

2024 Priority World Asteroidal Events

Steve Preston

Jul 15, 2023

PRIORITY Worldwide Asteroidal Occultations in 2024

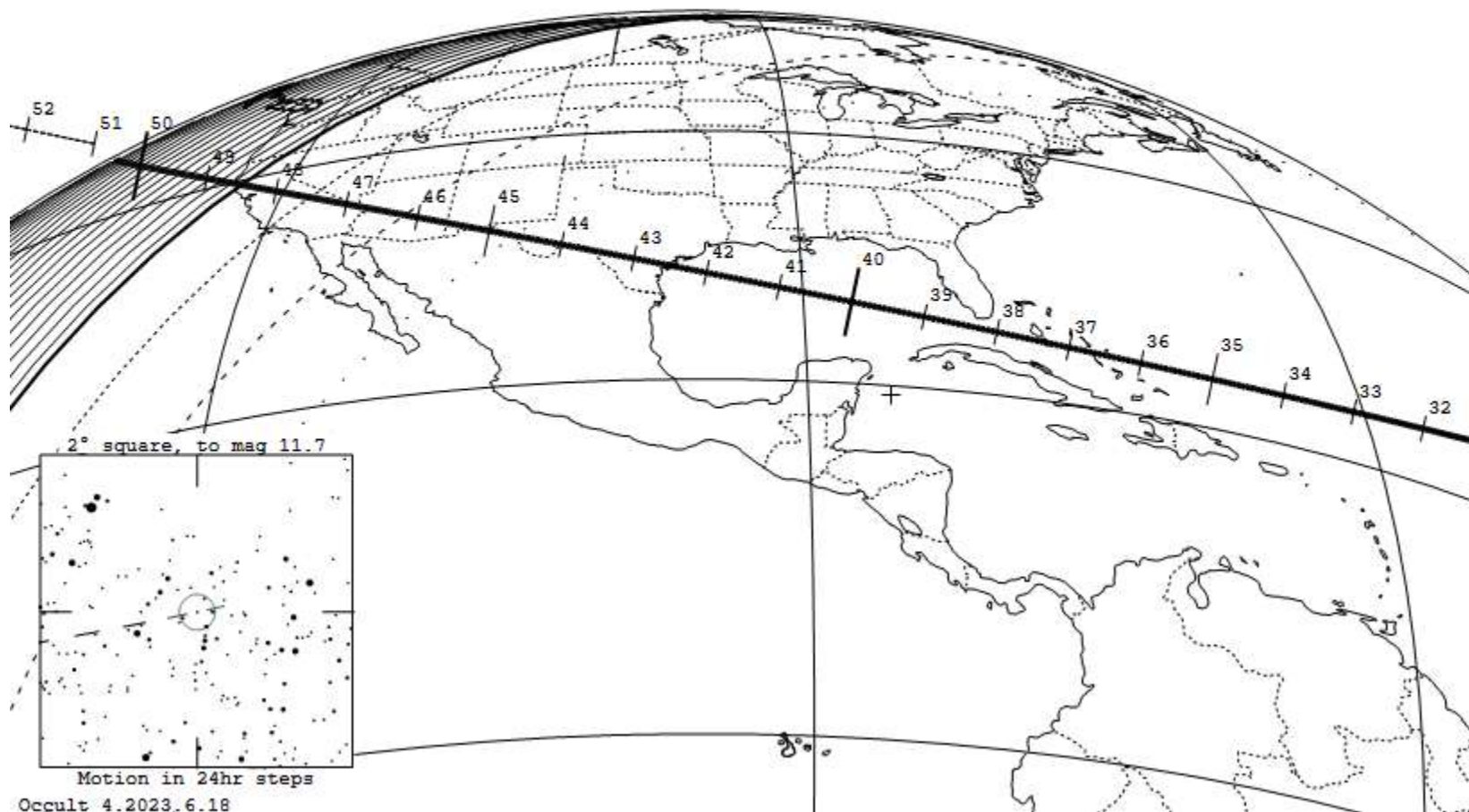
Date			U.T.		Diameter		Durn	Star	Mag-Drop			Elon %	Star	d Rely	Planet
y	m	d	h	m	km	"	sec/m	mag	V	R	*	o Ill	No.	<1.4	No Name
2024	Jul	11	3	39.1	1.09	0.001	0.21s	10.7	10.5	10.9	143		TYC 6800-01243-1	s 1.05	152830 Dinkinesh
2024	Nov	28	19	3.6	3.92	0.004	0.30s	11.2	8.0	8.0	103		UCAC4 505-051219	0.75	52246 Donaldjohanson

152830 Dinkinesh occults TYC 6800-01243-1 on 2024 Jul 11 from 3h 28m to 3h 51m U

Star: (Dia = 0.1 mas)
 Mv 10.7; Mb 11.5; Mr 9.8
 RA = 16 38 38.3843 (astrometric)
 Dec = -25 8 8.795
 [of Date: 16 40 9, -25 11 9]
 Prediction of 2023 Jun 16.8
 Reliable 1.1 (good),

Durations: Max = 0.21 secs
 1km = 0.19 secs, 1mas = 0.22 secs
 Mag Drop: 10.5 [100%]v, 10.9 [100%]r
 Sun : Dist = 143°
 Moon: Dist = 83°, illum = 25%
 Error 47.0 x 10.0 mas in PA 100°

Asteroid:
 Mag = 21.1
 Dia = 1.09 ± 0.10km, 1.0 mas
 Parallax = 5.671"
 Hourly dRA = -1.351s
 dDec = 3.85"
 JPL#23INTG:2023Mar16, Known errors

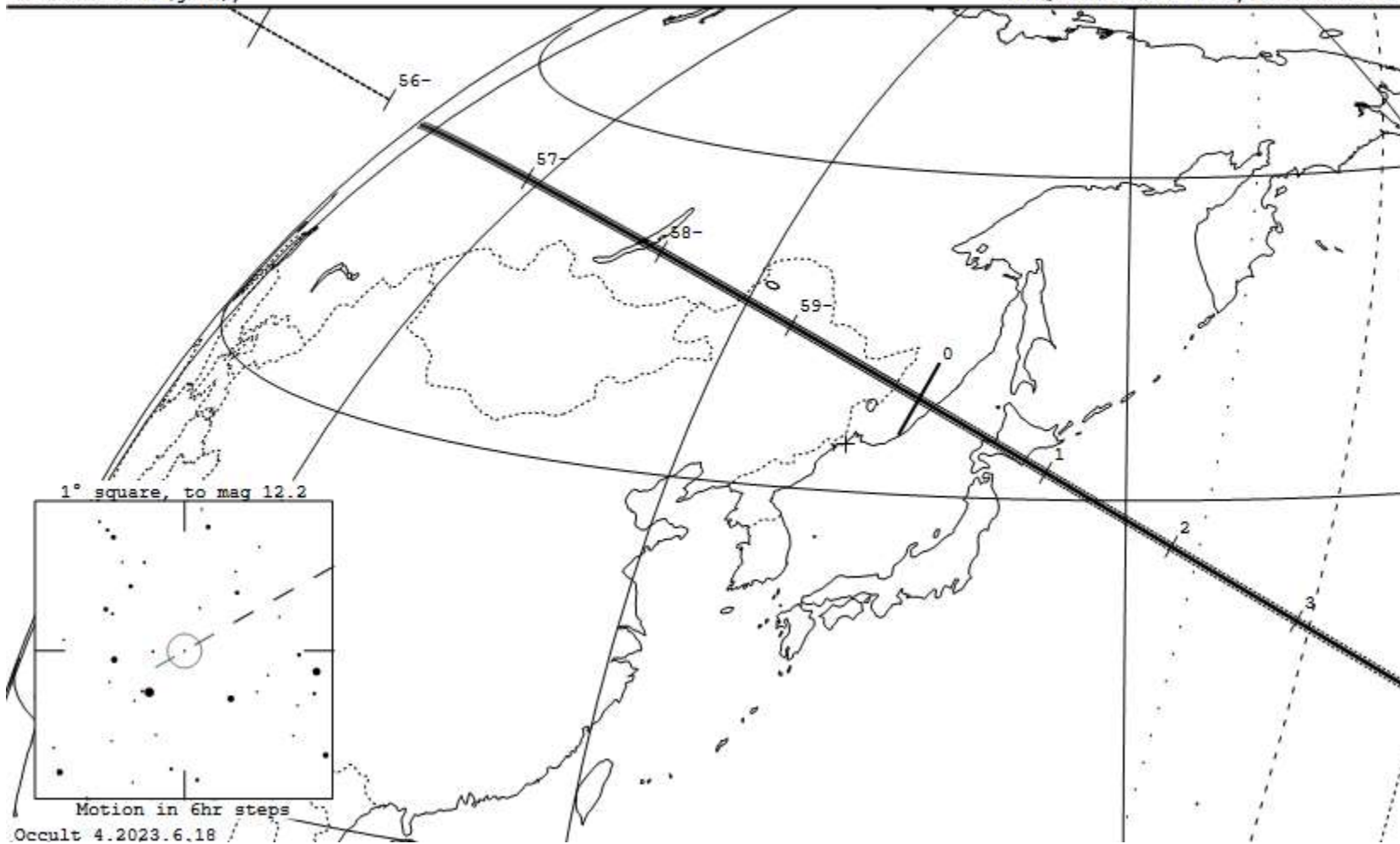


52246 Donaldjohanson occults UCAC4 505-051219 on 2024 Nov 28 from 18h 56m to 19h 1

Star: (Dia < 0.1 mas)
Mv 11.2; Mb 11.5; Mr 10.8
RA = 9 38 16.8496 (astrometric)
Dec = 10 54 55.731
[of Date: 9 39 37, 10 48 13]
Prediction of 2023 Jun 16.8
Reliable 0.8 (good),

Durations: Max = 0.30 secs
1km = 0.076 secs, 1mas = 0.081 secs
Mag Drop: 8.0 [100%]v, 8.0 [100%]r
Sun : Dist = 103°
Moon: Dist = 76°, illum = 6%
Error 32.0 x 16.0 mas in PA 111°

Asteroid:
Mag = 19.2
Dia = 3.92 ± 0.40km, 3.7 mas
Parallax = 6.047"
Hourly dRA = 2.656s
dDec = -22.46"
JPL#20INTG:2022Feb04, Known errors



Occult 4.2023.6.18