 Aug 04 21:47	17° \approx 15'53 -0°35'35
opposition	5678 Jul 08 20:16	20° $\overline{3}$ 37'43 -0°13'51	min. Earth dist.	5684 Aug 04 17:52	17° \approx 16'17 18.17242 AU
min. Earth dist.	5678 Jul 09 00:48	20° $\overline{3}$ 37'14 17.78980 AU	direct	5684 Oct 21 04:01	15° \approx 14'26
direct	5678 Sep 24 00:07	18° $\overline{3}$ 33'59	evening set	5685 Jan 22 15:12	18° \approx 29'57
evening set	5678 Dec 27 15:44	21° $\overline{3}$ 55'54			
			conjunction	5685 Feb 07 09:45	19° \approx 26'49 -0°33'26
conjunction	5679 Jan 12 15:09	22° $\overline{3}$ 54'35 -0°14'21	minimum elong	5685 Feb 07 09:45	19° \approx 26'49 0°33'25
minimum elong	5679 Jan 12 15:09	22° $\overline{3}$ 54'35 0°14'20	max. Earth dist.	5685 Feb 07 14:00	19° \approx 27'27 20.20476 AU
behind sun begin	5679 Jan 12 12:00	22° $\overline{3}$ 54'07	morning rise	5685 Feb 23 02:58	20° \approx 23'28
behind sun end	5679 Jan 12 18:18	22° $\overline{3}$ 55'04	retrograde	5685 May 25 16:56	23° \approx 35'41
max. Earth dist.	5679 Jan 12 10:56	22° $\overline{3}$ 53'57 19.81955 AU	opposition	5685 Aug 09 16:10	21° \approx 36'22 -0°38'31
morning rise	5679 Jan 28 12:00	23° $\overline{3}$ 52'53	min. Earth dist.	5685 Aug 09 10:33	21° \approx 36'56 18.23666 AU
retrograde	5679 Apr 29 17:49	27° $\overline{3}$ 08'39	direct	5685 Oct 25 21:45	19° \approx 35'15
opposition	5679 Jul 13 17:41	25° $\overline{3}$ 08'12 -0°17'53	evening set	5686 Jan 27 04:04	22° \approx 49'40
min. Earth dist.	5679 Jul 13 19:38	25° $\overline{3}$ 08'00 17.84971 AU			
direct	5679 Sep 28 23:55	23° $\overline{3}$ 04'49	conjunction	5686 Feb 11 22:12	23° \approx 46'15 -0°35'59
evening set	5680 Jan 01 09:46	26° $\overline{3}$ 25'44	minimum elong	5686 Feb 11 22:11	23° \approx 46'15 0°35'58
			max. Earth dist.	5686 Feb 12 04:40	23° \approx 47'13 20.26826 AU
conjunction	5680 Jan 17 08:23	27° $\overline{3}$ 24'07 -0°17'54	morning rise	5686 Feb 27 14:51	24° \approx 42'40

retrograde	5686 May 30 06:03	27° \approx 54'17	evening set	5693 Feb 24 23:36	22° \times 18'55
opposition	5686 Aug 14 09:51	25° \approx 55'06 -0°41'13			
min. Earth dist.	5686 Aug 14 03:33	25° \approx 55'44 18.29940 AU	conjunction	5693 Mar 12 15:07	23° \times 13'51 -0°47'17
direct	5686 Oct 30 14:55	23° \approx 54'20	minimum elong	5693 Mar 12 15:07	23° \times 13'51 0°47'17
evening set	5687 Jan 31 16:12	27° \approx 07'36	max. Earth dist.	5693 Mar 13 05:09	23° \times 15'55 20.67347 AU
			morning rise	5693 Mar 28 07:10	24° \times 08'51
conjunction	5687 Feb 16 09:38	28° \approx 03'55 -0°38'19	retrograde	5693 Jun 28 16:37	27° \times 17'06
minimum elong	5687 Feb 16 09:38	28° \approx 03'55 0°38'18	opposition	5693 Sep 13 19:18	25° \times 18'21 -0°52'42
max. Earth dist.	5687 Feb 16 16:05	28° \approx 04'53 20.33022 AU	min. Earth dist.	5693 Sep 13 04:45	25° \times 19'49 18.70001 AU
morning rise	5687 Mar 04 02:11	29° \approx 00'05	direct	5693 Nov 29 17:29	23° \times 19'45
	5687 Mar 21 20:03	0° \times	evening set	5694 Mar 01 06:34	26° \times 25'48
retrograde	5687 Jun 03 20:17	2° \times 11'09			
opposition	5687 Aug 19 02:52	0° \times 12'02 -0°43'40	conjunction	5694 Mar 16 22:11	27° \times 20'34 -0°47'55
min. Earth dist.	5687 Aug 18 19:12	0° \times 12'48 18.36060 AU	minimum elong	5694 Mar 16 22:11	27° \times 20'34 0°47'54
	5687 Aug 24 01:06	30° \times	max. Earth dist.	5694 Mar 17 14:11	27° \times 22'55 20.72556 AU
direct	5687 Nov 04 07:14	28° \approx 11'33	morning rise	5694 Apr 01 14:14	28° \times 15'25
	5688 Jan 10 14:22	0° \times		5694 May 05 04:23	0° γ
evening set	5688 Feb 05 03:17	1° \times 23'42	retrograde	5694 Jul 03 03:18	1° γ 23'18
				5694 Sep 03 10:12	30° \times
conjunction	5688 Feb 20 20:24	2° \times 19'46 -0°40'25	opposition	5694 Sep 18 07:49	29° \times 24'40 -0°53'16
minimum elong	5688 Feb 20 20:24	2° \times 19'46 0°40'25	min. Earth dist.	5694 Sep 17 16:03	29° \times 26'15 18.75083 AU
max. Earth dist.	5688 Feb 21 05:05	2° \times 21'04 20.39054 AU	direct	5694 Dec 04 05:16	27° \times 26'23
morning rise	5688 Mar 07 12:31	3° \times 15'42		5695 Feb 24 03:44	0° γ
retrograde	5688 Jun 07 08:14	6° \times 26'12	evening set	5695 Mar 05 13:14	0° γ 31'35
opposition	5688 Aug 22 19:13	4° \times 27'09 -0°45'51			
min. Earth dist.	5688 Aug 22 10:34	4° \times 28'02 18.42011 AU	conjunction	5695 Mar 21 04:42	1° γ 26'12 -0°48'18
direct	5688 Nov 07 22:57	2° \times 26'59	minimum elong	5695 Mar 21 04:42	1° γ 26'12 0°48'18
evening set	5689 Feb 08 13:42	5° \times 38'00	max. Earth dist.	5695 Mar 21 20:36	1° γ 28'31 20.77501 AU
			morning rise	5695 Apr 05 21:07	2° γ 20'55
conjunction	5689 Feb 24 06:14	6° \times 33'48 -0°42'17	retrograde	5695 Jul 07 12:09	5° γ 28'31
minimum elong	5689 Feb 24 06:13	6° \times 33'48 0°42'17	opposition	5695 Sep 22 20:05	3° γ 29'57 -0°53'33
max. Earth dist.	5689 Feb 24 15:08	6° \times 35'08 20.44942 AU	min. Earth dist.	5695 Sep 22 04:07	3° γ 31'33 18.79887 AU
morning rise	5689 Mar 11 22:20	7° \times 29'31	direct	5695 Dec 08 14:49	1° γ 31'59
retrograde	5689 Jun 11 21:08	10° \times 39'30	evening set	5696 Mar 08 19:18	4° γ 36'23
opposition	5689 Aug 27 10:56	8° \times 40'29 -0°47'46			
min. Earth dist.	5689 Aug 27 00:58	8° \times 41'29 18.47853 AU	conjunction	5696 Mar 24 10:57	5° γ 30'51 -0°48'27
direct	5689 Nov 12 13:45	6° \times 40'35	minimum elong	5696 Mar 24 10:57	5° γ 30'51 0°48'28
evening set	5690 Feb 12 23:03	9° \times 50'32	max. Earth dist.	5696 Mar 25 04:30	5° γ 33'24 20.82132 AU
			morning rise	5696 Apr 09 03:28	6° γ 25'27
conjunction	5690 Feb 28 15:24	10° \times 46'06 -0°43'54	retrograde	5696 Jul 10 22:08	9° γ 32'46
minimum elong	5690 Feb 28 15:24	10° \times 46'06 0°43'53	opposition	5696 Sep 26 07:50	7° γ 34'18 -0°53'34
max. Earth dist.	5690 Mar 01 02:43	10° \times 47'47 20.50719 AU	min. Earth dist.	5696 Sep 25 14:45	7° γ 36'00 18.84333 AU
morning rise	5690 Mar 16 07:15	11° \times 41'37	direct	5696 Dec 12 01:52	5° γ 36'37
retrograde	5690 Jun 16 08:18	14° \times 51'05	evening set	5697 Mar 13 01:16	8° γ 40'16
opposition	5690 Sep 01 01:56	12° \times 52'07 -0°49'25			
min. Earth dist.	5690 Aug 31 14:37	12° \times 53'16 18.53574 AU	conjunction	5697 Mar 28 16:52	9° γ 34'36 -0°48'22
direct	5690 Nov 17 04:05	10° \times 52'32	minimum elong	5697 Mar 28 16:52	9° γ 34'36 0°48'22
evening set	5691 Feb 17 07:58	14° \times 01'26	max. Earth dist.	5697 Mar 29 10:02	9° γ 37'06 20.86384 AU
			morning rise	5697 Apr 13 09:52	10° γ 29'07
conjunction	5691 Mar 04 23:52	14° \times 56'46 -0°45'16	retrograde	5697 Jul 15 06:40	13° γ 36'12
minimum elong	5691 Mar 04 23:52	14° \times 56'46 0°45'16	opposition	5697 Sep 30 19:13	11° γ 37'46 -0°53'19
max. Earth dist.	5691 Mar 05 11:24	14° \times 58'28 20.56387 AU	min. Earth dist.	5697 Sep 30 02:22	11° γ 39'27 18.88390 AU
morning rise	5691 Mar 20 15:48	15° \times 52'06	direct	5697 Dec 16 10:02	9° γ 40'20
retrograde	5691 Jun 20 19:41	19° \times 01'07	evening set	5698 Mar 17 06:45	12° γ 43'16
opposition	5691 Sep 05 16:11	17° \times 02'12 -0°50'47			
min. Earth dist.	5691 Sep 05 03:48	17° \times 03'27 18.59198 AU	conjunction	5698 Apr 01 22:43	13° γ 37'30 -0°48'02
direct	5691 Nov 21 17:06	15° \times 02'56	minimum elong	5698 Apr 01 22:43	13° γ 37'30 0°48'03
evening set	5692 Feb 21 16:04	18° \times 10'50	max. Earth dist.	5698 Apr 02 17:03	13° γ 40'10 20.90211 AU
			morning rise	5698 Apr 17 15:59	14° γ 31'57
conjunction	5692 Mar 08 07:54	19° \times 05'59 -0°46'24	retrograde	5698 Jul 19 15:53	17° γ 38'49
minimum elong	5692 Mar 08 07:54	19° \times 05'59 0°46'23	opposition	5698 Oct 05 06:05	15° γ 40'25 -0°52'49
max. Earth dist.	5692 Mar 08 21:41	19° \times 08'01 20.61944 AU	min. Earth dist.	5698 Oct 04 12:20	15° γ 42'11 18.91971 AU
morning rise	5692 Mar 23 23:41	20° \times 01'07	direct	5698 Dec 20 20:07	13° γ 43'12
retrograde	5692 Jun 24 06:36	23° \times 09'44	evening set	5699 Mar 21 12:11	16° γ 45'28
opposition	5692 Sep 09 05:59	21° \times 10'54 -0°51'53			
min. Earth dist.	5692 Sep 08 16:09	21° \times 12'18 18.64680 AU	conjunction	5699 Apr 06 04:13	17° γ 39'36 -0°47'28
direct	5692 Nov 25 06:07	19° \times 11'58	minimum elong	5699 Apr 06 04:13	17° γ 39'36 0°47'28

max. Earth dist.	5699 Apr 06 21:47	17° Υ 42'09	20.93541 AU		5705 Sep 27 23:17	15° κ 8
morning rise	5699 Apr 21 22:03	18° Υ 33'59		opposition	5705 Nov 03 23:13	13° δ 39'19 -0°42'22
retrograde	5699 Jul 24 00:12	21° Υ 40'40		min. Earth dist.	5705 Nov 03 05:37	13° δ 41'04 19.04129 AU
opposition	5699 Oct 09 16:35	19° Υ 42'14 -0°52'03		direct	5706 Jan 18 21:30	11° δ 42'42
min. Earth dist.	5699 Oct 08 23:26	19° Υ 43'57 18.95056 AU		evening set	5706 Apr 18 19:30	14° δ 41'54
direct	5699 Dec 25 03:35	17° Υ 45'11			5706 Apr 24 03:53	15° δ
evening set	5700 Mar 25 17:09	20° Υ 46'50				
conjunction	5700 Apr 10 09:40	21° Υ 40'54 -0°46'40		conjunction	5706 May 04 15:04	15° δ 35'57 -0°37'19
minimum elong	5700 Apr 10 09:40	21° Υ 40'54 0°46'41		minimum elong	5706 May 04 15:04	15° δ 35'57 0°37'20
max. Earth dist.	5700 Apr 11 04:11	21° Υ 43'35 20.96373 AU		max. Earth dist.	5706 May 05 10:31	15° δ 38'44 21.04241 AU
morning rise	5700 Apr 26 03:53	22° Υ 35'14		morning rise	5706 May 20 13:19	16° δ 30'24
retrograde	5700 Jul 28 08:43	25° Υ 41'44		retrograde	5706 Aug 22 08:16	19° δ 36'44
min. Earth dist.	5700 Oct 13 08:37	23° Υ 45'05 18.97628 AU		opposition	5706 Nov 08 07:14	17° δ 37'48 -0°40'00
opposition	5700 Oct 14 02:40	23° Υ 43'17 -0°51'01		min. Earth dist.	5706 Nov 07 12:47	17° δ 39'39 19.04319 AU
direct	5700 Dec 29 12:52	21° Υ 46'21		direct	5707 Jan 23 04:19	15° δ 41'15
evening set	5701 Mar 29 21:54	24° Υ 47'24		evening set	5707 Apr 22 23:58	18° δ 40'19
conjunction	5701 Apr 14 14:40	25° Υ 41'25 -0°45'38		conjunction	5707 May 08 20:03	19° δ 34'25 -0°35'05
minimum elong	5701 Apr 14 14:40	25° Υ 41'25 0°45'38		minimum elong	5707 May 08 20:03	19° δ 34'25 0°35'07
max. Earth dist.	5701 Apr 15 08:30	25° Υ 43'59 20.98701 AU		max. Earth dist.	5707 May 09 14:37	19° δ 37'05 21.04242 AU
morning rise	5701 Apr 30 09:36	26° Υ 35'44		morning rise	5707 May 24 19:12	20° δ 28'57
retrograde	5701 Aug 01 16:37	29° Υ 42'06		retrograde	5707 Aug 26 15:45	23° δ 35'27
opposition	5701 Oct 18 12:25	27° Υ 43'32 -0°49'45		opposition	5707 Nov 12 15:18	21° δ 36'28 -0°37'26
min. Earth dist.	5701 Oct 17 19:06	27° Υ 45'16 18.99727 AU		min. Earth dist.	5707 Nov 11 22:01	21° δ 38'12 19.04131 AU
direct	5702 Jan 02 19:28	25° Υ 46'41		direct	5708 Jan 27 08:49	19° δ 39'58
evening set	5702 Apr 03 02:23	28° Υ 47'13		evening set	5708 Apr 26 04:33	22° δ 38'58
conjunction	5702 Apr 18 19:44	29° Υ 41'12 -0°44'23		conjunction	5708 May 12 01:29	23° δ 33'10 -0°32'41
minimum elong	5702 Apr 18 19:44	29° Υ 41'12 0°44'24		minimum elong	5708 May 12 01:30	23° δ 33'10 0°32'42
max. Earth dist.	5702 Apr 19 14:34	29° Υ 43'55 21.00578 AU		max. Earth dist.	5708 May 12 20:36	23° δ 35'54 21.03864 AU
	5702 Apr 24 06:03	0° δ		morning rise	5708 May 28 01:21	24° δ 27'47
morning rise	5702 May 04 15:09	0° δ 35'31		retrograde	5708 Aug 30 01:11	27° δ 34'28
retrograde	5702 Aug 06 00:37	3° δ 41'45		opposition	5708 Nov 15 23:09	25° δ 35'27 -0°34'41
opposition	5702 Oct 22 21:25	1° δ 43'07 -0°48'15		min. Earth dist.	5708 Nov 15 05:14	25° δ 37'15 19.03540 AU
min. Earth dist.	5702 Oct 22 03:11	1° δ 44'56 19.01385 AU		direct	5709 Jan 30 14:52	23° δ 39'00
	5702 Dec 14 12:41	30° κ Υ		evening set	5709 Apr 30 09:32	26° δ 38'00
direct	5703 Jan 07 03:54	29° Υ 46'20		conjunction	5709 May 16 07:05	27° δ 32'18 -0°30'07
	5703 Jan 30 07:01	0° δ		minimum elong	5709 May 16 07:05	27° δ 32'18 0°30'09
evening set	5703 Apr 07 06:51	2° δ 46'25		max. Earth dist.	5709 May 17 01:02	27° δ 34'52 21.03059 AU
conjunction	5703 Apr 23 00:30	3° δ 40'23 -0°42'55		morning rise	5709 Jun 01 07:56	28° δ 27'02
minimum elong	5703 Apr 23 00:30	3° δ 40'23 0°42'56			5709 Jul 01 10:10	0° Π
max. Earth dist.	5703 Apr 23 18:45	3° δ 43'00 21.02034 AU		retrograde	5709 Sep 03 09:31	1° Π 33'58
morning rise	5703 May 08 20:42	4° δ 34'42			5709 Nov 09 19:10	30° κ 8
retrograde	5703 Aug 10 08:00	7° δ 40'54		opposition	5709 Nov 20 07:08	29° δ 34'54 -0°31'46
opposition	5703 Oct 27 06:22	5° δ 42'09 -0°46'30		min. Earth dist.	5709 Nov 19 14:46	29° δ 36'32 19.02512 AU
min. Earth dist.	5703 Oct 26 12:53	5° δ 43'54 19.02660 AU		direct	5710 Feb 03 19:34	27° δ 38'27
direct	5704 Jan 11 09:17	3° δ 45'25			5710 Apr 23 03:39	0° Π
evening set	5704 Apr 10 10:55	6° δ 45'08		evening set	5710 May 04 14:51	0° Π 37'33
conjunction	5704 Apr 26 05:15	7° δ 39'06 -0°41'14		conjunction	5710 May 20 13:19	1° Π 31'57 -0°27'25
minimum elong	5704 Apr 26 05:15	7° δ 39'06 0°41'15		minimum elong	5710 May 20 13:19	1° Π 31'57 0°27'26
max. Earth dist.	5704 Apr 27 00:34	7° δ 41'53 21.03127 AU		max. Earth dist.	5710 May 21 07:20	1° Π 34'32 21.01800 AU
morning rise	5704 May 12 01:59	8° δ 33'27		morning rise	5710 Jun 05 14:53	2° Π 26'49
retrograde	5704 Aug 13 16:14	11° δ 39'38		retrograde	5710 Sep 07 19:33	5° Π 34'00
opposition	5704 Oct 30 14:54	9° δ 40'49 -0°44'32		opposition	5710 Nov 24 14:50	3° Π 34'53 -0°28'42
min. Earth dist.	5704 Oct 29 20:22	9° δ 42'40 19.03568 AU		min. Earth dist.	5710 Nov 23 22:14	3° Π 36'33 19.01000 AU
direct	5705 Jan 14 17:01	7° δ 44'09		direct	5711 Feb 08 01:41	1° Π 38'25
evening set	5705 Apr 14 15:16	10° δ 43'34		evening set	5711 May 08 20:43	4° Π 37'40
conjunction	5705 Apr 30 10:02	11° δ 37'34 -0°39'22		conjunction	5711 May 24 19:50	5° Π 32'12 -0°24'34
minimum elong	5705 Apr 30 10:02	11° δ 37'34 0°39'24		minimum elong	5711 May 24 19:50	5° Π 32'12 0°24'35
max. Earth dist.	5705 May 01 04:42	11° δ 40'14 21.03857 AU		max. Earth dist.	5711 May 25 12:17	5° Π 34'33 21.00032 AU
morning rise	5705 May 16 07:38	12° δ 31'57		morning rise	5711 Jun 09 22:23	6° Π 27'13
	5705 Jul 09 02:40	15° δ		retrograde	5711 Sep 12 04:18	9° Π 34'42
retrograde	5705 Aug 17 23:29	15° δ 38'12		opposition	5711 Nov 28 22:54	7° Π 35'29 -0°25'28
				min. Earth dist.	5711 Nov 28 08:10	7° Π 36'58 18.98973 AU

direct	5712 Feb 12 06:38	5°II38'56	opposition	5717 Dec 23 00:02	1°☿52'29 -0°03'50
evening set	5712 May 12 02:43	8°II38'23	min. Earth dist.	5717 Dec 22 15:03	1°☿53'25 18.76845 AU
				5718 Feb 21 13:32	30°♄II
conjunction	5712 May 28 02:50	9°II33'04 -0°21'35	direct	5718 Mar 07 22:13	29°II54'37
minimum elong	5712 May 28 02:50	9°II33'04 0°21'37		5718 Mar 22 07:13	0°☿
max. Earth dist.	5712 May 28 19:02	9°II35'23 20.97743 AU	evening set	5718 Jun 06 01:32	2°☿56'28
morning rise	5712 Jun 13 06:10	10°II28'14			
retrograde	5712 Sep 15 15:26	13°II36'02	conjunction	5718 Jun 22 07:04	3°☿52'19 -0°01'49
opposition	5712 Dec 02 06:54	11°II36'41 -0°22'07	minimum elong	5718 Jun 22 07:03	3°☿52'19 0°01'50
min. Earth dist.	5712 Dec 01 16:06	11°II38'11 18.96402 AU	behind sun begin	5718 Jun 22 00:23	3°☿51'23
direct	5713 Feb 15 13:42	9°II40'00	behind sun end	5718 Jun 22 13:43	3°☿53'16
evening set	5713 May 16 09:28	12°II39'42	max. Earth dist.	5718 Jun 22 17:15	3°☿53'47 20.74460 AU
			morning rise	5718 Jul 08 15:48	4°☿48'40
conjunction	5713 Jun 01 10:20	13°II34'33 -0°18'30	retrograde	5718 Oct 11 06:24	7°☿58'50
minimum elong	5713 Jun 01 10:20	13°II34'33 0°18'31	opposition	5718 Dec 27 08:37	5°☿58'15 -0°00'00
max. Earth dist.	5713 Jun 02 00:46	13°II36'36 20.94906 AU	min. Earth dist.	5718 Dec 26 23:30	5°☿59'11 18.72004 AU
morning rise	5713 Jun 17 14:42	14°II29'53	asc. node	5718 Dec 27 13:03	5°☿57'48
retrograde	5713 Sep 19 23:55	17°II38'00	direct	5719 Mar 12 07:07	4°☿00'08
opposition	5713 Dec 06 14:56	15°II38'29 -0°18'38	evening set	5719 Jun 10 11:24	7°☿02'37
min. Earth dist.	5713 Dec 06 02:14	15°II39'46 18.93307 AU			
direct	5714 Feb 19 18:51	13°II41'37	conjunction	5719 Jun 26 17:44	7°☿58'43 0°01'46
evening set	5714 May 20 16:27	16°II41'37	minimum elong	5719 Jun 26 17:44	7°☿58'43 0°01'44
			behind sun begin	5719 Jun 26 11:03	7°☿57'47
conjunction	5714 Jun 05 18:21	17°II36'38 -0°15'18	behind sun end	5719 Jun 27 00:26	7°☿59'40
minimum elong	5714 Jun 05 18:21	17°II36'38 0°15'20	max. Earth dist.	5719 Jun 27 02:30	7°☿59'58 20.69510 AU
behind sun begin	5714 Jun 05 16:23	17°II36'22	morning rise	5719 Jul 13 03:24	8°☿55'18
behind sun end	5714 Jun 05 20:19	17°II36'55	retrograde	5719 Oct 15 17:23	12°☿05'59
max. Earth dist.	5714 Jun 06 08:23	17°II38'39 20.91575 AU	opposition	5719 Dec 31 17:46	10°☿05'14 0°03'51
morning rise	5714 Jun 21 23:32	18°II32'09	min. Earth dist.	5719 Dec 31 10:30	10°☿05'59 18.66960 AU
retrograde	5714 Sep 24 11:45	21°II40'37	direct	5720 Mar 15 13:32	8°☿06'51
opposition	5714 Dec 10 22:57	19°II40'53 -0°15'03	evening set	5720 Jun 13 21:48	11°☿10'03
min. Earth dist.	5714 Dec 10 10:13	19°II42'11 18.89734 AU			
direct	5715 Feb 24 02:41	17°II43'48	conjunction	5720 Jun 30 05:12	12°☿06'25 0°05'15
evening set	5715 May 24 23:54	20°II44'09	minimum elong	5720 Jun 30 05:11	12°☿06'25 0°05'14
			behind sun begin	5720 Jun 29 22:42	12°☿05'30
conjunction	5715 Jun 10 02:34	21°II39'21 -0°12'01	behind sun end	5720 Jun 30 11:39	12°☿07'20
minimum elong	5715 Jun 10 02:34	21°II39'21 0°12'03	max. Earth dist.	5720 Jun 30 13:19	12°☿07'34 20.64383 AU
behind sun begin	5715 Jun 09 22:02	21°II38'43	morning rise	5720 Jul 16 15:39	13°☿03'14
behind sun end	5715 Jun 10 07:05	21°II39'59	retrograde	5720 Oct 19 07:01	16°☿14'29
max. Earth dist.	5715 Jun 10 15:03	21°II41'08 20.87789 AU	opposition	5721 Jan 04 03:07	14°☿13'35 0°07'41
morning rise	5715 Jun 26 08:44	22°II35'04	min. Earth dist.	5721 Jan 03 19:50	14°☿14'21 18.61735 AU
retrograde	5715 Sep 28 20:17	25°II43'54	direct	5721 Mar 19 22:40	12°☿14'57
opposition	5715 Dec 15 07:16	23°II43'57 -0°11'22	evening set	5721 Jun 18 09:18	15°☿18'58
min. Earth dist.	5715 Dec 14 20:28	23°II45'03 18.85755 AU			
direct	5716 Feb 28 08:02	21°II46'37	conjunction	5721 Jul 04 17:29	16°☿15'35 0°08'42
evening set	5716 May 28 07:49	24°II47'23	minimum elong	5721 Jul 04 17:30	16°☿15'35 0°08'40
			behind sun begin	5721 Jul 04 11:42	16°☿14'46
conjunction	5716 Jun 13 11:31	25°II42'48 -0°08'40	behind sun end	5721 Jul 04 23:18	16°☿16'24
minimum elong	5716 Jun 13 11:31	25°II42'48 0°08'43	max. Earth dist.	5721 Jul 05 00:09	16°☿16'32 20.59065 AU
behind sun begin	5716 Jun 13 05:45	25°II41'59	morning rise	5721 Jul 21 04:48	17°☿12'40
behind sun end	5716 Jun 13 17:16	25°II43'36	retrograde	5721 Oct 23 19:23	20°☿24'30
max. Earth dist.	5716 Jun 13 23:42	25°II44'32 20.83644 AU	opposition	5722 Jan 08 12:53	18°☿23'29 0°11'31
morning rise	5716 Jun 29 18:30	26°II38'42	min. Earth dist.	5722 Jan 08 07:39	18°☿24'01 18.56332 AU
retrograde	5716 Oct 02 08:21	29°II47'56	direct	5722 Mar 24 06:25	16°☿24'36
opposition	5716 Dec 18 15:28	27°II47'46 -0°07'38	evening set	5722 Jun 22 21:32	19°☿29'29
min. Earth dist.	5716 Dec 18 04:33	27°II48'53 18.81444 AU			
direct	5717 Mar 03 16:32	25°II50'10	conjunction	5722 Jul 09 06:41	20°☿26'23 0°12'08
evening set	5717 Jun 01 16:25	28°II51'26	minimum elong	5722 Jul 09 06:41	20°☿26'23 0°12'06
			behind sun begin	5722 Jul 09 02:11	20°☿25'44
conjunction	5717 Jun 17 20:55	29°II47'04 -0°05'17	behind sun end	5722 Jul 09 11:10	20°☿27'01
minimum elong	5717 Jun 17 20:56	29°II47'04 0°05'19	max. Earth dist.	5722 Jul 09 12:19	20°☿27'11 20.53584 AU
behind sun begin	5717 Jun 17 14:29	29°II46'10	morning rise	5722 Jul 25 18:44	21°☿23'43
behind sun end	5717 Jun 18 03:23	29°II47'58	retrograde	5722 Oct 28 10:06	24°☿36'11
max. Earth dist.	5717 Jun 18 07:37	29°II48'36 20.79180 AU	opposition	5723 Jan 12 23:05	22°☿35'03 0°15'19
	5717 Jun 21 14:30	0°☿	min. Earth dist.	5723 Jan 12 18:06	22°☿35'34 18.50754 AU
morning rise	5717 Jul 04 04:55	0°☿43'12	direct	5723 Mar 28 16:11	20°☿35'56
retrograde	5717 Oct 06 17:57	3°☿52'52	evening set	5723 Jun 27 10:39	23°☿41'44

conjunction	5723 Jul 13 20:34	24° \mathring{S} 38'55	0°15'31	conjunction	5729 Aug 09 03:44	20° \mathring{N} 31'15	0°33'55
minimum elong	5723 Jul 13 20:34	24° \mathring{S} 38'55	0°15'29	minimum elong	5729 Aug 09 03:44	20° \mathring{N} 31'15	0°33'54
behind sun begin	5723 Jul 13 19:05	24° \mathring{S} 38'42		max. Earth dist.	5729 Aug 08 22:19	20° \mathring{N} 30'27	20.09700 AU
behind sun end	5723 Jul 13 22:04	24° \mathring{S} 39'08		morning rise	5729 Aug 25 19:45	21° \mathring{N} 30'25	
max. Earth dist.	5723 Jul 14 00:44	24° \mathring{S} 39'31	20.47901 AU	retrograde	5729 Nov 28 02:01	24° \mathring{N} 47'19	
morning rise	5723 Jul 30 09:20	25° \mathring{S} 36'31		opposition	5730 Feb 11 13:28	22° \mathring{N} 45'04	0°39'06
retrograde	5723 Nov 01 23:52	28° \mathring{S} 49'38		min. Earth dist.	5730 Feb 11 18:59	22° \mathring{N} 44'28	18.06369 AU
opposition	5724 Jan 17 09:59	26° \mathring{S} 48'24	0°19'03	direct	5730 Apr 27 04:54	20° \mathring{N} 43'26	
min. Earth dist.	5724 Jan 17 07:11	26° \mathring{S} 48'42	18.44970 AU	evening set	5730 Jul 28 08:48	23° \mathring{N} 56'38	
direct	5724 Apr 01 01:35	24° \mathring{S} 49'02					
evening set	5724 Jul 01 00:49	27° \mathring{S} 55'48		conjunction	5730 Aug 13 23:45	24° \mathring{N} 55'50	0°36'27
				minimum elong	5730 Aug 13 23:45	24° \mathring{N} 55'50	0°36'27
conjunction	5724 Jul 17 11:38	28° \mathring{S} 53'17	0°18'51	max. Earth dist.	5730 Aug 13 16:15	24° \mathring{N} 54'43	20.03084 AU
minimum elong	5724 Jul 17 11:37	28° \mathring{S} 53'17	0°18'49	morning rise	5730 Aug 30 16:14	25° \mathring{N} 55'16	
max. Earth dist.	5724 Jul 17 14:13	28° \mathring{S} 53'39	20.42015 AU	retrograde	5730 Dec 02 20:56	29° \mathring{N} 12'46	
morning rise	5724 Aug 03 01:06	29° \mathring{S} 51'08		opposition	5731 Feb 16 03:56	27° \mathring{N} 10'19	0°41'50
	5724 Aug 05 15:21	0° \mathring{N}		min. Earth dist.	5731 Feb 16 10:09	27° \mathring{N} 09'39	17.99811 AU
retrograde	5724 Nov 05 15:36	3° \mathring{N} 04'55		direct	5731 May 01 19:58	25° \mathring{N} 08'16	
opposition	5725 Jan 20 21:08	1° \mathring{N} 03'34	0°22'43	evening set	5731 Aug 02 04:56	28° \mathring{N} 22'36	
min. Earth dist.	5725 Jan 20 19:00	1° \mathring{N} 03'47	18.38967 AU				
	5725 Feb 16 11:23	30° \mathring{R} \mathring{S}		conjunction	5731 Aug 18 20:32	29° \mathring{N} 22'05	0°38'48
direct	5725 Apr 05 12:57	29° \mathring{S} 03'53		minimum elong	5731 Aug 18 20:32	29° \mathring{N} 22'05	0°38'47
	5725 May 22 07:55	0° \mathring{N}		max. Earth dist.	5731 Aug 18 12:39	29° \mathring{N} 20'54	19.96581 AU
evening set	5725 Jul 05 16:02	2° \mathring{N} 11'41			5731 Aug 29 09:43	0° \mathring{N}	
				morning rise	5731 Sep 04 13:08	0° \mathring{N} 21'46	
conjunction	5725 Jul 22 03:38	3° \mathring{N} 09'27	0°22'06	retrograde	5731 Dec 07 16:03	3° \mathring{N} 39'50	
minimum elong	5725 Jul 22 03:38	3° \mathring{N} 09'27	0°22'05	opposition	5732 Feb 20 19:04	1° \mathring{N} 37'13	0°44'19
max. Earth dist.	5725 Jul 22 04:31	3° \mathring{N} 09'34	20.35882 AU	min. Earth dist.	5732 Feb 21 02:36	1° \mathring{N} 36'24	17.93394 AU
morning rise	5725 Aug 07 17:42	4° \mathring{N} 07'35			5732 Apr 04 08:07	30° \mathring{R} \mathring{N}	
retrograde	5725 Nov 10 06:20	7° \mathring{N} 22'00		direct	5732 May 05 11:11	29° \mathring{N} 34'47	
opposition	5726 Jan 25 09:05	5° \mathring{N} 20'30	0°26'17		5732 Jun 05 06:26	0° \mathring{N}	
min. Earth dist.	5726 Jan 25 09:14	5° \mathring{N} 20'29	18.32719 AU	evening set	5732 Aug 06 02:14	2° \mathring{N} 50'16	
direct	5726 Apr 09 23:42	3° \mathring{N} 20'29					
evening set	5726 Jul 10 08:01	6° \mathring{N} 29'20		conjunction	5732 Aug 22 18:10	3° \mathring{N} 50'01	0°40'55
				minimum elong	5732 Aug 22 18:10	3° \mathring{N} 50'01	0°40'54
conjunction	5726 Jul 26 20:21	7° \mathring{N} 27'22	0°25'16	max. Earth dist.	5732 Aug 22 08:06	3° \mathring{N} 48'30	19.90268 AU
minimum elong	5726 Jul 26 20:21	7° \mathring{N} 27'22	0°25'14	morning rise	5732 Sep 08 11:09	4° \mathring{N} 49'56	
max. Earth dist.	5726 Jul 26 19:16	7° \mathring{N} 27'13	20.29533 AU	retrograde	5732 Dec 11 11:44	8° \mathring{N} 08'35	
morning rise	5726 Aug 12 11:02	8° \mathring{N} 25'46		opposition	5733 Feb 24 10:40	6° \mathring{N} 05'49	0°46'33
retrograde	5726 Nov 14 23:12	11° \mathring{N} 40'50		min. Earth dist.	5733 Feb 24 19:01	6° \mathring{N} 04'55	17.87202 AU
opposition	5727 Jan 29 21:22	9° \mathring{N} 39'09	0°29'44	direct	5733 May 10 03:20	4° \mathring{N} 03'00	
min. Earth dist.	5727 Jan 29 22:15	9° \mathring{N} 39'04	18.26272 AU	evening set	5733 Aug 11 00:17	7° \mathring{N} 19'39	
direct	5727 Apr 14 12:56	7° \mathring{N} 38'46					
evening set	5727 Jul 15 00:54	10° \mathring{N} 48'40		conjunction	5733 Aug 27 16:46	8° \mathring{N} 19'40	0°42'47
				minimum elong	5733 Aug 27 16:46	8° \mathring{N} 19'40	0°42'46
conjunction	5727 Jul 31 14:00	11° \mathring{N} 47'00	0°28'18	max. Earth dist.	5733 Aug 27 06:35	8° \mathring{N} 18'08	19.84190 AU
minimum elong	5727 Jul 31 14:00	11° \mathring{N} 47'00	0°28'17	morning rise	5733 Sep 13 09:41	9° \mathring{N} 19'49	
max. Earth dist.	5727 Jul 31 11:33	11° \mathring{N} 46'39	20.22999 AU	retrograde	5733 Dec 16 08:25	12° \mathring{N} 39'01	
morning rise	5727 Aug 17 05:08	12° \mathring{N} 45'40		opposition	5734 Mar 01 03:05	10° \mathring{N} 36'09	0°48'31
	5727 Sep 30 21:48	15° \mathring{N}		min. Earth dist.	5734 Mar 01 12:20	10° \mathring{N} 35'09	17.81264 AU
retrograde	5727 Nov 19 14:47	16° \mathring{N} 01'21		direct	5734 May 14 20:18	8° \mathring{N} 33'01	
	5728 Jan 09 12:20	15° \mathring{R} \mathring{N}		evening set	5734 Aug 15 23:11	11° \mathring{N} 50'49	
opposition	5728 Feb 03 10:18	13° \mathring{N} 59'29	0°33'02				
min. Earth dist.	5728 Feb 03 13:15	13° \mathring{N} 59'11	18.19678 AU	conjunction	5734 Sep 01 15:48	12° \mathring{N} 51'06	0°44'25
direct	5728 Apr 18 00:58	11° \mathring{N} 58'42		minimum elong	5734 Sep 01 15:48	12° \mathring{N} 51'06	0°44'24
	5728 Jul 15 23:27	15° \mathring{N}		max. Earth dist.	5734 Sep 01 03:29	12° \mathring{N} 49'14	19.78404 AU
evening set	5728 Jul 18 18:37	15° \mathring{N} 09'41		morning rise	5734 Sep 18 08:55	13° \mathring{N} 51'27	
				retrograde	5734 Dec 21 04:37	17° \mathring{N} 11'13	
conjunction	5728 Aug 04 08:24	16° \mathring{N} 08'18	0°31'11	opposition	5735 Mar 05 20:10	15° \mathring{N} 08'17	0°50'12
minimum elong	5728 Aug 04 08:24	16° \mathring{N} 08'18	0°31'10	min. Earth dist.	5735 Mar 06 06:19	15° \mathring{N} 07'11	17.75640 AU
max. Earth dist.	5728 Aug 04 03:54	16° \mathring{N} 07'38	20.16372 AU	direct	5735 May 19 14:06	13° \mathring{N} 04'50	
morning rise	5728 Aug 21 00:08	17° \mathring{N} 07'14		evening set	5735 Aug 20 22:53	16° \mathring{N} 23'49	
retrograde	5728 Nov 23 08:50	20° \mathring{N} 23'32					
opposition	5729 Feb 06 23:37	18° \mathring{N} 21'27	0°36'10	conjunction	5735 Sep 06 15:56	17° \mathring{N} 24'20	0°45'46
min. Earth dist.	5729 Feb 07 03:21	18° \mathring{N} 21'04	18.13025 AU	minimum elong	5735 Sep 06 15:56	17° \mathring{N} 24'20	0°45'46
direct	5729 Apr 22 15:19	16° \mathring{N} 20'15		max. Earth dist.	5735 Sep 06 03:44	17° \mathring{N} 22'29	19.72928 AU
evening set	5729 Jul 23 13:16	19° \mathring{N} 32'20		morning rise	5735 Sep 23 08:52	18° \mathring{N} 24'54	

retrograde	5735 Dec 26 02:27	21° <u>♏</u> 45'11		evening set	5742 Sep 23 17:24	19° <u>♏</u> 00'05	
opposition	5736 Mar 09 13:48	19° <u>♏</u> 42'14	0°51'34				
min. Earth dist.	5736 Mar 10 00:42	19° <u>♏</u> 41'02	17.70316 AU	conjunction	5742 Oct 10 09:53	20° <u>♏</u> 01'48	0°46'55
direct	5736 May 23 08:49	17° <u>♏</u> 38'31		minimum elong	5742 Oct 10 09:53	20° <u>♏</u> 01'48	0°46'56
evening set	5736 Aug 24 23:40	20° <u>♏</u> 58'39		max. Earth dist.	5742 Oct 09 14:01	19° <u>♏</u> 58'43	19.42774 AU
				morning rise	5742 Oct 27 00:30	21° <u>♏</u> 03'16	
conjunction	5736 Sep 10 16:44	21° <u>♏</u> 59'25	0°46'51	retrograde	5743 Jan 27 17:03	24° <u>♏</u> 25'57	
minimum elong	5736 Sep 10 16:44	21° <u>♏</u> 59'25	0°46'51	opposition	5743 Apr 11 12:18	22° <u>♏</u> 22'55	0°51'43
max. Earth dist.	5736 Sep 10 02:14	21° <u>♏</u> 57'12	19.67756 AU	min. Earth dist.	5743 Apr 12 05:30	22° <u>♏</u> 21'02	17.41314 AU
morning rise	5736 Sep 27 09:44	23° <u>♏</u> 00'10		direct	5743 Jun 25 21:23	20° <u>♏</u> 17'28	
retrograde	5736 Dec 29 23:36	26° <u>♏</u> 20'57		evening set	5743 Sep 28 21:42	23° <u>♏</u> 44'08	
opposition	5737 Mar 14 08:16	24° <u>♏</u> 17'59	0°52'38				
min. Earth dist.	5737 Mar 14 20:32	24° <u>♏</u> 16'39	17.65295 AU	conjunction	5743 Oct 15 13:50	24° <u>♏</u> 45'56	0°45'48
direct	5737 May 28 04:34	22° <u>♏</u> 14'01		minimum elong	5743 Oct 15 13:50	24° <u>♏</u> 45'56	0°45'48
evening set	5737 Aug 30 01:06	25° <u>♏</u> 35'17		max. Earth dist.	5743 Oct 14 17:43	24° <u>♏</u> 42'48	19.39907 AU
				morning rise	5743 Nov 01 03:53	25° <u>♏</u> 47'27	
conjunction	5737 Sep 15 18:24	26° <u>♏</u> 36'15	0°47'39	retrograde	5744 Feb 01 18:24	29° <u>♏</u> 10'14	
minimum elong	5737 Sep 15 18:24	26° <u>♏</u> 36'15	0°47'40	opposition	5744 Apr 15 10:29	27° <u>♏</u> 07'11	0°50'19
max. Earth dist.	5737 Sep 15 03:51	26° <u>♏</u> 34'02	19.62862 AU	min. Earth dist.	5744 Apr 16 03:02	27° <u>♏</u> 05'22	17.38685 AU
morning rise	5737 Oct 02 11:01	27° <u>♏</u> 37'11		direct	5744 Jun 29 23:29	25° <u>♏</u> 01'32	
	5737 Nov 17 17:10	0° <u>♏</u>		evening set	5744 Oct 03 02:14	28° <u>♏</u> 28'49	
retrograde	5738 Jan 03 22:24	0° <u>♏</u> 58'25					
	5738 Feb 21 02:59	30° <u>♏</u>		conjunction	5744 Oct 19 17:56	29° <u>♏</u> 30'40	0°44'22
opposition	5738 Mar 19 03:23	28° <u>♏</u> 55'28	0°53'22	minimum elong	5744 Oct 19 17:56	29° <u>♏</u> 30'40	0°44'23
min. Earth dist.	5738 Mar 19 16:09	28° <u>♏</u> 54'04	17.60533 AU	max. Earth dist.	5744 Oct 18 21:47	29° <u>♏</u> 27'31	19.37531 AU
direct	5738 Jun 02 01:29	26° <u>♏</u> 51'16			5744 Oct 27 14:06	0° <u>♏</u>	
	5738 Aug 31 07:59	0° <u>♏</u>		morning rise	5744 Nov 05 07:12	0° <u>♏</u> 32'12	
evening set	5738 Sep 04 03:25	0° <u>♏</u> 13'36		retrograde	5745 Feb 05 17:03	3° <u>♏</u> 55'01	
				opposition	5745 Apr 20 09:25	1° <u>♏</u> 52'00	0°48'33
conjunction	5738 Sep 20 20:34	1° <u>♏</u> 14'45	0°48'08	min. Earth dist.	5745 Apr 21 03:02	1° <u>♏</u> 50'04	17.36586 AU
minimum elong	5738 Sep 20 20:34	1° <u>♏</u> 14'45	0°48'08		5745 Jun 12 02:39	30° <u>♏</u>	
max. Earth dist.	5738 Sep 20 03:45	1° <u>♏</u> 12'11	19.58232 AU	direct	5745 Jul 04 23:13	29° <u>♏</u> 46'10	
morning rise	5738 Oct 07 13:01	2° <u>♏</u> 15'50			5745 Jul 27 16:55	0° <u>♏</u>	
retrograde	5739 Jan 08 20:13	5° <u>♏</u> 37'30		evening set	5745 Oct 08 06:43	3° <u>♏</u> 13'59	
opposition	5739 Mar 23 23:16	3° <u>♏</u> 34'31	0°53'45				
min. Earth dist.	5739 Mar 24 13:35	3° <u>♏</u> 32'57	17.56052 AU	conjunction	5745 Oct 24 21:47	4° <u>♏</u> 15'51	0°42'38
direct	5739 Jun 06 22:50	1° <u>♏</u> 30'03		minimum elong	5745 Oct 24 21:47	4° <u>♏</u> 15'51	0°42'39
evening set	5739 Sep 09 06:05	4° <u>♏</u> 53'24		max. Earth dist.	5745 Oct 24 01:23	4° <u>♏</u> 12'39	19.35720 AU
				morning rise	5745 Nov 10 10:24	5° <u>♏</u> 17'23	
conjunction	5739 Sep 25 23:21	5° <u>♏</u> 54'44	0°48'19	retrograde	5746 Feb 10 18:49	8° <u>♏</u> 40'12	
minimum elong	5739 Sep 25 23:21	5° <u>♏</u> 54'44	0°48'19	opposition	5746 Apr 25 08:32	6° <u>♏</u> 37'12	0°46'27
max. Earth dist.	5739 Sep 25 06:23	5° <u>♏</u> 52'08	19.53883 AU	min. Earth dist.	5746 Apr 26 01:00	6° <u>♏</u> 35'24	17.35071 AU
morning rise	5739 Oct 12 15:24	6° <u>♏</u> 55'57		direct	5746 Jul 10 01:55	4° <u>♏</u> 31'15	
retrograde	5740 Jan 13 20:00	10° <u>♏</u> 17'57		evening set	5746 Oct 13 11:11	7° <u>♏</u> 59'29	
opposition	5740 Mar 27 19:42	8° <u>♏</u> 14'57	0°53'47	max. Earth dist.	5746 Oct 29 06:17	8° <u>♏</u> 58'19	19.34507 AU
min. Earth dist.	5740 Mar 28 10:11	8° <u>♏</u> 13'22	17.51838 AU				
direct	5740 Jun 10 22:01	6° <u>♏</u> 10'15		conjunction	5746 Oct 30 01:44	9° <u>♏</u> 01'21	0°40'36
evening set	5740 Sep 13 09:37	9° <u>♏</u> 34'33		minimum elong	5746 Oct 30 01:44	9° <u>♏</u> 01'21	0°40'37
max. Earth dist.	5740 Sep 29 07:48	10° <u>♏</u> 33'07	19.49817 AU	morning rise	5746 Nov 15 13:24	10° <u>♏</u> 02'51	
				retrograde	5747 Feb 15 17:33	13° <u>♏</u> 25'37	
conjunction	5740 Sep 30 02:37	10° <u>♏</u> 36'02	0°48'10	opposition	5747 Apr 30 08:04	11° <u>♏</u> 22'42	0°44'02
minimum elong	5740 Sep 30 02:37	10° <u>♏</u> 36'02	0°48'10	min. Earth dist.	5747 May 01 01:10	11° <u>♏</u> 20'49	17.34179 AU
morning rise	5740 Oct 16 18:18	11° <u>♏</u> 37'21		direct	5747 Jul 15 02:04	9° <u>♏</u> 16'40	
retrograde	5741 Jan 17 18:07	14° <u>♏</u> 59'38		evening set	5747 Oct 18 15:41	12° <u>♏</u> 45'16	
opposition	5741 Apr 01 16:42	12° <u>♏</u> 56'37	0°53'27	max. Earth dist.	5747 Nov 03 09:36	13° <u>♏</u> 44'00	19.33944 AU
min. Earth dist.	5741 Apr 02 08:49	12° <u>♏</u> 54'52	17.47946 AU				
direct	5741 Jun 15 20:52	10° <u>♏</u> 51'39		conjunction	5747 Nov 04 05:28	13° <u>♏</u> 47'06	0°38'17
evening set	5741 Sep 18 13:24	14° <u>♏</u> 16'50		minimum elong	5747 Nov 04 05:28	13° <u>♏</u> 47'06	0°38'19
max. Earth dist.	5741 Oct 04 11:15	15° <u>♏</u> 15'30	19.46103 AU	morning rise	5747 Nov 20 16:28	14° <u>♏</u> 48'33	
					5747 Nov 23 19:45	15° <u>♏</u>	
conjunction	5741 Oct 05 06:15	15° <u>♏</u> 18'26	0°47'42	retrograde	5748 Feb 20 18:58	18° <u>♏</u> 11'12	
minimum elong	5741 Oct 05 06:15	15° <u>♏</u> 18'26	0°47'42	opposition	5748 May 04 07:49	16° <u>♏</u> 08'24	0°41'19
morning rise	5741 Oct 21 21:24	16° <u>♏</u> 19'51		min. Earth dist.	5748 May 04 23:42	16° <u>♏</u> 06'40	17.33926 AU
retrograde	5742 Jan 22 18:36	19° <u>♏</u> 42'21			5748 May 31 22:22	15° <u>♏</u>	
opposition	5742 Apr 06 14:12	17° <u>♏</u> 39'20	0°52'46	direct	5748 Jul 19 05:32	14° <u>♏</u> 02'23	
min. Earth dist.	5742 Apr 07 06:00	17° <u>♏</u> 37'36	17.44416 AU		5748 Sep 04 10:25	15° <u>♏</u>	
direct	5742 Jun 20 21:47	15° <u>♏</u> 34'08		evening set	5748 Oct 22 20:01	17° <u>♏</u> 31'14	

conjunction	5748 Nov 08 09:11	18° \mathbb{M} 33'01	0°35'43	max. Earth dist.	5754 Dec 07 08:39	17° \mathbb{A} 01'08	19.45059 AU
minimum elong	5748 Nov 08 09:11	18° \mathbb{M} 33'01	0°35'44	morning rise	5754 Dec 24 03:20	18° \mathbb{A} 03'49	
max. Earth dist.	5748 Nov 07 14:51	18° \mathbb{M} 30'09	19.34000 AU	retrograde	5755 Mar 25 12:41	21° \mathbb{A} 24'19	
morning rise	5748 Nov 24 19:07	19° \mathbb{M} 34'22		opposition	5755 Jun 07 11:06	19° \mathbb{A} 22'43	0°15'41
retrograde	5749 Feb 24 17:22	22° \mathbb{M} 56'53		min. Earth dist.	5755 Jun 07 23:44	19° \mathbb{A} 21'21	17.46645 AU
opposition	5749 May 09 07:55	20° \mathbb{M} 54'15	0°38'19	direct	5755 Aug 23 03:06	17° \mathbb{A} 17'25	
min. Earth dist.	5749 May 10 00:09	20° \mathbb{M} 52'28	17.34281 AU	evening set	5755 Nov 26 17:02	20° \mathbb{A} 45'05	
direct	5749 Jul 24 06:54	18° \mathbb{M} 48'17					
evening set	5749 Oct 28 00:18	22° \mathbb{M} 17'18		conjunction	5755 Dec 12 23:34	21° \mathbb{A} 45'45	0°12'10
				minimum elong	5755 Dec 12 23:34	21° \mathbb{A} 45'45	0°12'12
conjunction	5749 Nov 13 12:29	23° \mathbb{M} 18'59	0°32'54	behind sun begin	5755 Dec 12 19:06	21° \mathbb{A} 45'04	
minimum elong	5749 Nov 13 12:29	23° \mathbb{M} 18'59	0°32'56	behind sun end	5755 Dec 13 04:03	21° \mathbb{A} 46'26	
max. Earth dist.	5749 Nov 12 17:40	23° \mathbb{M} 16'02	19.34660 AU	max. Earth dist.	5755 Dec 12 09:11	21° \mathbb{A} 43'30	19.48312 AU
morning rise	5749 Nov 29 21:40	24° \mathbb{M} 20'15		morning rise	5755 Dec 29 02:46	22° \mathbb{A} 45'56	
retrograde	5750 Mar 01 18:00	27° \mathbb{M} 42'34		retrograde	5756 Mar 29 10:09	26° \mathbb{A} 05'55	
opposition	5750 May 14 08:12	25° \mathbb{M} 40'06	0°35'03	opposition	5756 Jun 11 11:28	24° \mathbb{A} 04'27	0°11'25
min. Earth dist.	5750 May 14 23:25	25° \mathbb{M} 38'27	17.35220 AU	min. Earth dist.	5756 Jun 11 23:47	24° \mathbb{A} 03'08	17.50084 AU
direct	5750 Jul 29 11:01	23° \mathbb{M} 34'13		direct	5756 Aug 27 04:54	21° \mathbb{A} 59'17	
evening set	5750 Nov 02 04:01	27° \mathbb{M} 03'17		evening set	5756 Nov 30 17:31	25° \mathbb{A} 26'21	
conjunction	5750 Nov 18 15:32	28° \mathbb{M} 04'53	0°29'52	conjunction	5756 Dec 16 23:05	26° \mathbb{A} 26'47	0°08'19
minimum elong	5750 Nov 18 15:32	28° \mathbb{M} 04'53	0°29'54	minimum elong	5756 Dec 16 23:06	26° \mathbb{A} 26'47	0°08'20
max. Earth dist.	5750 Nov 17 22:28	28° \mathbb{M} 02'12	19.35859 AU	behind sun begin	5756 Dec 16 17:13	26° \mathbb{A} 25'53	
morning rise	5750 Dec 04 23:36	29° \mathbb{M} 06'00		behind sun end	5756 Dec 17 04:58	26° \mathbb{A} 27'41	
	5750 Dec 20 03:38	0° \mathbb{A}		max. Earth dist.	5756 Dec 16 10:18	26° \mathbb{A} 24'48	19.51938 AU
retrograde	5751 Mar 06 16:35	2° \mathbb{A} 28'04		morning rise	5757 Jan 02 01:15	27° \mathbb{A} 26'44	
opposition	5751 May 19 08:45	0° \mathbb{A} 25'48	0°31'33		5757 Feb 21 03:25	0° \mathbb{B}	
min. Earth dist.	5751 May 20 00:00	0° \mathbb{A} 24'09	17.36659 AU	retrograde	5757 Apr 03 08:12	0° \mathbb{B} 46'09	
	5751 May 29 08:08	30° \mathbb{R} \mathbb{M}			5757 May 15 20:18	30° \mathbb{R} \mathbb{A}	
direct	5751 Aug 03 13:57	28° \mathbb{M} 20'02		opposition	5757 Jun 16 11:30	28° \mathbb{A} 44'49	0°07'05
	5751 Oct 05 21:08	0° \mathbb{A}		min. Earth dist.	5757 Jun 16 22:10	28° \mathbb{A} 43'40	17.53882 AU
evening set	5751 Nov 07 07:46	1° \mathbb{A} 49'02		direct	5757 Sep 01 07:42	26° \mathbb{A} 39'49	
					5757 Dec 04 00:28	0° \mathbb{B}	
conjunction	5751 Nov 23 18:12	2° \mathbb{A} 50'29	0°26'38	evening set	5757 Dec 05 17:13	0° \mathbb{B} 06'11	
minimum elong	5751 Nov 23 18:12	2° \mathbb{A} 50'29	0°26'38				
max. Earth dist.	5751 Nov 23 00:32	2° \mathbb{A} 47'42	19.37538 AU	conjunction	5757 Dec 21 21:43	1° \mathbb{B} 06'21	0°04'26
morning rise	5751 Dec 10 01:27	3° \mathbb{A} 51'27		minimum elong	5757 Dec 21 21:44	1° \mathbb{B} 06'21	0°04'28
retrograde	5752 Mar 10 16:03	7° \mathbb{A} 13'13		behind sun begin	5757 Dec 21 15:12	1° \mathbb{B} 05'22	
opposition	5752 May 23 09:15	5° \mathbb{A} 11'07	0°27'49	behind sun end	5757 Dec 22 04:16	1° \mathbb{B} 07'21	
min. Earth dist.	5752 May 23 23:51	5° \mathbb{A} 09'33	17.38563 AU	max. Earth dist.	5757 Dec 21 09:57	1° \mathbb{B} 04'32	19.55931 AU
direct	5752 Aug 07 17:46	3° \mathbb{A} 05'27		morning rise	5758 Jan 06 22:57	2° \mathbb{B} 06'03	
evening set	5752 Nov 11 10:57	6° \mathbb{A} 34'18		retrograde	5758 Apr 08 04:28	5° \mathbb{B} 24'54	
				opposition	5758 Jun 21 11:16	3° \mathbb{B} 23'40	0°02'43
conjunction	5752 Nov 27 20:35	7° \mathbb{A} 35'35	0°23'12	min. Earth dist.	5758 Jun 21 21:30	3° \mathbb{B} 22'34	17.58080 AU
minimum elong	5752 Nov 27 20:35	7° \mathbb{A} 35'35	0°23'14	direct	5758 Sep 06 08:26	1° \mathbb{B} 18'50	
max. Earth dist.	5752 Nov 27 04:37	7° \mathbb{A} 33'05	19.39653 AU	evening set	5758 Dec 10 15:51	4° \mathbb{B} 44'27	
morning rise	5752 Dec 14 02:41	8° \mathbb{A} 36'23					
retrograde	5753 Mar 15 15:08	11° \mathbb{A} 57'46		conjunction	5758 Dec 26 19:23	5° \mathbb{B} 44'20	0°00'28
opposition	5753 May 28 10:01	9° \mathbb{A} 55'52	0°23'55	minimum elong	5758 Dec 26 19:23	5° \mathbb{B} 44'20	0°00'29
min. Earth dist.	5753 May 29 00:09	9° \mathbb{A} 54'20	17.40871 AU	behind sun begin	5758 Dec 26 12:46	5° \mathbb{B} 43'20	
direct	5753 Aug 12 21:11	7° \mathbb{A} 50'19		behind sun end	5758 Dec 27 02:00	5° \mathbb{B} 45'21	
evening set	5753 Nov 16 13:36	11° \mathbb{A} 18'52		max. Earth dist.	5758 Dec 26 09:10	5° \mathbb{B} 42'46	19.60334 AU
				morning rise	5759 Jan 11 19:43	6° \mathbb{B} 43'47	
conjunction	5753 Dec 02 22:05	12° \mathbb{A} 19'57	0°19'38	desc. node	5759 Feb 07 16:12	8° \mathbb{B} 15'02	
minimum elong	5753 Dec 02 22:06	12° \mathbb{A} 19'57	0°19'39	retrograde	5759 Apr 13 01:18	10° \mathbb{B} 02'01	
max. Earth dist.	5753 Dec 02 05:52	12° \mathbb{A} 17'25	19.42163 AU	opposition	5759 Jun 26 10:32	8° \mathbb{B} 00'55	-0°01'37
morning rise	5753 Dec 19 03:17	13° \mathbb{A} 20'34		min. Earth dist.	5759 Jun 26 18:32	8° \mathbb{B} 00'04	17.62674 AU
retrograde	5754 Mar 20 13:46	16° \mathbb{A} 41'33		direct	5759 Sep 11 10:20	5° \mathbb{B} 56'18	
opposition	5754 Jun 02 10:42	14° \mathbb{A} 39'48	0°19'52	evening set	5759 Dec 15 13:44	9° \mathbb{B} 21'05	
min. Earth dist.	5754 Jun 03 00:20	14° \mathbb{A} 38'20	17.43578 AU				
direct	5754 Aug 17 23:53	12° \mathbb{A} 34'22		conjunction	5759 Dec 31 16:14	10° \mathbb{B} 20'42	-0°03'30
evening set	5754 Nov 21 15:34	16° \mathbb{A} 02'31		minimum elong	5759 Dec 31 16:14	10° \mathbb{B} 20'42	0°03'29
				behind sun begin	5759 Dec 31 09:39	10° \mathbb{B} 19'42	
conjunction	5754 Dec 07 23:13	17° \mathbb{A} 03'25	0°15'57	behind sun end	5759 Dec 31 22:49	10° \mathbb{B} 21'42	
minimum elong	5754 Dec 07 23:13	17° \mathbb{A} 03'25	0°15'59	max. Earth dist.	5759 Dec 31 07:43	10° \mathbb{B} 19'24	19.65133 AU
behind sun begin	5754 Dec 07 22:52	17° \mathbb{A} 03'22		morning rise	5760 Jan 16 15:34	11° \mathbb{B} 19'51	
behind sun end	5754 Dec 07 23:34	17° \mathbb{A} 03'28		retrograde	5760 Apr 16 20:20	14° \mathbb{B} 37'30	

opposition	5760 Jun 30 09:32	12° $\overline{3}$ 36'32 -0°05'56	morning rise	5766 Feb 11 21:27	8° \approx 22'47
min. Earth dist.	5760 Jun 30 16:58	12° $\overline{3}$ 35'45 17.67689 AU	retrograde	5766 May 14 05:49	11° \approx 36'51
direct	5760 Sep 15 09:56	10° $\overline{3}$ 32'11	opposition	5766 Jul 28 17:47	9° \approx 37'08 -0°29'32
evening set	5760 Dec 19 10:41	13° $\overline{3}$ 56'06	min. Earth dist.	5766 Jul 28 16:34	9° \approx 37'16 18.04221 AU
			direct	5766 Oct 13 23:54	7° \approx 35'01
conjunction	5761 Jan 04 12:08	14° $\overline{3}$ 55'25 -0°07'20	evening set	5767 Jan 15 21:30	10° \approx 52'52
minimum elong	5761 Jan 04 12:08	14° $\overline{3}$ 55'25 0°07'19			
behind sun begin	5761 Jan 04 06:04	14° $\overline{3}$ 54'30	conjunction	5767 Jan 31 17:34	11° \approx 50'21 -0°28'10
behind sun end	5761 Jan 04 18:13	14° $\overline{3}$ 56'20	minimum elong	5767 Jan 31 17:34	11° \approx 50'21 0°28'09
max. Earth dist.	5761 Jan 04 05:00	14° $\overline{3}$ 54'20 19.70363 AU	max. Earth dist.	5767 Jan 31 19:08	11° \approx 50'35 20.07490 AU
morning rise	5761 Jan 20 10:39	15° $\overline{3}$ 54'18	morning rise	5767 Feb 16 11:50	12° \approx 47'34
retrograde	5761 Apr 21 16:13	19° $\overline{3}$ 11'21		5767 Mar 31 07:35	15° \approx
opposition	5761 Jul 05 08:03	17° $\overline{3}$ 10'34 -0°10'10	retrograde	5767 May 18 22:27	16° \approx 01'01
min. Earth dist.	5761 Jul 05 12:50	17° $\overline{3}$ 10'04 17.73112 AU		5767 Jul 08 20:06	15° \approx
direct	5761 Sep 20 10:39	15° $\overline{3}$ 06'32	opposition	5767 Aug 02 13:19	14° \approx 01'28 -0°32'54
evening set	5761 Dec 24 06:32	18° $\overline{3}$ 29'31	min. Earth dist.	5767 Aug 02 10:05	14° \approx 01'48 18.10724 AU
			direct	5767 Oct 18 19:58	11° \approx 59'42
conjunction	5762 Jan 09 07:05	19° $\overline{3}$ 28'33 -0°11'05		5768 Jan 15 20:10	15° \approx
minimum elong	5762 Jan 09 07:05	19° $\overline{3}$ 28'33 0°11'04	evening set	5768 Jan 20 12:12	15° \approx 16'27
behind sun begin	5762 Jan 09 02:07	19° $\overline{3}$ 27'48			
behind sun end	5762 Jan 09 12:04	19° $\overline{3}$ 29'18	conjunction	5768 Feb 05 07:39	16° \approx 13'38 -0°31'06
max. Earth dist.	5762 Jan 09 02:11	19° $\overline{3}$ 27'48 19.75976 AU	minimum elong	5768 Feb 05 07:39	16° \approx 13'38 0°31'05
morning rise	5762 Jan 25 04:41	20° $\overline{3}$ 27'09	max. Earth dist.	5768 Feb 05 11:28	16° \approx 14'13 20.13957 AU
retrograde	5762 Apr 26 10:00	23° $\overline{3}$ 43'37	morning rise	5768 Feb 21 01:12	17° \approx 10'34
opposition	5762 Jul 10 06:15	21° $\overline{3}$ 43'02 -0°14'19	retrograde	5768 May 22 12:29	20° \approx 23'25
min. Earth dist.	5762 Jul 10 10:31	21° $\overline{3}$ 42'35 17.78902 AU	opposition	5768 Aug 06 08:24	18° \approx 24'01 -0°36'03
direct	5762 Sep 25 09:27	19° $\overline{3}$ 39'22	min. Earth dist.	5768 Aug 06 04:47	18° \approx 24'24 18.17154 AU
evening set	5762 Dec 29 01:43	23° $\overline{3}$ 01'24	direct	5768 Oct 22 14:13	16° \approx 22'36
			evening set	5769 Jan 24 02:10	19° \approx 38'12
conjunction	5763 Jan 14 01:14	24° $\overline{3}$ 00'07 -0°14'46			
minimum elong	5763 Jan 14 01:14	24° $\overline{3}$ 00'07 0°14'44	conjunction	5769 Feb 08 20:47	20° \approx 35'05 -0°33'51
behind sun begin	5763 Jan 13 22:26	23° $\overline{3}$ 59'41	minimum elong	5769 Feb 08 20:47	20° \approx 35'05 0°33'50
behind sun end	5763 Jan 14 04:02	24° $\overline{3}$ 00'32	max. Earth dist.	5769 Feb 09 00:41	20° \approx 35'40 20.20346 AU
max. Earth dist.	5763 Jan 13 21:19	23° $\overline{3}$ 59'31 19.81930 AU	morning rise	5769 Feb 24 14:03	21° \approx 31'46
morning rise	5763 Jan 29 22:10	24° $\overline{3}$ 58'26	retrograde	5769 May 27 03:48	24° \approx 44'00
retrograde	5763 May 01 04:33	28° $\overline{3}$ 14'18	opposition	5769 Aug 11 02:45	22° \approx 44'42 -0°38'58
opposition	5763 Jul 15 03:39	26° $\overline{3}$ 13'57 -0°18'21	min. Earth dist.	5769 Aug 10 21:19	22° \approx 45'15 18.23496 AU
min. Earth dist.	5763 Jul 15 05:27	26° $\overline{3}$ 13'45 17.84984 AU	direct	5769 Oct 27 08:21	20° \approx 43'35
direct	5763 Sep 30 08:46	24° $\overline{3}$ 10'39	evening set	5770 Jan 28 14:56	23° \approx 58'02
evening set	5764 Jan 02 19:58	27° $\overline{3}$ 31'43			
conjunction	5764 Jan 18 18:40	28° $\overline{3}$ 30'07 -0°18'19	conjunction	5770 Feb 13 09:09	24° \approx 54'38 -0°36'23
minimum elong	5764 Jan 18 18:40	28° $\overline{3}$ 30'07 0°18'18	minimum elong	5770 Feb 13 09:09	24° \approx 54'38 0°36'21
max. Earth dist.	5764 Jan 18 17:02	28° $\overline{3}$ 29'53 19.88126 AU	max. Earth dist.	5770 Feb 13 15:20	24° \approx 55'34 20.26622 AU
morning rise	5764 Feb 03 14:43	29° $\overline{3}$ 28'10	morning rise	5770 Mar 01 01:53	25° \approx 51'03
	5764 Feb 12 14:40	0° \approx	retrograde	5770 May 31 17:01	29° \approx 02'40
retrograde	5764 May 04 21:09	2° \approx 43'26	opposition	5770 Aug 15 20:28	27° \approx 03'27 -0°41'39
opposition	5764 Jul 19 00:58	0° \approx 43'18 -0°22'15	min. Earth dist.	5770 Aug 15 14:29	27° \approx 04'04 18.29705 AU
min. Earth dist.	5764 Jul 19 02:24	0° \approx 43'10 17.91280 AU	direct	5770 Nov 01 01:42	25° \approx 02'38
	5764 Aug 05 17:37	30° \approx 3	evening set	5771 Feb 02 03:04	28° \approx 15'54
direct	5764 Oct 04 06:20	28° $\overline{3}$ 40'25	conjunction	5771 Feb 17 20:34	29° \approx 12'13 -0°38'41
	5764 Nov 29 22:27	0° \approx	minimum elong	5771 Feb 17 20:33	29° \approx 12'13 0°38'41
evening set	5765 Jan 06 13:20	2° \approx 00'26	max. Earth dist.	5771 Feb 18 02:51	29° \approx 13'10 20.32773 AU
				5771 Mar 03 04:06	0° \approx
conjunction	5765 Jan 22 11:01	2° \approx 58'32 -0°21'46	morning rise	5771 Mar 05 13:09	0° \approx 08'24
minimum elong	5765 Jan 22 11:01	2° \approx 58'32 0°21'44	retrograde	5771 Jun 05 06:33	3° \approx 19'25
max. Earth dist.	5765 Jan 22 10:02	2° \approx 58'23 19.94506 AU	opposition	5771 Aug 20 13:18	1° \approx 20'14 -0°44'04
morning rise	5765 Feb 07 06:30	3° \approx 56'17	min. Earth dist.	5771 Aug 20 05:42	1° \approx 21'00 18.35807 AU
retrograde	5765 May 09 14:37	7° \approx 10'58		5771 Sep 25 10:28	30° \approx
opposition	5765 Jul 23 21:38	5° \approx 11'03 -0°25'59	direct	5771 Nov 05 17:46	29° \approx 19'41
min. Earth dist.	5765 Jul 23 20:43	5° \approx 11'09 17.97719 AU		5771 Dec 15 20:02	0° \approx
direct	5765 Oct 09 04:18	3° \approx 08'33	evening set	5772 Feb 06 14:07	2° \approx 31'48
evening set	5766 Jan 11 05:48	6° \approx 27'30			
conjunction	5766 Jan 27 02:47	7° \approx 25'18 -0°25'03	conjunction	5772 Feb 22 07:18	3° \approx 27'52 -0°40'46
minimum elong	5766 Jan 27 02:46	7° \approx 25'18 0°25'01	minimum elong	5772 Feb 22 07:17	3° \approx 27'52 0°40'45
max. Earth dist.	5766 Jan 27 04:06	7° \approx 25'30 20.00979 AU	max. Earth dist.	5772 Feb 22 16:03	3° \approx 29'10 20.38820 AU
			morning rise	5772 Mar 08 23:27	4° \approx 23'47

retrograde	5772 Jun 08 18:39	7°♄34'13	evening set	5779 Mar 06 23:54	1°♅38'08
opposition	5772 Aug 24 05:40	5°♄35'05 -0°46'13			
min. Earth dist.	5772 Aug 23 21:05	5°♄35'57 18.41810 AU	conjunction	5779 Mar 22 15:21	2°♅32'43 -0°48'26
direct	5772 Nov 09 10:17	3°♄34'49	minimum elong	5779 Mar 22 15:21	2°♅32'43 0°48'27
evening set	5773 Feb 10 00:23	6°♄45'48	max. Earth dist.	5779 Mar 23 07:04	2°♅35'01 20.77990 AU
			morning rise	5779 Apr 07 07:45	3°♅27'26
conjunction	5773 Feb 25 16:57	7°♄41'35 -0°42'36	retrograde	5779 Jul 08 23:10	6°♅34'57
minimum elong	5773 Feb 25 16:57	7°♄41'35 0°42'35	opposition	5779 Sep 24 06:12	4°♅36'26 -0°53'41
max. Earth dist.	5773 Feb 26 02:04	7°♄42'57 20.44787 AU	min. Earth dist.	5779 Sep 23 14:13	4°♅38'01 18.80380 AU
morning rise	5773 Mar 13 09:05	8°♄37'19	direct	5779 Dec 10 00:52	2°♅38'28
retrograde	5773 Jun 13 07:02	11°♄47'12	evening set	5780 Mar 10 06:04	5°♅42'51
opposition	5773 Aug 28 21:17	9°♄48'06 -0°48'06			
min. Earth dist.	5773 Aug 28 11:04	9°♄49'08 18.47757 AU	conjunction	5780 Mar 25 21:43	6°♅37'18 -0°48'33
direct	5773 Nov 14 00:18	7°♄48'08	minimum elong	5780 Mar 25 21:43	6°♅37'18 0°48'34
evening set	5774 Feb 14 09:48	10°♄58'01	max. Earth dist.	5780 Mar 26 15:02	6°♅39'50 20.82619 AU
			morning rise	5780 Apr 10 14:13	7°♅31'54
conjunction	5774 Mar 02 02:11	11°♄53'34 -0°44'11	retrograde	5780 Jul 12 08:21	10°♅39'09
minimum elong	5774 Mar 02 02:11	11°♄53'34 0°44'11	opposition	5780 Sep 27 17:59	8°♅40'43 -0°53'40
max. Earth dist.	5774 Mar 02 13:46	11°♄55'18 20.50689 AU	min. Earth dist.	5780 Sep 27 01:08	8°♅42'24 18.84805 AU
morning rise	5774 Mar 17 18:02	12°♄49'05	direct	5780 Dec 13 11:36	6°♅43'03
retrograde	5774 Jun 17 17:58	15°♄58'27	evening set	5781 Mar 14 11:57	9°♅46'40
opposition	5774 Sep 02 12:04	13°♄59'26 -0°49'43			
min. Earth dist.	5774 Sep 02 00:42	14°♄00'35 18.53619 AU	conjunction	5781 Mar 30 03:34	10°♅40'59 -0°48'26
direct	5774 Nov 18 15:10	11°♄59'47	minimum elong	5781 Mar 30 03:34	10°♅40'59 0°48'27
evening set	5775 Feb 18 18:42	15°♄08'38	max. Earth dist.	5781 Mar 30 20:19	10°♅43'26 20.86828 AU
			morning rise	5781 Apr 14 20:34	11°♅35'30
conjunction	5775 Mar 06 10:38	16°♄03'58 -0°45'32	retrograde	5781 Jul 16 17:41	14°♅42'31
minimum elong	5775 Mar 06 10:38	16°♄03'58 0°45'31	opposition	5781 Oct 02 05:23	12°♅44'07 -0°53'23
max. Earth dist.	5775 Mar 06 22:23	16°♄05'42 20.56507 AU	min. Earth dist.	5781 Oct 01 12:41	12°♅45'47 18.88795 AU
morning rise	5775 Mar 22 02:36	16°♄59'17	direct	5781 Dec 17 20:32	10°♅46'42
retrograde	5775 Jun 22 05:37	20°♄08'12	evening set	5782 Mar 18 17:28	13°♅49'36
opposition	5775 Sep 07 02:22	18°♄09'16 -0°51'03			
min. Earth dist.	5775 Sep 06 13:43	18°♄10'32 18.59390 AU	conjunction	5782 Apr 03 09:26	14°♅43'49 -0°48'04
direct	5775 Nov 23 03:19	16°♄09'57	minimum elong	5782 Apr 03 09:26	14°♅43'49 0°48'04
evening set	5776 Feb 23 02:39	19°♄17'49	max. Earth dist.	5782 Apr 04 03:24	14°♅46'26 20.90572 AU
			morning rise	5782 Apr 19 02:40	15°♅38'15
conjunction	5776 Mar 09 18:32	20°♄12'56 -0°46'37	retrograde	5782 Jul 21 02:40	18°♅45'02
minimum elong	5776 Mar 09 18:32	20°♄12'56 0°46'38	opposition	5782 Oct 06 16:03	16°♅46'39 -0°52'50
max. Earth dist.	5776 Mar 10 08:34	20°♄15'00 20.62202 AU	min. Earth dist.	5782 Oct 05 22:42	16°♅48'23 18.92287 AU
morning rise	5776 Mar 25 10:19	21°♄08'04	direct	5782 Dec 22 06:22	14°♅49'25
retrograde	5776 Jun 25 15:50	24°♄16'35	evening set	5783 Mar 22 22:48	17°♅51'39
opposition	5776 Sep 10 16:08	22°♄17'45 -0°52'07			
min. Earth dist.	5776 Sep 10 02:17	22°♄19'09 18.64999 AU	conjunction	5783 Apr 07 14:51	18°♅45'47 -0°47'28
direct	5776 Nov 26 16:40	20°♄18'48	minimum elong	5783 Apr 07 14:51	18°♅45'47 0°47'29
evening set	5777 Feb 26 10:18	23°♄25'42	max. Earth dist.	5783 Apr 08 08:02	18°♅48'17 20.93819 AU
			morning rise	5783 Apr 23 08:41	19°♅40'10
conjunction	5777 Mar 14 01:51	24°♄20'38 -0°47'29	retrograde	5783 Jul 25 10:26	22°♅46'45
minimum elong	5777 Mar 14 01:51	24°♄20'38 0°47'28	min. Earth dist.	5783 Oct 10 09:36	20°♅50'00 18.95296 AU
max. Earth dist.	5777 Mar 14 15:55	24°♄22'42 20.67720 AU	opposition	5783 Oct 11 02:32	20°♅48'19 -0°52'02
morning rise	5777 Mar 29 17:55	25°♄15'37	direct	5783 Dec 26 14:11	18°♅51'14
retrograde	5777 Jun 30 03:06	28°♄23'45	evening set	5784 Mar 26 03:28	21°♅52'50
opposition	5777 Sep 15 05:19	26°♄25'02 -0°52'55			
min. Earth dist.	5777 Sep 14 14:39	26°♄26'30 18.70420 AU	conjunction	5784 Apr 10 20:00	22°♅46'53 -0°46'38
direct	5777 Dec 01 03:16	24°♄26'25	minimum elong	5784 Apr 10 20:00	22°♅46'53 0°46'38
evening set	5778 Mar 02 17:12	27°♄32'26	max. Earth dist.	5784 Apr 11 14:27	22°♅49'33 20.96591 AU
			morning rise	5784 Apr 26 14:12	23°♅41'13
conjunction	5778 Mar 18 08:52	28°♄27'11 -0°48'05	retrograde	5784 Jul 28 19:07	26°♅47'37
minimum elong	5778 Mar 18 08:52	28°♄27'11 0°48'06	opposition	5784 Oct 14 12:27	24°♅49'08 -0°50'58
max. Earth dist.	5778 Mar 19 00:53	28°♄29'32 20.73009 AU	min. Earth dist.	5784 Oct 13 18:41	24°♅50'54 18.97834 AU
morning rise	5778 Apr 03 00:56	29°♄22'02	direct	5784 Dec 29 23:22	22°♅52'10
	5778 Apr 14 08:25	0°♅	evening set	5785 Mar 30 08:09	25°♅53'09
retrograde	5778 Jul 04 12:39	2°♅29'50			
opposition	5778 Sep 19 17:58	0°♅31'13 -0°53'26	conjunction	5785 Apr 15 00:53	26°♅47'10 -0°45'34
min. Earth dist.	5778 Sep 19 02:19	0°♅32'48 18.75560 AU	minimum elong	5785 Apr 15 00:53	26°♅47'10 0°45'35
	5778 Oct 02 20:56	30°♄	max. Earth dist.	5785 Apr 15 18:42	26°♅49'44 20.98917 AU
direct	5778 Dec 05 15:12	28°♄32'57	morning rise	5785 Apr 30 19:48	27°♅41'28
	5779 Feb 03 15:12	0°♅		5785 Jun 18 12:24	0°♄


























































































































retrograde	5785 Aug 02 01:57	0°♄47'44	opposition	5791 Nov 13 00:19	22°♄41'03 -0°37'10
	5785 Sep 17 04:07	30°♄47'09	direct	5792 Jan 27 17:58	20°♄44'36
opposition	5785 Oct 18 21:53	28°♄49'09 -0°49'40	evening set	5792 Apr 26 14:01	23°♄43'31
min. Earth dist.	5785 Oct 18 04:37	28°♄50'52 18.99969 AU			
direct	5786 Jan 03 05:50	26°♄52'15	conjunction	5792 May 12 10:54	24°♄37'40 -0°32'26
evening set	5786 Apr 03 12:25	29°♄52'44	minimum elong	5792 May 12 10:54	24°♄37'40 0°32'28
	5786 Apr 05 15:53	0°♄	max. Earth dist.	5792 May 13 06:09	24°♄40'25 21.04907 AU
			morning rise	5792 May 28 10:40	25°♄32'16
conjunction	5786 Apr 19 05:45	0°♄46'43 -0°44'17	retrograde	5792 Aug 30 10:20	28°♄38'48
minimum elong	5786 Apr 19 05:45	0°♄46'43 0°44'18	opposition	5792 Nov 16 08:10	26°♄39'51 -0°34'24
max. Earth dist.	5786 Apr 20 00:47	0°♄49'27 21.00857 AU	min. Earth dist.	5792 Nov 15 14:16	26°♄41'39 19.04611 AU
morning rise	5786 May 05 01:07	1°♄41'00	direct	5793 Jan 31 00:52	24°♄43'26
retrograde	5786 Aug 06 10:06	4°♄47'09	evening set	5793 Apr 30 19:06	27°♄42'21
opposition	5786 Oct 23 06:52	2°♄48'29 -0°48'07			
min. Earth dist.	5786 Oct 22 12:38	2°♄50'18 19.01718 AU	conjunction	5793 May 16 16:34	28°♄36'36 -0°29'52
direct	5787 Jan 07 13:45	0°♄51'41	minimum elong	5793 May 16 16:34	28°♄36'36 0°29'53
evening set	5787 Apr 07 16:40	3°♄51'43	max. Earth dist.	5793 May 17 10:24	28°♄39'09 21.04149 AU
			morning rise	5793 Jun 01 17:20	29°♄31'19
conjunction	5787 Apr 23 10:16	4°♄45'40 -0°42'47		5793 Jun 10 10:06	0°♄
minimum elong	5787 Apr 23 10:17	4°♄45'40 0°42'48	retrograde	5793 Sep 03 18:31	2°♄38'05
max. Earth dist.	5787 Apr 24 04:40	4°♄48'19 21.02426 AU	opposition	5793 Nov 20 15:59	0°♄39'04 -0°31'28
morning rise	5787 May 09 06:24	5°♄39'58	min. Earth dist.	5793 Nov 19 23:45	0°♄40'42 19.03608 AU
retrograde	5787 Aug 10 17:03	8°♄46'04		5793 Dec 07 04:31	30°♄
opposition	5787 Oct 27 15:41	6°♄47'20 -0°46'21	direct	5794 Feb 04 04:50	28°♄42'39
min. Earth dist.	5787 Oct 26 21:56	6°♄49'06 19.03123 AU		5794 Apr 01 11:29	0°♄
direct	5788 Jan 11 19:27	4°♄50'36	evening set	5794 May 05 00:24	1°♄41'38
evening set	5788 Apr 10 20:44	7°♄50'16			
			conjunction	5794 May 20 22:48	2°♄36'00 -0°27'08
conjunction	5788 Apr 26 15:02	8°♄44'13 -0°41'05	minimum elong	5794 May 20 22:49	2°♄36'00 0°27'09
minimum elong	5788 Apr 26 15:02	8°♄44'13 0°41'07	max. Earth dist.	5794 May 21 16:45	2°♄38'34 21.02887 AU
max. Earth dist.	5788 Apr 27 10:34	8°♄47'02 21.03661 AU	morning rise	5794 Jun 06 00:16	3°♄30'50
morning rise	5788 May 12 11:41	9°♄38'32	retrograde	5794 Sep 08 04:19	6°♄37'51
retrograde	5788 Aug 14 01:12	12°♄44'38	opposition	5794 Nov 24 23:48	4°♄38'45 -0°28'22
min. Earth dist.	5788 Oct 30 05:22	10°♄47'43 19.04180 AU	min. Earth dist.	5794 Nov 24 07:28	4°♄40'24 19.02066 AU
opposition	5788 Oct 31 00:05	10°♄45'51 -0°44'21	direct	5795 Feb 08 11:56	2°♄42'18
direct	5789 Jan 15 02:15	8°♄49'12	evening set	5795 May 09 06:07	5°♄41'25
evening set	5789 Apr 15 00:54	11°♄48'33			
			conjunction	5795 May 25 05:09	6°♄35'54 -0°24'16
conjunction	5789 Apr 30 19:38	12°♄42'32 -0°39'12	minimum elong	5795 May 25 05:09	6°♄35'54 0°24'17
minimum elong	5789 Apr 30 19:38	12°♄42'32 0°39'12	max. Earth dist.	5795 May 25 21:20	6°♄38'13 21.01067 AU
max. Earth dist.	5789 May 01 14:22	12°♄45'13 21.04545 AU	morning rise	5795 Jun 10 07:37	7°♄30'52
morning rise	5789 May 16 17:12	13°♄36'54	retrograde	5795 Sep 12 12:51	10°♄38'11
	5789 Jun 12 05:40	15°♄	opposition	5795 Nov 29 07:52	8°♄38'58 -0°25'07
retrograde	5789 Aug 18 08:43	16°♄43'02	min. Earth dist.	5795 Nov 28 17:22	8°♄40'26 18.99970 AU
	5789 Oct 28 17:42	15°♄	direct	5796 Feb 12 16:37	6°♄42'24
opposition	5789 Nov 04 08:24	14°♄44'11 -0°42'09	evening set	5796 May 12 12:07	9°♄41'42
min. Earth dist.	5789 Nov 03 14:28	14°♄45'59 19.04887 AU			
direct	5790 Jan 19 07:12	12°♄47'37	conjunction	5796 May 28 12:10	10°♄36'20 -0°21'16
	5790 Apr 04 19:48	15°♄	minimum elong	5796 May 28 12:10	10°♄36'20 0°21'17
evening set	5790 Apr 19 05:05	15°♄46'45	max. Earth dist.	5796 May 29 04:12	10°♄38'37 20.98704 AU
			morning rise	5796 Jun 13 15:25	11°♄31'27
conjunction	5790 May 05 00:36	16°♄40'46 -0°37'07	retrograde	5796 Sep 15 22:56	14°♄39'03
minimum elong	5790 May 05 00:36	16°♄40'46 0°37'09	opposition	5796 Dec 02 15:40	12°♄39'41 -0°21'45
max. Earth dist.	5790 May 05 20:12	16°♄43'35 21.05066 AU	min. Earth dist.	5796 Dec 02 01:10	12°♄41'09 18.97329 AU
morning rise	5790 May 20 22:45	17°♄35'11	direct	5797 Feb 15 23:38	10°♄42'59
retrograde	5790 Aug 22 17:09	20°♄41'25	evening set	5797 May 16 18:37	13°♄42'30
opposition	5790 Nov 08 16:15	18°♄42'32 -0°39'45			
min. Earth dist.	5790 Nov 07 21:38	18°♄44'24 19.05207 AU	conjunction	5797 Jun 01 19:25	14°♄37'18 -0°18'09
direct	5791 Jan 23 13:48	16°♄46'02	minimum elong	5797 Jun 01 19:25	14°♄37'18 0°18'12
evening set	5791 Apr 23 09:33	19°♄45'02	max. Earth dist.	5797 Jun 02 09:36	14°♄39'20 20.95811 AU
			morning rise	5797 Jun 17 23:43	15°♄32'36
conjunction	5791 May 09 05:34	20°♄39'06 -0°34'52	retrograde	5797 Sep 20 08:03	18°♄40'31
minimum elong	5791 May 09 05:34	20°♄39'06 0°34'53	opposition	5797 Dec 06 23:40	16°♄40'58 -0°18'15
max. Earth dist.	5791 May 10 00:09	20°♄41'46 21.05193 AU	min. Earth dist.	5797 Dec 06 11:07	16°♄42'14 18.94193 AU
morning rise	5791 May 25 04:39	21°♄33'36	direct	5798 Feb 20 04:53	14°♄44'04
retrograde	5791 Aug 27 01:04	24°♄39'58	evening set	5798 May 21 01:22	17°♄43'54
min. Earth dist.	5791 Nov 12 06:50	22°♄42'48 19.05132 AU			

conjunction	5798 Jun 06 03:10	18° Π 38'52	-0°14'57	behind sun end	5803 Jun 28 08:24	9° \ominus 00'50	
minimum elong	5798 Jun 06 03:10	18° Π 38'52	0°14'58	max. Earth dist.	5803 Jun 28 10:34	9° \ominus 01'09	20.70692 AU
behind sun begin	5798 Jun 06 00:44	18° Π 38'32		morning rise	5803 Jul 14 11:18	9° \ominus 56'27	
behind sun end	5798 Jun 06 05:36	18° Π 39'13		retrograde	5803 Oct 17 01:44	13° \ominus 07'05	
max. Earth dist.	5798 Jun 06 17:14	18° Π 40'53	20.92455 AU	opposition	5804 Jan 02 01:58	11° \ominus 06'29	0°04'15
morning rise	5798 Jun 22 08:14	19° Π 34'20		min. Earth dist.	5804 Jan 01 18:32	11° \ominus 07'15	18.68166 AU
retrograde	5798 Sep 24 18:24	22° Π 42'36		direct	5804 Mar 16 21:02	9° \ominus 08'15	
opposition	5798 Dec 11 07:29	20° Π 42'52	-0°14'39	evening set	5804 Jun 15 05:58	12° \ominus 11'25	
min. Earth dist.	5798 Dec 10 18:48	20° Π 44'10	18.90621 AU				
direct	5799 Feb 24 11:46	18° Π 45'46		conjunction	5804 Jul 01 13:15	13° \ominus 07'45	0°05'37
evening set	5799 May 25 08:43	21° Π 45'58		minimum elong	5804 Jul 01 13:15	13° \ominus 07'45	0°05'35
				behind sun begin	5804 Jul 01 06:49	13° \ominus 06'50	
conjunction	5799 Jun 10 11:16	22° Π 41'08	-0°11'40	behind sun end	5804 Jul 01 19:40	13° \ominus 08'39	
minimum elong	5799 Jun 10 11:16	22° Π 41'08	0°11'42	max. Earth dist.	5804 Jul 01 21:37	13° \ominus 08'56	20.65609 AU
behind sun begin	5799 Jun 10 06:34	22° Π 40'29		morning rise	5804 Jul 17 23:36	14° \ominus 04'32	
behind sun end	5799 Jun 10 15:57	22° Π 41'47		retrograde	5804 Oct 20 16:11	17° \ominus 15'46	
max. Earth dist.	5799 Jun 10 23:39	22° Π 42'54	20.88694 AU	opposition	5805 Jan 05 11:13	15° \ominus 15'02	0°08'06
morning rise	5799 Jun 26 17:20	23° Π 36'48		min. Earth dist.	5805 Jan 05 03:52	15° \ominus 15'47	18.62969 AU
retrograde	5799 Sep 29 04:12	26° Π 45'28		direct	5805 Mar 21 06:27	13° \ominus 16'33	
opposition	5799 Dec 15 15:39	24° Π 45'32	-0°10'58	evening set	5805 Jun 19 17:27	16° \ominus 20'32	
min. Earth dist.	5799 Dec 15 04:46	24° Π 46'38	18.86690 AU				
direct	5800 Feb 28 17:18	22° Π 48'12		conjunction	5805 Jul 06 01:31	17° \ominus 17'08	0°09'04
evening set	5800 May 29 16:20	25° Π 48'51		minimum elong	5805 Jul 06 01:31	17° \ominus 17'08	0°09'03
				behind sun begin	5805 Jul 05 19:50	17° \ominus 16'20	
conjunction	5800 Jun 14 19:57	26° Π 44'13	-0°08'19	behind sun end	5805 Jul 06 07:12	17° \ominus 17'57	
minimum elong	5800 Jun 14 19:58	26° Π 44'13	0°08'20	max. Earth dist.	5805 Jul 06 08:08	17° \ominus 18'05	20.60299 AU
behind sun begin	5800 Jun 14 14:06	26° Π 43'24		morning rise	5805 Jul 22 12:44	18° \ominus 14'12	
behind sun end	5800 Jun 15 01:49	26° Π 45'03		retrograde	5805 Oct 25 03:47	21° \ominus 26'01	
max. Earth dist.	5800 Jun 15 08:17	26° Π 45'59	20.84606 AU	opposition	5806 Jan 09 21:08	19° \ominus 25'10	0°11'56
morning rise	5800 Jul 01 02:51	27° Π 40'05		min. Earth dist.	5806 Jan 09 16:00	19° \ominus 25'42	18.57546 AU
	5800 Aug 19 06:33	0° \ominus		direct	5806 Mar 25 13:33	17° \ominus 26'27	
retrograde	5800 Oct 03 15:47	0° \ominus 49'12		evening set	5806 Jun 24 05:38	20° \ominus 31'19	
	5800 Nov 19 00:11	30° \Re Π					
opposition	5800 Dec 19 23:47	28° Π 49'04	-0°07'14	conjunction	5806 Jul 10 14:38	21° \ominus 28'10	0°12'30
min. Earth dist.	5800 Dec 19 12:43	28° Π 50'12	18.82441 AU	minimum elong	5806 Jul 10 14:38	21° \ominus 28'10	0°12'28
direct	5801 Mar 05 00:35	26° Π 51'31		behind sun begin	5806 Jul 10 10:20	21° \ominus 27'34	
evening set	5801 Jun 03 00:51	29° Π 52'41		behind sun end	5806 Jul 10 18:56	21° \ominus 28'47	
	5801 Jun 05 04:41	0° \ominus		max. Earth dist.	5806 Jul 10 20:20	21° \ominus 28'59	20.54761 AU
conjunction	5801 Jun 19 05:16	0° \ominus 48'17	-0°04'55	morning rise	5806 Jul 27 02:32	22° \ominus 25'29	
minimum elong	5801 Jun 19 05:15	0° \ominus 48'17	0°04'57	retrograde	5806 Oct 29 19:08	25° \ominus 37'57	
behind sun begin	5801 Jun 18 22:46	0° \ominus 47'22		opposition	5807 Jan 14 07:22	23° \ominus 36'58	0°15'44
behind sun end	5801 Jun 19 11:44	0° \ominus 49'11		min. Earth dist.	5807 Jan 14 02:34	23° \ominus 37'28	18.51879 AU
max. Earth dist.	5801 Jun 19 15:54	0° \ominus 49'48	20.80212 AU	direct	5807 Mar 30 00:44	21° \ominus 38'00	
morning rise	5801 Jul 05 13:07	1° \ominus 44'22		evening set	5807 Jun 28 18:56	24° \ominus 43'46	
retrograde	5801 Oct 08 01:52	4° \ominus 53'56		conjunction	5807 Jul 15 04:43	25° \ominus 40'55	0°15'54
opposition	5801 Dec 24 08:10	2° \ominus 53'39	-0°03'26	minimum elong	5807 Jul 15 04:42	25° \ominus 40'55	0°15'52
min. Earth dist.	5801 Dec 23 22:59	2° \ominus 54'35	18.77918 AU	max. Earth dist.	5807 Jul 15 08:28	25° \ominus 41'27	20.48956 AU
direct	5802 Mar 09 06:31	0° \ominus 55'52		morning rise	5807 Jul 31 17:21	26° \ominus 38'29	
evening set	5802 Jun 07 09:50	3° \ominus 57'38		retrograde	5807 Nov 03 07:46	29° \ominus 51'36	
conjunction	5802 Jun 23 15:16	4° \ominus 53'27	-0°01'27	opposition	5808 Jan 18 18:14	27° \ominus 50'28	0°19'28
minimum elong	5802 Jun 23 15:16	4° \ominus 53'27	0°01'29	min. Earth dist.	5808 Jan 18 15:52	27° \ominus 50'43	18.45943 AU
behind sun begin	5802 Jun 23 08:36	4° \ominus 52'31		direct	5808 Apr 02 09:15	25° \ominus 51'11	
behind sun end	5802 Jun 23 21:56	4° \ominus 54'24		evening set	5808 Jul 02 09:01	28° \ominus 57'54	
max. Earth dist.	5802 Jun 24 01:40	4° \ominus 54'57	20.75571 AU	conjunction	5808 Jul 18 19:44	29° \ominus 55'21	0°19'14
morning rise	5802 Jul 09 23:54	5° \ominus 49'46		minimum elong	5808 Jul 18 19:44	29° \ominus 55'21	0°19'13
retrograde	5802 Oct 12 15:04	8° \ominus 59'51		max. Earth dist.	5808 Jul 18 22:00	29° \ominus 55'40	20.42889 AU
asc. node	5802 Nov 19 23:37	8° \ominus 25'04			5808 Jul 20 03:29	0° Ω	
opposition	5802 Dec 28 16:48	6° \ominus 59'24	0°00'24	morning rise	5808 Aug 04 09:04	0° Ω 53'11	
min. Earth dist.	5802 Dec 28 07:26	7° \ominus 00'22	18.73152 AU	retrograde	5808 Nov 07 00:07	4° Ω 06'55	
direct	5803 Mar 13 14:35	5° \ominus 01'23		opposition	5809 Jan 22 05:30	2° Ω 05'37	0°23'08
evening set	5803 Jun 11 19:30	8° \ominus 03'49		min. Earth dist.	5809 Jan 22 03:43	2° Ω 05'48	18.39734 AU
				direct	5809 Apr 06 21:40	0° Ω 05'59	
conjunction	5803 Jun 28 01:45	8° \ominus 59'54	0°02'08	evening set	5809 Jul 07 00:12	3° Ω 13'42	
minimum elong	5803 Jun 28 01:43	8° \ominus 59'53	0°02'07				
behind sun begin	5803 Jun 27 19:02	8° \ominus 58'57		conjunction	5809 Jul 23 11:39	4° Ω 11'25	0°22'29

minimum elong	5809 Jul 23 11:39	4°Ω11'25	0°22'28	max. Earth dist.	5815 Aug 19 20:04	0°♊20'41	19.96611 AU
max. Earth dist.	5809 Jul 23 11:57	4°Ω11'28	20.36541 AU	morning rise	5815 Sep 05 20:31	1°♊21'32	
morning rise	5809 Aug 09 01:36	5°Ω09'31		retrograde	5815 Dec 08 22:35	4°♊39'34	
retrograde	5809 Nov 11 13:58	8°Ω23'52		opposition	5816 Feb 22 03:01	2°♊36'55	0°44'39
opposition	5810 Jan 26 17:19	6°Ω22'22	0°26'42	min. Earth dist.	5816 Feb 22 10:27	2°♊36'07	17.93429 AU
min. Earth dist.	5810 Jan 26 17:55	6°Ω22'18	18.33273 AU	direct	5816 May 06 19:16	0°♊34'28	
direct	5810 Apr 11 08:06	4°Ω22'21		evening set	5816 Aug 07 09:41	3°♊49'54	
evening set	5810 Jul 11 16:05	7°Ω31'05					
conjunction	5810 Jul 28 04:21	8°Ω29'06	0°25'38	conjunction	5816 Aug 24 01:34	4°♊49'38	0°41'11
minimum elong	5810 Jul 28 04:21	8°Ω29'06	0°25'38	minimum elong	5816 Aug 24 01:34	4°♊49'38	0°41'10
max. Earth dist.	5810 Jul 28 03:00	8°Ω28'54	20.29994 AU	max. Earth dist.	5816 Aug 23 15:40	4°♊48'09	19.90308 AU
morning rise	5810 Aug 13 18:55	9°Ω27'27		morning rise	5816 Sep 09 18:29	5°♊49'33	
retrograde	5810 Nov 16 07:01	12°Ω42'25		retrograde	5816 Dec 12 19:19	9°♊08'12	
opposition	5811 Jan 31 05:34	10°Ω40'43	0°30'08	opposition	5817 Feb 25 18:44	7°♊05'26	0°46'51
min. Earth dist.	5811 Jan 31 06:41	10°Ω40'36	18.26643 AU	min. Earth dist.	5817 Feb 26 02:44	7°♊04'34	17.87248 AU
direct	5811 Apr 15 21:21	8°Ω40'17		direct	5817 May 11 11:59	5°♊02'38	
evening set	5811 Jul 16 08:45	11°Ω50'03		evening set	5817 Aug 12 07:42	8°♊19'17	
conjunction	5811 Aug 01 21:45	12°Ω48'21	0°28'40	conjunction	5817 Aug 29 00:05	9°♊19'18	0°43'03
minimum elong	5811 Aug 01 21:45	12°Ω48'21	0°28'38	minimum elong	5817 Aug 29 00:05	9°♊19'18	0°43'03
max. Earth dist.	5811 Aug 01 18:57	12°Ω47'56	20.23295 AU	max. Earth dist.	5817 Aug 28 14:00	9°♊17'46	19.84239 AU
morning rise	5811 Aug 18 12:51	13°Ω46'59		morning rise	5817 Sep 14 16:56	10°♊19'26	
retrograde	5811 Sep 09 17:54	15°Ω		retrograde	5817 Dec 17 15:19	13°♊38'42	
opposition	5811 Nov 20 22:26	17°Ω02'34		opposition	5818 Mar 02 11:08	11°♊35'52	0°48'48
min. Earth dist.	5812 Feb 04 18:28	15°Ω00'38	0°33'26	min. Earth dist.	5818 Mar 02 20:18	11°♊34'52	17.81312 AU
direct	5812 Feb 04 21:41	15°Ω00'17	18.19905 AU	direct	5818 May 16 04:12	9°♊32'47	
evening set	5812 Feb 05 00:25	15°♊Ω		evening set	5818 Aug 17 06:42	12°♊50'37	
conjunction	5812 Apr 19 09:22	12°Ω59'47		conjunction	5818 Sep 02 23:17	13°♊50'54	0°44'39
minimum elong	5812 Jun 28 16:51	15°Ω		minimum elong	5818 Sep 02 23:17	13°♊50'54	0°44'39
max. Earth dist.	5812 Jul 20 02:26	16°Ω10'37		max. Earth dist.	5818 Sep 02 11:05	13°♊49'03	19.78448 AU
morning rise	5812 Aug 05 16:08	17°Ω09'13	0°31'32	morning rise	5818 Sep 19 16:22	14°♊51'16	
retrograde	5812 Aug 05 16:08	17°Ω09'13	0°31'32	retrograde	5818 Dec 22 13:10	18°♊11'08	
opposition	5812 Aug 05 11:36	17°Ω08'33	20.16544 AU	opposition	5819 Mar 07 04:13	16°♊08'15	0°50'27
min. Earth dist.	5812 Aug 22 07:47	18°Ω08'07		min. Earth dist.	5819 Mar 07 14:15	16°♊07'10	17.75662 AU
direct	5812 Nov 24 16:24	21°Ω24'19		direct	5819 May 20 21:55	14°♊04'54	
evening set	5812 Nov 24 16:24	21°Ω24'19		evening set	5819 Aug 22 06:27	17°♊23'56	
conjunction	5813 Feb 08 07:36	19°Ω22'10	0°36'33	conjunction	5819 Sep 07 23:28	18°♊24'29	0°45'59
minimum elong	5813 Feb 08 11:22	19°Ω21'46	18.13150 AU	minimum elong	5819 Sep 07 23:28	18°♊24'29	0°45'59
max. Earth dist.	5813 Apr 23 23:44	17°Ω20'53		max. Earth dist.	5819 Sep 07 11:14	18°♊22'37	19.72915 AU
morning rise	5813 Jul 24 20:59	20°Ω32'50		morning rise	5819 Sep 24 16:23	19°♊25'03	
retrograde	5813 Aug 10 11:22	21°Ω31'44	0°34'15	retrograde	5819 Dec 27 10:48	22°♊45'29	
opposition	5813 Aug 10 11:21	21°Ω31'44	0°34'14	opposition	5820 Mar 10 22:05	20°♊42'35	0°51'48
min. Earth dist.	5813 Aug 10 05:46	21°Ω30'54	20.09791 AU	min. Earth dist.	5820 Mar 11 09:10	20°♊41'23	17.70250 AU
direct	5813 Aug 27 03:19	22°Ω30'53		direct	5820 May 24 16:28	18°♊38'58	
evening set	5813 Nov 29 09:07	25°Ω47'41		evening set	5820 Aug 26 07:23	21°♊59'11	
conjunction	5814 Feb 12 21:32	23°Ω45'21	0°39'28	max. Earth dist.	5820 Sep 11 09:42	22°♊57'43	19.67621 AU
minimum elong	5814 Feb 13 03:05	23°Ω44'45	18.06435 AU	conjunction	5820 Sep 12 00:23	22°♊59'57	0°47'03
max. Earth dist.	5814 Apr 28 13:01	21°Ω43'40		minimum elong	5820 Sep 12 00:23	22°♊59'57	0°47'03
morning rise	5814 Jul 29 16:15	24°Ω56'45		morning rise	5820 Sep 28 17:21	24°♊00'44	
retrograde	5814 Aug 15 07:08	25°Ω55'55	0°36'47	retrograde	5820 Dec 31 08:45	27°♊21'41	
opposition	5814 Aug 15 07:07	25°Ω55'55	0°36'46	opposition	5821 Mar 15 16:34	25°♊18'46	0°52'50
min. Earth dist.	5814 Aug 14 23:46	25°Ω54'49	20.03131 AU	min. Earth dist.	5821 Mar 16 04:57	25°♊17'25	17.65079 AU
direct	5814 Aug 31 23:31	26°Ω55'20		direct	5821 May 29 11:39	23°♊14'52	
evening set	5814 Nov 12 02:29	0°♊		evening set	5821 Aug 31 08:54	26°♊36'13	
conjunction	5814 Dec 04 04:22	0°♊12'46		max. Earth dist.	5821 Sep 16 11:22	27°♊34'57	19.62553 AU
minimum elong	5814 Dec 26 09:20	30°♊Ω		conjunction	5821 Sep 17 02:11	27°♊37'13	0°47'49
max. Earth dist.	5815 Feb 17 11:58	28°Ω10'14	0°42'10	minimum elong	5821 Sep 17 02:11	27°♊37'13	0°47'48
morning rise	5815 Feb 17 17:56	28°Ω09'36	17.99847 AU	morning rise	5821 Oct 03 18:47	28°♊38'10	
retrograde	5815 May 03 04:40	26°Ω08'09		retrograde	5821 Oct 27 22:53	1°♊59'34	
opposition	5815 Aug 03 12:28	29°Ω22'24		opposition	5822 Jan 05 07:24	30°♊♊	
min. Earth dist.	5815 Aug 14 02:08	0°♊		min. Earth dist.	5822 Mar 19 04:54	29°♊56'37	0°53'32
conjunction	5815 Aug 20 03:58	0°♊21'52	0°39'06	conjunction	5822 Mar 20 11:52	29°♊55'12	17.60126 AU
minimum elong	5815 Aug 20 03:58	0°♊21'52	0°39'05	minimum elong	5822 Mar 21 00:57		

direct	5822 Jun 03 09:09	27° <u>17</u> 52'28		conjunction	5828 Oct 21 01:39	0° <u>18</u> 32'21	0°44'17
	5822 Aug 14 12:41	0° <u>0</u>		minimum elong	5828 Oct 21 01:39	0° <u>18</u> 32'21	0°44'18
evening set	5822 Sep 05 11:05	1° <u>0</u> 14'52		morning rise	5828 Nov 06 14:58	1° <u>18</u> 33'56	
max. Earth dist.	5822 Sep 21 11:07	2° <u>0</u> 13'26	19.57721 AU	retrograde	5829 Feb 07 01:20	4° <u>18</u> 56'51	
				opposition	5829 Apr 21 17:51	2° <u>18</u> 53'40	0°48'26
conjunction	5822 Sep 22 04:13	2° <u>0</u> 16'03	0°48'16	min. Earth dist.	5829 Apr 22 11:15	2° <u>18</u> 51'46	17.35384 AU
minimum elong	5822 Sep 22 04:13	2° <u>0</u> 16'03	0°48'16	direct	5829 Jul 06 07:52	0° <u>18</u> 47'43	
morning rise	5822 Oct 08 20:43	3° <u>0</u> 17'10		evening set	5829 Oct 09 14:32	4° <u>18</u> 15'35	
retrograde	5823 Jan 10 05:02	6° <u>0</u> 38'59		max. Earth dist.	5829 Oct 25 09:43	5° <u>18</u> 14'21	19.34544 AU
opposition	5823 Mar 25 07:48	4° <u>0</u> 35'59	0°53'53				
min. Earth dist.	5823 Mar 25 22:18	4° <u>0</u> 34'24	17.55434 AU	conjunction	5829 Oct 26 05:39	5° <u>18</u> 17'29	0°42'31
direct	5823 Jun 08 06:19	2° <u>0</u> 31'31		minimum elong	5829 Oct 26 05:39	5° <u>18</u> 17'29	0°42'32
evening set	5823 Sep 10 13:52	5° <u>0</u> 54'57		morning rise	5829 Nov 11 18:19	6° <u>18</u> 19'03	
				retrograde	5830 Feb 12 02:22	9° <u>18</u> 41'58	
conjunction	5823 Sep 27 07:08	6° <u>0</u> 56'19	0°48'25	opposition	5830 Apr 26 17:02	7° <u>18</u> 38'51	0°46'18
minimum elong	5823 Sep 27 07:08	6° <u>0</u> 56'19	0°48'24	min. Earth dist.	5830 Apr 27 09:10	7° <u>18</u> 37'05	17.33931 AU
max. Earth dist.	5823 Sep 26 14:00	6° <u>0</u> 53'40	19.53163 AU	direct	5830 Jul 11 10:18	5° <u>18</u> 32'47	
morning rise	5823 Oct 13 23:11	7° <u>0</u> 57'33		evening set	5830 Oct 14 19:00	9° <u>18</u> 01'06	
retrograde	5824 Jan 15 04:20	11° <u>0</u> 19'42					
opposition	5824 Mar 29 04:08	9° <u>0</u> 16'39	0°53'53	conjunction	5830 Oct 31 09:37	10° <u>18</u> 03'00	0°40'27
min. Earth dist.	5824 Mar 29 18:57	9° <u>0</u> 15'01	17.51021 AU	minimum elong	5830 Oct 31 09:37	10° <u>18</u> 03'00	0°40'28
direct	5824 Jun 12 06:15	7° <u>0</u> 11'54		max. Earth dist.	5830 Oct 30 14:28	10° <u>18</u> 00'00	19.33409 AU
evening set	5824 Sep 14 17:23	10° <u>0</u> 36'16		morning rise	5830 Nov 16 21:24	11° <u>18</u> 04'32	
				retrograde	5831 Feb 17 01:52	14° <u>18</u> 27'26	
conjunction	5824 Oct 01 10:22	11° <u>0</u> 37'46	0°48'14	opposition	5831 May 01 16:43	12° <u>18</u> 24'25	0°43'51
minimum elong	5824 Oct 01 10:22	11° <u>0</u> 37'46	0°48'14	min. Earth dist.	5831 May 02 09:32	12° <u>18</u> 22'34	17.33118 AU
max. Earth dist.	5824 Sep 30 15:20	11° <u>0</u> 34'50	19.48915 AU	direct	5831 Jul 16 10:59	10° <u>18</u> 18'20	
morning rise	5824 Oct 18 02:06	12° <u>0</u> 39'08		evening set	5831 Oct 19 23:41	13° <u>18</u> 47'00	
retrograde	5825 Jan 19 02:18	16° <u>0</u> 01'33					
opposition	5825 Apr 03 01:12	13° <u>0</u> 58'27	0°53'31	conjunction	5831 Nov 05 13:32	14° <u>18</u> 48'53	0°38'06
min. Earth dist.	5825 Apr 03 17:27	13° <u>0</u> 56'40	17.46964 AU	minimum elong	5831 Nov 05 13:32	14° <u>18</u> 48'53	0°38'07
direct	5825 Jun 17 04:58	11° <u>0</u> 53'24		max. Earth dist.	5831 Nov 04 18:06	14° <u>18</u> 45'51	19.32923 AU
evening set	5825 Sep 19 21:00	15° <u>0</u> 18'38			5831 Nov 08 12:22	15° <u>18</u>	
				morning rise	5831 Nov 22 00:38	15° <u>18</u> 50'23	
conjunction	5825 Oct 06 13:52	16° <u>0</u> 20'16	0°47'44	retrograde	5832 Feb 22 02:52	19° <u>18</u> 13'11	
minimum elong	5825 Oct 06 13:52	16° <u>0</u> 20'16	0°47'45	opposition	5832 May 05 16:27	17° <u>18</u> 10'19	0°41'06
max. Earth dist.	5825 Oct 05 18:59	16° <u>0</u> 17'21	19.45051 AU	min. Earth dist.	5832 May 06 08:04	17° <u>18</u> 08'37	17.32932 AU
morning rise	5825 Oct 23 05:03	17° <u>0</u> 21'43		direct	5832 Jul 20 14:04	15° <u>18</u> 04'15	
retrograde	5826 Jan 24 02:30	20° <u>0</u> 44'21		evening set	5832 Oct 24 04:14	18° <u>18</u> 33'13	
opposition	5826 Apr 07 22:39	18° <u>0</u> 41'12	0°52'47				
min. Earth dist.	5826 Apr 08 14:36	18° <u>0</u> 39'27	17.43305 AU	conjunction	5832 Nov 09 17:28	19° <u>18</u> 35'03	0°35'30
direct	5826 Jun 22 06:22	16° <u>0</u> 35'54		minimum elong	5832 Nov 09 17:28	19° <u>18</u> 35'03	0°35'32
evening set	5826 Sep 25 01:08	20° <u>0</u> 01'54		max. Earth dist.	5832 Nov 08 23:20	19° <u>18</u> 32'13	19.33032 AU
				morning rise	5832 Nov 26 03:30	20° <u>18</u> 36'28	
conjunction	5826 Oct 11 17:37	21° <u>0</u> 03'38	0°46'54	retrograde	5833 Feb 26 02:38	23° <u>18</u> 59'08	
minimum elong	5826 Oct 11 17:37	21° <u>0</u> 03'38	0°46'54	opposition	5833 May 10 16:48	21° <u>18</u> 56'28	0°38'04
max. Earth dist.	5826 Oct 10 21:41	21° <u>0</u> 00'32	19.41619 AU	min. Earth dist.	5833 May 11 08:56	21° <u>18</u> 54'42	17.33325 AU
morning rise	5826 Oct 28 08:17	22° <u>0</u> 05'09		direct	5833 Jul 25 15:38	19° <u>18</u> 50'28	
retrograde	5827 Jan 29 01:10	25° <u>0</u> 27'56		evening set	5833 Oct 29 08:35	23° <u>18</u> 19'37	
opposition	5827 Apr 12 20:37	23° <u>0</u> 24'45	0°51'41				
min. Earth dist.	5827 Apr 13 13:50	23° <u>0</u> 22'52	17.40126 AU	conjunction	5833 Nov 14 20:51	24° <u>18</u> 21'21	0°32'40
direct	5827 Jun 27 05:47	21° <u>0</u> 19'11		minimum elong	5833 Nov 14 20:51	24° <u>18</u> 21'21	0°32'41
evening set	5827 Sep 30 05:24	24° <u>0</u> 45'53		max. Earth dist.	5833 Nov 14 02:14	24° <u>18</u> 18'26	19.33705 AU
				morning rise	5833 Dec 01 06:08	25° <u>18</u> 22'40	
conjunction	5827 Oct 16 21:35	25° <u>0</u> 47'42	0°45'45	retrograde	5834 Mar 03 03:04	28° <u>18</u> 45'10	
minimum elong	5827 Oct 16 21:35	25° <u>0</u> 47'42	0°45'46	opposition	5834 May 15 17:14	26° <u>18</u> 42'40	0°34'46
max. Earth dist.	5827 Oct 16 01:44	25° <u>0</u> 44'37	19.38696 AU	min. Earth dist.	5834 May 16 08:17	26° <u>18</u> 41'02	17.34256 AU
morning rise	5827 Nov 02 11:41	26° <u>0</u> 49'16		direct	5834 Jul 30 19:19	24° <u>18</u> 36'46	
	5828 Jan 13 05:00	0° <u>18</u>		evening set	5834 Nov 03 12:41	28° <u>18</u> 05'59	
retrograde	5828 Feb 03 02:02	0° <u>18</u> 12'09		max. Earth dist.	5834 Nov 19 07:13	29° <u>18</u> 04'56	19.34879 AU
	5828 Feb 24 02:45	30° <u>18</u> 0					
opposition	5828 Apr 16 18:57	28° <u>0</u> 08'57	0°50'14	conjunction	5834 Nov 20 00:16	29° <u>18</u> 07'37	0°29'35
min. Earth dist.	5828 Apr 17 11:23	28° <u>0</u> 07'09	17.37464 AU	minimum elong	5834 Nov 20 00:16	29° <u>18</u> 07'37	0°29'37
direct	5828 Jul 01 07:42	26° <u>0</u> 03'10			5834 Dec 03 23:16	0° <u>18</u> 0	
evening set	5828 Oct 04 09:57	29° <u>0</u> 30'29		morning rise	5834 Dec 06 08:26	0° <u>18</u> 08'48	
	5828 Oct 12 09:55	0° <u>18</u>		retrograde	5835 Mar 08 02:31	3° <u>18</u> 31'02	
max. Earth dist.	5828 Oct 20 05:40	0° <u>18</u> 29'15	19.36310 AU	opposition	5835 May 20 17:51	1° <u>18</u> 28'44	0°31'13

min. Earth dist.	5835 May 21 09:11	1° \mathring{A} 27'04	17.35661 AU	retrograde	5841 Apr 04 18:02	1° \mathring{B} 51'02	
	5835 Jun 27 14:34	30° $\mathring{R}\mathring{M}$			5841 Jun 13 19:53	30° $\mathring{R}\mathring{A}$	
direct	5835 Aug 04 22:00	29° \mathring{M} 22'56		opposition	5841 Jun 17 21:06	29° \mathring{A} 49'38	0°06'36
	5835 Sep 11 14:36	0° \mathring{A}		min. Earth dist.	5841 Jun 18 07:29	29° \mathring{A} 48'31	17.52930 AU
evening set	5835 Nov 08 16:40	2° \mathring{A} 52'06		direct	5841 Sep 02 17:17	27° \mathring{A} 44'34	
max. Earth dist.	5835 Nov 24 09:27	3° \mathring{A} 50'49	19.36517 AU		5841 Nov 16 16:39	0° \mathring{B}	
				evening set	5841 Dec 07 02:24	1° \mathring{B} 11'03	
conjunction	5835 Nov 25 03:11	3° \mathring{A} 53'36	0°26'19				
minimum elong	5835 Nov 25 03:11	3° \mathring{A} 53'36	0°26'22	conjunction	5841 Dec 23 07:01	2° \mathring{B} 11'15	0°04'00
morning rise	5835 Dec 11 10:32	4° \mathring{A} 54'38		minimum elong	5841 Dec 23 07:00	2° \mathring{B} 11'15	0°04'01
retrograde	5836 Mar 12 02:05	8° \mathring{A} 16'34		behind sun begin	5841 Dec 23 00:26	2° \mathring{B} 10'15	
opposition	5836 May 24 18:37	6° \mathring{A} 14'26	0°27'28	behind sun end	5841 Dec 23 13:35	2° \mathring{B} 12'15	
min. Earth dist.	5836 May 25 09:05	6° \mathring{A} 12'52	17.37519 AU	max. Earth dist.	5841 Dec 22 19:31	2° \mathring{B} 09'28	19.55047 AU
direct	5836 Aug 09 02:16	4° \mathring{A} 08'44		morning rise	5842 Jan 08 08:22	3° \mathring{B} 11'00	
evening set	5836 Nov 12 19:56	7° \mathring{A} 37'44		retrograde	5842 Apr 09 13:53	6° \mathring{B} 29'58	
				opposition	5842 Jun 22 20:54	4° \mathring{B} 28'40	0°02'14
conjunction	5836 Nov 29 05:40	8° \mathring{A} 39'04	0°22'53	min. Earth dist.	5842 Jun 23 06:38	4° \mathring{B} 27'38	17.57274 AU
minimum elong	5836 Nov 29 05:40	8° \mathring{A} 39'04	0°22'54	direct	5842 Sep 07 17:08	2° \mathring{B} 23'48	
max. Earth dist.	5836 Nov 28 13:41	8° \mathring{A} 36'34	19.38584 AU	evening set	5842 Dec 12 01:11	5° \mathring{B} 49'30	
morning rise	5836 Dec 15 11:50	9° \mathring{A} 39'55					
retrograde	5837 Mar 17 00:54	13° \mathring{A} 01'29		conjunction	5842 Dec 28 04:50	6° \mathring{B} 49'26	0°00'01
opposition	5837 May 29 19:29	10° \mathring{A} 59'32	0°23'32	minimum elong	5842 Dec 28 04:49	6° \mathring{B} 49'26	0°00'03
min. Earth dist.	5837 May 30 09:39	10° \mathring{A} 58'00	17.39784 AU	behind sun begin	5842 Dec 27 23:07	6° \mathring{B} 48'35	
direct	5837 Aug 14 05:58	8° \mathring{A} 53'58		behind sun end	5842 Dec 28 10:31	6° \mathring{B} 50'17	
evening set	5837 Nov 17 22:49	12° \mathring{A} 22'40		max. Earth dist.	5842 Dec 27 19:07	6° \mathring{B} 47'57	19.59616 AU
				desc. node	5842 Dec 28 21:38	6° \mathring{B} 52'03	
conjunction	5837 Dec 04 07:25	13° \mathring{A} 23'49	0°19'17	morning rise	5843 Jan 13 05:12	7° \mathring{B} 48'54	
minimum elong	5837 Dec 04 07:25	13° \mathring{A} 23'49	0°19'19	retrograde	5843 Apr 14 11:48	11° \mathring{B} 07'15	
max. Earth dist.	5837 Dec 03 15:04	13° \mathring{A} 21'15	19.41063 AU	opposition	5843 Jun 27 20:06	9° \mathring{B} 06'07	-0°02'07
morning rise	5837 Dec 20 12:44	14° \mathring{A} 24'29		min. Earth dist.	5843 Jun 28 03:42	9° \mathring{B} 05'18	17.62052 AU
retrograde	5838 Mar 21 23:27	17° \mathring{A} 45'37		direct	5843 Sep 12 19:38	7° \mathring{B} 01'29	
opposition	5838 Jun 03 20:08	15° \mathring{A} 43'49	0°19'27	evening set	5843 Dec 16 23:12	10° \mathring{B} 26'22	
min. Earth dist.	5838 Jun 04 09:36	15° \mathring{A} 42'22	17.42472 AU				
direct	5838 Aug 19 09:15	13° \mathring{A} 38'21		conjunction	5844 Jan 02 01:48	11° \mathring{B} 26'01	-0°03'57
evening set	5838 Nov 23 00:49	17° \mathring{A} 06'39		minimum elong	5844 Jan 02 01:46	11° \mathring{B} 26'01	0°03'56
				behind sun begin	5844 Jan 01 19:13	11° \mathring{B} 25'01	
conjunction	5838 Dec 09 08:36	18° \mathring{A} 07'36	0°15'34	behind sun end	5844 Jan 02 08:20	11° \mathring{B} 27'00	
minimum elong	5838 Dec 09 08:36	18° \mathring{A} 07'36	0°15'35	max. Earth dist.	5844 Jan 01 17:34	11° \mathring{B} 24'45	19.64615 AU
behind sun begin	5838 Dec 09 07:03	18° \mathring{A} 07'22		morning rise	5844 Jan 18 01:12	12° \mathring{B} 25'12	
behind sun end	5838 Dec 09 10:09	18° \mathring{A} 07'50		retrograde	5844 Apr 18 06:04	15° \mathring{B} 42'57	
max. Earth dist.	5838 Dec 08 18:04	18° \mathring{A} 05'20	19.43953 AU	opposition	5844 Jul 01 19:13	13° \mathring{B} 41'59	-0°06'26
morning rise	5838 Dec 25 12:50	19° \mathring{A} 08'04		min. Earth dist.	5844 Jul 02 02:11	13° \mathring{B} 41'15	17.67270 AU
retrograde	5839 Mar 26 22:05	22° \mathring{A} 28'43		direct	5844 Sep 16 18:35	11° \mathring{B} 37'39	
opposition	5839 Jun 08 20:43	20° \mathring{A} 27'03	0°15'14	evening set	5844 Dec 20 20:08	15° \mathring{B} 01'40	
min. Earth dist.	5839 Jun 09 09:17	20° \mathring{A} 25'42	17.45546 AU				
direct	5839 Aug 24 12:43	18° \mathring{A} 21'43		conjunction	5845 Jan 05 21:41	16° \mathring{B} 01'00	-0°07'47
evening set	5839 Nov 28 02:18	21° \mathring{A} 49'30		minimum elong	5845 Jan 05 21:42	16° \mathring{B} 01'00	0°07'45
				behind sun begin	5845 Jan 05 15:43	16° \mathring{B} 00'06	
conjunction	5839 Dec 14 08:57	22° \mathring{A} 50'13	0°11'45	behind sun end	5845 Jan 06 03:41	16° \mathring{B} 01'55	
minimum elong	5839 Dec 14 08:56	22° \mathring{A} 50'13	0°11'47	max. Earth dist.	5845 Jan 05 15:04	16° \mathring{B} 00'00	19.70040 AU
behind sun begin	5839 Dec 14 04:16	22° \mathring{A} 49'30		morning rise	5845 Jan 21 20:17	16° \mathring{B} 59'55	
behind sun end	5839 Dec 14 13:37	22° \mathring{A} 50'56		retrograde	5845 Apr 23 02:47	20° \mathring{B} 17'04	
max. Earth dist.	5839 Dec 13 18:33	22° \mathring{A} 47'59	19.47232 AU	opposition	5845 Jul 06 17:47	18° \mathring{B} 16'18	-0°10'41
morning rise	5839 Dec 30 12:15	23° \mathring{A} 50'28		min. Earth dist.	5845 Jul 06 22:18	18° \mathring{B} 15'50	17.72869 AU
retrograde	5840 Mar 30 19:30	27° \mathring{A} 10'35		direct	5845 Sep 21 20:23	16° \mathring{B} 12'19	
opposition	5840 Jun 12 21:00	25° \mathring{A} 09'03	0°10'57	evening set	5845 Dec 25 16:17	19° \mathring{B} 35'24	
min. Earth dist.	5840 Jun 13 09:00	25° \mathring{A} 07'46	17.49033 AU				
direct	5840 Aug 28 14:16	23° \mathring{A} 03'50		conjunction	5846 Jan 10 16:54	20° \mathring{B} 34'26	-0°11'33
evening set	5840 Dec 02 02:48	26° \mathring{A} 31'01		minimum elong	5846 Jan 10 16:54	20° \mathring{B} 34'26	0°11'30
				behind sun begin	5846 Jan 10 12:06	20° \mathring{B} 33'43	
conjunction	5840 Dec 18 08:31	27° \mathring{A} 31'30	0°07'53	behind sun end	5846 Jan 10 21:42	20° \mathring{B} 35'10	
minimum elong	5840 Dec 18 08:31	27° \mathring{A} 31'30	0°07'56	max. Earth dist.	5846 Jan 10 12:10	20° \mathring{B} 33'44	19.75809 AU
behind sun begin	5840 Dec 18 02:33	27° \mathring{A} 30'35		morning rise	5846 Jan 26 14:36	21° \mathring{B} 33'04	
behind sun end	5840 Dec 18 14:29	27° \mathring{A} 32'24		retrograde	5846 Apr 27 19:48	24° \mathring{B} 49'36	
max. Earth dist.	5840 Dec 17 20:03	27° \mathring{A} 29'33	19.50931 AU	opposition	5846 Jul 11 15:56	22° \mathring{B} 49'04	-0°14'49
morning rise	5841 Jan 03 10:47	28° \mathring{A} 31'29		min. Earth dist.	5846 Jul 11 20:05	22° \mathring{B} 48'38	17.78792 AU
	5841 Jan 29 06:39	0° \mathring{B}		direct	5846 Sep 26 18:08	20° \mathring{B} 45'26	

evening set	5846 Dec 30 11:35	24°  07'34	direct	5852 Oct 24 00:58	17°  29'08
			evening set	5853 Jan 25 12:39	20°  44'44
conjunction	5847 Jan 15 11:13	25°  06'18 -0°15'13			
minimum elong	5847 Jan 15 11:13	25°  06'18 0°15'12	conjunction	5853 Feb 10 07:22	21°  41'38 -0°34'16
behind sun begin	5847 Jan 15 08:55	25°  05'57	minimum elong	5853 Feb 10 07:22	21°  41'38 0°34'14
behind sun end	5847 Jan 15 13:31	25°  06'39	max. Earth dist.	5853 Feb 10 11:06	21°  42'11 20.20047 AU
max. Earth dist.	5847 Jan 15 07:31	25°  05'44 19.81866 AU	morning rise	5853 Feb 26 00:42	22°  38'18
morning rise	5847 Jan 31 08:13	26°  04'38	retrograde	5853 May 28 14:14	25°  50'32
retrograde	5847 May 02 15:14	29°  02'33	opposition	5853 Aug 12 13:00	23°  51'10 -0°39'25
opposition	5847 Jul 16 13:35	27°  02'15 -0°18'51	min. Earth dist.	5853 Aug 12 07:41	23°  51'43 18.23162 AU
min. Earth dist.	5847 Jul 16 15:22	27°  02'04 17.84950 AU	direct	5853 Oct 28 19:35	21°  49'59
direct	5847 Oct 01 18:42	25°  01'00	evening set	5854 Jan 30 01:33	25°  40'26
evening set	5848 Jan 04 05:59	28°  03'07			
conjunction	5848 Jan 20 04:44	29°  03'32 -0°18'47	conjunction	5854 Feb 14 19:49	26°  01'03 -0°36'47
minimum elong	5848 Jan 20 04:43	29°  03'32 0°18'45	minimum elong	5854 Feb 14 19:49	26°  01'03 0°36'46
max. Earth dist.	5848 Jan 20 03:04	29°  03'17 19.88108 AU	max. Earth dist.	5854 Feb 15 01:50	26°  01'57 20.26269 AU
	5848 Jan 26 13:18	0°  00	morning rise	5854 Mar 02 12:37	26°  57'28
morning rise	5848 Feb 05 00:50	0°  34'36		5854 May 14 13:06	0°  00
retrograde	5848 May 06 07:11	3°  49'54	retrograde	5854 Jun 02 02:46	0°  09'04
opposition	5848 Jul 20 10:59	1°  49'48 -0°22'45		5854 Jun 21 01:28	30°  00
min. Earth dist.	5848 Jul 20 12:31	1°  49'39 17.91269 AU	opposition	5854 Aug 17 06:32	28°  09'47 -0°42'05
	5848 Sep 12 19:42	30°  00	min. Earth dist.	5854 Aug 17 00:44	28°  10'23 18.29347 AU
direct	5848 Oct 05 15:34	29°  04'56	direct	5854 Nov 02 12:14	26°  08'54
	5848 Oct 28 04:09	0°  00	evening set	5855 Feb 03 13:37	29°  22'12
evening set	5849 Jan 07 23:34	3°  07'00		5855 Feb 14 03:56	0°  00
conjunction	5849 Jan 23 21:20	4°  05'07 -0°22'13	conjunction	5855 Feb 19 07:11	0°  18'32 -0°39'04
minimum elong	5849 Jan 23 21:20	4°  05'07 0°22'12	minimum elong	5855 Feb 19 07:11	0°  18'31 0°39'03
max. Earth dist.	5849 Jan 23 20:22	4°  04'58 19.94488 AU	max. Earth dist.	5855 Feb 19 13:28	0°  19'28 20.32426 AU
morning rise	5849 Feb 08 16:51	5°  02'53	morning rise	5855 Mar 06 23:49	1°  14'42
retrograde	5849 May 11 01:26	8°  17'35	retrograde	5855 Jun 06 16:43	4°  25'43
opposition	5849 Jul 25 07:42	6°  17'41 -0°26'29	opposition	5855 Aug 21 23:25	2°  26'29 -0°44'28
min. Earth dist.	5849 Jul 25 06:57	6°  17'45 17.97689 AU	min. Earth dist.	5855 Aug 21 15:40	2°  27'17 18.35487 AU
direct	5849 Oct 10 14:04	4°  15'10	direct	5855 Nov 07 04:55	0°  25'53
evening set	5850 Jan 12 16:06	7°  34'09	evening set	5856 Feb 08 00:35	3°  38'03
conjunction	5850 Jan 28 13:09	8°  31'58 -0°25'30	conjunction	5856 Feb 23 17:47	4°  34'07 -0°41'07
minimum elong	5850 Jan 28 13:09	8°  31'58 0°25'29	minimum elong	5856 Feb 23 17:47	4°  34'07 0°41'07
max. Earth dist.	5850 Jan 28 14:16	8°  32'08 20.00922 AU	max. Earth dist.	5856 Feb 24 02:38	4°  35'27 20.38536 AU
morning rise	5850 Feb 13 07:54	9°  29'27	morning rise	5856 Mar 10 09:58	5°  30'04
retrograde	5850 May 15 16:31	12°  43'31	retrograde	5856 Jun 10 04:21	8°  40'31
opposition	5850 Jul 30 04:01	10°  43'48 -0°30'02	opposition	5856 Aug 25 15:47	6°  41'22 -0°46'36
min. Earth dist.	5850 Jul 30 03:05	10°  43'54 18.04132 AU	min. Earth dist.	5856 Aug 25 07:06	6°  42'15 18.41582 AU
direct	5850 Oct 15 09:53	8°  41'40	direct	5856 Nov 10 19:41	4°  41'06
evening set	5851 Jan 17 07:57	11°  59'33	evening set	5857 Feb 11 10:57	7°  52'09
conjunction	5851 Feb 02 04:05	12°  57'02 -0°28'37	conjunction	5857 Feb 27 03:34	8°  47'57 -0°42'55
minimum elong	5851 Feb 02 04:05	12°  57'02 0°28'35	minimum elong	5857 Feb 27 03:34	8°  47'57 0°42'55
max. Earth dist.	5851 Feb 02 05:28	12°  57'15 20.07358 AU	max. Earth dist.	5857 Feb 27 12:45	8°  49'19 20.44616 AU
morning rise	5851 Feb 17 22:23	13°  54'15	morning rise	5857 Mar 14 19:44	9°  43'41
	5851 Mar 09 05:27	15°  00	retrograde	5857 Jun 14 17:15	12°  53'37
retrograde	5851 May 20 09:06	17°  07'42	opposition	5857 Aug 30 07:18	10°  54'33 -0°48'27
opposition	5851 Aug 03 23:31	15°  08'08 -0°33'23	min. Earth dist.	5857 Aug 29 20:48	10°  55'37 18.47650 AU
min. Earth dist.	5851 Aug 03 20:30	15°  08'26 18.10547 AU	direct	5857 Nov 15 10:33	8°  54'37
	5851 Aug 07 06:28	15°  00	evening set	5858 Feb 15 20:21	12°  04'36
direct	5851 Oct 20 06:28	13°  06'19	conjunction	5858 Mar 03 12:49	13°  00'11 -0°44'29
	5851 Dec 28 00:33	15°  00	minimum elong	5858 Mar 03 12:48	13°  00'11 0°44'29
evening set	5852 Jan 21 22:48	16°  23'05	max. Earth dist.	5858 Mar 04 00:26	13°  01'55 20.50644 AU
conjunction	5852 Feb 06 18:19	17°  20'17 -0°31'32	morning rise	5858 Mar 19 04:42	13°  55'42
minimum elong	5852 Feb 06 18:19	17°  20'17 0°31'32	retrograde	5858 Jun 19 04:34	17°  05'09
max. Earth dist.	5852 Feb 06 21:49	17°  20'48 20.13737 AU	opposition	5858 Sep 03 22:16	15°  06'12 -0°50'02
morning rise	5852 Feb 22 11:56	18°  17'13	min. Earth dist.	5858 Sep 03 10:50	15°  07'21 18.53629 AU
retrograde	5852 May 23 23:08	21°  30'03	direct	5858 Nov 19 23:59	13°  06'37
opposition	5852 Aug 07 18:41	19°  30'36 -0°36'31	evening set	5859 Feb 20 05:16	16°  15'35
min. Earth dist.	5852 Aug 07 15:21	19°  30'57 18.16892 AU	conjunction	5859 Mar 07 21:15	17°  10'55 -0°45'48

minimum elong	5859 Mar 07 21:14	17° ✕ 10'55	0°45'49	opposition	5865 Oct 03 15:51	13° Υ 52'41	-0°53'28
max. Earth dist.	5859 Mar 08 09:02	17° ✕ 12'40	20.56569 AU	min. Earth dist.	5865 Oct 02 23:32	13° Υ 54'19	18.88654 AU
morning rise	5859 Mar 23 13:14	18° ✕ 06'16		direct	5865 Dec 19 07:17	11° Υ 55'11	
retrograde	5859 Jun 23 16:20	21° ✕ 15'15		evening set	5866 Mar 20 04:37	14° Υ 58'05	
opposition	5859 Sep 08 12:37	19° ✕ 16'25	-0°51'21				
min. Earth dist.	5859 Sep 07 23:48	19° ✕ 17'43	18.59492 AU	conjunction	5866 Apr 04 20:37	15° Υ 52'17	-0°48'07
direct	5859 Nov 24 13:09	17° ✕ 17'12		minimum elong	5866 Apr 04 20:37	15° Υ 52'17	0°48'08
evening set	5860 Feb 24 13:25	20° ✕ 25'11		max. Earth dist.	5866 Apr 05 14:11	15° Υ 54'51	20.90373 AU
				morning rise	5866 Apr 20 13:50	16° Υ 46'43	
conjunction	5860 Mar 11 05:20	21° ✕ 20'19	-0°46'53	retrograde	5866 Jul 22 12:25	19° Υ 53'24	
minimum elong	5860 Mar 11 05:20	21° ✕ 20'19	0°46'52	min. Earth dist.	5866 Oct 07 09:40	17° Υ 56'38	18.92035 AU
max. Earth dist.	5860 Mar 11 19:23	21° ✕ 22'24	20.62342 AU	opposition	5866 Oct 08 02:35	17° Υ 54'57	-0°52'52
morning rise	5860 Mar 26 21:09	22° ✕ 15'28		direct	5866 Dec 23 17:37	15° Υ 57'37	
retrograde	5860 Jun 27 03:22	25° ✕ 24'03		evening set	5867 Mar 24 09:44	18° Υ 59'47	
opposition	5860 Sep 12 02:30	23° ✕ 25'20	-0°52'23				
min. Earth dist.	5860 Sep 11 12:47	23° ✕ 26'43	18.65163 AU	conjunction	5867 Apr 09 01:47	19° Υ 53'54	-0°47'29
direct	5860 Nov 28 01:55	21° ✕ 26'29		minimum elong	5867 Apr 09 01:47	19° Υ 53'54	0°47'29
evening set	5861 Feb 27 21:03	24° ✕ 33'30		max. Earth dist.	5867 Apr 09 18:39	19° Υ 56'20	20.93531 AU
				morning rise	5867 Apr 24 19:37	20° Υ 48'15	
conjunction	5861 Mar 15 12:40	25° ✕ 28'26	-0°47'42	retrograde	5867 Jul 26 21:00	23° Υ 54'44	
minimum elong	5861 Mar 15 12:40	25° ✕ 28'26	0°47'43	opposition	5867 Oct 12 12:57	21° Υ 56'11	-0°52'02
max. Earth dist.	5861 Mar 16 02:40	25° ✕ 30'30	20.67901 AU	min. Earth dist.	5867 Oct 11 20:06	21° Υ 57'52	18.94985 AU
morning rise	5861 Mar 31 04:45	26° ✕ 23'26		direct	5867 Dec 28 01:13	19° Υ 58'58	
retrograde	5861 Jul 01 14:00	29° ✕ 31'39		evening set	5868 Mar 27 14:24	23° Υ 00'29	
opposition	5861 Sep 16 15:49	27° ✕ 33'02	-0°53'09				
min. Earth dist.	5861 Sep 16 01:13	27° ✕ 34'30	18.70600 AU	conjunction	5868 Apr 12 06:55	23° Υ 54'32	-0°46'36
direct	5861 Dec 02 13:23	25° ✕ 34'30		minimum elong	5868 Apr 12 06:55	23° Υ 54'32	0°46'38
evening set	5862 Mar 04 04:10	28° ✕ 40'37		max. Earth dist.	5868 Apr 13 01:15	23° Υ 57'11	20.96275 AU
				morning rise	5868 Apr 28 01:05	24° Υ 48'50	
conjunction	5862 Mar 19 19:51	29° ✕ 35'23	-0°48'17	retrograde	5868 Jul 30 04:22	27° Υ 55'07	
minimum elong	5862 Mar 19 19:51	29° ✕ 35'23	0°48'16	opposition	5868 Oct 15 22:43	25° Υ 56'30	-0°50'55
max. Earth dist.	5862 Mar 20 11:44	29° ✕ 37'43	20.73180 AU	min. Earth dist.	5868 Oct 15 05:02	25° Υ 58'16	18.97534 AU
	5862 Mar 26 19:27	0° Υ		direct	5868 Dec 31 10:12	23° Υ 59'24	
morning rise	5862 Apr 04 11:54	0° Υ 30'14		evening set	5869 Mar 31 18:54	27° Υ 00'19	
retrograde	5862 Jul 06 00:19	3° Υ 38'05					
opposition	5862 Sep 21 04:26	1° Υ 39'34	-0°53'38	conjunction	5869 Apr 16 11:38	27° Υ 54'18	-0°45'30
min. Earth dist.	5862 Sep 20 13:10	1° Υ 41'06	18.75713 AU	minimum elong	5869 Apr 16 11:38	27° Υ 54'18	0°45'31
	5862 Nov 09 07:49	30° ✕		max. Earth dist.	5869 Apr 17 05:22	27° Υ 56'51	20.98643 AU
direct	5862 Dec 07 01:24	29° ✕ 41'22		morning rise	5869 May 02 06:32	28° Υ 48'35	
	5863 Jan 03 04:43	0° Υ			5869 May 24 14:47	0° ♄	
evening set	5863 Mar 08 11:01	2° Υ 46'37		retrograde	5869 Aug 03 12:32	1° ♄ 54'43	
					5869 Oct 18 16:20	30° ✕ Υ	
conjunction	5863 Mar 24 02:29	3° Υ 41'13	-0°48'36	opposition	5869 Oct 20 08:07	29° Υ 56'02	-0°49'35
minimum elong	5863 Mar 24 02:29	3° Υ 41'13	0°48'37	min. Earth dist.	5869 Oct 19 14:37	29° Υ 57'47	18.99734 AU
max. Earth dist.	5863 Mar 24 17:56	3° Υ 43'29	20.78117 AU	direct	5870 Jan 04 16:37	27° Υ 59'02	
morning rise	5863 Apr 08 18:53	4° Υ 35'56			5870 Mar 17 12:54	0° ♄	
retrograde	5863 Jul 10 09:52	7° Υ 43'28		evening set	5870 Apr 04 23:06	0° ♄ 59'27	
opposition	5863 Sep 25 16:47	5° Υ 45'00	-0°53'51				
min. Earth dist.	5863 Sep 25 01:06	5° Υ 46'35	18.80469 AU	conjunction	5870 Apr 20 16:23	1° ♄ 53'24	-0°44'11
direct	5863 Dec 11 11:21	3° Υ 47'05		minimum elong	5870 Apr 20 16:24	1° ♄ 53'24	0°44'12
evening set	5864 Mar 11 17:09	6° Υ 51'30		max. Earth dist.	5870 Apr 21 11:31	1° ♄ 56'09	21.00666 AU
				morning rise	5870 May 06 11:41	2° ♄ 47'40	
conjunction	5864 Mar 27 08:49	7° Υ 45'57	-0°48'41	retrograde	5870 Aug 07 19:56	5° ♄ 53'43	
minimum elong	5864 Mar 27 08:49	7° Υ 45'57	0°48'41	opposition	5870 Oct 24 16:56	3° ♄ 54'59	-0°48'00
max. Earth dist.	5864 Mar 28 01:52	7° Υ 48'27	20.82657 AU	min. Earth dist.	5870 Oct 23 22:35	3° ♄ 56'49	19.01585 AU
morning rise	5864 Apr 12 01:19	8° Υ 40'34		direct	5871 Jan 09 00:26	1° ♄ 58'06	
retrograde	5864 Jul 13 19:17	11° Υ 47'48		evening set	5871 Apr 09 03:21	4° ♄ 58'05	
opposition	5864 Sep 29 04:37	9° Υ 49'22	-0°53'47				
min. Earth dist.	5864 Sep 28 12:18	9° Υ 51'00	18.84787 AU	conjunction	5871 Apr 24 20:56	5° ♄ 52'01	-0°42'39
direct	5864 Dec 14 22:44	7° Υ 51'42		minimum elong	5871 Apr 24 20:56	5° ♄ 52'01	0°42'40
evening set	5865 Mar 15 23:11	10° Υ 55'19		max. Earth dist.	5871 Apr 25 15:22	5° ♄ 54'40	21.02355 AU
				morning rise	5871 May 10 17:01	6° ♄ 46'18	
conjunction	5865 Mar 31 14:48	11° Υ 49'39	-0°48'32	retrograde	5871 Aug 12 03:38	9° ♄ 52'19	
minimum elong	5865 Mar 31 14:48	11° Υ 49'39	0°48'31	min. Earth dist.	5871 Oct 28 07:43	7° ♄ 55'20	19.03113 AU
max. Earth dist.	5865 Apr 01 07:06	11° Υ 52'01	20.86748 AU	opposition	5871 Oct 29 01:43	7° ♄ 53'33	-0°46'11
morning rise	5865 Apr 16 07:48	12° Υ 44'09		direct	5872 Jan 13 05:49	5° ♄ 56'46	
retrograde	5865 Jul 18 04:15	15° Υ 51'07		evening set	5872 Apr 12 07:14	8° ♄ 56'24	

conjunction	5872 Apr 28 01:31	9°850'21 -0°40'55	minimum elong	5878 May 22 09:22	3°II42'50 0°26'50
minimum elong	5872 Apr 28 01:32	9°850'21 0°40'56	max. Earth dist.	5878 May 23 02:57	3°II45'21 21.03061 AU
max. Earth dist.	5872 Apr 28 21:17	9°853'12 21.03711 AU	morning rise	5878 Jun 07 10:44	4°II37'39
morning rise	5872 May 13 22:09	10°844'40	retrograde	5878 Sep 09 14:12	7°II44'40
retrograde	5872 Aug 15 11:47	13°850'42	opposition	5878 Nov 26 10:00	5°II45'38 -0°27'59
opposition	5872 Nov 01 10:06	11°851'54 -0°44'10	min. Earth dist.	5878 Nov 25 17:54	5°II47'15 19.02194 AU
min. Earth dist.	5872 Oct 31 15:21	11°853'46 19.04284 AU	direct	5879 Feb 09 22:13	3°II49'11
direct	5873 Jan 16 12:59	9°855'15	evening set	5879 May 10 16:44	6°II48'19
evening set	5873 Apr 16 11:28	12°854'37			
conjunction	5873 May 02 06:11	13°848'35 -0°39'00	conjunction	5879 May 26 15:43	7°II42'48 -0°23'54
minimum elong	5873 May 02 06:11	13°848'35 0°39'02	minimum elong	5879 May 26 15:43	7°II42'48 0°23'56
max. Earth dist.	5873 May 03 01:00	13°851'17 21.04703 AU	max. Earth dist.	5879 May 27 07:27	7°II45'03 21.01156 AU
morning rise	5873 May 18 03:42	14°842'56	morning rise	5879 Jun 11 18:08	8°II37'46
	5873 May 23 06:41	15°8	retrograde	5879 Sep 13 22:41	11°II45'02
retrograde	5873 Aug 19 19:09	17°849'02	opposition	5879 Nov 30 17:58	9°II45'50 -0°24'43
opposition	5873 Nov 05 18:16	15°850'14 -0°41'56	min. Earth dist.	5879 Nov 30 03:33	9°II47'17 19.00024 AU
min. Earth dist.	5873 Nov 05 00:18	15°852'01 19.05090 AU	direct	5880 Feb 14 03:04	7°II49'15
	5873 Nov 27 09:23	15°88	evening set	5880 May 13 22:29	10°II48'32
direct	5874 Jan 20 17:37	13°853'40	conjunction	5880 May 29 22:31	11°II43'10 -0°20'53
	5874 Mar 13 16:10	15°8	minimum elong	5880 May 29 22:31	11°II43'10 0°20'56
evening set	5874 Apr 20 15:38	16°852'51	max. Earth dist.	5880 May 30 14:25	11°II45'26 20.98738 AU
conjunction	5874 May 06 11:08	17°846'52 -0°36'54	morning rise	5880 Jun 15 01:42	12°II38'16
minimum elong	5874 May 06 11:08	17°846'52 0°36'55	retrograde	5880 Sep 17 08:50	15°II45'49
max. Earth dist.	5874 May 07 06:54	17°849'42 21.05311 AU	min. Earth dist.	5880 Dec 03 11:15	13°II47'54 18.97353 AU
morning rise	5874 May 22 09:15	18°841'17	opposition	5880 Dec 04 01:43	13°II46'26 -0°21'19
retrograde	5874 Aug 24 03:47	21°847'29	direct	5881 Feb 17 10:15	11°II49'41
min. Earth dist.	5874 Nov 09 07:49	19°850'31 19.05481 AU	evening set	5881 May 18 04:54	14°II49'11
opposition	5874 Nov 10 02:17	19°848'40 -0°39'30	conjunction	5881 Jun 03 05:37	15°II43'58 -0°17'46
direct	5875 Jan 25 00:09	17°852'13	minimum elong	5881 Jun 03 05:37	15°II43'58 0°17'47
evening set	5875 Apr 24 20:02	20°851'15	max. Earth dist.	5881 Jun 03 19:45	15°II45'59 20.95847 AU
conjunction	5875 May 10 16:00	21°845'20 -0°34'37	morning rise	5881 Jun 19 09:51	16°II39'14
minimum elong	5875 May 10 16:01	21°845'20 0°34'39	retrograde	5881 Sep 21 17:16	19°II47'05
max. Earth dist.	5875 May 11 10:35	21°847'59 21.05489 AU	opposition	5881 Dec 08 09:29	17°II47'30 -0°17'49
morning rise	5875 May 26 15:03	22°839'50	min. Earth dist.	5881 Dec 07 20:47	17°II48'47 18.94257 AU
retrograde	5875 Aug 28 11:28	25°846'12	direct	5882 Feb 21 14:45	15°II50'34
opposition	5875 Nov 14 10:25	23°847'22 -0°36'53	evening set	5882 May 22 11:30	18°II50'20
min. Earth dist.	5875 Nov 13 17:03	23°849'06 19.05437 AU	conjunction	5882 Jun 07 13:15	19°II45'17 -0°14'33
direct	5876 Jan 29 04:52	21°850'59	minimum elong	5882 Jun 07 13:15	19°II45'17 0°14'35
evening set	5876 Apr 28 00:41	24°849'57	behind sun begin	5882 Jun 07 10:25	19°II44'54
conjunction	5876 May 13 21:31	25°844'07 -0°32'10	behind sun end	5882 Jun 07 16:05	19°II45'41
minimum elong	5876 May 13 21:31	25°844'07 0°32'11	max. Earth dist.	5882 Jun 08 03:36	19°II47'21 20.92562 AU
max. Earth dist.	5876 May 14 16:40	25°846'51 21.05208 AU	morning rise	5882 Jun 23 18:13	20°II40'44
morning rise	5876 May 29 21:13	26°838'42	retrograde	5882 Sep 26 04:16	23°II48'55
retrograde	5876 Aug 31 20:32	29°845'16	opposition	5882 Dec 12 17:17	21°II49'09 -0°14'12
opposition	5876 Nov 17 18:13	27°846'24 -0°34'05	min. Earth dist.	5882 Dec 12 04:23	21°II50'27 18.90787 AU
min. Earth dist.	5876 Nov 17 00:39	27°848'09 19.04899 AU	direct	5883 Feb 25 22:22	19°II52'00
direct	5877 Feb 01 10:52	25°850'03	evening set	5883 May 26 18:37	22°II52'08
evening set	5877 May 02 05:47	28°849'01	conjunction	5883 Jun 11 21:05	23°II47'16 -0°11'15
conjunction	5877 May 18 03:12	29°843'16 -0°29'33	minimum elong	5883 Jun 11 21:05	23°II47'16 0°11'16
minimum elong	5877 May 18 03:12	29°843'16 0°29'35	behind sun begin	5883 Jun 11 16:12	23°II46'35
max. Earth dist.	5877 May 18 20:39	29°845'46 21.04409 AU	behind sun end	5883 Jun 12 01:58	23°II47'57
	5877 May 22 23:59	0°II	max. Earth dist.	5883 Jun 12 09:49	23°II49'05 20.88929 AU
morning rise	5877 Jun 03 03:54	0°II37'58	morning rise	5883 Jun 28 03:06	24°II42'54
retrograde	5877 Sep 05 04:47	3°II44'46	retrograde	5883 Sep 30 13:17	27°II51'29
min. Earth dist.	5877 Nov 21 10:11	1°II47'26 19.03831 AU	opposition	5883 Dec 17 01:25	25°II51'30 -0°10'31
opposition	5877 Nov 22 02:13	1°II45'49 -0°31'07	min. Earth dist.	5883 Dec 16 14:12	25°II52'39 18.87002 AU
	5878 Jan 16 03:13	30°88	direct	5884 Mar 01 03:12	23°II54'09
direct	5878 Feb 05 15:50	29°849'26	evening set	5884 May 30 02:15	26°II54'43
	5878 Feb 25 22:33	0°II	conjunction	5884 Jun 15 05:48	27°II50'03 -0°07'54
evening set	5878 May 06 11:01	2°II48'28	minimum elong	5884 Jun 15 05:47	27°II50'03 0°07'56
conjunction	5878 May 22 09:22	3°II42'50 -0°26'48	behind sun begin	5884 Jun 14 23:50	27°II49'13
			behind sun end	5884 Jun 15 11:45	27°II50'53

max. Earth dist.	5884 Jun 15 18:38	27° Π 51'53	20.85000 AU	opposition	5890 Jan 10 06:42	20° \mathfrak{D} 29'49	0°12'26
morning rise	5884 Jul 01 12:34	28° Π 45'53		min. Earth dist.	5890 Jan 10 01:37	20° \mathfrak{D} 30'20	18.58649 AU
	5884 Jul 24 19:39	0° \mathfrak{D}		direct	5890 Mar 25 23:41	18° \mathfrak{D} 31'11	
retrograde	5884 Oct 04 00:52	1° \mathfrak{D} 54'53		evening set	5890 Jun 24 15:26	21° \mathfrak{D} 35'57	
	5884 Dec 18 05:55	30° \mathfrak{R} Π					
opposition	5884 Dec 20 09:22	29° Π 54'44	-0°06'45	conjunction	5890 Jul 11 00:20	22° \mathfrak{D} 32'47	0°12'57
min. Earth dist.	5884 Dec 19 22:00	29° Π 55'54	18.82926 AU	minimum elong	5890 Jul 11 00:20	22° \mathfrak{D} 32'47	0°12'56
direct	5885 Mar 05 11:05	27° Π 57'10		behind sun begin	5890 Jul 10 20:18	22° \mathfrak{D} 32'12	
	5885 May 16 10:04	0° \mathfrak{D}		behind sun end	5890 Jul 11 04:21	22° \mathfrak{D} 33'21	
evening set	5885 Jun 03 10:39	0° \mathfrak{D} 58'15		max. Earth dist.	5890 Jul 11 05:55	22° \mathfrak{D} 33'35	20.55846 AU
				morning rise	5890 Jul 27 12:05	23° \mathfrak{D} 30'03	
conjunction	5885 Jun 19 14:57	1° \mathfrak{D} 53'48	-0°04'29	retrograde	5890 Oct 30 04:28	26° \mathfrak{D} 42'25	
minimum elong	5885 Jun 19 14:57	1° \mathfrak{D} 53'48	0°04'31	opposition	5891 Jan 14 16:59	24° \mathfrak{D} 41'31	0°16'14
behind sun begin	5885 Jun 19 08:25	1° \mathfrak{D} 52'54		min. Earth dist.	5891 Jan 14 12:18	24° \mathfrak{D} 42'01	18.52933 AU
behind sun end	5885 Jun 19 21:29	1° \mathfrak{D} 54'43		direct	5891 Mar 30 09:39	22° \mathfrak{D} 42'37	
max. Earth dist.	5885 Jun 20 01:59	1° \mathfrak{D} 55'23	20.80789 AU	evening set	5891 Jun 29 04:37	25° \mathfrak{D} 48'18	
morning rise	5885 Jul 05 22:45	2° \mathfrak{D} 49'52					
retrograde	5885 Oct 08 11:09	5° \mathfrak{D} 59'19		conjunction	5891 Jul 15 14:17	26° \mathfrak{D} 45'24	0°16'21
opposition	5885 Dec 24 17:51	3° \mathfrak{D} 59'01	-0°02'57	minimum elong	5891 Jul 15 14:17	26° \mathfrak{D} 45'24	0°16'19
min. Earth dist.	5885 Dec 24 08:18	4° \mathfrak{D} 00'00	18.78587 AU	max. Earth dist.	5891 Jul 15 17:39	26° \mathfrak{D} 45'53	20.49964 AU
direct	5886 Mar 09 16:37	2° \mathfrak{D} 01'14		morning rise	5891 Aug 01 02:52	27° \mathfrak{D} 42'57	
evening set	5886 Jun 07 19:27	5° \mathfrak{D} 02'55			5891 Sep 16 19:54	0° Ω	
				retrograde	5891 Nov 03 18:04	0° Ω 55'58	
conjunction	5886 Jun 24 00:49	5° \mathfrak{D} 58'42	-0°01'00		5891 Dec 22 16:34	30° \mathfrak{R} \mathfrak{D}	
minimum elong	5886 Jun 24 00:47	5° \mathfrak{D} 58'42	0°01'02	opposition	5892 Jan 19 03:57	28° \mathfrak{D} 54'54	0°19'58
behind sun begin	5886 Jun 23 18:08	5° \mathfrak{D} 57'46		min. Earth dist.	5892 Jan 19 01:45	28° \mathfrak{D} 55'08	18.46895 AU
behind sun end	5886 Jun 24 07:27	5° \mathfrak{D} 59'38		direct	5892 Apr 02 19:01	26° \mathfrak{D} 55'40	
max. Earth dist.	5886 Jun 24 11:44	6° \mathfrak{D} 00'16	20.76327 AU	evening set	5892 Jul 02 18:43	0° Ω 02'18	
morning rise	5886 Jul 10 09:18	6° \mathfrak{D} 54'58			5892 Jul 02 02:36	0° Ω	
asc. node	5886 Oct 04 18:26	10° \mathfrak{D} 03'17					
retrograde	5886 Oct 12 23:24	10° \mathfrak{D} 04'56		conjunction	5892 Jul 19 05:21	0° Ω 59'42	0°19'41
opposition	5886 Dec 29 02:26	8° \mathfrak{D} 04'31	0°00'53	minimum elong	5892 Jul 19 05:20	0° Ω 59'42	0°19'39
min. Earth dist.	5886 Dec 28 16:46	8° \mathfrak{D} 05'30	18.73994 AU	max. Earth dist.	5892 Jul 19 07:24	1° Ω 00'00	20.43782 AU
direct	5887 Mar 14 00:49	6° \mathfrak{D} 06'32		morning rise	5892 Aug 04 18:34	1° Ω 57'30	
evening set	5887 Jun 12 05:12	9° \mathfrak{D} 08'52		retrograde	5892 Nov 07 09:49	5° Ω 11'08	
				opposition	5893 Jan 22 15:03	3° Ω 09'53	0°23'38
conjunction	5887 Jun 28 11:19	10° \mathfrak{D} 04'54	0°02'35	min. Earth dist.	5893 Jan 22 13:23	3° Ω 10'04	18.40568 AU
minimum elong	5887 Jun 28 11:19	10° \mathfrak{D} 04'54	0°02'32	direct	5893 Apr 07 06:46	1° Ω 10'18	
behind sun begin	5887 Jun 28 04:38	10° \mathfrak{D} 03'57		evening set	5893 Jul 07 09:45	4° Ω 17'55	
behind sun end	5887 Jun 28 17:59	10° \mathfrak{D} 05'50					
max. Earth dist.	5887 Jun 28 20:25	10° \mathfrak{D} 06'11	20.71612 AU	conjunction	5893 Jul 23 21:06	5° Ω 15'37	0°22'56
morning rise	5887 Jul 14 20:48	11° \mathfrak{D} 01'24		minimum elong	5893 Jul 23 21:06	5° Ω 15'37	0°22'54
retrograde	5887 Oct 17 11:09	14° \mathfrak{D} 11'56		max. Earth dist.	5893 Jul 23 21:06	5° Ω 15'37	20.37330 AU
opposition	5888 Jan 02 11:31	12° \mathfrak{D} 11'23	0°04'44	morning rise	5893 Aug 09 11:00	6° Ω 13'41	
min. Earth dist.	5888 Jan 02 03:52	12° \mathfrak{D} 12'10	18.69156 AU	retrograde	5893 Nov 11 23:54	9° Ω 27'56	
direct	5888 Mar 17 07:10	10° \mathfrak{D} 13'12		opposition	5894 Jan 27 02:54	7° Ω 26'29	0°27'11
evening set	5888 Jun 15 15:38	13° \mathfrak{D} 16'16		min. Earth dist.	5894 Jan 27 03:36	7° Ω 26'25	18.34017 AU
				direct	5894 Apr 11 17:12	5° Ω 26'31	
conjunction	5888 Jul 01 22:48	14° \mathfrak{D} 12'34	0°06'03	evening set	5894 Jul 12 01:19	8° Ω 35'08	
minimum elong	5888 Jul 01 22:49	14° \mathfrak{D} 12'34	0°06'02				
behind sun begin	5888 Jul 01 16:28	14° \mathfrak{D} 11'40		conjunction	5894 Jul 28 13:31	9° Ω 33'07	0°26'04
behind sun end	5888 Jul 02 05:10	14° \mathfrak{D} 13'28		minimum elong	5894 Jul 28 13:31	9° Ω 33'07	0°26'02
max. Earth dist.	5888 Jul 02 07:28	14° \mathfrak{D} 13'48	20.66652 AU	max. Earth dist.	5894 Jul 28 12:17	9° Ω 32'56	20.30706 AU
morning rise	5888 Jul 18 09:03	15° \mathfrak{D} 09'19		morning rise	5894 Aug 14 04:00	10° Ω 31'27	
retrograde	5888 Oct 21 00:46	18° \mathfrak{D} 20'26		retrograde	5894 Nov 16 16:41	13° Ω 46'21	
opposition	5889 Jan 05 20:51	16° \mathfrak{D} 19'47	0°08'36	opposition	5895 Jan 31 15:04	11° Ω 44'40	0°30'37
min. Earth dist.	5889 Jan 05 13:23	16° \mathfrak{D} 20'33	18.64050 AU	min. Earth dist.	5895 Jan 31 16:08	11° Ω 44'33	18.27329 AU
direct	5889 Mar 21 15:57	14° \mathfrak{D} 21'23		direct	5895 Apr 16 06:53	9° Ω 44'17	
evening set	5889 Jun 20 03:10	17° \mathfrak{D} 25'17		evening set	5895 Jul 16 18:00	12° Ω 53'58	
conjunction	5889 Jul 06 11:04	18° \mathfrak{D} 21'50	0°09'31	conjunction	5895 Aug 02 06:53	13° Ω 52'15	0°29'05
minimum elong	5889 Jul 06 11:04	18° \mathfrak{D} 21'50	0°09'29	minimum elong	5895 Aug 02 06:53	13° Ω 52'15	0°29'04
behind sun begin	5889 Jul 06 05:31	18° \mathfrak{D} 21'03		max. Earth dist.	5895 Aug 02 04:04	13° Ω 51'50	20.23969 AU
behind sun end	5889 Jul 06 16:37	18° \mathfrak{D} 22'37		morning rise	5895 Aug 18 21:54	14° Ω 50'51	
max. Earth dist.	5889 Jul 06 17:35	18° \mathfrak{D} 22'45	20.61397 AU		5895 Aug 21 13:40	15° Ω	
morning rise	5889 Jul 22 22:10	19° \mathfrak{D} 18'51		retrograde	5895 Nov 21 07:26	18° Ω 06'22	
retrograde	5889 Oct 25 13:32	22° \mathfrak{D} 30'35		opposition	5896 Feb 05 03:46	16° Ω 04'28	0°33'53

min. Earth dist.	5896 Feb 05 07:00	16° Ω 04'08	18.20576 AU	evening set	5902 Aug 18 15:17	13° \mathbb{N} 54'35	
	5896 Mar 02 20:55	15° \mathbb{R} Ω					
direct	5896 Apr 19 18:20	14° Ω 03'40		conjunction	5902 Sep 04 07:48	14° \mathbb{N} 54'50	0°44'56
	5896 Jun 05 13:28	15° Ω		minimum elong	5902 Sep 04 07:48	14° \mathbb{N} 54'50	0°44'56
evening set	5896 Jul 20 11:29	17° Ω 14'26		max. Earth dist.	5902 Sep 03 19:47	14° \mathbb{N} 53'00	19.79355 AU
				morning rise	5902 Sep 21 00:52	15° \mathbb{N} 55'11	
conjunction	5896 Aug 06 01:07	18° Ω 13'00	0°31'57	retrograde	5902 Dec 23 22:04	19° \mathbb{N} 15'02	
minimum elong	5896 Aug 06 01:06	18° Ω 13'00	0°31'55	opposition	5903 Mar 08 13:31	17° \mathbb{N} 12'14	0°50'45
max. Earth dist.	5896 Aug 05 20:52	18° Ω 12'23	20.17216 AU	min. Earth dist.	5903 Mar 08 23:30	17° \mathbb{N} 11'09	17.76534 AU
morning rise	5896 Aug 22 16:40	19° Ω 11'52		direct	5903 May 22 07:23	15° \mathbb{N} 08'58	
retrograde	5896 Nov 25 01:34	22° Ω 28'02		evening set	5903 Aug 23 15:13	18° \mathbb{N} 27'55	
opposition	5897 Feb 08 16:55	20° Ω 25'55	0°36'59				
min. Earth dist.	5897 Feb 08 20:30	20° Ω 25'32	18.13835 AU	conjunction	5903 Sep 09 08:09	19° \mathbb{N} 28'25	0°46'15
direct	5897 Apr 24 09:13	18° Ω 24'42		minimum elong	5903 Sep 09 08:09	19° \mathbb{N} 28'25	0°46'15
evening set	5897 Jul 25 05:51	21° Ω 36'35		max. Earth dist.	5903 Sep 08 19:45	19° \mathbb{N} 26'32	19.73736 AU
				morning rise	5903 Sep 26 01:01	20° \mathbb{N} 28'59	
conjunction	5897 Aug 10 20:05	22° Ω 35'27	0°34'38	retrograde	5903 Dec 28 19:33	23° \mathbb{N} 49'22	
minimum elong	5897 Aug 10 20:05	22° Ω 35'27	0°34'38	opposition	5904 Mar 12 07:19	21° \mathbb{N} 46'31	0°52'04
max. Earth dist.	5897 Aug 10 14:41	22° Ω 34'39	20.10489 AU	min. Earth dist.	5904 Mar 12 18:42	21° \mathbb{N} 45'17	17.71009 AU
morning rise	5897 Aug 27 11:57	23° Ω 34'34		direct	5904 May 26 01:28	19° \mathbb{N} 42'58	
retrograde	5897 Nov 29 17:51	26° Ω 51'21		evening set	5904 Aug 27 16:09	23° \mathbb{N} 03'04	
opposition	5898 Feb 13 06:46	24° Ω 49'04	0°39'53				
min. Earth dist.	5898 Feb 13 12:11	24° Ω 48'29	18.07160 AU	conjunction	5904 Sep 13 09:06	24° \mathbb{N} 03'49	0°47'17
direct	5898 Apr 28 22:14	22° Ω 47'27		minimum elong	5904 Sep 13 09:06	24° \mathbb{N} 03'49	0°47'16
evening set	5898 Jul 30 01:05	26° Ω 00'28		max. Earth dist.	5904 Sep 12 18:09	24° \mathbb{N} 01'32	19.68303 AU
				morning rise	5904 Sep 30 02:02	25° \mathbb{N} 04'34	
conjunction	5898 Aug 15 15:53	26° Ω 59'37	0°37'09	retrograde	5905 Jan 01 17:36	28° \mathbb{N} 25'27	
minimum elong	5898 Aug 15 15:53	26° Ω 59'37	0°37'08	opposition	5905 Mar 17 01:54	26° \mathbb{N} 22'32	0°53'04
max. Earth dist.	5898 Aug 15 08:57	26° Ω 58'35	20.03884 AU	min. Earth dist.	5905 Mar 17 14:23	26° \mathbb{N} 21'11	17.65678 AU
morning rise	5898 Sep 01 08:11	27° Ω 59'00		direct	5905 May 30 21:56	24° \mathbb{N} 18'40	
	5898 Oct 10 02:30	0° \mathbb{N}		evening set	5905 Sep 01 17:32	27° \mathbb{N} 39'53	
retrograde	5898 Dec 04 13:07	1° \mathbb{N} 16'25					
	5899 Jan 30 12:15	30° \mathbb{R} Ω		conjunction	5905 Sep 18 10:45	28° \mathbb{N} 40'50	0°48'01
opposition	5899 Feb 17 21:07	29° Ω 13'57	0°42'34	minimum elong	5905 Sep 18 10:45	28° \mathbb{N} 40'50	0°48'01
min. Earth dist.	5899 Feb 18 02:48	29° Ω 13'21	18.00635 AU	max. Earth dist.	5905 Sep 17 19:40	28° \mathbb{N} 38'32	19.63060 AU
direct	5899 May 03 13:46	27° Ω 11'58		morning rise	5905 Oct 05 03:19	29° \mathbb{N} 41'45	
	5899 Jul 27 07:51	0° \mathbb{N}			5905 Oct 10 06:33	0° Ω	
evening set	5899 Aug 03 21:10	0° \mathbb{N} 26'09		retrograde	5906 Jan 06 15:46	3° Ω 03'05	
				opposition	5906 Mar 21 21:10	1° Ω 00'07	0°53'44
conjunction	5899 Aug 20 12:35	1° \mathbb{N} 25'35	0°39'26	min. Earth dist.	5906 Mar 22 10:31	0° Ω 58'39	17.60544 AU
minimum elong	5899 Aug 20 12:35	1° \mathbb{N} 25'35	0°39'25		5906 Apr 14 21:22	30° \mathbb{R} \mathbb{N}	
max. Earth dist.	5899 Aug 20 04:57	1° \mathbb{N} 24'26	19.97433 AU	direct	5906 Jun 04 18:13	28° \mathbb{N} 55'56	
morning rise	5899 Sep 06 05:06	2° \mathbb{N} 25'13			5906 Jul 24 13:31	0° Ω	
retrograde	5899 Dec 09 07:39	5° \mathbb{N} 43'15		evening set	5906 Sep 06 19:48	2° Ω 18'12	
opposition	5900 Feb 22 12:16	3° \mathbb{N} 40'40	0°45'01				
min. Earth dist.	5900 Feb 22 19:33	3° \mathbb{N} 39'53	17.94283 AU	conjunction	5906 Sep 23 12:53	3° Ω 19'21	0°48'26
direct	5900 May 08 04:16	1° \mathbb{N} 38'19		minimum elong	5906 Sep 23 12:53	3° Ω 19'21	0°48'26
evening set	5900 Aug 08 18:22	4° \mathbb{N} 53'41		max. Earth dist.	5906 Sep 22 19:26	3° Ω 16'40	19.58054 AU
				morning rise	5906 Oct 10 05:22	4° Ω 20'26	
conjunction	5900 Aug 25 10:11	5° \mathbb{N} 53'24	0°41'31	retrograde	5907 Jan 11 14:05	7° Ω 42'10	
minimum elong	5900 Aug 25 10:10	5° \mathbb{N} 53'24	0°41'31	opposition	5907 Mar 26 16:55	5° Ω 39'06	0°54'03
max. Earth dist.	5900 Aug 25 00:40	5° \mathbb{N} 51'58	19.91192 AU	min. Earth dist.	5907 Mar 27 07:30	5° Ω 37'31	17.55685 AU
morning rise	5900 Sep 11 03:01	6° \mathbb{N} 53'17		direct	5907 Jun 09 16:15	3° Ω 34'36	
retrograde	5900 Dec 14 04:14	10° \mathbb{N} 11'56		evening set	5907 Sep 11 22:29	6° Ω 57'52	
opposition	5901 Feb 27 03:53	8° \mathbb{N} 09'15	0°47'12				
min. Earth dist.	5901 Feb 27 11:37	8° \mathbb{N} 08'25	17.88153 AU	conjunction	5907 Sep 28 15:44	7° Ω 59'13	0°48'33
direct	5901 May 12 20:58	6° \mathbb{N} 06'35		minimum elong	5907 Sep 28 15:44	7° Ω 59'13	0°48'33
evening set	5901 Aug 13 16:23	9° \mathbb{N} 23'09		max. Earth dist.	5907 Sep 27 22:22	7° Ω 56'32	19.53340 AU
				morning rise	5907 Oct 15 07:47	9° Ω 00'26	
conjunction	5901 Aug 30 08:42	10° \mathbb{N} 23'09	0°43'21	retrograde	5908 Jan 16 13:00	12° Ω 22'29	
minimum elong	5901 Aug 30 08:42	10° \mathbb{N} 23'09	0°43'20	opposition	5908 Mar 30 13:16	10° Ω 19'22	0°54'00
max. Earth dist.	5901 Aug 29 22:47	10° \mathbb{N} 21'39	19.85161 AU	min. Earth dist.	5908 Mar 31 04:15	10° Ω 17'43	17.51129 AU
morning rise	5901 Sep 16 01:31	11° \mathbb{N} 23'16		direct	5908 Jun 13 14:47	8° Ω 14'33	
retrograde	5901 Dec 19 00:30	14° \mathbb{N} 42'31		evening set	5908 Sep 16 01:51	11° Ω 38'46	
opposition	5902 Mar 03 20:22	12° \mathbb{N} 39'47	0°49'07				
min. Earth dist.	5902 Mar 04 05:33	12° \mathbb{N} 38'47	17.82234 AU	conjunction	5908 Oct 02 18:47	12° Ω 40'16	0°48'20
direct	5902 May 17 12:58	10° \mathbb{N} 36'49		minimum elong	5908 Oct 02 18:47	12° Ω 40'16	0°48'21

max. Earth dist.	5908 Oct 01 23:31	12° <u>♏</u> 37'17	19.48965 AU		5915 Mar 23 10:59	15° <u>♏</u> <u>♏</u>	
morning rise	5908 Oct 19 10:32	13° <u>♏</u> 41'36		opposition	5915 May 03 01:17	13° <u>♏</u> 26'19	0°43'41
retrograde	5909 Jan 20 11:17	17° <u>♏</u> 03'57		min. Earth dist.	5915 May 03 18:03	13° <u>♏</u> 24'29	17.33103 AU
opposition	5909 Apr 04 10:10	15° <u>♏</u> 00'45	0°53'36	direct	5915 Jul 17 19:03	11° <u>♏</u> 20'18	
min. Earth dist.	5909 Apr 05 02:21	14° <u>♏</u> 58'59	17.46963 AU	evening set	5915 Oct 21 07:47	14° <u>♏</u> 49'04	
direct	5909 Jun 18 14:05	12° <u>♏</u> 55'39			5915 Oct 24 07:02	15° <u>♏</u>	
evening set	5909 Sep 21 05:24	16° <u>♏</u> 20'45					
				conjunction	5915 Nov 06 21:42	15° <u>♏</u> 50'58	0°37'56
conjunction	5909 Oct 07 22:16	17° <u>♏</u> 22'22	0°47'47	minimum elong	5915 Nov 06 21:42	15° <u>♏</u> 50'58	0°37'59
minimum elong	5909 Oct 07 22:16	17° <u>♏</u> 22'22	0°47'48	max. Earth dist.	5915 Nov 06 02:23	15° <u>♏</u> 47'56	19.32896 AU
max. Earth dist.	5909 Oct 07 03:23	17° <u>♏</u> 19'27	19.45012 AU	morning rise	5915 Nov 23 08:51	16° <u>♏</u> 52'29	
morning rise	5909 Oct 24 13:28	18° <u>♏</u> 23'48		retrograde	5916 Feb 23 12:29	20° <u>♏</u> 15'24	
retrograde	5910 Jan 25 10:57	21° <u>♏</u> 46'23		opposition	5916 May 07 01:10	18° <u>♏</u> 12'36	0°40'54
opposition	5910 Apr 09 07:31	19° <u>♏</u> 43'08	0°52'49	min. Earth dist.	5916 May 07 16:48	18° <u>♏</u> 10'53	17.32876 AU
min. Earth dist.	5910 Apr 09 23:26	19° <u>♏</u> 41'24	17.43238 AU	direct	5916 Jul 21 22:01	16° <u>♏</u> 06'37	
direct	5910 Jun 23 14:31	17° <u>♏</u> 37'46		evening set	5916 Oct 25 12:20	19° <u>♏</u> 35'40	
evening set	5910 Sep 26 09:18	21° <u>♏</u> 03'40		max. Earth dist.	5916 Nov 10 07:19	20° <u>♏</u> 34'39	19.32931 AU
max. Earth dist.	5910 Oct 12 05:48	22° <u>♏</u> 02'18	19.41531 AU				
				conjunction	5916 Nov 11 01:35	20° <u>♏</u> 37'31	0°35'18
conjunction	5910 Oct 13 01:47	22° <u>♏</u> 05'24	0°46'55	minimum elong	5916 Nov 11 01:36	20° <u>♏</u> 37'31	0°35'20
minimum elong	5910 Oct 13 01:47	22° <u>♏</u> 05'24	0°46'56	morning rise	5916 Nov 27 11:42	21° <u>♏</u> 38'57	
morning rise	5910 Oct 29 16:32	23° <u>♏</u> 06'54		retrograde	5917 Feb 27 11:31	25° <u>♏</u> 01'45	
retrograde	5911 Jan 30 09:27	26° <u>♏</u> 29'40		opposition	5917 May 12 01:32	22° <u>♏</u> 59'07	0°37'49
opposition	5911 Apr 14 05:28	24° <u>♏</u> 26'24	0°51'41	min. Earth dist.	5917 May 12 17:55	22° <u>♏</u> 57'20	17.33170 AU
min. Earth dist.	5911 Apr 14 22:28	24° <u>♏</u> 24'32	17.40025 AU	direct	5917 Jul 26 23:26	20° <u>♏</u> 53'11	
direct	5911 Jun 28 14:36	22° <u>♏</u> 20'47		evening set	5917 Oct 30 16:52	24° <u>♏</u> 22'24	
evening set	5911 Oct 01 13:30	25° <u>♏</u> 47'25		max. Earth dist.	5917 Nov 15 10:26	25° <u>♏</u> 21'13	19.33481 AU
max. Earth dist.	5911 Oct 17 10:06	26° <u>♏</u> 46'11	19.38590 AU				
				conjunction	5917 Nov 16 05:12	25° <u>♏</u> 24'10	0°32'26
conjunction	5911 Oct 18 05:43	26° <u>♏</u> 49'14	0°45'43	minimum elong	5917 Nov 16 05:12	25° <u>♏</u> 24'10	0°32'28
minimum elong	5911 Oct 18 05:43	26° <u>♏</u> 49'14	0°45'44	morning rise	5917 Dec 02 14:33	26° <u>♏</u> 25'30	
morning rise	5911 Nov 03 19:49	27° <u>♏</u> 50'47		retrograde	5918 Mar 04 12:41	29° <u>♏</u> 48'06	
	5911 Dec 13 19:00	0° <u>♏</u>		opposition	5918 May 17 01:57	27° <u>♏</u> 45'37	0°34'29
retrograde	5912 Feb 04 10:15	1° <u>♏</u> 13'40		min. Earth dist.	5918 May 17 17:14	27° <u>♏</u> 43'58	17.33960 AU
	5912 Mar 29 18:11	30° <u>♏</u> <u>♏</u>		direct	5918 Aug 01 03:30	25° <u>♏</u> 39'44	
opposition	5912 Apr 18 03:40	29° <u>♏</u> 10'25	0°50'12	evening set	5918 Nov 04 20:59	29° <u>♏</u> 09'00	
min. Earth dist.	5912 Apr 18 19:54	29° <u>♏</u> 08'38	17.37366 AU		5918 Nov 18 12:46	0° <u>♏</u> <u>♏</u>	
direct	5912 Jul 02 16:26	27° <u>♏</u> 04'37					
	5912 Sep 26 20:40	0° <u>♏</u>		conjunction	5918 Nov 21 08:39	0° <u>♏</u> 10'40	0°29'19
evening set	5912 Oct 05 18:00	0° <u>♏</u> 31'54		minimum elong	5918 Nov 21 08:39	0° <u>♏</u> 10'40	0°29'22
				max. Earth dist.	5918 Nov 20 15:15	0° <u>♏</u> 07'57	19.34498 AU
conjunction	5912 Oct 22 09:42	1° <u>♏</u> 33'47	0°44'13	morning rise	5918 Dec 07 16:54	1° <u>♏</u> 11'52	
minimum elong	5912 Oct 22 09:42	1° <u>♏</u> 33'47	0°44'14	retrograde	5919 Mar 09 11:13	4° <u>♏</u> 34'12	
max. Earth dist.	5912 Oct 21 13:48	1° <u>♏</u> 30'41	19.36228 AU	opposition	5919 May 22 02:43	2° <u>♏</u> 31'53	0°30'55
morning rise	5912 Nov 07 23:05	2° <u>♏</u> 35'22		min. Earth dist.	5919 May 22 18:25	2° <u>♏</u> 30'10	17.35194 AU
retrograde	5913 Feb 08 09:06	5° <u>♏</u> 58'19		direct	5919 Aug 06 06:29	0° <u>♏</u> 26'03	
opposition	5913 Apr 23 02:35	3° <u>♏</u> 55'08	0°48'21	evening set	5919 Nov 10 00:58	3° <u>♏</u> 55'15	
min. Earth dist.	5913 Apr 23 19:40	3° <u>♏</u> 53'15	17.35322 AU				
direct	5913 Jul 07 16:25	1° <u>♏</u> 49'12		conjunction	5919 Nov 26 11:33	4° <u>♏</u> 56'47	0°26'01
evening set	5913 Oct 10 22:23	5° <u>♏</u> 17'03		minimum elong	5919 Nov 26 11:34	4° <u>♏</u> 56'47	0°26'02
				max. Earth dist.	5919 Nov 25 17:31	4° <u>♏</u> 53'57	19.35959 AU
conjunction	5913 Oct 27 13:34	6° <u>♏</u> 18'58	0°42'25	morning rise	5919 Dec 12 18:59	5° <u>♏</u> 57'50	
minimum elong	5913 Oct 27 13:34	6° <u>♏</u> 18'58	0°42'26	retrograde	5920 Mar 13 10:59	9° <u>♏</u> 19'51	
max. Earth dist.	5913 Oct 26 17:59	6° <u>♏</u> 15'54	19.34503 AU	opposition	5920 May 26 03:24	7° <u>♏</u> 17'39	0°27'07
morning rise	5913 Nov 13 02:18	7° <u>♏</u> 20'33		min. Earth dist.	5920 May 26 18:05	7° <u>♏</u> 16'04	17.36872 AU
retrograde	5914 Feb 13 11:09	10° <u>♏</u> 43'33		direct	5920 Aug 10 10:56	5° <u>♏</u> 11'53	
opposition	5914 Apr 28 01:44	8° <u>♏</u> 40'27	0°46'11	evening set	5920 Nov 14 04:18	8° <u>♏</u> 40'54	
min. Earth dist.	5914 Apr 28 17:37	8° <u>♏</u> 38'42	17.33904 AU				
direct	5914 Jul 12 18:48	6° <u>♏</u> 34'28		conjunction	5920 Nov 30 14:08	9° <u>♏</u> 42'16	0°22'33
evening set	5914 Oct 16 03:01	10° <u>♏</u> 02'48		minimum elong	5920 Nov 30 14:08	9° <u>♏</u> 42'16	0°22'35
				max. Earth dist.	5920 Nov 29 21:52	9° <u>♏</u> 39'43	19.37854 AU
conjunction	5914 Nov 01 17:39	11° <u>♏</u> 04'43	0°40'19	morning rise	5920 Dec 16 20:24	10° <u>♏</u> 43'09	
minimum elong	5914 Nov 01 17:39	11° <u>♏</u> 04'43	0°40'20	retrograde	5921 Mar 18 09:31	14° <u>♏</u> 04'46	
max. Earth dist.	5914 Oct 31 22:33	11° <u>♏</u> 01'44	19.33396 AU	opposition	5921 May 31 04:17	12° <u>♏</u> 02'43	0°23'10
morning rise	5914 Nov 18 05:32	12° <u>♏</u> 06'17		min. Earth dist.	5921 May 31 18:47	12° <u>♏</u> 01'09	17.38977 AU
	5915 Jan 16 22:57	15° <u>♏</u>		direct	5921 Aug 15 14:31	9° <u>♏</u> 57'02	
retrograde	5915 Feb 18 10:24	15° <u>♏</u> 29'16		evening set	5921 Nov 19 07:04	13° <u>♏</u> 25'44	

conjunction	5921 Dec 05 15:46	14° \nearrow 26'55	0°18'56	morning rise	5927 Jan 14 13:58	8° \searrow 51'07
minimum elong	5921 Dec 05 15:46	14° \nearrow 26'55	0°18'57	retrograde	5927 Apr 15 19:28	12° \searrow 09'32
max. Earth dist.	5921 Dec 04 23:12	14° \nearrow 24'19	19.40185 AU	opposition	5927 Jun 29 04:52	10° \searrow 08'21 -0°02'36
morning rise	5921 Dec 21 21:14	15° \nearrow 27'37		min. Earth dist.	5927 Jun 29 12:09	10° \searrow 07'34 17.61280 AU
retrograde	5922 Mar 23 08:13	18° \nearrow 48'47		direct	5927 Sep 14 04:02	8° \searrow 03'40
opposition	5922 Jun 05 04:56	16° \nearrow 46'51	0°19'03	evening set	5927 Dec 18 07:49	11° \searrow 28'39
min. Earth dist.	5922 Jun 05 18:28	16° \nearrow 45'23	17.41528 AU			
direct	5922 Aug 20 18:06	14° \nearrow 41'14		conjunction	5928 Jan 03 10:28	12° \searrow 28'20 -0°04'23
evening set	5922 Nov 24 09:09	18° \nearrow 09'32		minimum elong	5928 Jan 03 10:28	12° \searrow 28'20 0°04'21
				behind sun begin	5928 Jan 03 03:56	12° \searrow 27'21
conjunction	5922 Dec 10 17:03	19° \nearrow 10'31	0°15'11	behind sun end	5928 Jan 03 16:59	12° \searrow 29'19
minimum elong	5922 Dec 10 17:03	19° \nearrow 10'31	0°15'13	max. Earth dist.	5928 Jan 03 02:31	12° \searrow 27'07 19.63919 AU
behind sun begin	5922 Dec 10 14:55	19° \nearrow 10'11		morning rise	5928 Jan 19 10:01	13° \searrow 27'34
behind sun end	5922 Dec 10 19:10	19° \nearrow 10'50		retrograde	5928 Apr 19 15:21	16° \searrow 45'25
max. Earth dist.	5922 Dec 10 02:30	19° \nearrow 08'14	19.42958 AU	opposition	5928 Jul 03 04:01	14° \searrow 44'27 -0°06'55
morning rise	5922 Dec 26 21:22	20° \nearrow 11'00		min. Earth dist.	5928 Jul 03 10:34	14° \searrow 43'45 17.66643 AU
retrograde	5923 Mar 28 06:22	23° \nearrow 31'40		direct	5928 Sep 18 03:32	12° \searrow 40'06
opposition	5923 Jun 10 05:21	21° \nearrow 29'51	0°14'49	evening set	5928 Dec 22 04:58	16° \searrow 04'15
min. Earth dist.	5923 Jun 10 18:10	21° \nearrow 28'29	17.44511 AU			
direct	5923 Aug 25 21:19	19° \nearrow 24'22		conjunction	5929 Jan 07 06:40	17° \searrow 03'38 -0°08'13
evening set	5923 Nov 29 10:40	22° \nearrow 52'09		minimum elong	5929 Jan 07 06:39	17° \searrow 03'38 0°08'11
				behind sun begin	5929 Jan 07 00:46	17° \searrow 02'44
conjunction	5923 Dec 15 17:24	23° \nearrow 52'53	0°11'22	behind sun end	5929 Jan 07 12:32	17° \searrow 04'31
minimum elong	5923 Dec 15 17:24	23° \nearrow 52'53	0°11'24	max. Earth dist.	5929 Jan 07 00:25	17° \searrow 02'41 19.69481 AU
behind sun begin	5923 Dec 15 12:33	23° \nearrow 52'09		morning rise	5929 Jan 23 05:20	18° \searrow 02'35
behind sun end	5923 Dec 15 22:15	23° \nearrow 53'38		retrograde	5929 Apr 24 11:41	21° \searrow 19'50
max. Earth dist.	5923 Dec 15 03:02	23° \nearrow 50'39	19.46178 AU	opposition	5929 Jul 08 02:38	19° \searrow 19'07 -0°11'10
morning rise	5923 Dec 31 20:51	24° \nearrow 53'09		min. Earth dist.	5929 Jul 08 06:56	19° \searrow 18'40 17.72366 AU
retrograde	5924 Apr 01 04:06	28° \nearrow 13'18		direct	5929 Sep 23 03:57	17° \searrow 15'09
opposition	5924 Jun 14 05:43	26° \nearrow 11'35	0°10'30	evening set	5929 Dec 27 01:14	20° \searrow 38'23
min. Earth dist.	5924 Jun 14 17:35	26° \nearrow 10'19	17.47972 AU			
direct	5924 Aug 29 23:36	24° \nearrow 06'13		conjunction	5930 Jan 12 01:57	21° \searrow 37'28 -0°11'59
evening set	5924 Dec 03 11:04	27° \nearrow 33'24		minimum elong	5930 Jan 12 01:56	21° \searrow 37'28 0°11'58
				behind sun begin	5930 Jan 11 21:21	21° \searrow 36'47
conjunction	5924 Dec 19 16:53	28° \nearrow 33'54	0°07'29	behind sun end	5930 Jan 12 06:32	21° \searrow 38'10
minimum elong	5924 Dec 19 16:53	28° \nearrow 33'54	0°07'31	max. Earth dist.	5930 Jan 11 21:17	21° \searrow 36'46 19.75353 AU
behind sun begin	5924 Dec 19 10:49	28° \nearrow 32'58		morning rise	5930 Jan 27 23:46	22° \searrow 36'08
behind sun end	5924 Dec 19 22:57	28° \nearrow 34'49		retrograde	5930 Apr 29 06:03	25° \searrow 52'48
max. Earth dist.	5924 Dec 19 04:47	28° \nearrow 32'01	19.49881 AU	opposition	5930 Jul 13 01:00	23° \searrow 52'20 -0°15'19
morning rise	5925 Jan 04 19:15	29° \nearrow 33'55		min. Earth dist.	5930 Jul 13 04:57	23° \searrow 51'55 17.78372 AU
	5925 Jan 12 00:29	0° \searrow		direct	5930 Sep 28 02:40	21° \searrow 48'45
retrograde	5925 Apr 06 01:44	2° \searrow 53'30		evening set	5930 Dec 31 20:45	25° \searrow 11'01
opposition	5925 Jun 19 05:48	0° \searrow 51'56	0°06'08			
min. Earth dist.	5925 Jun 19 16:05	0° \searrow 50'50	17.51910 AU	conjunction	5931 Jan 16 20:27	26° \searrow 09'48 -0°15'40
	5925 Jul 10 02:32	30° \nearrow		minimum elong	5931 Jan 16 20:27	26° \searrow 09'48 0°15'38
direct	5925 Sep 04 02:00	28° \nearrow 46'45		behind sun begin	5931 Jan 16 18:46	26° \searrow 09'33
	5925 Oct 27 22:50	0° \searrow		behind sun end	5931 Jan 16 22:09	26° \searrow 10'03
evening set	5925 Dec 08 10:52	2° \searrow 13'15		max. Earth dist.	5931 Jan 16 16:56	26° \searrow 09'16 19.81471 AU
				morning rise	5931 Feb 01 17:31	27° \searrow 08'11
conjunction	5925 Dec 24 15:33	3° \searrow 13'29	0°03'35		5931 Apr 04 00:37	0° \approx
minimum elong	5925 Dec 24 15:33	3° \searrow 13'29	0°03'37	retrograde	5931 May 04 01:13	0° \approx 24'14
behind sun begin	5925 Dec 24 08:57	3° \searrow 12'28			5931 Jun 03 16:42	30° \nearrow
behind sun end	5925 Dec 24 22:09	3° \searrow 14'29		opposition	5931 Jul 17 22:43	28° \searrow 23'59 -0°19'22
max. Earth dist.	5925 Dec 24 04:17	3° \searrow 11'44	19.54072 AU	min. Earth dist.	5931 Jul 18 00:28	28° \searrow 23'48 17.84572 AU
morning rise	5926 Jan 09 17:00	4° \searrow 13'15		direct	5931 Oct 03 02:25	26° \searrow 20'47
retrograde	5926 Apr 10 22:26	7° \searrow 32'15		evening set	5932 Jan 05 15:22	29° \searrow 42'04
opposition	5926 Jun 24 05:29	5° \searrow 30'51	0°01'46		5932 Jan 10 14:00	0° \approx
min. Earth dist.	5926 Jun 24 14:50	5° \searrow 29'51	17.56360 AU			
direct	5926 Sep 09 02:48	3° \searrow 25'52		conjunction	5932 Jan 21 14:11	0° \approx 40'32 -0°19'14
desc. node	5926 Nov 20 06:01	5° \searrow 31'52		minimum elong	5932 Jan 21 14:11	0° \approx 40'32 0°19'13
evening set	5926 Dec 13 09:44	6° \searrow 51'39		max. Earth dist.	5932 Jan 21 12:22	0° \approx 40'15 19.87740 AU
				morning rise	5932 Feb 06 10:23	1° \approx 38'37
conjunction	5926 Dec 29 13:29	7° \searrow 51'37	-0°00'26	retrograde	5932 May 07 17:52	4° \approx 54'03
minimum elong	5926 Dec 29 13:29	7° \searrow 51'37	0°00'24	opposition	5932 Jul 21 20:16	2° \approx 54'01 -0°23'15
behind sun begin	5926 Dec 29 06:52	7° \searrow 50'37		min. Earth dist.	5932 Jul 21 21:48	2° \approx 53'52 17.90906 AU
behind sun end	5926 Dec 29 20:06	7° \searrow 52'37		direct	5932 Oct 07 00:18	0° \approx 51'12
max. Earth dist.	5926 Dec 29 04:15	7° \searrow 50'12	19.58771 AU	evening set	5933 Jan 09 08:59	4° \approx 11'25

conjunction	5933 Jan 25 06:51	5° \approx 09'34 -0°22'40	minimum elong	5939 Feb 20 16:51	1° \approx 23'59 0°39'26
minimum elong	5933 Jan 25 06:51	5° \approx 09'34 0°22'38	max. Earth dist.	5939 Feb 20 23:25	1° \approx 24'58 20.32032 AU
max. Earth dist.	5933 Jan 25 05:48	5° \approx 09'24 19.94115 AU	morning rise	5939 Mar 08 09:31	2° \approx 20'11
morning rise	5933 Feb 10 02:27	6° \approx 07'22	retrograde	5939 Jun 08 02:12	5° \approx 31'12
retrograde	5933 May 12 11:43	9° \approx 22'11	opposition	5939 Aug 23 08:48	3° \approx 31'56 -0°44'52
opposition	5933 Jul 26 17:04	7° \approx 22'20 -0°26'59	min. Earth dist.	5939 Aug 23 00:47	3° \approx 32'45 18.35160 AU
min. Earth dist.	5933 Jul 26 16:24	7° \approx 22'24 17.97300 AU	direct	5939 Nov 08 14:00	1° \approx 31'18
direct	5933 Oct 11 23:01	5° \approx 19'52	evening set	5940 Feb 09 10:21	4° \approx 43'30
evening set	5934 Jan 14 01:45	8° \approx 39'00			
conjunction	5934 Jan 29 22:52	9° \approx 36'50 -0°25'57	conjunction	5940 Feb 25 03:36	5° \approx 39'34 -0°41'27
minimum elong	5934 Jan 29 22:52	9° \approx 36'50 0°25'55	minimum elong	5940 Feb 25 03:36	5° \approx 39'34 0°41'27
max. Earth dist.	5934 Jan 29 23:37	9° \approx 36'56 20.00510 AU	max. Earth dist.	5940 Feb 25 12:41	5° \approx 40'56 20.38281 AU
morning rise	5934 Feb 14 17:42	10° \approx 34'21	morning rise	5940 Mar 11 19:49	6° \approx 35'31
retrograde	5934 May 17 02:32	13° \approx 48'31	retrograde	5940 Jun 11 13:55	9° \approx 45'58
opposition	5934 Jul 31 13:17	11° \approx 48'50 -0°30'32	opposition	5940 Aug 27 01:12	7° \approx 46'49 -0°46'58
min. Earth dist.	5934 Jul 31 12:35	11° \approx 48'54 18.03695 AU	min. Earth dist.	5940 Aug 26 16:22	7° \approx 47'43 18.41405 AU
direct	5934 Oct 16 19:03	9° \approx 46'42	direct	5940 Nov 12 05:43	5° \approx 46'32
evening set	5935 Jan 18 17:41	13° \approx 04'43	evening set	5941 Feb 12 20:41	8° \approx 57'37
conjunction	5935 Feb 03 13:55	14° \approx 02'14 -0°29'03	conjunction	5941 Feb 28 13:22	9° \approx 53'26 -0°43'14
minimum elong	5935 Feb 03 13:55	14° \approx 02'14 0°29'02	minimum elong	5941 Feb 28 13:22	9° \approx 53'26 0°43'14
max. Earth dist.	5935 Feb 03 15:02	14° \approx 02'24 20.06896 AU	max. Earth dist.	5941 Feb 28 22:50	9° \approx 54'50 20.44515 AU
morning rise	5935 Feb 19 08:17	14° \approx 59'28	morning rise	5941 Mar 16 05:35	10° \approx 49'10
retrograde	5935 Feb 19 11:52	15° \approx	retrograde	5941 Jun 16 03:09	13° \approx 59'06
opposition	5935 May 21 19:14	18° \approx 13'00	opposition	5941 Aug 31 16:48	12° \approx 00'03 -0°48'47
min. Earth dist.	5935 Aug 05 08:55	16° \approx 13'26 -0°33'52	min. Earth dist.	5941 Aug 31 06:01	12° \approx 01'08 18.47615 AU
direct	5935 Aug 05 06:04	16° \approx 13'43 18.10058 AU	direct	5941 Nov 16 19:48	10° \approx 00'06
evening set	5935 Sep 06 05:19	15° \approx	evening set	5942 Feb 17 06:15	13° \approx 10'09
direct	5935 Oct 21 15:58	14° \approx 11'37	conjunction	5942 Mar 04 22:45	14° \approx 05'43 -0°44'47
evening set	5935 Dec 04 11:22	15° \approx	minimum elong	5942 Mar 04 22:45	14° \approx 05'43 0°44'47
conjunction	5936 Jan 23 08:26	17° \approx 28'28	max. Earth dist.	5942 Mar 05 10:33	14° \approx 07'28 20.50673 AU
minimum elong	5936 Feb 08 04:03	18° \approx 25'41 -0°31'58	morning rise	5942 Mar 20 14:39	15° \approx 01'15
max. Earth dist.	5936 Feb 08 04:03	18° \approx 25'41 0°31'56	retrograde	5942 Jun 20 13:51	18° \approx 10'41
morning rise	5936 Feb 08 07:17	18° \approx 26'11 20.13227 AU	opposition	5942 Sep 05 07:45	16° \approx 11'46 -0°50'21
retrograde	5936 Feb 23 21:44	19° \approx 22'39	min. Earth dist.	5942 Sep 04 20:19	16° \approx 12'56 18.53712 AU
opposition	5936 May 25 08:34	22° \approx 35'32	direct	5942 Nov 21 10:08	14° \approx 12'13
min. Earth dist.	5936 Aug 09 04:04	20° \approx 36'04 -0°36'59	evening set	5943 Feb 21 15:20	17° \approx 21'13
direct	5936 Aug 09 00:58	20° \approx 36'23 18.16368 AU	conjunction	5943 Mar 09 07:21	18° \approx 16'34 -0°46'04
evening set	5936 Oct 25 10:27	18° \approx 34'33	minimum elong	5943 Mar 09 07:21	18° \approx 16'34 0°46'03
conjunction	5937 Jan 26 22:22	21° \approx 50'13	max. Earth dist.	5943 Mar 09 19:14	18° \approx 18'20 20.56703 AU
minimum elong	5937 Feb 11 17:11	22° \approx 47'08 -0°34'41	morning rise	5943 Mar 24 23:22	19° \approx 11'54
max. Earth dist.	5937 Feb 11 17:11	22° \approx 47'08 0°34'40	retrograde	5943 Jun 25 02:26	22° \approx 20'54
morning rise	5937 Feb 27 10:35	22° \approx 47'41 20.19522 AU	opposition	5943 Sep 09 22:15	20° \approx 22'06 -0°51'38
retrograde	5937 May 29 23:51	26° \approx 56'04	min. Earth dist.	5943 Sep 09 09:18	20° \approx 23'25 18.59662 AU
opposition	5937 Aug 13 22:14	24° \approx 56'40 -0°39'52	direct	5943 Nov 25 22:50	18° \approx 22'55
min. Earth dist.	5937 Aug 13 16:59	24° \approx 57'13 18.22649 AU	evening set	5944 Feb 25 23:30	21° \approx 30'56
direct	5937 Oct 30 04:53	22° \approx 55'26	conjunction	5944 Mar 12 15:27	22° \approx 26'04 -0°47'07
evening set	5938 Jan 31 11:11	26° \approx 09'56	minimum elong	5944 Mar 12 15:27	22° \approx 26'04 0°47'08
conjunction	5938 Feb 16 05:32	27° \approx 06'33 -0°37'10	max. Earth dist.	5944 Mar 13 05:32	22° \approx 28'09 20.62539 AU
minimum elong	5938 Feb 16 05:32	27° \approx 06'33 0°37'09	morning rise	5944 Mar 28 07:18	23° \approx 21'14
max. Earth dist.	5938 Feb 16 11:36	27° \approx 07'28 20.25781 AU	retrograde	5944 Jun 28 12:31	26° \approx 29'49
morning rise	5938 Mar 03 22:24	28° \approx 03'00	opposition	5944 Sep 13 12:15	24° \approx 31'09 -0°52'38
retrograde	5938 Apr 10 03:11	0° \approx	min. Earth dist.	5944 Sep 12 22:42	24° \approx 32'31 18.65376 AU
opposition	5938 Jun 03 12:16	1° \approx 14'36	direct	5944 Nov 29 11:40	22° \approx 32'20
min. Earth dist.	5938 Jul 30 23:25	30° \approx	evening set	5945 Mar 01 07:25	25° \approx 39'24
direct	5938 Aug 18 15:55	29° \approx 15'16 -0°42'30	conjunction	5945 Mar 16 23:03	26° \approx 34'20 -0°47'55
evening set	5938 Aug 18 10:09	29° \approx 15'51 18.28902 AU	minimum elong	5945 Mar 16 23:02	26° \approx 34'20 0°47'54
conjunction	5938 Nov 03 21:52	27° \approx 14'19	max. Earth dist.	5945 Mar 17 12:53	26° \approx 36'22 20.68119 AU
minimum elong	5939 Jan 27 23:32	0° \approx	morning rise	5945 Apr 01 15:08	27° \approx 29'20
max. Earth dist.	5939 Jan 27 23:32	0° \approx	retrograde	5945 May 25 03:34	0° \approx
morning rise	5939 Feb 04 23:14	0° \approx 27'39	retrograde	5945 Jul 03 00:15	0° \approx 37'32
retrograde	5939 Feb 04 23:14	0° \approx 27'39	min. Earth dist.	5945 Aug 12 01:12	30° \approx
conjunction	5939 Feb 20 16:51	1° \approx 23'59 -0°39'26	min. Earth dist.	5945 Sep 17 11:01	28° \approx 40'26 18.70814 AU

opposition	5945 Sep 18 01:31	28° ✕ 38'59 -0°53'22	max. Earth dist.	5952 Apr 14 11:44	25° Υ 03'26 20.96176 AU
direct	5945 Dec 03 23:08	26° ✕ 40'29	morning rise	5952 Apr 29 11:25	25° Υ 55'04
evening set	5946 Mar 05 14:40	29° ✕ 46'39	retrograde	5952 Jul 31 15:13	29° Υ 01'20
	5946 Mar 09 11:13	0° Υ	opposition	5952 Oct 17 08:31	27° Υ 02'43 -0°50'52
			min. Earth dist.	5952 Oct 16 14:55	27° Υ 04'29 18.97477 AU
conjunction	5946 Mar 21 06:22	0° Υ 41'25 -0°48'28	direct	5953 Jan 01 20:13	25° Υ 05'37
minimum elong	5946 Mar 21 06:22	0° Υ 41'25 0°48'28	evening set	5953 Apr 02 05:16	28° Υ 06'34
max. Earth dist.	5946 Mar 21 21:57	0° Υ 43'43 20.73376 AU			
morning rise	5946 Apr 05 22:25	1° Υ 36'16	conjunction	5953 Apr 17 21:59	29° Υ 00'34 -0°45'26
retrograde	5946 Jul 07 09:44	4° Υ 44'07	minimum elong	5953 Apr 17 21:59	29° Υ 00'34 0°45'27
opposition	5946 Sep 22 14:23	2° Υ 45'39 -0°53'49	max. Earth dist.	5953 Apr 18 15:48	29° Υ 03'08 20.98637 AU
min. Earth dist.	5946 Sep 21 23:28	2° Υ 47'09 18.75884 AU	morning rise	5953 May 03 16:51	29° Υ 54'51
direct	5946 Dec 08 10:38	0° Υ 47'29		5953 May 05 05:31	0° ♄
evening set	5947 Mar 09 21:32	3° Υ 52'47	retrograde	5953 Aug 04 22:22	3° ♄ 00'58
			opposition	5953 Oct 21 17:43	1° ♄ 02'19 -0°49'29
conjunction	5947 Mar 25 13:00	4° Υ 47'22 -0°48'46	min. Earth dist.	5953 Oct 21 00:06	1° ♄ 04'04 18.99786 AU
minimum elong	5947 Mar 25 13:00	4° Υ 47'22 0°48'46		5953 Nov 18 03:31	30° ♄ Υ
max. Earth dist.	5947 Mar 26 04:03	4° Υ 49'34 20.78247 AU	direct	5954 Jan 06 02:37	29° Υ 05'19
morning rise	5947 Apr 10 05:24	5° Υ 42'06		5954 Feb 22 02:46	0° ♄
retrograde	5947 Jul 11 20:26	8° Υ 49'38	evening set	5954 Apr 06 09:25	2° ♄ 05'47
min. Earth dist.	5947 Sep 26 11:19	6° Υ 52'46 18.80555 AU			
opposition	5947 Sep 27 02:48	6° Υ 51'13 -0°54'00	conjunction	5954 Apr 22 02:43	2° ♄ 59'44 -0°44'05
direct	5947 Dec 12 21:20	4° Υ 53'18	minimum elong	5954 Apr 22 02:43	2° ♄ 59'44 0°44'05
evening set	5948 Mar 13 03:52	7° Υ 57'46	max. Earth dist.	5954 Apr 22 22:00	3° ♄ 02'31 21.00777 AU
			morning rise	5954 May 07 21:59	3° ♄ 54'01
conjunction	5948 Mar 28 19:33	8° Υ 52'13 -0°48'49	retrograde	5954 Aug 09 06:07	7° ♄ 00'02
minimum elong	5948 Mar 28 19:33	8° Υ 52'13 0°48'49	min. Earth dist.	5954 Oct 25 08:18	5° ♄ 03'11 19.01754 AU
max. Earth dist.	5948 Mar 29 12:07	8° Υ 54'39 20.82692 AU	opposition	5954 Oct 26 02:39	5° ♄ 01'21 -0°47'51
morning rise	5948 Apr 13 12:02	9° Υ 46'49	direct	5955 Jan 10 10:23	3° ♄ 04'30
retrograde	5948 Jul 15 05:26	12° Υ 54'03	evening set	5955 Apr 10 13:30	6° ♄ 04'31
opposition	5948 Sep 30 14:36	10° Υ 55'39 -0°53'54			
min. Earth dist.	5948 Sep 29 22:43	10° Υ 57'14 18.84772 AU	conjunction	5955 Apr 26 07:05	6° ♄ 58'28 -0°42'31
direct	5948 Dec 16 07:54	8° Υ 57'58	minimum elong	5955 Apr 26 07:05	6° ♄ 58'28 0°42'32
evening set	5949 Mar 17 09:47	12° Υ 01'38	max. Earth dist.	5955 Apr 27 01:38	7° ♄ 01'08 21.02583 AU
			morning rise	5955 May 12 03:09	7° ♄ 52'44
conjunction	5949 Apr 02 01:27	12° Υ 55'57 -0°48'37	retrograde	5955 Aug 13 13:53	10° ♄ 58'45
minimum elong	5949 Apr 02 01:27	12° Υ 55'57 0°48'38	opposition	5955 Oct 30 11:27	9° ♄ 00'01 -0°46'00
max. Earth dist.	5949 Apr 02 17:18	12° Υ 58'16 20.86686 AU	min. Earth dist.	5955 Oct 29 17:16	9° ♄ 01'50 19.03392 AU
morning rise	5949 Apr 17 18:27	13° Υ 50'28	direct	5956 Jan 14 15:56	7° ♄ 03'17
retrograde	5949 Jul 19 14:40	16° Υ 57'24	evening set	5956 Apr 13 17:30	10° ♄ 02'57
min. Earth dist.	5949 Oct 04 09:45	15° Υ 00'35 18.88546 AU			
opposition	5949 Oct 05 01:52	14° Υ 58'59 -0°53'32	conjunction	5956 Apr 29 11:47	10° ♄ 56'54 -0°40'45
direct	5949 Dec 20 17:33	13° Υ 01'28	minimum elong	5956 Apr 29 11:47	10° ♄ 56'54 0°40'47
evening set	5950 Mar 21 15:09	16° Υ 04'22	max. Earth dist.	5956 Apr 30 07:35	10° ♄ 59'44 21.04037 AU
			morning rise	5956 May 15 08:22	11° ♄ 51'12
conjunction	5950 Apr 06 07:09	16° Υ 58'35 -0°48'10	retrograde	5956 Aug 16 21:21	14° ♄ 57'12
minimum elong	5950 Apr 06 07:09	16° Υ 58'35 0°48'11	opposition	5956 Nov 02 19:46	12° ♄ 58'28 -0°43'57
max. Earth dist.	5950 Apr 07 00:31	17° Υ 01'07 20.90236 AU	min. Earth dist.	5956 Nov 02 01:04	13° ♄ 00'20 19.04650 AU
morning rise	5950 Apr 22 00:22	17° Υ 53'01	direct	5957 Jan 17 22:44	11° ♄ 01'51
retrograde	5950 Jul 23 23:12	20° Υ 59'40	evening set	5957 Apr 17 21:42	14° ♄ 01'14
opposition	5950 Oct 09 12:29	19° Υ 01'12 -0°52'54			
min. Earth dist.	5950 Oct 08 19:52	19° Υ 02'52 18.91882 AU	conjunction	5957 May 03 16:24	14° ♄ 55'11 -0°38'48
direct	5950 Dec 25 03:17	17° Υ 03'50	minimum elong	5957 May 03 16:24	14° ♄ 55'11 0°38'49
evening set	5951 Mar 25 20:15	20° Υ 06'02	max. Earth dist.	5957 May 04 11:08	14° ♄ 57'52 21.05102 AU
				5957 May 05 01:55	15° ♄
conjunction	5951 Apr 10 12:18	21° Υ 00'09 -0°47'29	morning rise	5957 May 19 13:53	15° ♄ 49'32
minimum elong	5951 Apr 10 12:18	21° Υ 00'09 0°47'31	retrograde	5957 Aug 21 05:36	18° ♄ 55'36
max. Earth dist.	5951 Apr 11 05:06	21° Υ 02'35 20.93383 AU	min. Earth dist.	5957 Nov 06 10:00	16° ♄ 58'39 19.05510 AU
morning rise	5951 Apr 26 06:07	21° Υ 54'31	opposition	5957 Nov 07 04:03	16° ♄ 56'50 -0°41'41
retrograde	5951 Jul 28 06:56	25° Υ 00'58	direct	5958 Jan 22 03:39	15° ♄ 00'19
opposition	5951 Oct 13 22:47	23° Υ 02'24 -0°52'01	evening set	5958 Apr 22 01:51	17° ♄ 59'29
min. Earth dist.	5951 Oct 13 05:55	23° Υ 04'05 18.94856 AU			
direct	5951 Dec 29 11:24	21° Υ 05'10	conjunction	5958 May 07 21:17	18° ♄ 53'29 -0°36'39
evening set	5952 Mar 29 00:44	24° Υ 06'42	minimum elong	5958 May 07 21:17	18° ♄ 53'29 0°36'41
			max. Earth dist.	5958 May 08 16:58	18° ♄ 56'18 21.05739 AU
conjunction	5952 Apr 13 17:16	25° Υ 00'45 -0°46'34	morning rise	5958 May 23 19:19	19° ♄ 47'53
minimum elong	5952 Apr 13 17:16	25° Υ 00'45 0°46'35	retrograde	5958 Aug 25 13:21	22° ♄ 54'03

opposition	5958 Nov 11 12:06	20° ♄ 55'16 -0°39'13	conjunction	5965 Jun 04 15:12	16° ♊ 48'07 -0°17'20
min. Earth dist.	5958 Nov 10 17:46	20° ♄ 57'06 19.05908 AU	minimum elong	5965 Jun 04 15:12	16° ♊ 48'07 0°17'23
direct	5959 Jan 26 10:18	18° ♄ 58'50	max. Earth dist.	5965 Jun 05 05:19	16° ♊ 50'08 20.95844 AU
evening set	5959 Apr 26 06:24	21° ♄ 57'51	morning rise	5965 Jun 20 19:21	17° ♊ 43'22
			retrograde	5965 Sep 23 01:53	20° ♊ 51'05
conjunction	5959 May 12 02:19	22° ♄ 51'54 -0°34'20	opposition	5965 Dec 09 18:43	18° ♊ 51'25 -0°17'20
minimum elong	5959 May 12 02:19	22° ♄ 51'54 0°34'22	min. Earth dist.	5965 Dec 09 05:56	18° ♊ 52'43 18.94283 AU
max. Earth dist.	5959 May 12 20:37	22° ♄ 54'31 21.05904 AU	direct	5966 Feb 23 01:39	16° ♊ 54'24
morning rise	5959 May 28 01:17	23° ♄ 46'23	evening set	5966 May 23 20:54	19° ♊ 54'06
retrograde	5959 Aug 29 21:47	26° ♄ 52'41			
opposition	5959 Nov 15 20:12	24° ♄ 53'52 -0°36'33	conjunction	5966 Jun 08 22:33	20° ♊ 49'02 -0°14'06
min. Earth dist.	5959 Nov 15 02:58	24° ♄ 55'35 19.05827 AU	minimum elong	5966 Jun 08 22:33	20° ♊ 49'02 0°14'08
direct	5960 Jan 30 14:44	22° ♄ 57'28	behind sun begin	5966 Jun 08 19:19	20° ♊ 48'35
evening set	5960 Apr 29 10:59	25° ♄ 56'24	behind sun end	5966 Jun 09 01:47	20° ♊ 49'29
			max. Earth dist.	5966 Jun 09 13:05	20° ♊ 51'07 20.92621 AU
conjunction	5960 May 15 07:47	26° ♄ 50'32 -0°31'51	morning rise	5966 Jun 25 03:24	21° ♊ 44'27
minimum elong	5960 May 15 07:47	26° ♄ 50'32 0°31'53	retrograde	5966 Sep 27 11:56	24° ♊ 52'32
max. Earth dist.	5960 May 16 02:37	26° ♄ 53'14 21.05555 AU	opposition	5966 Dec 14 02:26	22° ♊ 52'44 -0°13'43
morning rise	5960 May 31 07:24	27° ♄ 45'06	min. Earth dist.	5966 Dec 13 13:24	22° ♊ 54'03 18.90892 AU
	5960 Jul 17 14:45	0° ♊	direct	5967 Feb 27 07:57	20° ♊ 55'32
retrograde	5960 Sep 02 06:18	0° ♊ 51'34	evening set	5967 May 28 04:01	23° ♊ 55'37
	5960 Oct 20 09:06	30° ♋			
min. Earth dist.	5960 Nov 18 10:53	28° ♄ 54'24 19.05194 AU	conjunction	5967 Jun 13 06:24	24° ♊ 50'44 -0°10'48
opposition	5960 Nov 19 04:06	28° ♄ 52'41 -0°33'43	minimum elong	5967 Jun 13 06:23	24° ♊ 50'44 0°10'51
direct	5961 Feb 02 21:39	26° ♄ 56'17	behind sun begin	5967 Jun 13 01:20	24° ♊ 50'02
evening set	5961 May 03 16:06	29° ♄ 55'11	behind sun end	5967 Jun 13 11:27	24° ♊ 51'27
	5961 May 05 02:29	0° ♊	max. Earth dist.	5967 Jun 13 19:10	24° ♊ 52'34 20.89083 AU
			morning rise	5967 Jun 29 12:19	25° ♊ 46'21
conjunction	5961 May 19 13:27	0° ♊ 49'25 -0°29'13	retrograde	5967 Oct 01 21:40	28° ♊ 54'52
minimum elong	5961 May 19 13:27	0° ♊ 49'25 0°29'14	opposition	5967 Dec 18 10:23	26° ♊ 54'53 -0°10'00
max. Earth dist.	5961 May 20 06:26	0° ♊ 51'50 21.04643 AU	min. Earth dist.	5967 Dec 17 22:55	26° ♊ 56'03 18.87213 AU
morning rise	5961 Jun 04 14:04	1° ♊ 44'05	direct	5968 Mar 02 13:09	24° ♊ 57'31
retrograde	5961 Sep 06 14:36	4° ♊ 50'45	evening set	5968 May 31 11:30	27° ♊ 58'04
opposition	5961 Nov 23 11:55	2° ♊ 51'45 -0°30'44			
min. Earth dist.	5961 Nov 22 20:11	2° ♊ 53'20 19.04002 AU	conjunction	5968 Jun 16 14:58	28° ♊ 53'24 -0°07'26
direct	5962 Feb 07 02:09	0° ♊ 55'17	minimum elong	5968 Jun 16 14:58	28° ♊ 53'24 0°07'28
evening set	5962 May 07 21:14	3° ♊ 54'14	behind sun begin	5968 Jun 16 08:54	28° ♊ 52'33
			behind sun end	5968 Jun 16 21:01	28° ♊ 54'15
conjunction	5962 May 23 19:32	4° ♊ 48'34 -0°26'26	max. Earth dist.	5968 Jun 17 03:58	28° ♊ 55'15 20.85264 AU
minimum elong	5962 May 23 19:32	4° ♊ 48'34 0°26'28	morning rise	5968 Jul 02 21:38	29° ♊ 49'13
max. Earth dist.	5962 May 24 12:49	4° ♊ 51'02 21.03175 AU		5968 Jul 06 02:55	0° ♋
morning rise	5962 Jun 08 20:50	5° ♊ 43'21	retrograde	5968 Oct 05 09:15	2° ♋ 58'10
retrograde	5962 Sep 10 23:28	8° ♊ 50'13	opposition	5968 Dec 21 18:25	0° ♋ 58'04 -0°06'15
opposition	5962 Nov 27 19:41	6° ♊ 51'06 -0°27'34	min. Earth dist.	5968 Dec 21 06:48	0° ♋ 59'16 18.83247 AU
min. Earth dist.	5962 Nov 27 03:58	6° ♊ 52'40 19.02252 AU		5969 Jan 15 12:31	30° ♋
direct	5963 Feb 11 09:09	4° ♊ 54'33	direct	5969 Mar 06 20:08	29° ♊ 00'32
evening set	5963 May 12 02:39	7° ♊ 53'33		5969 Apr 24 12:03	0° ♋
			evening set	5969 Jun 04 19:49	2° ♋ 01'37
conjunction	5963 May 28 01:35	8° ♊ 48'01 -0°23'31			
minimum elong	5963 May 28 01:35	8° ♊ 48'01 0°23'33	conjunction	5969 Jun 20 24:00	2° ♋ 57'09 -0°04'02
max. Earth dist.	5963 May 28 17:07	8° ♊ 50'14 21.01178 AU	minimum elong	5969 Jun 20 24:00	2° ♋ 57'09 0°04'03
morning rise	5963 Jun 13 03:57	9° ♊ 42'57	behind sun begin	5969 Jun 20 17:26	2° ♋ 56'14
retrograde	5963 Sep 15 07:49	12° ♊ 50'04	behind sun end	5969 Jun 21 06:34	2° ♋ 58'05
opposition	5963 Dec 02 03:30	10° ♊ 50'45 -0°24'17	max. Earth dist.	5969 Jun 21 11:08	2° ♋ 58'45 20.81163 AU
min. Earth dist.	5963 Dec 01 13:18	10° ♊ 52'11 19.00014 AU	morning rise	5969 Jul 07 07:41	3° ♋ 53'12
direct	5964 Feb 15 14:03	8° ♊ 54'04	retrograde	5969 Oct 09 19:37	7° ♋ 02'39
evening set	5964 May 15 08:20	11° ♊ 53'13	opposition	5969 Dec 26 02:48	5° ♋ 02'26 -0°02'26
			min. Earth dist.	5969 Dec 25 16:57	5° ♋ 03'26 18.79014 AU
conjunction	5964 May 31 08:18	12° ♊ 47'50 -0°20'29	direct	5970 Mar 11 01:24	3° ♋ 04'43
minimum elong	5964 May 31 08:17	12° ♊ 47'50 0°20'31	evening set	5970 Jun 09 04:38	6° ♋ 06'25
max. Earth dist.	5964 Jun 01 00:11	12° ♊ 50'06 20.98716 AU			
morning rise	5964 Jun 16 11:24	13° ♊ 42'54	conjunction	5970 Jun 25 09:54	7° ♋ 02'11 -0°00'31
retrograde	5964 Sep 18 17:04	16° ♊ 50'18	minimum elong	5970 Jun 25 09:54	7° ♋ 02'11 0°00'33
opposition	5964 Dec 05 10:59	14° ♊ 50'49 -0°20'52	behind sun begin	5970 Jun 25 03:15	7° ♋ 01'15
min. Earth dist.	5964 Dec 04 20:43	14° ♊ 52'15 18.97334 AU	behind sun end	5970 Jun 25 16:32	7° ♋ 03'07
direct	5965 Feb 18 20:32	12° ♊ 53'58	max. Earth dist.	5970 Jun 25 21:05	7° ♋ 03'47 20.76804 AU
evening set	5965 May 19 14:34	15° ♊ 53'22	morning rise	5970 Jul 11 18:18	7° ♋ 58'27

asc. node	5970 Aug 16 22:08	9°☾48'26	conjunction	5976 Jul 20 14:13	2°♂03'45	0°20'09
retrograde	5970 Oct 14 09:05	11°☾08'26	minimum elong	5976 Jul 20 14:13	2°♂03'45	0°20'08
opposition	5970 Dec 30 11:26	9°☾08'07 0°01'25	max. Earth dist.	5976 Jul 20 16:18	2°♂04'03	20.44113 AU
min. Earth dist.	5970 Dec 30 01:35	9°☾09'08 18.74511 AU	morning rise	5976 Aug 06 03:21	3°♂01'31	
direct	5971 Mar 15 09:30	7°☾10'14	retrograde	5976 Nov 08 18:19	6°♂15'03	
evening set	5971 Jun 13 14:19	10°☾12'36	opposition	5977 Jan 24 00:06	4°♂13'46	0°24'09
			min. Earth dist.	5977 Jan 23 22:29	4°♂13'56	18.40878 AU
conjunction	5971 Jun 29 20:20	11°☾08'37 0°03'03	direct	5977 Apr 08 16:25	2°♂14'08	
minimum elong	5971 Jun 29 20:20	11°☾08'37 0°03'02	evening set	5977 Jul 08 18:27	5°♂21'38	
behind sun begin	5971 Jun 29 13:41	11°☾07'41				
behind sun end	5971 Jun 30 03:00	11°☾09'33	conjunction	5977 Jul 25 05:41	6°♂19'17	0°23'24
max. Earth dist.	5971 Jun 30 05:33	11°☾09'56 20.72165 AU	minimum elong	5977 Jul 25 05:41	6°♂19'17	0°23'22
morning rise	5971 Jul 16 05:46	12°☾05'07	max. Earth dist.	5977 Jul 25 05:39	6°♂19'17	20.37630 AU
retrograde	5971 Oct 18 20:08	15°☾15'41	morning rise	5977 Aug 10 19:29	7°♂17'19	
opposition	5972 Jan 03 20:36	13°☾15'15 0°05'16	retrograde	5977 Nov 13 08:02	10°♂31'28	
min. Earth dist.	5972 Jan 03 12:52	13°☾16'03 18.69727 AU	opposition	5978 Jan 28 11:49	8°♂29'57	0°27'42
direct	5972 Mar 18 15:23	11°☾17'10	min. Earth dist.	5978 Jan 28 12:29	8°♂29'53	18.34318 AU
evening set	5972 Jun 17 00:52	14°☾20'17	direct	5978 Apr 13 02:46	6°♂29'55	
			evening set	5978 Jul 13 09:58	9°♂38'24	
conjunction	5972 Jul 03 07:57	15°☾16'34 0°06'32				
minimum elong	5972 Jul 03 07:56	15°☾16'33 0°06'30	conjunction	5978 Jul 29 22:04	10°♂36'21	0°26'31
behind sun begin	5972 Jul 03 01:40	15°☾15'40	minimum elong	5978 Jul 29 22:04	10°♂36'21	0°26'30
behind sun end	5972 Jul 03 14:13	15°☾17'27	max. Earth dist.	5978 Jul 29 21:04	10°♂36'12	20.31016 AU
max. Earth dist.	5972 Jul 03 16:43	15°☾17'49 20.67229 AU	morning rise	5978 Aug 15 12:27	11°♂34'38	
morning rise	5972 Jul 19 18:03	16°☾13'18	retrograde	5978 Nov 18 00:39	14°♂49'25	
retrograde	5972 Oct 22 10:50	19°☾24'27	opposition	5979 Feb 01 23:48	12°♂47'40	0°31'06
opposition	5973 Jan 07 05:50	17°☾23'54 0°09'08	min. Earth dist.	5979 Feb 02 00:43	12°♂47'34	18.27659 AU
min. Earth dist.	5973 Jan 06 22:31	17°☾24'40 18.64621 AU	direct	5979 Apr 17 15:42	10°♂47'13	
direct	5973 Mar 23 00:55	15°☾25'36	evening set	5979 Jul 18 02:26	13°♂56'45	
evening set	5973 Jun 21 12:26	18°☾29'31				
conjunction	5973 Jul 07 20:14	19°☾26'04 0°10'00	conjunction	5979 Aug 03 15:13	14°♂54'59	0°29'31
minimum elong	5973 Jul 07 20:14	19°☾26'04 0°09'59	minimum elong	5979 Aug 03 15:13	14°♂54'59	0°29'29
behind sun begin	5973 Jul 07 14:51	19°☾25'18	max. Earth dist.	5979 Aug 03 12:28	14°♂54'35	20.24321 AU
behind sun end	5973 Jul 08 01:37	19°☾26'49		5979 Aug 05 01:08	15°♂	
max. Earth dist.	5973 Jul 08 02:37	19°☾26'58 20.61950 AU	morning rise	5979 Aug 20 06:11	15°♂53'33	
morning rise	5973 Jul 24 07:14	20°☾23'04	retrograde	5979 Nov 22 15:54	19°♂08'58	
retrograde	5973 Oct 26 22:44	23°☾34'49	opposition	5980 Feb 06 12:32	17°♂07'00	0°34'21
opposition	5974 Jan 11 15:52	21°☾34'07 0°12'58	min. Earth dist.	5980 Feb 06 15:34	17°♂06'40	18.20957 AU
min. Earth dist.	5974 Jan 11 10:56	21°☾34'38 18.59173 AU	direct	5980 Apr 21 03:32	15°♂06'09	
direct	5974 Mar 27 08:09	19°☾35'33	evening set	5980 Jul 21 19:48	18°♂16'46	
evening set	5974 Jun 26 00:32	22°☾40'18				
conjunction	5974 Jul 12 09:21	23°☾37'07 0°13'26	conjunction	5980 Aug 07 09:19	19°♂15'18	0°32'22
minimum elong	5974 Jul 12 09:21	23°☾37'07 0°13'24	minimum elong	5980 Aug 07 09:19	19°♂15'18	0°32'21
behind sun begin	5974 Jul 12 05:37	23°☾36'35	max. Earth dist.	5980 Aug 07 05:25	19°♂14'43	20.17626 AU
behind sun end	5974 Jul 12 13:04	23°☾37'38	morning rise	5980 Aug 24 00:44	20°♂14'07	
max. Earth dist.	5974 Jul 12 14:55	23°☾37'54 20.56329 AU	retrograde	5980 Nov 26 09:35	23°♂30'10	
morning rise	5974 Jul 28 21:00	24°☾34'22	opposition	5981 Feb 10 01:31	21°♂28'01	0°37'26
retrograde	5974 Oct 31 13:51	27°☾46'43	min. Earth dist.	5981 Feb 10 04:44	21°♂27'40	18.14282 AU
opposition	5975 Jan 16 02:12	25°☾45'51 0°16'46	direct	5981 Apr 25 17:36	19°♂26'47	
min. Earth dist.	5975 Jan 15 21:41	25°☾46'20 18.53371 AU	evening set	5981 Jul 26 14:06	22°♂38'32	
direct	5975 Mar 31 19:22	23°☾46'59				
evening set	5975 Jun 30 13:45	26°☾52'36	conjunction	5981 Aug 12 04:13	23°♂37'21	0°35'02
			minimum elong	5981 Aug 12 04:12	23°♂37'21	0°35'01
conjunction	5975 Jul 16 23:19	27°☾49'41 0°16'50	max. Earth dist.	5981 Aug 11 22:57	23°♂36'34	20.10976 AU
minimum elong	5975 Jul 16 23:19	27°☾49'41 0°16'48	morning rise	5981 Aug 28 20:01	24°♂36'27	
max. Earth dist.	5975 Jul 17 02:27	27°☾50'08 20.50361 AU	retrograde	5981 Dec 01 02:14	27°♂53'09	
morning rise	5975 Aug 02 11:50	28°☾47'12	opposition	5982 Feb 14 15:25	25°♂50'50	0°40'19
	5975 Aug 24 22:53	0°♂	min. Earth dist.	5982 Feb 14 20:30	25°♂50'18	18.07690 AU
retrograde	5975 Nov 05 02:37	2°♂00'09	direct	5982 Apr 30 06:37	23°♂49'15	
opposition	5976 Jan 20 13:00	29°☾59'05 0°20'30	evening set	5982 Jul 31 09:08	27°♂02'09	
min. Earth dist.	5976 Jan 20 10:58	29°☾59'17 18.47254 AU				
	5976 Jan 20 04:10	30°♂☾	conjunction	5982 Aug 16 23:52	28°♂01'16	0°37'31
direct	5976 Apr 04 04:09	27°☾59'50	minimum elong	5982 Aug 16 23:52	28°♂01'16	0°37'30
	5976 Jun 13 19:53	0°♂	max. Earth dist.	5982 Aug 16 17:21	28°♂00'17	20.04452 AU
evening set	5976 Jul 04 03:39	1°♂06'22	morning rise	5982 Sep 02 16:06	29°♂00'37	
				5982 Sep 20 07:29	0°♂	
			retrograde	5982 Dec 05 21:34	2°♂17'59	

opposition	5983 Feb 19 05:49	0° \mathbb{M} 15'32	0°42'58	conjunction	5989 Sep 18 19:19	29° \mathbb{M} 43'51	0°48'13
min. Earth dist.	5983 Feb 19 11:03	0° \mathbb{M} 14'59	18.01237 AU	minimum elong	5989 Sep 18 19:19	29° \mathbb{M} 43'51	0°48'13
	5983 Feb 25 07:21	30° \mathbb{R} 8		max. Earth dist.	5989 Sep 18 03:58	29° \mathbb{M} 41'30	19.63083 AU
direct	5983 May 04 22:15	28° \mathbb{L} 13'37			5989 Sep 23 04:41	0° \mathbb{L}	
	5983 Jul 09 10:24	0° \mathbb{M}		morning rise	5989 Oct 05 11:51	0° \mathbb{L} 44'46	
evening set	5983 Aug 05 05:21	1° \mathbb{M} 27'43		retrograde	5990 Jan 07 01:30	4° \mathbb{L} 06'11	
				opposition	5990 Mar 22 06:13	2° \mathbb{L} 03'14	0°53'57
conjunction	5983 Aug 21 20:39	2° \mathbb{M} 27'07	0°39'48	min. Earth dist.	5990 Mar 22 19:53	2° \mathbb{L} 01'45	17.60485 AU
minimum elong	5983 Aug 21 20:39	2° \mathbb{M} 27'07	0°39'47		5990 May 30 09:18	30° \mathbb{R} \mathbb{M}	
max. Earth dist.	5983 Aug 21 13:08	2° \mathbb{M} 26'00	19.98067 AU	direct	5990 Jun 05 03:06	29° \mathbb{M} 59'06	
morning rise	5983 Sep 07 13:06	3° \mathbb{M} 26'44			5990 Jun 10 21:46	0° \mathbb{L}	
retrograde	5983 Dec 10 15:43	6° \mathbb{M} 44'45		evening set	5990 Sep 07 04:16	3° \mathbb{L} 21'23	
opposition	5984 Feb 23 20:53	4° \mathbb{M} 42'14	0°45'24				
min. Earth dist.	5984 Feb 24 03:59	4° \mathbb{M} 41'29	17.94938 AU	conjunction	5990 Sep 23 21:21	4° \mathbb{L} 22'33	0°48'37
direct	5984 May 08 12:36	2° \mathbb{M} 40'00		minimum elong	5990 Sep 23 21:21	4° \mathbb{L} 22'33	0°48'38
evening set	5984 Aug 09 02:35	5° \mathbb{M} 55'20		max. Earth dist.	5990 Sep 23 03:46	4° \mathbb{L} 19'50	19.57924 AU
				morning rise	5990 Oct 10 13:53	5° \mathbb{L} 23'39	
conjunction	5984 Aug 25 18:19	6° \mathbb{M} 55'01	0°41'51	retrograde	5991 Jan 11 23:11	8° \mathbb{L} 45'27	
minimum elong	5984 Aug 25 18:19	6° \mathbb{M} 55'01	0°41'49	opposition	5991 Mar 27 02:01	6° \mathbb{L} 42'23	0°54'13
max. Earth dist.	5984 Aug 25 09:05	6° \mathbb{M} 53'38	19.91860 AU	min. Earth dist.	5991 Mar 27 16:40	6° \mathbb{L} 40'47	17.55484 AU
morning rise	5984 Sep 11 11:05	7° \mathbb{M} 54'53		direct	5991 Jun 10 00:19	4° \mathbb{L} 37'54	
retrograde	5984 Dec 14 12:43	11° \mathbb{M} 13'34		evening set	5991 Sep 12 06:58	8° \mathbb{L} 01'11	
opposition	5985 Feb 27 12:38	9° \mathbb{M} 10'59	0°47'34	max. Earth dist.	5991 Sep 28 06:50	8° \mathbb{L} 59'52	19.53083 AU
min. Earth dist.	5985 Feb 27 20:12	9° \mathbb{M} 10'10	17.88814 AU				
direct	5985 May 13 05:35	7° \mathbb{M} 08'27		conjunction	5991 Sep 29 00:12	9° \mathbb{L} 02'32	0°48'41
evening set	5985 Aug 14 00:37	10° \mathbb{M} 25'00		minimum elong	5991 Sep 29 00:12	9° \mathbb{L} 02'32	0°48'41
				morning rise	5991 Oct 15 16:15	10° \mathbb{L} 03'46	
conjunction	5985 Aug 30 16:48	11° \mathbb{M} 24'59	0°43'40	retrograde	5992 Jan 16 22:17	13° \mathbb{L} 25'54	
minimum elong	5985 Aug 30 16:48	11° \mathbb{M} 24'59	0°43'40	opposition	5992 Mar 30 22:16	11° \mathbb{L} 22'45	0°54'08
max. Earth dist.	5985 Aug 30 06:53	11° \mathbb{M} 23'29	19.85801 AU	min. Earth dist.	5992 Mar 31 13:27	11° \mathbb{L} 21'05	17.50826 AU
morning rise	5985 Sep 16 09:34	12° \mathbb{M} 25'05		direct	5992 Jun 13 23:43	9° \mathbb{L} 17'57	
retrograde	5985 Dec 19 08:51	15° \mathbb{M} 44'25		evening set	5992 Sep 16 10:17	12° \mathbb{L} 42'10	
opposition	5986 Mar 04 05:14	13° \mathbb{M} 41'47	0°49'27	max. Earth dist.	5992 Oct 02 08:02	13° \mathbb{L} 40'42	19.48630 AU
min. Earth dist.	5986 Mar 04 14:35	13° \mathbb{M} 40'47	17.82835 AU				
direct	5986 May 17 21:50	11° \mathbb{M} 38'57		conjunction	5992 Oct 03 03:14	13° \mathbb{L} 43'40	0°48'25
evening set	5986 Aug 18 23:47	14° \mathbb{M} 56'45		minimum elong	5992 Oct 03 03:14	13° \mathbb{L} 43'40	0°48'26
				morning rise	5992 Oct 19 19:01	14° \mathbb{L} 45'01	
conjunction	5986 Sep 04 16:13	15° \mathbb{M} 56'59	0°45'14	retrograde	5993 Jan 20 19:58	18° \mathbb{L} 07'26	
minimum elong	5986 Sep 04 16:13	15° \mathbb{M} 56'59	0°45'13	opposition	5993 Apr 04 19:13	16° \mathbb{L} 04'11	0°53'41
max. Earth dist.	5986 Sep 04 04:07	15° \mathbb{M} 55'09	19.79899 AU	min. Earth dist.	5993 Apr 05 11:18	16° \mathbb{L} 02'26	17.46604 AU
morning rise	5986 Sep 21 09:12	16° \mathbb{M} 57'19		direct	5993 Jun 18 22:37	13° \mathbb{L} 59'04	
retrograde	5986 Dec 24 06:55	20° \mathbb{M} 17'15		evening set	5993 Sep 21 13:38	17° \mathbb{L} 24'09	
opposition	5987 Mar 08 22:23	18° \mathbb{M} 14'33	0°51'04	max. Earth dist.	5993 Oct 07 11:59	18° \mathbb{L} 22'55	19.44639 AU
min. Earth dist.	5987 Mar 09 08:31	18° \mathbb{M} 13'28	17.77008 AU				
direct	5987 May 22 16:02	16° \mathbb{M} 11'25		conjunction	5993 Oct 08 06:32	18° \mathbb{L} 25'47	0°47'50
evening set	5987 Aug 23 23:47	19° \mathbb{M} 30'24		minimum elong	5993 Oct 08 06:32	18° \mathbb{L} 25'47	0°47'51
				morning rise	5993 Oct 24 21:45	19° \mathbb{L} 27'14	
conjunction	5987 Sep 09 16:38	20° \mathbb{M} 30'54	0°46'31	retrograde	5994 Jan 25 19:45	22° \mathbb{L} 49'53	
minimum elong	5987 Sep 09 16:38	20° \mathbb{M} 30'54	0°46'31	opposition	5994 Apr 09 16:36	20° \mathbb{L} 46'35	0°52'52
max. Earth dist.	5987 Sep 09 03:55	20° \mathbb{M} 28'58	19.74125 AU	min. Earth dist.	5994 Apr 10 08:28	20° \mathbb{L} 44'51	17.42861 AU
morning rise	5987 Sep 26 09:27	21° \mathbb{M} 31'27		direct	5994 Jun 23 23:41	18° \mathbb{L} 41'12	
retrograde	5987 Dec 29 04:41	24° \mathbb{M} 51'55		evening set	5994 Sep 26 17:39	22° \mathbb{L} 07'04	
opposition	5988 Mar 12 16:25	22° \mathbb{M} 49'10	0°52'21				
min. Earth dist.	5988 Mar 13 04:08	22° \mathbb{M} 47'54	17.71308 AU	conjunction	5994 Oct 13 10:09	23° \mathbb{L} 08'49	0°46'56
direct	5988 May 26 10:32	20° \mathbb{M} 45'42		minimum elong	5994 Oct 13 10:09	23° \mathbb{L} 08'49	0°46'56
evening set	5988 Aug 28 00:41	24° \mathbb{M} 05'50		max. Earth dist.	5994 Oct 12 14:23	23° \mathbb{L} 05'45	19.41161 AU
				morning rise	5994 Oct 30 00:56	24° \mathbb{L} 10'20	
conjunction	5988 Sep 13 17:34	25° \mathbb{M} 06'34	0°47'31	retrograde	5995 Jan 30 18:10	27° \mathbb{L} 33'09	
minimum elong	5988 Sep 13 17:34	25° \mathbb{M} 06'34	0°47'32	opposition	5995 Apr 14 14:27	25° \mathbb{L} 29'50	0°51'41
max. Earth dist.	5988 Sep 13 02:24	25° \mathbb{M} 04'15	19.68507 AU	min. Earth dist.	5995 Apr 15 07:11	25° \mathbb{L} 28'00	17.39675 AU
morning rise	5988 Sep 30 10:27	26° \mathbb{M} 07'20		direct	5995 Jun 28 23:16	23° \mathbb{L} 24'12	
retrograde	5989 Jan 02 02:53	29° \mathbb{M} 28'18		evening set	5995 Oct 01 21:52	26° \mathbb{L} 50'49	
opposition	5989 Mar 17 10:58	27° \mathbb{M} 25'27	0°53'19				
min. Earth dist.	5989 Mar 17 23:36	27° \mathbb{M} 24'04	17.65787 AU	conjunction	5995 Oct 18 14:06	27° \mathbb{L} 52'39	0°45'42
direct	5989 May 31 06:07	25° \mathbb{M} 21'38		minimum elong	5995 Oct 18 14:07	27° \mathbb{L} 52'39	0°45'43
evening set	5989 Sep 02 02:08	28° \mathbb{M} 42'53		max. Earth dist.	5995 Oct 17 18:56	27° \mathbb{L} 49'40	19.38264 AU
				morning rise	5995 Nov 04 04:14	28° \mathbb{L} 54'13	

	5995 Nov 22 23:23	0°♈	retrograde	6002 Mar 04 22:07	0°♏52'21	
retrograde	5996 Feb 04 18:59	2°♈17'10		6002 Apr 18 21:12	30°♈	
opposition	5996 Apr 18 12:48	0°♈13'52 0°50'08	opposition	6002 May 17 11:39	28°♈49'49 0°34'09	
min. Earth dist.	5996 Apr 19 04:46	0°♈12'07 17.37070 AU	min. Earth dist.	6002 May 18 03:00	28°♈48'09 17.33393 AU	
	5996 Apr 23 19:28	30°♈	direct	6002 Aug 01 13:16	26°♈43'53	
direct	5996 Jul 03 01:06	28°♈08'04		6002 Nov 01 15:36	0°♏	
	5996 Sep 08 00:42	0°♈	evening set	6002 Nov 05 06:12	0°♏13'11	
evening set	5996 Oct 06 02:19	1°♈35'21				
			conjunction	6002 Nov 21 17:55	1°♏14'53 0°29'01	
conjunction	5996 Oct 22 18:01	2°♈37'14 0°44'09	minimum elong	6002 Nov 21 17:55	1°♏14'53 0°29'02	
minimum elong	5996 Oct 22 18:01	2°♈37'14 0°44'10	max. Earth dist.	6002 Nov 21 00:08	1°♏12'05 19.33853 AU	
max. Earth dist.	5996 Oct 21 22:23	2°♈34'10 19.35963 AU	morning rise	6002 Dec 08 02:15	2°♏16'07	
morning rise	5996 Nov 08 07:29	3°♈38'50	retrograde	6003 Mar 09 21:07	5°♏38'31	
retrograde	5997 Feb 08 18:22	7°♈01'52	opposition	6003 May 22 12:22	3°♏36'08 0°30'32	
opposition	5997 Apr 23 11:45	4°♈58'39 0°48'15	min. Earth dist.	6003 May 23 04:17	3°♏34'24 17.34475 AU	
min. Earth dist.	5997 Apr 24 04:30	4°♈56'49 17.35085 AU	direct	6003 Aug 06 15:20	1°♏30'15	
direct	5997 Jul 08 01:11	2°♈52'44	evening set	6003 Nov 10 10:16	4°♏59'30	
evening set	5997 Oct 11 06:54	6°♈20'36				
			conjunction	6003 Nov 26 20:56	6°♏01'03 0°25'40	
conjunction	5997 Oct 27 22:09	7°♈22'32 0°42'18	minimum elong	6003 Nov 26 20:56	6°♏01'03 0°25'43	
minimum elong	5997 Oct 27 22:09	7°♈22'32 0°42'20	max. Earth dist.	6003 Nov 26 02:37	5°♏58'11 19.35169 AU	
max. Earth dist.	5997 Oct 27 02:56	7°♈19'32 19.34290 AU	morning rise	6003 Dec 13 04:28	7°♏02'08	
morning rise	5997 Nov 13 10:55	8°♈24'08	retrograde	6004 Mar 13 21:15	10°♏24'14	
retrograde	5998 Feb 13 19:51	11°♈47'13	opposition	6004 May 26 13:07	8°♏21'57 0°26'43	
opposition	5998 Apr 28 10:53	9°♈44'07 0°46'02	min. Earth dist.	6004 May 27 03:50	8°♏20'21 17.36014 AU	
min. Earth dist.	5998 Apr 29 02:38	9°♈42'23 17.33701 AU	direct	6004 Aug 10 20:17	6°♏16'07	
direct	5998 Jul 13 03:37	7°♈38'09	evening set	6004 Nov 14 13:29	9°♏45'11	
evening set	5998 Oct 16 11:40	11°♈06'31				
max. Earth dist.	5998 Nov 01 07:15	12°♈05'28 19.33191 AU	conjunction	6004 Nov 30 23:24	10°♏46'35 0°22'10	
			minimum elong	6004 Nov 30 23:24	10°♏46'35 0°22'11	
conjunction	5998 Nov 02 02:21	12°♈08'27 0°40'10	max. Earth dist.	6004 Nov 30 06:56	10°♏44'00 19.36936 AU	
minimum elong	5998 Nov 02 02:21	12°♈08'27 0°40'12	morning rise	6004 Dec 17 05:46	11°♏47'30	
morning rise	5998 Nov 18 14:19	13°♈10'02	retrograde	6005 Mar 18 19:16	15°♏09'12	
	5998 Dec 21 09:53	15°♈	opposition	6005 May 31 13:57	13°♏07'04 0°22'43	
retrograde	5999 Feb 18 19:35	16°♈33'07	min. Earth dist.	6005 Jun 01 04:38	13°♏05'28 17.38007 AU	
	5999 Apr 21 23:01	15°♈	direct	6005 Aug 15 23:17	11°♏01'17	
opposition	5999 May 03 10:40	14°♈30'09 0°43'30	evening set	6005 Nov 19 16:22	14°♏30'04	
min. Earth dist.	5999 May 04 03:24	14°♈28'19 17.32879 AU	max. Earth dist.	6005 Dec 05 08:26	15°♏28'39 19.39175 AU	
direct	5999 Jul 18 04:13	12°♈24'10				
	5999 Oct 06 19:03	15°♈	conjunction	6005 Dec 06 01:10	15°♏31'16 0°18'30	
evening set	5999 Oct 21 16:34	15°♈52'57	minimum elong	6005 Dec 06 01:10	15°♏31'16 0°18'33	
max. Earth dist.	5999 Nov 06 11:19	16°♈51'51 19.32637 AU	morning rise	6005 Dec 22 06:44	16°♏32'00	
			retrograde	6006 Mar 23 18:08	19°♏53'17	
conjunction	5999 Nov 07 06:32	16°♈54'52 0°37'45	opposition	6006 Jun 05 14:24	17°♏51'14 0°18'34	
minimum elong	5999 Nov 07 06:32	16°♈54'52 0°37'46	min. Earth dist.	6006 Jun 06 03:56	17°♏49'46 17.40487 AU	
morning rise	5999 Nov 23 17:44	17°♈56'24	direct	6006 Aug 21 03:40	15°♏45'32	
retrograde	6000 Feb 23 21:20	21°♈19'24	evening set	6006 Nov 24 18:25	19°♏13'55	
opposition	6000 May 07 10:37	19°♈16'36 0°40'40	max. Earth dist.	6006 Dec 10 11:52	20°♏12'39 19.41901 AU	
min. Earth dist.	6000 May 08 02:18	19°♈14'53 17.32573 AU				
direct	6000 Jul 22 07:49	17°♈10'37	conjunction	6006 Dec 11 02:26	20°♏14'56 0°14'45	
evening set	6000 Oct 25 21:21	20°♈39'41	minimum elong	6006 Dec 11 02:26	20°♏14'56 0°14'47	
			behind sun begin	6006 Dec 10 23:47	20°♏14'31	
conjunction	6000 Nov 11 10:39	21°♈41'34 0°35'04	behind sun end	6006 Dec 11 05:04	20°♏15'20	
minimum elong	6000 Nov 11 10:39	21°♈41'34 0°35'07	morning rise	6006 Dec 27 06:51	21°♏15'27	
max. Earth dist.	6000 Nov 10 16:07	21°♈38'39 19.32572 AU	retrograde	6007 Mar 28 15:42	24°♏36'13	
morning rise	6000 Nov 27 20:50	22°♈43'01	opposition	6007 Jun 10 14:56	22°♏34'18 0°14'18	
retrograde	6001 Feb 27 20:53	26°♈05'53	min. Earth dist.	6007 Jun 11 03:46	22°♏32'55 17.43453 AU	
opposition	6001 May 12 11:08	24°♈03'14 0°37'32	direct	6007 Aug 26 06:50	20°♏28'43	
min. Earth dist.	6001 May 13 03:38	24°♈01'26 17.32752 AU	evening set	6007 Nov 29 19:51	23°♏56'36	
direct	6001 Jul 27 09:00	21°♈57'16				
evening set	6001 Oct 31 01:53	25°♈26'31	conjunction	6007 Dec 16 02:39	24°♏57'22 0°10'54	
			minimum elong	6007 Dec 16 02:39	24°♏57'22 0°10'56	
conjunction	6001 Nov 16 14:18	26°♈28'18 0°32'09	behind sun begin	6007 Dec 15 21:36	24°♏56'36	
minimum elong	6001 Nov 16 14:18	26°♈28'18 0°32'11	behind sun end	6007 Dec 16 07:42	24°♏58'08	
max. Earth dist.	6001 Nov 15 19:20	26°♈25'20 19.32991 AU	max. Earth dist.	6007 Dec 15 12:21	24°♏55'08 19.45130 AU	
morning rise	6001 Dec 02 23:45	27°♈29'40	morning rise	6008 Jan 01 06:12	25°♏57'40	
	6002 Jan 20 03:15	0°♏	retrograde	6008 Apr 01 13:23	29°♏17'56	

opposition	6008 Jun 14 15:14	27° \mathbb{A} 16'08	0°09'58	evening set	6013 Dec 27 10:59	21° \mathbb{B} 44'35
min. Earth dist.	6008 Jun 15 02:47	27° \mathbb{A} 14'54	17.46953 AU			
direct	6008 Aug 30 09:08	25° \mathbb{A} 10'41		conjunction	6014 Jan 12 11:46	22° \mathbb{B} 43'43 -0°12'31
evening set	6008 Dec 03 20:21	28° \mathbb{A} 37'59		minimum elong	6014 Jan 12 11:46	22° \mathbb{B} 43'43 0°12'28
				behind sun begin	6014 Jan 12 07:26	22° \mathbb{B} 43'03
conjunction	6008 Dec 20 02:16	29° \mathbb{A} 38'31	0°07'00	behind sun end	6014 Jan 12 16:07	22° \mathbb{B} 44'22
minimum elong	6008 Dec 20 02:16	29° \mathbb{A} 38'31	0°07'03	max. Earth dist.	6014 Jan 12 06:58	22° \mathbb{B} 42'59 19.74731 AU
behind sun begin	6008 Dec 19 20:06	29° \mathbb{A} 37'35		morning rise	6014 Jan 28 09:41	23° \mathbb{B} 42'25
behind sun end	6008 Dec 20 08:25	29° \mathbb{A} 39'28		retrograde	6014 Apr 29 15:54	26° \mathbb{B} 59'11
max. Earth dist.	6008 Dec 19 14:24	29° \mathbb{A} 36'41	19.48900 AU	opposition	6014 Jul 13 10:43	24° \mathbb{B} 58'41 -0°15'54
	6008 Dec 25 19:24	0° \mathbb{B}		min. Earth dist.	6014 Jul 13 14:49	24° \mathbb{B} 58'15 17.77743 AU
morning rise	6009 Jan 05 04:42	0° \mathbb{B} 38'35		direct	6014 Sep 28 11:50	22° \mathbb{B} 55'04
retrograde	6009 Apr 06 11:15	3° \mathbb{B} 58'17		evening set	6015 Jan 01 06:40	26° \mathbb{B} 17'27
opposition	6009 Jun 19 15:16	1° \mathbb{B} 56'40	0°05'36			
min. Earth dist.	6009 Jun 20 01:21	1° \mathbb{B} 55'35	17.50983 AU	conjunction	6015 Jan 17 06:29	27° \mathbb{B} 16'15 -0°16'11
	6009 Aug 17 05:18	30° \mathbb{R} \mathbb{A}		minimum elong	6015 Jan 17 06:29	27° \mathbb{B} 16'15 0°16'10
direct	6009 Sep 04 11:30	29° \mathbb{A} 51'26		max. Earth dist.	6015 Jan 17 02:57	27° \mathbb{B} 15'43 19.80826 AU
	6009 Sep 22 12:07	0° \mathbb{B}		morning rise	6015 Feb 02 03:36	28° \mathbb{B} 14'40
evening set	6009 Dec 08 20:08	3° \mathbb{B} 18'03			6015 Mar 06 01:58	0° \approx
				retrograde	6015 May 04 11:20	1° \approx 30'47
conjunction	6009 Dec 25 00:56	4° \mathbb{B} 18'20	0°03'05		6015 Jul 06 11:58	30° \mathbb{R} \mathbb{B}
minimum elong	6009 Dec 25 00:55	4° \mathbb{B} 18'20	0°03'06	opposition	6015 Jul 18 08:38	29° \mathbb{B} 30'30 -0°19'57
behind sun begin	6009 Dec 24 18:17	4° \mathbb{B} 17'19		min. Earth dist.	6015 Jul 18 10:36	29° \mathbb{B} 30'18 17.83907 AU
behind sun end	6009 Dec 25 07:32	4° \mathbb{B} 19'20		direct	6015 Oct 03 12:43	27° \mathbb{B} 27'15
max. Earth dist.	6009 Dec 24 13:45	4° \mathbb{B} 16'36	19.53201 AU		6015 Dec 23 03:42	0° \approx
morning rise	6010 Jan 10 02:30	5° \mathbb{B} 18'09		evening set	6016 Jan 06 01:20	0° \approx 48'36
retrograde	6010 Apr 11 07:55	8° \mathbb{B} 37'17				
opposition	6010 Jun 24 15:02	6° \mathbb{B} 35'52	0°01'12	conjunction	6016 Jan 22 00:13	1° \approx 47'05 -0°19'46
min. Earth dist.	6010 Jun 24 24:00	6° \mathbb{B} 34'54	17.55543 AU	minimum elong	6016 Jan 22 00:13	1° \approx 47'05 0°19'43
direct	6010 Sep 09 11:21	4° \mathbb{B} 30'53		max. Earth dist.	6016 Jan 21 22:12	1° \approx 46'47 19.87048 AU
desc. node	6010 Oct 04 08:31	4° \mathbb{B} 47'00		morning rise	6016 Feb 06 20:30	2° \approx 45'12
evening set	6010 Dec 13 19:04	7° \mathbb{B} 56'48		retrograde	6016 May 08 03:48	6° \approx 00'42
				opposition	6016 Jul 22 06:16	4° \approx 00'36 -0°23'50
conjunction	6010 Dec 29 22:54	8° \mathbb{B} 56'48	-0°00'57	min. Earth dist.	6016 Jul 22 07:59	4° \approx 00'25 17.90187 AU
minimum elong	6010 Dec 29 22:55	8° \mathbb{B} 56'48	0°00'55	direct	6016 Oct 07 09:51	1° \approx 57'42
behind sun begin	6010 Dec 29 16:17	8° \mathbb{B} 55'48		evening set	6017 Jan 09 19:10	5° \approx 17'58
behind sun end	6010 Dec 30 05:33	8° \mathbb{B} 57'49				
max. Earth dist.	6010 Dec 29 13:59	8° \mathbb{B} 55'26	19.58009 AU	conjunction	6017 Jan 25 17:08	6° \approx 16'08 -0°23'11
morning rise	6011 Jan 14 23:28	9° \mathbb{B} 56'21		minimum elong	6017 Jan 25 17:08	6° \approx 16'08 0°23'10
retrograde	6011 Apr 16 05:53	13° \mathbb{B} 14'54		max. Earth dist.	6017 Jan 25 16:01	6° \approx 15'58 19.93366 AU
opposition	6011 Jun 29 14:23	11° \mathbb{B} 13'43	-0°03'10	morning rise	6017 Feb 10 12:47	7° \approx 13'58
min. Earth dist.	6011 Jun 29 21:35	11° \mathbb{B} 12'57	17.60562 AU	retrograde	6017 May 12 21:48	10° \approx 28'48
direct	6011 Sep 14 13:21	9° \mathbb{B} 09'03		opposition	6017 Jul 27 03:00	8° \approx 28'52 -0°27'34
evening set	6011 Dec 18 17:19	12° \mathbb{B} 34'11		min. Earth dist.	6017 Jul 27 02:33	8° \approx 28'55 17.96524 AU
				direct	6017 Oct 12 09:01	6° \approx 26'17
conjunction	6012 Jan 03 20:03	13° \mathbb{B} 33'54	-0°04'54	evening set	6018 Jan 14 12:00	9° \approx 45'27
minimum elong	6012 Jan 03 20:03	13° \mathbb{B} 33'54	0°04'52			
behind sun begin	6012 Jan 03 13:35	13° \mathbb{B} 32'55		conjunction	6018 Jan 30 09:12	10° \approx 43'19 -0°26'28
behind sun end	6012 Jan 04 02:32	13° \mathbb{B} 34'53		minimum elong	6018 Jan 30 09:12	10° \approx 43'19 0°26'26
max. Earth dist.	6012 Jan 03 12:10	13° \mathbb{B} 32'42	19.63245 AU	max. Earth dist.	6018 Jan 30 09:44	10° \approx 43'24 19.99710 AU
morning rise	6012 Jan 19 19:44	14° \mathbb{B} 33'10		morning rise	6018 Feb 15 04:08	11° \approx 40'51
retrograde	6012 Apr 20 01:10	17° \mathbb{B} 51'09		retrograde	6018 May 17 12:57	14° \approx 55'02
opposition	6012 Jul 03 13:38	15° \mathbb{B} 50'12	-0°07'29	opposition	6018 Jul 31 23:24	12° \approx 55'14 -0°31'06
min. Earth dist.	6012 Jul 03 20:04	15° \mathbb{B} 49'31	17.65997 AU	min. Earth dist.	6018 Jul 31 22:49	12° \approx 55'18 18.02878 AU
direct	6012 Sep 18 12:09	13° \mathbb{B} 45'52		direct	6018 Oct 17 05:01	10° \approx 52'59
evening set	6012 Dec 22 14:27	17° \mathbb{B} 10'08		evening set	6019 Jan 19 03:53	14° \approx 11'00
					6019 Feb 01 16:11	15° \approx
conjunction	6013 Jan 07 16:15	18° \mathbb{B} 09'34	-0°08'44			
minimum elong	6013 Jan 07 16:15	18° \mathbb{B} 09'34	0°08'42	conjunction	6019 Feb 04 00:12	15° \approx 08'33 -0°29'33
behind sun begin	6013 Jan 07 10:30	18° \mathbb{B} 08'41		minimum elong	6019 Feb 04 00:12	15° \approx 08'33 0°29'32
behind sun end	6013 Jan 07 22:00	18° \mathbb{B} 10'26		max. Earth dist.	6019 Feb 04 01:24	15° \approx 08'44 20.06070 AU
max. Earth dist.	6013 Jan 07 10:14	18° \mathbb{B} 08'39	19.68854 AU	morning rise	6019 Feb 19 18:38	16° \approx 05'48
morning rise	6013 Jan 23 15:02	19° \mathbb{B} 08'33		retrograde	6019 May 22 05:15	19° \approx 19'19
retrograde	6013 Apr 24 22:09	22° \mathbb{B} 25'56		opposition	6019 Aug 05 18:58	17° \approx 19'38 -0°34'25
opposition	6013 Jul 08 12:22	20° \mathbb{B} 25'13	-0°11'45	min. Earth dist.	6019 Aug 05 16:06	17° \approx 19'56 18.09234 AU
min. Earth dist.	6013 Jul 08 16:48	20° \mathbb{B} 24'45	17.71744 AU	direct	6019 Oct 22 02:20	15° \approx 17'41
direct	6013 Sep 23 13:43	18° \mathbb{B} 21'15		evening set	6020 Jan 23 18:42	18° \approx 34'32

conjunction	6020 Feb 08 14:23	19° \approx 31'46	-0°32'27	retrograde	6026 Jun 21 00:30	19° \approx 17'09	
minimum elong	6020 Feb 08 14:22	19° \approx 31'46	0°32'26	opposition	6026 Sep 05 17:45	17° \approx 18'21	-0°50'43
max. Earth dist.	6020 Feb 08 17:39	19° \approx 32'16	20.12425 AU	min. Earth dist.	6026 Sep 05 06:24	17° \approx 19'30	18.53891 AU
morning rise	6020 Feb 24 08:10	20° \approx 28'45		direct	6026 Nov 21 19:03	15° \approx 18'53	
retrograde	6020 May 25 19:05	23° \approx 41'36		evening set	6027 Feb 22 01:46	18° \approx 28'00	
opposition	6020 Aug 09 14:03	21° \approx 42'01	-0°37'31				
min. Earth dist.	6020 Aug 09 10:51	21° \approx 42'21	18.15604 AU	conjunction	6027 Mar 09 17:49	19° \approx 23'22	-0°46'23
direct	6020 Oct 25 20:43	19° \approx 40'22		minimum elong	6027 Mar 09 17:49	19° \approx 23'22	0°46'24
evening set	6021 Jan 27 08:29	22° \approx 56'03		max. Earth dist.	6027 Mar 10 05:45	19° \approx 25'08	20.56912 AU
				morning rise	6027 Mar 25 09:50	20° \approx 18'43	
conjunction	6021 Feb 12 03:23	23° \approx 52'58	-0°35'09	retrograde	6027 Jun 25 12:44	23° \approx 27'47	
minimum elong	6021 Feb 12 03:23	23° \approx 52'58	0°35'07	opposition	6027 Sep 10 08:18	21° \approx 29'07	-0°51'58
max. Earth dist.	6021 Feb 12 07:22	23° \approx 53'34	20.18811 AU	min. Earth dist.	6027 Sep 09 19:23	21° \approx 30'25	18.59889 AU
morning rise	6021 Feb 27 20:51	24° \approx 49'41		direct	6027 Nov 26 08:24	19° \approx 30'01	
retrograde	6021 May 30 09:51	28° \approx 01'54		evening set	6028 Feb 26 10:10	22° \approx 38'09	
opposition	6021 Aug 14 08:14	26° \approx 02'24	-0°40'22				
min. Earth dist.	6021 Aug 14 02:37	26° \approx 02'59	18.22004 AU	conjunction	6028 Mar 13 02:08	23° \approx 33'19	-0°47'25
direct	6021 Oct 30 15:48	24° \approx 01'04		minimum elong	6028 Mar 13 02:08	23° \approx 33'19	0°47'24
evening set	6022 Jan 31 21:22	27° \approx 15'35		max. Earth dist.	6028 Mar 13 16:04	23° \approx 35'22	20.62771 AU
				morning rise	6028 Mar 28 17:59	24° \approx 28'28	
conjunction	6022 Feb 16 15:45	28° \approx 12'13	-0°37'37	retrograde	6028 Jun 28 23:34	27° \approx 37'07	
minimum elong	6022 Feb 16 15:45	28° \approx 12'13	0°37'37	opposition	6028 Sep 13 22:18	25° \approx 38'34	-0°52'57
max. Earth dist.	6022 Feb 16 22:03	28° \approx 13'10	20.25217 AU	min. Earth dist.	6028 Sep 13 09:08	25° \approx 39'54	18.65605 AU
morning rise	6022 Mar 04 08:39	29° \approx 08'40		direct	6028 Nov 29 21:04	23° \approx 39'50	
	6022 Mar 19 09:26	0° \approx		evening set	6029 Mar 01 18:07	26° \approx 47'00	
retrograde	6022 Jun 03 22:16	2° \approx 20'16					
opposition	6022 Aug 19 01:48	0° \approx 20'53	-0°42'58	conjunction	6029 Mar 17 09:47	27° \approx 41'57	-0°48'11
min. Earth dist.	6022 Aug 18 19:40	0° \approx 21'31	18.28434 AU	minimum elong	6029 Mar 17 09:47	27° \approx 41'57	0°48'12
	6022 Aug 27 14:45	30° \approx		max. Earth dist.	6029 Mar 17 23:23	27° \approx 43'58	20.68326 AU
direct	6022 Nov 04 08:01	28° \approx 19'53		morning rise	6029 Apr 02 01:53	28° \approx 36'58	
	6023 Jan 07 17:06	0° \approx			6029 Apr 27 20:18	0° \approx	
evening set	6023 Feb 05 09:30	1° \approx 33'16		retrograde	6029 Jul 03 10:53	1° \approx 45'14	
					6029 Sep 12 23:31	30° \approx	
conjunction	6023 Feb 21 03:10	2° \approx 29'37	-0°39'51	opposition	6029 Sep 18 11:44	29° \approx 46'45	-0°53'39
minimum elong	6023 Feb 21 03:10	2° \approx 29'37	0°39'50	min. Earth dist.	6029 Sep 17 21:30	29° \approx 48'11	18.70988 AU
max. Earth dist.	6023 Feb 21 10:03	2° \approx 30'39	20.31666 AU	direct	6029 Dec 04 08:42	27° \approx 48'19	
morning rise	6023 Mar 08 19:51	3° \approx 25'49			6030 Feb 17 13:43	0° \approx	
retrograde	6023 Jun 08 12:18	6° \approx 36'51		evening set	6030 Mar 06 01:28	0° \approx 54'35	
opposition	6023 Aug 23 18:43	4° \approx 37'35	-0°45'19				
min. Earth dist.	6023 Aug 23 10:12	4° \approx 38'27	18.34894 AU	conjunction	6030 Mar 21 17:09	1° \approx 49'21	-0°48'42
direct	6023 Nov 09 00:50	2° \approx 36'57		minimum elong	6030 Mar 21 17:09	1° \approx 49'21	0°48'42
evening set	6024 Feb 09 20:31	5° \approx 49'14		max. Earth dist.	6030 Mar 22 08:24	1° \approx 51'36	20.73502 AU
				morning rise	6030 Apr 06 09:11	2° \approx 44'12	
conjunction	6024 Feb 25 13:50	6° \approx 45'19	-0°41'51	retrograde	6030 Jul 07 20:36	5° \approx 52'05	
minimum elong	6024 Feb 25 13:50	6° \approx 45'19	0°41'50	min. Earth dist.	6030 Sep 22 10:12	3° \approx 55'08	18.75960 AU
max. Earth dist.	6024 Feb 25 23:10	6° \approx 46'43	20.38115 AU	opposition	6030 Sep 23 00:37	3° \approx 53'41	-0°54'04
morning rise	6024 Mar 12 06:06	7° \approx 41'17		direct	6030 Dec 08 21:05	1° \approx 55'32	
retrograde	6024 Jun 11 23:57	10° \approx 51'47		evening set	6031 Mar 10 08:27	5° \approx 00'53	
opposition	6024 Aug 27 11:07	8° \approx 52'40	-0°47'23				
min. Earth dist.	6024 Aug 27 02:03	8° \approx 53'36	18.41327 AU	conjunction	6031 Mar 25 23:58	5° \approx 55'30	-0°48'58
direct	6024 Nov 12 15:03	6° \approx 52'25		minimum elong	6031 Mar 25 23:58	5° \approx 55'30	0°48'58
evening set	6025 Feb 13 07:01	10° \approx 03'37		max. Earth dist.	6031 Mar 26 14:36	5° \approx 57'38	20.78269 AU
				morning rise	6031 Apr 10 16:21	6° \approx 50'13	
conjunction	6025 Feb 28 23:46	10° \approx 59'27	-0°43'36	retrograde	6031 Jul 12 07:00	9° \approx 57'45	
minimum elong	6025 Feb 28 23:46	10° \approx 59'27	0°43'36	opposition	6031 Sep 27 13:05	7° \approx 59'21	-0°54'12
max. Earth dist.	6025 Mar 01 09:26	11° \approx 00'53	20.44521 AU	min. Earth dist.	6031 Sep 26 21:53	8° \approx 00'52	18.80518 AU
morning rise	6025 Mar 16 16:01	11° \approx 55'11		direct	6031 Dec 13 07:29	6° \approx 01'25	
retrograde	6025 Jun 16 13:11	15° \approx 05'11		evening set	6032 Mar 13 14:40	9° \approx 05'54	
opposition	6025 Sep 01 02:35	13° \approx 06'13	-0°49'11				
min. Earth dist.	6025 Aug 31 15:37	13° \approx 07'20	18.47689 AU	conjunction	6032 Mar 29 06:24	10° \approx 00'22	-0°48'59
direct	6025 Nov 17 05:59	11° \approx 06'21		minimum elong	6032 Mar 29 06:24	10° \approx 00'22	0°48'59
evening set	6026 Feb 17 16:41	14° \approx 16'30		max. Earth dist.	6032 Mar 29 22:36	10° \approx 02'44	20.82601 AU
				morning rise	6032 Apr 13 22:54	10° \approx 54'58	
conjunction	6026 Mar 05 09:13	15° \approx 12'06	-0°45'07	retrograde	6032 Jul 15 15:33	14° \approx 02'09	
minimum elong	6026 Mar 05 09:13	15° \approx 12'06	0°45'06	min. Earth dist.	6032 Sep 30 09:28	12° \approx 05'16	18.84629 AU
max. Earth dist.	6026 Mar 05 21:05	15° \approx 13'52	20.50807 AU	opposition	6032 Oct 01 00:55	12° \approx 03'44	-0°54'04
morning rise	6026 Mar 21 01:10	16° \approx 07'38		direct	6032 Dec 16 19:00	10° \approx 05'59	

evening set	6033 Mar 17 20:37	13° Υ 09'38		max. Earth dist.	6039 Apr 27 12:30	8° S 08'14	21.02721 AU
				morning rise	6039 May 12 14:00	8° S 59'51	
conjunction	6033 Apr 02 12:19	14° Υ 03'58 -0°48'45		retrograde	6039 Aug 14 00:53	12° S 05'51	
minimum elong	6033 Apr 02 12:19	14° Υ 03'58 0°48'45		opposition	6039 Oct 30 21:52	10° S 07'11 -0°45'54	
max. Earth dist.	6033 Apr 03 03:52	14° Υ 06'14 20.86510 AU		min. Earth dist.	6039 Oct 30 03:38	10° S 09'00 19.03551 AU	
morning rise	6033 Apr 18 05:20	14° Υ 58'28		direct	6040 Jan 15 02:13	8° S 10'30	
retrograde	6033 Jul 20 00:59	18° Υ 05'20		evening set	6040 Apr 14 04:24	11° S 10'12	
opposition	6033 Oct 05 12:01	16° Υ 06'51 -0°53'40					
min. Earth dist.	6033 Oct 04 20:02	16° Υ 08'27 18.88346 AU		conjunction	6040 Apr 29 22:41	12° S 04'09 -0°40'38	
direct	6033 Dec 21 04:03	14° Υ 09'15		minimum elong	6040 Apr 29 22:41	12° S 04'09 0°40'40	
evening set	6034 Mar 22 01:56	17° Υ 12'08		max. Earth dist.	6040 Apr 30 18:29	12° S 07'00 21.04208 AU	
				morning rise	6040 May 15 19:15	12° S 58'28	
conjunction	6034 Apr 06 17:58	18° Υ 06'21 -0°48'16			6040 Jun 26 01:18	15° S	
minimum elong	6034 Apr 06 17:58	18° Υ 06'21 0°48'17		retrograde	6040 Aug 17 09:09	16° S 04'29	
max. Earth dist.	6034 Apr 07 11:11	18° Υ 08'51 20.90031 AU			6040 Oct 10 18:28	15° R 8	
morning rise	6034 Apr 22 11:10	19° Υ 00'47		min. Earth dist.	6040 Nov 02 11:54	14° S 07'40 19.04819 AU	
retrograde	6034 Jul 24 08:25	22° Υ 07'21		opposition	6040 Nov 03 06:21	14° S 05'49 -0°43'48	
opposition	6034 Oct 09 22:43	20° Υ 08'49 -0°53'00		direct	6041 Jan 18 09:09	12° S 09'16	
min. Earth dist.	6034 Oct 09 06:15	20° Υ 10'28 18.91688 AU			6041 Apr 15 18:16	15° S	
direct	6034 Dec 25 14:05	18° Υ 11'23		evening set	6041 Apr 18 08:46	15° S 08'42	
evening set	6035 Mar 26 06:54	21° Υ 13'32					
				conjunction	6041 May 04 03:25	16° S 02'41 -0°38'38	
conjunction	6035 Apr 10 22:58	22° Υ 07'39 -0°47'33		minimum elong	6041 May 04 03:25	16° S 02'41 0°38'40	
minimum elong	6035 Apr 10 22:58	22° Υ 07'39 0°47'33		max. Earth dist.	6041 May 04 22:00	16° S 05'21 21.05261 AU	
max. Earth dist.	6035 Apr 11 15:45	22° Υ 10'05 20.93211 AU		morning rise	6041 May 20 00:50	16° S 57'02	
morning rise	6035 Apr 26 16:47	23° Υ 02'00		retrograde	6041 Aug 21 16:46	20° S 03'08	
retrograde	6035 Jul 28 17:31	26° Υ 08'23		opposition	6041 Nov 07 14:38	18° S 04'28 -0°41'29	
opposition	6035 Oct 14 09:00	24° Υ 09'46 -0°52'04		min. Earth dist.	6041 Nov 06 20:49	18° S 06'14 19.05645 AU	
min. Earth dist.	6035 Oct 13 15:58	24° Υ 11'28 18.94718 AU		direct	6042 Jan 22 14:26	16° S 08'00	
direct	6035 Dec 29 21:50	22° Υ 12'28		evening set	6042 Apr 22 13:05	19° S 07'15	
evening set	6036 Mar 29 11:31	25° Υ 13'59					
				conjunction	6042 May 08 08:29	20° S 01'16 -0°36'28	
conjunction	6036 Apr 14 04:02	26° Υ 08'02 -0°46'36		minimum elong	6042 May 08 08:29	20° S 01'16 0°36'29	
minimum elong	6036 Apr 14 04:02	26° Υ 08'02 0°46'38		max. Earth dist.	6042 May 09 03:55	20° S 04'03 21.05840 AU	
max. Earth dist.	6036 Apr 14 22:30	26° Υ 10'42 20.96076 AU		morning rise	6042 May 24 06:27	20° S 55'41	
morning rise	6036 Apr 29 22:10	27° Υ 02'20		retrograde	6042 Aug 26 01:14	24° S 01'53	
	6036 Jul 13 09:44	0° S		opposition	6042 Nov 11 22:49	22° S 03'11 -0°38'59	
retrograde	6036 Aug 01 00:32	0° S 08'31		min. Earth dist.	6042 Nov 11 04:58	22° S 04'58 19.05964 AU	
	6036 Aug 19 20:20	30° R 9		direct	6043 Jan 26 21:06	20° S 06'49	
opposition	6036 Oct 17 18:38	28° Υ 09'53 -0°50'53		evening set	6043 Apr 26 17:38	23° S 05'55	
min. Earth dist.	6036 Oct 17 01:02	28° Υ 11'39 18.97425 AU					
direct	6037 Jan 02 06:12	26° Υ 12'44		conjunction	6043 May 12 13:30	23° S 59'59 -0°34'07	
evening set	6037 Apr 02 16:01	29° Υ 13'42		minimum elong	6043 May 12 13:30	23° S 59'59 0°34'09	
	6037 Apr 16 03:36	0° S		max. Earth dist.	6043 May 13 07:22	24° S 02'33 21.05900 AU	
conjunction	6037 Apr 18 08:44	0° S 07'41 -0°45'26		morning rise	6043 May 28 12:26	24° S 54'28	
minimum elong	6037 Apr 18 08:44	0° S 07'41 0°45'26		retrograde	6043 Aug 30 09:08	28° S 00'50	
max. Earth dist.	6037 Apr 19 02:33	0° S 10'15 20.98629 AU		opposition	6043 Nov 16 07:00	26° S 02'04 -0°36'17	
morning rise	6037 May 04 03:35	1° S 01'58		min. Earth dist.	6043 Nov 15 14:09	26° S 03'45 19.05753 AU	
retrograde	6037 Aug 05 09:14	4° S 08'02		direct	6044 Jan 31 02:16	24° S 05'42	
min. Earth dist.	6037 Oct 21 10:10	2° S 11'09 18.99821 AU		evening set	6044 Apr 29 22:22	27° S 04'43	
opposition	6037 Oct 22 04:01	2° S 09'23 -0°49'27					
direct	6038 Jan 06 12:54	0° S 12'23		conjunction	6044 May 15 19:07	27° S 58'52 -0°31'36	
evening set	6038 Apr 06 20:08	3° S 12'51		minimum elong	6044 May 15 19:07	27° S 58'52 0°31'36	
				max. Earth dist.	6044 May 16 13:25	28° S 01'29 21.05403 AU	
conjunction	6038 Apr 22 13:24	4° S 06'48 -0°44'02		morning rise	6044 May 31 18:41	28° S 53'27	
minimum elong	6038 Apr 22 13:24	4° S 06'48 0°44'04			6044 Jun 21 15:25	0° II	
max. Earth dist.	6038 Apr 23 08:45	4° S 09'36 21.00851 AU		retrograde	6044 Sep 02 17:21	1° II 59'57	
morning rise	6038 May 08 08:38	5° S 01'04		opposition	6044 Nov 19 14:46	0° II 01'06 -0°33'25	
retrograde	6038 Aug 09 16:42	8° S 07'05		min. Earth dist.	6044 Nov 18 22:06	0° II 02'46 19.04963 AU	
opposition	6038 Oct 26 13:02	6° S 08'25 -0°47'47			6044 Nov 20 01:42	30° R 8	
min. Earth dist.	6038 Oct 25 18:41	6° S 10'15 19.01862 AU		direct	6045 Feb 03 08:38	28° S 04'42	
direct	6039 Jan 10 20:19	4° S 11'35			6045 Apr 14 04:39	0° II	
evening set	6039 Apr 11 00:23	7° S 11'38		evening set	6045 May 04 03:24	1° II 03'41	
conjunction	6039 Apr 26 17:57	8° S 05'34 -0°42'26		conjunction	6045 May 20 00:44	1° II 57'55 -0°28'55	
minimum elong	6039 Apr 26 17:57	8° S 05'34 0°42'28		minimum elong	6045 May 20 00:44	1° II 57'55 0°28'57	
				max. Earth dist.	6045 May 20 17:10	2° II 00'16 21.04342 AU	

morning rise	6045 Jun 05 01:18	2°II52'36			6051 Oct 13 11:45	30°RII	
retrograde	6045 Sep 07 01:34	5°II59'17		opposition	6051 Dec 18 20:59	28°II03'01	-0°09'29
opposition	6045 Nov 23 22:39	4°II00'17	-0°30'22	min. Earth dist.	6051 Dec 18 09:19	28°II04'13	18.87001 AU
min. Earth dist.	6045 Nov 23 07:12	4°II01'50	19.03632 AU	direct	6052 Mar 02 23:50	26°II05'37	
direct	6046 Feb 07 13:50	2°II03'47		evening set	6052 May 31 22:17	29°II06'10	
evening set	6046 May 08 08:19	5°II02'46			6052 Jun 16 15:15	0°☾	
conjunction	6046 May 24 06:35	5°II57'07	-0°26'06	conjunction	6052 Jun 17 01:42	0°☾01'29	-0°06'58
minimum elong	6046 May 24 06:35	5°II57'07	0°26'08	minimum elong	6052 Jun 17 01:41	0°☾01'29	0°07'00
max. Earth dist.	6046 May 24 23:33	5°II59'33	21.02754 AU	behind sun begin	6052 Jun 16 19:32	0°☾00'38	
morning rise	6046 Jun 09 07:50	6°II51'55		behind sun end	6052 Jun 17 07:51	0°☾02'21	
retrograde	6046 Sep 11 09:48	9°II58'48		max. Earth dist.	6052 Jun 17 14:55	0°☾03'23	20.85095 AU
opposition	6046 Nov 28 06:22	7°II59'38	-0°27'11	morning rise	6052 Jul 03 08:17	0°☾57'18	
min. Earth dist.	6046 Nov 27 14:55	8°II01'11	19.01792 AU	retrograde	6052 Oct 05 19:19	4°☾06'14	
direct	6047 Feb 11 20:19	6°II03'02		opposition	6052 Dec 22 04:55	2°☾06'07	-0°05'42
evening set	6047 May 12 13:45	9°II02'05		min. Earth dist.	6052 Dec 21 17:18	2°☾07'18	18.83118 AU
				direct	6053 Mar 07 07:05	0°☾08'33	
conjunction	6047 May 28 12:39	9°II56'32	-0°23'09	evening set	6053 Jun 05 06:37	3°☾09'39	
minimum elong	6047 May 28 12:39	9°II56'32	0°23'11				
max. Earth dist.	6047 May 29 03:58	9°II58'44	21.00698 AU	conjunction	6053 Jun 21 10:45	4°☾05'11	-0°03'32
morning rise	6047 Jun 13 14:58	10°II51'29		minimum elong	6053 Jun 21 10:44	4°☾05'11	0°03'34
retrograde	6047 Sep 15 18:17	13°II58'36		behind sun begin	6053 Jun 21 04:08	4°☾04'15	
opposition	6047 Dec 02 14:02	11°II59'15	-0°23'51	behind sun end	6053 Jun 21 17:21	4°☾06'06	
min. Earth dist.	6047 Dec 01 23:49	12°II00'41	18.99530 AU	max. Earth dist.	6053 Jun 21 22:00	4°☾06'47	20.81074 AU
direct	6048 Feb 16 00:58	10°II02'29		morning rise	6053 Jul 07 18:22	5°☾01'12	
evening set	6048 May 15 19:19	13°II01'41		retrograde	6053 Oct 10 06:22	8°☾10'39	
				opposition	6053 Dec 26 13:26	6°☾10'25	-0°01'53
conjunction	6048 May 31 19:14	13°II56'17	-0°20'05	min. Earth dist.	6053 Dec 26 03:32	6°☾11'26	18.78951 AU
minimum elong	6048 May 31 19:14	13°II56'17	0°20'08	direct	6054 Mar 11 12:48	4°☾12'41	
max. Earth dist.	6048 Jun 01 11:06	13°II58'33	20.98238 AU	evening set	6054 Jun 09 15:21	7°☾14'23	
morning rise	6048 Jun 16 22:16	14°II51'22		asc. node	6054 Jun 24 12:39	8°☾05'33	
retrograde	6048 Sep 19 03:20	17°II58'45					
opposition	6048 Dec 05 21:35	15°II59'14	-0°20'25	conjunction	6054 Jun 25 20:32	8°☾10'09	0°00'01
min. Earth dist.	6048 Dec 05 07:18	16°II00'40	18.96876 AU	minimum elong	6054 Jun 25 20:33	8°☾10'09	0°00'02
direct	6049 Feb 19 07:47	14°II02'19		behind sun begin	6054 Jun 25 15:19	8°☾09'26	
evening set	6049 May 20 01:26	17°II01'44		behind sun end	6054 Jun 26 01:47	8°☾10'53	
				max. Earth dist.	6054 Jun 26 07:52	8°☾11'46	20.76759 AU
conjunction	6049 Jun 05 01:59	17°II56'29	-0°16'55	morning rise	6054 Jul 12 04:54	9°☾06'24	
minimum elong	6049 Jun 05 01:59	17°II56'29	0°16'56	retrograde	6054 Oct 14 18:37	12°☾16'23	
max. Earth dist.	6049 Jun 05 16:11	17°II58'31	20.95411 AU	opposition	6054 Dec 30 22:10	10°☾16'04	0°01'59
morning rise	6049 Jun 21 06:03	18°II51'44		min. Earth dist.	6054 Dec 30 12:27	10°☾17'03	18.74469 AU
retrograde	6049 Sep 23 12:11	21°II59'27		direct	6055 Mar 15 20:28	8°☾18'10	
opposition	6049 Dec 10 05:15	19°II59'45	-0°16'51	evening set	6055 Jun 14 01:15	11°☾20'32	
min. Earth dist.	6049 Dec 09 16:15	20°II01'04	18.93888 AU				
direct	6050 Feb 23 11:59	18°II02'40		conjunction	6055 Jun 30 07:12	12°☾16'33	0°03'35
evening set	6050 May 24 07:47	21°II02'23		minimum elong	6055 Jun 30 07:11	12°☾16'33	0°03'32
				behind sun begin	6055 Jun 30 00:34	12°☾15'37	
conjunction	6050 Jun 09 09:23	21°II57'19	-0°13'40	behind sun end	6055 Jun 30 13:49	12°☾17'29	
minimum elong	6050 Jun 09 09:23	21°II57'19	0°13'42	max. Earth dist.	6055 Jun 30 16:13	12°☾17'50	20.72113 AU
behind sun begin	6050 Jun 09 05:50	21°II56'49		morning rise	6055 Jul 16 16:32	13°☾13'03	
behind sun end	6050 Jun 09 12:56	21°II57'49		retrograde	6055 Oct 19 06:55	16°☾23'36	
max. Earth dist.	6050 Jun 10 00:06	21°II59'25	20.92268 AU	opposition	6056 Jan 04 07:17	14°☾23'09	0°05'51
morning rise	6050 Jun 25 14:10	22°II52'44		min. Earth dist.	6056 Jan 03 23:44	14°☾23'56	18.69653 AU
retrograde	6050 Sep 27 22:21	26°II00'48		direct	6056 Mar 19 03:14	12°☾25'03	
opposition	6050 Dec 14 12:58	24°II00'57	-0°13'13	evening set	6056 Jun 17 11:51	15°☾28'10	
min. Earth dist.	6050 Dec 13 23:50	24°II02'17	18.90587 AU				
direct	6051 Feb 27 19:07	22°II03'43		conjunction	6056 Jul 03 18:51	16°☾24'26	0°07'04
evening set	6051 May 28 14:46	25°II03'48		minimum elong	6056 Jul 03 18:51	16°☾24'26	0°07'02
				behind sun begin	6056 Jul 03 12:40	16°☾23'34	
conjunction	6051 Jun 13 17:05	25°II58'55	-0°10'21	behind sun end	6056 Jul 04 01:01	16°☾25'19	
minimum elong	6051 Jun 13 17:06	25°II58'55	0°10'22	max. Earth dist.	6056 Jul 04 03:23	16°☾25'39	20.67113 AU
behind sun begin	6051 Jun 13 11:52	25°II58'11		morning rise	6056 Jul 20 04:52	17°☾21'10	
behind sun end	6051 Jun 13 22:20	25°II59'39		retrograde	6056 Oct 22 20:24	20°☾32'19	
max. Earth dist.	6051 Jun 14 06:03	26°II00'46	20.88825 AU	opposition	6057 Jan 07 16:46	18°☾31'44	0°09'43
morning rise	6051 Jun 29 22:58	26°II54'32		min. Earth dist.	6057 Jan 07 09:39	18°☾32'28	18.64457 AU
	6051 Sep 21 07:05	0°☾		direct	6057 Mar 23 11:57	16°☾33'24	
retrograde	6051 Oct 02 08:11	0°☾03'02		evening set	6057 Jun 21 23:20	19°☾37'18	

conjunction	6057 Jul 08 07:02	20°☿33'50	0°10'32			6063 Jul 17 10:24	15°♄	
minimum elong	6057 Jul 08 07:02	20°☿33'50	0°10'30	evening set		6063 Jul 18 12:53	15°♄03'49	
behind sun begin	6057 Jul 08 01:49	20°☿33'06						
behind sun end	6057 Jul 08 12:14	20°☿34'34		conjunction		6063 Aug 04 01:33	16°♄02'03	0°30'01
max. Earth dist.	6057 Jul 08 12:59	20°☿34'41	20.61726 AU	minimum elong		6063 Aug 04 01:33	16°♄02'03	0°30'00
morning rise	6057 Jul 24 17:57	21°☿30'49		max. Earth dist.		6063 Aug 03 23:10	16°♄01'42	20.24084 AU
retrograde	6057 Oct 27 09:17	24°☿42'34		morning rise		6063 Aug 20 16:27	17°♄00'37	
opposition	6058 Jan 12 02:48	22°☿41'49	0°13'34	retrograde		6063 Nov 23 02:12	20°♄16'05	
min. Earth dist.	6058 Jan 11 21:59	22°☿42'19	18.58889 AU	opposition		6064 Feb 06 23:01	18°♄14'06	0°34'54
direct	6058 Mar 27 19:54	20°☿43'11		min. Earth dist.		6064 Feb 07 01:43	18°♄13'49	18.20799 AU
evening set	6058 Jun 26 11:28	23°☿47'56		direct		6064 Apr 21 13:15	16°♄13'17	
				evening set		6064 Jul 22 06:10	19°♄23'56	
conjunction	6058 Jul 12 20:13	24°☿44'44	0°13'58					
minimum elong	6058 Jul 12 20:13	24°☿44'44	0°13'57	conjunction		6064 Aug 07 19:37	20°♄22'27	0°32'50
behind sun begin	6058 Jul 12 16:54	24°☿44'15		minimum elong		6064 Aug 07 19:37	20°♄22'27	0°32'48
behind sun end	6058 Jul 12 23:32	24°☿45'12		max. Earth dist.		6064 Aug 07 16:22	20°♄21'58	20.17551 AU
max. Earth dist.	6058 Jul 13 01:32	24°☿45'29	20.55989 AU	morning rise		6064 Aug 24 10:58	21°♄21'17	
morning rise	6058 Jul 29 07:48	25°☿41'58		retrograde		6064 Nov 26 20:31	24°♄37'24	
retrograde	6058 Nov 01 00:05	28°☿54'18		opposition		6065 Feb 10 12:09	22°♄35'16	0°37'57
opposition	6059 Jan 16 13:03	26°☿53'23	0°17'22	min. Earth dist.		6065 Feb 10 14:54	22°♄34'58	18.14298 AU
min. Earth dist.	6059 Jan 16 08:39	26°☿53'50	18.52981 AU	direct		6065 Apr 26 04:15	20°♄34'05	
direct	6059 Apr 01 06:07	24°☿54'25		evening set		6065 Jul 27 00:20	23°♄45'51	
evening set	6059 Jul 01 00:32	28°☿00'01						
conjunction	6059 Jul 17 10:02	28°☿57'06	0°17'22	conjunction		6065 Aug 12 14:21	24°♄44'41	0°35'29
minimum elong	6059 Jul 17 10:02	28°☿57'06	0°17'20	minimum elong		6065 Aug 12 14:21	24°♄44'41	0°35'28
max. Earth dist.	6059 Jul 17 12:55	28°☿57'31	20.49936 AU	max. Earth dist.		6065 Aug 12 09:36	24°♄43'59	20.11083 AU
morning rise	6059 Aug 02 22:29	29°☿54'37		morning rise		6065 Aug 29 06:06	25°♄43'46	
	6059 Aug 04 12:21	0°♄		retrograde		6065 Dec 01 12:29	29°♄00'33	
retrograde	6059 Nov 05 13:17	3°♄07'33		opposition		6066 Feb 15 02:05	26°♄58'17	0°40'48
opposition	6060 Jan 20 23:50	1°♄06'25	0°21'06	min. Earth dist.		6066 Feb 15 06:47	26°♄57'47	18.07890 AU
min. Earth dist.	6060 Jan 20 21:47	1°♄06'37	18.46801 AU	direct		6066 Apr 30 16:51	24°♄56'46	
	6060 Feb 18 01:38	30°♄☿		evening set		6066 Jul 31 19:29	28°♄09'42	
direct	6060 Apr 04 15:05	29°☿07'06		conjunction		6066 Aug 17 10:10	29°♄08'49	0°37'57
	6060 May 20 03:17	0°♄		minimum elong		6066 Aug 17 10:10	29°♄08'49	0°37'56
evening set	6060 Jul 04 14:19	2°♄13'37		max. Earth dist.		6066 Aug 17 04:17	29°♄07'56	20.04742 AU
conjunction	6060 Jul 21 00:47	3°♄10'59	0°20'41			6066 Aug 31 18:26	0°♄	
minimum elong	6060 Jul 21 00:47	3°♄10'59	0°20'40	morning rise		6066 Sep 03 02:19	0°♄08'10	
max. Earth dist.	6060 Jul 21 03:00	3°♄11'18	20.43649 AU	retrograde		6066 Dec 06 08:12	3°♄25'36	
morning rise	6060 Aug 06 13:48	4°♄08'45		opposition		6067 Feb 19 16:25	1°♄23'14	0°43'27
retrograde	6060 Nov 09 05:08	7°♄22'18		min. Earth dist.		6067 Feb 19 21:18	1°♄22'43	18.01608 AU
opposition	6061 Jan 24 10:45	5°♄20'56	0°24'44			6067 Mar 27 08:36	30°♄♄	
min. Earth dist.	6061 Jan 24 09:01	5°♄21'07	18.40417 AU	direct		6067 May 05 08:43	29°♄21'24	
direct	6061 Apr 09 02:51	3°♄21'15				6067 Jun 12 15:34	0°♄	
evening set	6061 Jul 09 05:04	6°♄28'44		evening set		6067 Aug 05 15:45	2°♄35'32	
conjunction	6061 Jul 25 16:11	7°♄26'23	0°23'55	conjunction		6067 Aug 22 06:58	3°♄34'56	0°40'13
minimum elong	6061 Jul 25 16:11	7°♄26'23	0°23'54	minimum elong		6067 Aug 22 06:58	3°♄34'56	0°40'11
max. Earth dist.	6061 Jul 25 16:18	7°♄26'24	20.37191 AU	max. Earth dist.		6067 Aug 21 23:47	3°♄33'52	19.98509 AU
morning rise	6061 Aug 11 05:56	8°♄24'25		morning rise		6067 Sep 07 23:23	4°♄34'33	
retrograde	6061 Nov 13 18:47	11°♄38'36		retrograde		6067 Dec 11 02:25	7°♄52'37	
opposition	6062 Jan 28 22:26	9°♄37'01	0°28'16	opposition		6068 Feb 24 07:39	5°♄50'11	0°45'51
min. Earth dist.	6062 Jan 28 22:51	9°♄36'59	18.33915 AU	min. Earth dist.		6068 Feb 24 14:36	5°♄49'27	17.95434 AU
direct	6062 Apr 13 12:42	7°♄36'57		direct		6068 May 08 23:00	3°♄48'03	
evening set	6062 Jul 13 20:22	10°♄45'27		evening set		6068 Aug 09 12:58	7°♄03'24	
conjunction	6062 Jul 30 08:24	11°♄43'23	0°27'02	conjunction		6068 Aug 26 04:37	8°♄03'04	0°42'15
minimum elong	6062 Jul 30 08:24	11°♄43'23	0°27'00	minimum elong		6068 Aug 26 04:37	8°♄03'04	0°42'15
max. Earth dist.	6062 Jul 30 07:53	11°♄43'19	20.30657 AU	max. Earth dist.		6068 Aug 25 19:47	8°♄01'45	19.92390 AU
morning rise	6062 Aug 15 22:41	12°♄41'41		morning rise		6068 Sep 11 21:18	9°♄02'56	
	6062 Oct 01 15:01	15°♄		retrograde		6068 Dec 14 23:34	12°♄21'39	
retrograde	6062 Nov 18 11:46	15°♄56'30		opposition		6069 Feb 27 23:24	10°♄19'09	0°47'59
	6063 Jan 06 05:05	15°♄♄		min. Earth dist.		6069 Feb 28 06:50	10°♄18'21	17.89363 AU
opposition	6063 Feb 02 10:26	13°♄54'43	0°31'40	direct		6069 May 13 16:19	8°♄16'42	
min. Earth dist.	6063 Feb 02 11:00	13°♄54'39	18.27356 AU	evening set		6069 Aug 14 11:12	11°♄33'15	
direct	6063 Apr 18 02:18	11°♄54'16		conjunction		6069 Aug 31 03:17	12°♄33'12	0°44'02

minimum elong	6069 Aug 31 03:17	12° <u>ℳ</u> 33'12	0°44'02	opposition	6076 Mar 31 08:59	12° <u>♂</u> 29'22	0°54'19
max. Earth dist.	6069 Aug 30 17:19	12° <u>ℳ</u> 31'42	19.86348 AU	min. Earth dist.	6076 Apr 01 00:01	12° <u>♂</u> 27'43	17.51008 AU
morning rise	6069 Sep 16 20:00	13° <u>ℳ</u> 33'18		direct	6076 Jun 14 09:50	10° <u>♂</u> 24'31	
retrograde	6069 Dec 19 19:24	16° <u>ℳ</u> 52'38		evening set	6076 Sep 16 20:12	13° <u>♂</u> 48'37	
opposition	6070 Mar 04 16:04	14° <u>ℳ</u> 50'03	0°49'52				
min. Earth dist.	6070 Mar 05 01:29	14° <u>ℳ</u> 49'02	17.83370 AU	conjunction	6076 Oct 03 13:05	14° <u>♂</u> 50'05	0°48'34
direct	6070 May 18 08:13	12° <u>ℳ</u> 47'17		minimum elong	6076 Oct 03 13:05	14° <u>♂</u> 50'05	0°48'35
evening set	6070 Aug 19 10:17	16° <u>ℳ</u> 05'00		max. Earth dist.	6076 Oct 02 18:08	14° <u>♂</u> 47'10	19.48824 AU
				morning rise	6076 Oct 20 04:53	15° <u>♂</u> 51'26	
conjunction	6070 Sep 05 02:41	17° <u>ℳ</u> 05'13	0°45'34	retrograde	6077 Jan 21 07:00	19° <u>♂</u> 13'48	
minimum elong	6070 Sep 05 02:41	17° <u>ℳ</u> 05'13	0°45'35	opposition	6077 Apr 05 05:50	17° <u>♂</u> 10'31	0°53'49
max. Earth dist.	6070 Sep 04 14:33	17° <u>ℳ</u> 03'23	19.80400 AU	min. Earth dist.	6077 Apr 05 21:30	17° <u>♂</u> 08'48	17.46821 AU
morning rise	6070 Sep 21 19:38	18° <u>ℳ</u> 05'33		direct	6077 Jun 19 09:08	15° <u>♂</u> 05'23	
retrograde	6070 Dec 24 17:45	21° <u>ℳ</u> 25'27		evening set	6077 Sep 21 23:36	18° <u>♂</u> 30'23	
opposition	6071 Mar 09 09:20	19° <u>ℳ</u> 22'46	0°51'26				
min. Earth dist.	6071 Mar 09 19:25	19° <u>ℳ</u> 21'41	17.77468 AU	conjunction	6077 Oct 08 16:28	19° <u>♂</u> 32'00	0°47'56
direct	6071 May 23 03:23	17° <u>ℳ</u> 19'39		minimum elong	6077 Oct 08 16:28	19° <u>♂</u> 32'00	0°47'57
evening set	6071 Aug 24 10:20	20° <u>ℳ</u> 38'32		max. Earth dist.	6077 Oct 07 22:15	19° <u>♂</u> 29'11	19.44884 AU
				morning rise	6077 Oct 25 07:41	20° <u>♂</u> 33'26	
conjunction	6071 Sep 10 03:07	21° <u>ℳ</u> 39'01	0°46'50	retrograde	6078 Jan 26 06:07	23° <u>♂</u> 56'04	
minimum elong	6071 Sep 10 03:06	21° <u>ℳ</u> 39'01	0°46'50	opposition	6078 Apr 10 03:08	21° <u>♂</u> 52'45	0°52'57
max. Earth dist.	6071 Sep 09 14:06	21° <u>ℳ</u> 37'02	19.74536 AU	min. Earth dist.	6078 Apr 10 18:42	21° <u>♂</u> 51'03	17.43147 AU
morning rise	6071 Sep 26 19:53	22° <u>ℳ</u> 39'33		direct	6078 Jun 24 09:01	19° <u>♂</u> 47'24	
retrograde	6071 Dec 29 14:33	25° <u>ℳ</u> 59'57		evening set	6078 Sep 27 03:36	23° <u>♂</u> 13'13	
opposition	6072 Mar 13 03:16	23° <u>ℳ</u> 57'11	0°52'42				
min. Earth dist.	6072 Mar 13 15:07	23° <u>ℳ</u> 55'53	17.71671 AU	conjunction	6078 Oct 13 20:04	24° <u>♂</u> 14'57	0°46'59
direct	6072 May 26 21:17	21° <u>ℳ</u> 53'42		minimum elong	6078 Oct 13 20:04	24° <u>♂</u> 14'57	0°47'01
evening set	6072 Aug 28 11:10	25° <u>ℳ</u> 13'43		max. Earth dist.	6078 Oct 13 00:33	24° <u>♂</u> 11'55	19.41491 AU
				morning rise	6078 Oct 30 10:53	25° <u>♂</u> 16'28	
conjunction	6072 Sep 14 04:01	26° <u>ℳ</u> 14'26	0°47'48	retrograde	6079 Jan 31 05:06	28° <u>♂</u> 39'19	
minimum elong	6072 Sep 14 04:01	26° <u>ℳ</u> 14'26	0°47'48	opposition	6079 Apr 15 01:06	26° <u>♂</u> 36'01	0°51'43
max. Earth dist.	6072 Sep 13 12:43	26° <u>ℳ</u> 12'06	19.68828 AU	min. Earth dist.	6079 Apr 15 17:22	26° <u>♂</u> 34'14	17.40049 AU
morning rise	6072 Sep 30 20:53	27° <u>ℳ</u> 15'09		direct	6079 Jun 29 09:16	24° <u>♂</u> 30'28	
	6072 Nov 26 16:00	0° <u>♂</u>		evening set	6079 Oct 02 07:49	27° <u>♂</u> 57'04	
retrograde	6073 Jan 02 13:16	0° <u>♂</u> 36'03		max. Earth dist.	6079 Oct 18 05:18	28° <u>♂</u> 55'59	19.38684 AU
	6073 Feb 08 20:32	30° <u>♂</u> <u>ℳ</u>					
opposition	6073 Mar 17 21:50	28° <u>ℳ</u> 33'09	0°53'37	conjunction	6079 Oct 19 00:03	28° <u>♂</u> 58'54	0°45'43
min. Earth dist.	6073 Mar 18 10:21	28° <u>ℳ</u> 31'47	17.66065 AU	minimum elong	6079 Oct 19 00:03	28° <u>♂</u> 58'54	0°45'44
direct	6073 May 31 18:05	26° <u>ℳ</u> 29'19		morning rise	6079 Nov 04 14:10	0° <u>ℳ</u> 00'28	
evening set	6073 Sep 02 12:23	29° <u>ℳ</u> 50'25			6079 Nov 04 11:09	0° <u>ℳ</u>	
	6073 Sep 05 04:20	0° <u>♂</u>		retrograde	6080 Feb 05 05:32	3° <u>ℳ</u> 23'28	
				opposition	6080 Apr 18 23:26	1° <u>ℳ</u> 20'15	0°50'08
conjunction	6073 Sep 19 05:32	0° <u>♂</u> 51'21	0°48'28	min. Earth dist.	6080 Apr 19 15:08	1° <u>ℳ</u> 18'32	17.37529 AU
minimum elong	6073 Sep 19 05:32	0° <u>♂</u> 51'21	0°48'29		6080 May 22 02:39	30° <u>♂</u> <u>♂</u>	
max. Earth dist.	6073 Sep 18 14:06	0° <u>♂</u> 48'59	19.63327 AU	direct	6080 Jul 03 10:50	29° <u>♂</u> 14'35	
morning rise	6073 Oct 05 22:05	1° <u>♂</u> 52'16			6080 Aug 14 00:05	0° <u>ℳ</u>	
retrograde	6074 Jan 07 10:53	5° <u>♂</u> 13'36		evening set	6080 Oct 06 12:26	2° <u>ℳ</u> 41'53	
opposition	6074 Mar 22 17:04	3° <u>♂</u> 10'35	0°54'13	max. Earth dist.	6080 Oct 22 08:40	3° <u>ℳ</u> 40'44	19.36461 AU
min. Earth dist.	6074 Mar 23 06:46	3° <u>♂</u> 09'05	17.60699 AU				
direct	6074 Jun 05 13:52	1° <u>♂</u> 06'24		conjunction	6080 Oct 23 04:08	3° <u>ℳ</u> 43'46	0°44'08
evening set	6074 Sep 07 14:31	4° <u>♂</u> 28'32		minimum elong	6080 Oct 23 04:08	3° <u>ℳ</u> 43'46	0°44'10
				morning rise	6080 Nov 08 17:38	4° <u>ℳ</u> 45'23	
conjunction	6074 Sep 24 07:34	5° <u>♂</u> 29'40	0°48'50	retrograde	6081 Feb 09 04:57	8° <u>ℳ</u> 08'30	
minimum elong	6074 Sep 24 07:34	5° <u>♂</u> 29'40	0°48'49	opposition	6081 Apr 23 22:24	6° <u>ℳ</u> 05'24	0°48'13
max. Earth dist.	6074 Sep 23 14:01	5° <u>♂</u> 26'59	19.58118 AU	min. Earth dist.	6081 Apr 24 14:57	6° <u>ℳ</u> 03'35	17.35602 AU
morning rise	6074 Oct 11 00:06	6° <u>♂</u> 30'45		direct	6081 Jul 08 11:19	3° <u>ℳ</u> 59'39	
retrograde	6075 Jan 12 09:50	9° <u>♂</u> 52'29		evening set	6081 Oct 11 17:00	7° <u>ℳ</u> 27'33	
opposition	6075 Mar 27 12:39	7° <u>♂</u> 49'21	0°54'27				
min. Earth dist.	6075 Mar 28 03:07	7° <u>♂</u> 47'46	17.55665 AU	conjunction	6081 Oct 28 08:17	8° <u>ℳ</u> 29'29	0°42'15
direct	6075 Jun 10 12:03	5° <u>♂</u> 44'49		minimum elong	6081 Oct 28 08:17	8° <u>ℳ</u> 29'29	0°42'17
evening set	6075 Sep 12 17:06	9° <u>♂</u> 07'58		max. Earth dist.	6081 Oct 27 13:22	8° <u>ℳ</u> 26'32	19.34815 AU
				morning rise	6081 Nov 13 21:06	9° <u>ℳ</u> 31'06	
conjunction	6075 Sep 29 10:18	10° <u>♂</u> 09'18	0°48'51	retrograde	6082 Feb 14 06:55	12° <u>ℳ</u> 54'17	
minimum elong	6075 Sep 29 10:18	10° <u>♂</u> 09'18	0°48'52	opposition	6082 Apr 28 21:41	10° <u>ℳ</u> 51'18	0°45'57
max. Earth dist.	6075 Sep 28 17:04	10° <u>♂</u> 06'38	19.53260 AU	min. Earth dist.	6082 Apr 29 13:29	10° <u>ℳ</u> 49'35	17.34212 AU
morning rise	6075 Oct 16 02:21	11° <u>♂</u> 10'30		direct	6082 Jul 13 13:52	8° <u>ℳ</u> 45'30	
retrograde	6076 Jan 17 08:07	14° <u>♂</u> 32'34		evening set	6082 Oct 16 22:01	12° <u>ℳ</u> 13'56	

conjunction	6082 Nov 02 12:41	13° \mathbb{M} .15'52	0°40'04	minimum elong	6088 Dec 01 09:57	11° \mathbb{A} 54'46	0°21'52
minimum elong	6082 Nov 02 12:41	13° \mathbb{M} .15'52	0°40'05	max. Earth dist.	6088 Nov 30 17:26	11° \mathbb{A} 52'11	19.36726 AU
max. Earth dist.	6082 Nov 01 17:27	13° \mathbb{M} .12'52	19.33677 AU	morning rise	6088 Dec 17 16:24	12° \mathbb{A} 55'41	
morning rise	6082 Nov 19 00:41	14° \mathbb{M} .17'28		retrograde	6089 Mar 19 05:48	16° \mathbb{A} 17'21	
	6082 Nov 30 21:35	15° \mathbb{M} .		opposition	6089 Jun 01 00:36	14° \mathbb{A} 15'07	0°22'18
retrograde	6083 Feb 19 06:36	17° \mathbb{M} .40'38		min. Earth dist.	6089 Jun 01 15:28	14° \mathbb{A} 13'30	17.37770 AU
opposition	6083 May 03 21:27	15° \mathbb{M} .37'48	0°43'22	direct	6089 Aug 16 10:26	12° \mathbb{A} 09'15	
min. Earth dist.	6083 May 04 14:20	15° \mathbb{M} .35'58	17.33328 AU	evening set	6089 Nov 20 02:41	15° \mathbb{A} 37'56	
	6083 May 18 12:30	15° \mathbb{R} \mathbb{M} .					
direct	6083 Jul 18 14:48	13° \mathbb{M} .31'57		conjunction	6089 Dec 06 11:35	16° \mathbb{A} 39'09	0°18'08
	6083 Sep 15 13:26	15° \mathbb{M} .		minimum elong	6089 Dec 06 11:34	16° \mathbb{A} 39'09	0°18'09
evening set	6083 Oct 22 03:01	17° \mathbb{M} .00'47		max. Earth dist.	6089 Dec 05 18:55	16° \mathbb{A} 36'32	19.38921 AU
				morning rise	6089 Dec 22 17:15	17° \mathbb{A} 39'53	
conjunction	6083 Nov 07 17:00	18° \mathbb{M} .02'42	0°37'37	retrograde	6090 Mar 24 04:23	21° \mathbb{A} 01'06	
minimum elong	6083 Nov 07 17:00	18° \mathbb{M} .02'42	0°37'39	opposition	6090 Jun 06 01:05	18° \mathbb{A} 58'56	0°18'07
max. Earth dist.	6083 Nov 06 21:45	17° \mathbb{M} .59'41	19.33036 AU	min. Earth dist.	6090 Jun 06 14:28	18° \mathbb{A} 57'29	17.40226 AU
morning rise	6083 Nov 24 04:14	19° \mathbb{M} .04'15		direct	6090 Aug 21 14:19	16° \mathbb{A} 53'08	
retrograde	6084 Feb 24 08:42	22° \mathbb{M} .27'20		evening set	6090 Nov 25 04:40	20° \mathbb{A} 21'25	
opposition	6084 May 07 21:34	20° \mathbb{M} .24'38	0°40'29				
min. Earth dist.	6084 May 08 13:26	20° \mathbb{M} .22'54	17.32914 AU	conjunction	6090 Dec 11 12:44	21° \mathbb{A} 22'26	0°14'20
direct	6084 Jul 22 17:52	18° \mathbb{M} .18'45		minimum elong	6090 Dec 11 12:44	21° \mathbb{A} 22'26	0°14'22
evening set	6084 Oct 26 07:44	21° \mathbb{M} .47'50		behind sun begin	6090 Dec 11 09:41	21° \mathbb{A} 21'58	
				behind sun end	6090 Dec 11 15:46	21° \mathbb{A} 22'54	
conjunction	6084 Nov 11 21:03	22° \mathbb{M} .49'44	0°34'53	max. Earth dist.	6090 Dec 10 22:24	21° \mathbb{A} 20'12	19.41643 AU
minimum elong	6084 Nov 11 21:03	22° \mathbb{M} .49'44	0°34'55	morning rise	6090 Dec 27 17:13	22° \mathbb{A} 22'57	
max. Earth dist.	6084 Nov 11 02:15	22° \mathbb{M} .46'47	19.32848 AU	retrograde	6091 Mar 29 02:04	25° \mathbb{A} 43'39	
morning rise	6084 Nov 28 07:18	23° \mathbb{M} .51'12		opposition	6091 Jun 11 01:30	23° \mathbb{A} 41'38	0°13'50
retrograde	6085 Feb 28 08:12	27° \mathbb{M} .14'08		min. Earth dist.	6091 Jun 11 14:14	23° \mathbb{A} 40'16	17.43218 AU
opposition	6085 May 12 22:05	25° \mathbb{M} .11'32	0°37'19	direct	6091 Aug 26 17:18	21° \mathbb{A} 35'57	
min. Earth dist.	6085 May 13 14:50	25° \mathbb{M} .09'42	17.32958 AU	evening set	6091 Nov 30 06:05	25° \mathbb{A} 03'45	
direct	6085 Jul 27 19:41	23° \mathbb{M} .05'38					
evening set	6085 Oct 31 12:25	26° \mathbb{M} .34'53		conjunction	6091 Dec 16 12:57	26° \mathbb{A} 04'31	0°10'28
max. Earth dist.	6085 Nov 16 05:47	27° \mathbb{M} .33'41	19.33126 AU	minimum elong	6091 Dec 16 12:57	26° \mathbb{A} 04'31	0°10'30
				behind sun begin	6091 Dec 16 07:44	26° \mathbb{A} 03'43	
conjunction	6085 Nov 17 00:53	27° \mathbb{M} .36'41	0°31'55	behind sun end	6091 Dec 16 18:09	26° \mathbb{A} 05'19	
minimum elong	6085 Nov 17 00:53	27° \mathbb{M} .36'41	0°31'58	max. Earth dist.	6091 Dec 15 22:53	26° \mathbb{A} 02'20	19.44926 AU
morning rise	6085 Dec 03 10:22	28° \mathbb{M} .38'03		morning rise	6092 Jan 01 16:35	27° \mathbb{A} 04'49	
	6085 Dec 27 00:21	0° \mathbb{A}			6092 Mar 02 23:18	0° \mathbb{B}	
retrograde	6086 Mar 05 09:19	2° \mathbb{A} 00'46		retrograde	6092 Apr 01 23:55	0° \mathbb{B} 25'01	
opposition	6086 May 17 22:28	29° \mathbb{M} .58'15	0°33'53		6092 May 02 16:21	30° \mathbb{R} \mathbb{A}	
	6086 May 17 06:28	30° \mathbb{R} \mathbb{M} .		opposition	6092 Jun 15 01:45	28° \mathbb{A} 23'09	0°09'29
min. Earth dist.	6086 May 18 14:05	29° \mathbb{M} .56'33	17.33457 AU	min. Earth dist.	6092 Jun 15 12:54	28° \mathbb{A} 21'57	17.46789 AU
direct	6086 Aug 01 23:35	27° \mathbb{M} .52'20		direct	6092 Aug 30 19:44	26° \mathbb{A} 17'38	
	6086 Oct 13 04:37	0° \mathbb{A}		evening set	6092 Dec 04 06:24	29° \mathbb{A} 44'52	
evening set	6086 Nov 05 16:46	1° \mathbb{A} 21'38			6092 Dec 08 09:05	0° \mathbb{B}	
max. Earth dist.	6086 Nov 21 10:30	2° \mathbb{A} 20'30	19.33850 AU				
				conjunction	6092 Dec 20 12:26	0° \mathbb{B} 45'24	0°06'33
conjunction	6086 Nov 22 04:32	2° \mathbb{A} 23'20	0°28'44	minimum elong	6092 Dec 20 12:26	0° \mathbb{B} 45'24	0°06'35
minimum elong	6086 Nov 22 04:32	2° \mathbb{A} 23'20	0°28'47	behind sun begin	6092 Dec 20 06:11	0° \mathbb{B} 44'27	
morning rise	6086 Dec 08 12:56	3° \mathbb{A} 24'34		behind sun end	6092 Dec 20 18:41	0° \mathbb{B} 46'21	
retrograde	6087 Mar 10 07:56	6° \mathbb{A} 46'59		max. Earth dist.	6092 Dec 20 00:56	0° \mathbb{B} 43'37	19.48778 AU
opposition	6087 May 22 23:16	4° \mathbb{A} 44'35	0°30'13	morning rise	6093 Jan 05 14:58	1° \mathbb{B} 45'28	
min. Earth dist.	6087 May 23 15:28	4° \mathbb{A} 42'49	17.34410 AU	retrograde	6093 Apr 06 21:20	5° \mathbb{B} 05'08	
direct	6087 Aug 07 02:28	2° \mathbb{A} 38'40		opposition	6093 Jun 20 01:48	3° \mathbb{B} 03'28	0°05'05
evening set	6087 Nov 10 20:42	6° \mathbb{A} 07'52		min. Earth dist.	6093 Jun 20 11:42	3° \mathbb{B} 02'24	17.50899 AU
				direct	6093 Sep 04 21:44	0° \mathbb{B} 58'12	
conjunction	6087 Nov 27 07:26	7° \mathbb{A} 09'26	0°25'22	evening set	6093 Dec 09 06:19	4° \mathbb{B} 24'48	
minimum elong	6087 Nov 27 07:26	7° \mathbb{A} 09'26	0°25'24				
max. Earth dist.	6087 Nov 26 13:04	7° \mathbb{A} 06'33	19.35047 AU	conjunction	6093 Dec 25 11:11	5° \mathbb{B} 25'05	0°02'36
morning rise	6087 Dec 13 15:01	8° \mathbb{A} 10'31		minimum elong	6093 Dec 25 11:11	5° \mathbb{B} 25'05	0°02'39
retrograde	6088 Mar 14 07:43	11° \mathbb{A} 32'36		behind sun begin	6093 Dec 25 04:32	5° \mathbb{B} 24'04	
opposition	6088 May 26 23:55	9° \mathbb{A} 30'16	0°26'21	behind sun end	6093 Dec 25 17:50	5° \mathbb{B} 26'05	
min. Earth dist.	6088 May 27 14:45	9° \mathbb{A} 28'39	17.35842 AU	max. Earth dist.	6093 Dec 25 00:10	5° \mathbb{B} 23'22	19.53154 AU
direct	6088 Aug 11 06:59	7° \mathbb{A} 24'22		morning rise	6094 Jan 10 12:52	6° \mathbb{B} 24'53	
evening set	6088 Nov 14 23:58	10° \mathbb{A} 53'22		retrograde	6094 Apr 11 18:25	9° \mathbb{B} 44'02	
				opposition	6094 Jun 25 01:24	7° \mathbb{B} 42'35	0°00'40
conjunction	6088 Dec 01 09:57	11° \mathbb{A} 54'46	0°21'49	min. Earth dist.	6094 Jun 25 10:10	7° \mathbb{B} 41'39	17.55520 AU

desc. node	6094 Aug 20 02:16	5°348'45	max. Earth dist.	6100 Jan 22 08:27	2°54'07	19.86632 AU
direct	6094 Sep 09 22:39	5°337'36	morning rise	6100 Feb 07 07:23	3°52'39	
evening set	6094 Dec 14 05:21	9°303'31	retrograde	6100 May 09 15:05	7°08'12	
			opposition	6100 Jul 23 16:48	5°08'05	-0°24'26
conjunction	6094 Dec 30 09:19	10°303'32 -0°01'28	min. Earth dist.	6100 Jul 23 18:47	5°07'53	17.89706 AU
minimum elong	6094 Dec 30 09:18	10°303'32 0°01'26	direct	6100 Oct 08 20:06	3°05'09	
behind sun begin	6094 Dec 30 02:40	10°302'31	evening set	6101 Jan 11 05:47	6°25'29	
behind sun end	6094 Dec 30 15:57	10°304'32				
max. Earth dist.	6094 Dec 30 00:33	10°302'11 19.58003 AU	conjunction	6101 Jan 27 03:52	7°23'41	-0°23'43
morning rise	6095 Jan 15 09:56	11°303'05	minimum elong	6101 Jan 27 03:52	7°23'41	0°23'41
retrograde	6095 Apr 16 15:33	14°321'39	max. Earth dist.	6101 Jan 27 02:24	7°23'28	19.92818 AU
opposition	6095 Jun 30 00:56	12°320'29 -0°03'43	morning rise	6101 Feb 11 23:35	8°21'32	
min. Earth dist.	6095 Jun 30 08:10	12°319'42 17.60558 AU	retrograde	6101 May 14 09:10	11°36'25	
direct	6095 Sep 14 23:38	10°315'50	opposition	6101 Jul 28 13:34	9°36'27	-0°28'09
evening set	6095 Dec 19 03:35	13°340'58	min. Earth dist.	6101 Jul 28 13:24	9°36'28	17.95913 AU
			direct	6101 Oct 13 19:18	7°33'49	
conjunction	6096 Jan 04 06:24	14°340'42 -0°05'24				
minimum elong	6096 Jan 04 06:23	14°340'42 0°05'22				
behind sun begin	6096 Jan 03 23:58	14°339'43				
behind sun end	6096 Jan 04 12:48	14°341'40				
max. Earth dist.	6096 Jan 03 22:24	14°339'28 19.63231 AU				
morning rise	6096 Jan 20 06:09	15°339'59				
retrograde	6096 Apr 20 11:51	18°358'00				
opposition	6096 Jul 04 00:12	16°357'03 -0°08'04				
min. Earth dist.	6096 Jul 04 06:36	16°356'23 17.65962 AU				
direct	6096 Sep 18 23:17	14°352'45				
evening set	6096 Dec 23 00:58	18°317'03				
conjunction	6097 Jan 08 02:51	19°316'30 -0°09'15				
minimum elong	6097 Jan 08 02:51	19°316'30 0°09'13				
behind sun begin	6097 Jan 07 21:14	19°315'39				
behind sun end	6097 Jan 08 08:27	19°317'20				
max. Earth dist.	6097 Jan 07 20:44	19°315'34 19.68785 AU				
morning rise	6097 Jan 24 01:41	20°315'30				
retrograde	6097 Apr 25 08:20	23°332'55				
opposition	6097 Jul 08 22:52	21°332'13 -0°12'20				
min. Earth dist.	6097 Jul 09 03:33	21°331'44 17.71637 AU				
direct	6097 Sep 23 23:40	19°328'16				
evening set	6097 Dec 27 21:36	22°351'40				
conjunction	6098 Jan 12 22:26	23°350'48 -0°13'02				
minimum elong	6098 Jan 12 22:26	23°350'48 0°13'01				
behind sun begin	6098 Jan 12 18:24	23°350'11				
behind sun end	6098 Jan 13 02:29	23°351'25				
max. Earth dist.	6098 Jan 12 17:14	23°350'01 19.74572 AU				
morning rise	6098 Jan 28 20:27	24°349'31				
retrograde	6098 Apr 30 03:01	28°306'20				
opposition	6098 Jul 13 21:22	26°305'51 -0°16'30				
min. Earth dist.	6098 Jul 14 01:37	26°305'25 17.77529 AU				
direct	6098 Sep 28 22:16	24°302'15				
evening set	6099 Jan 01 17:16	27°324'41				
conjunction	6099 Jan 17 17:09	28°323'31 -0°16'44				
minimum elong	6099 Jan 17 17:09	28°323'31 0°16'41				
max. Earth dist.	6099 Jan 17 13:22	28°322'56 19.80544 AU				
morning rise	6099 Feb 02 14:19	29°321'56				
	6099 Feb 13 08:32	0°				
retrograde	6099 May 04 22:35	2°38'08				
opposition	6099 Jul 18 19:17	0°37'51 -0°20'33				
min. Earth dist.	6099 Jul 18 21:31	0°37'37 17.83560 AU				
	6099 Aug 03 02:49	30°				
direct	6099 Oct 03 22:21	28°334'35				
	6099 Dec 01 17:18	0°				
evening set	6100 Jan 06 12:04	1°56'00				
conjunction	6100 Jan 22 11:01	2°54'31 -0°20'18				
minimum elong	6100 Jan 22 11:01	2°54'31 0°20'16				