D a t e		Name	Quadrant	Wt.	Gl. M. T.	R e m a r k s
1878	Nov. 17	Te.	s. f.	5	9 ^h 5 ^m 1	Fully up with ring
	" 18	Di.	n. p.	3	5.13.7	" " " "
	" 18	Rh.	s. f.	5	6.58.9	" " " "
	" 18	Te.	n. p.	5	7.40.2	" " " "
	" 19	Di.	s. p.	5	6. 7.5	" " " "
	" 19	Te.	s. f.	5	6 22.5	" " " "
	" 22	Di.	s. f.	5	7.39.5	" " " "
	" 22	Rh.	s. p.	5	10.14.6	" " " "
	" 23	Di.	n. f.	5	8 37.0	" " " "
	" 27	Rh.	s. f.	5	7.50.3	" " " "
	" 28	Te.	s. p.	5	9.47.5	" " " "
	" 29	Rh.	n. f.	5	4.53.5	" " " "
	" 29	Di. & Enc.	n. p. & s. f.	5	5.41.9	Enc. S. & dist. 1''7 by est., in same perp. to axis
	Dec. 3	Di.	s. f.	2	6.31.4	Thin clouds. Up with ring
	" 4	Di.	n. f.	4	7.25.0	Fully up with ring
	" 4	Te.	s. f.	5	8.47.8	" " " "
	" 6	Te.	s. f.	3	6. 7.1	" " " "
	" 6	Rh.	s. f.	3	8.44	" " " "

1878 Sept. 22. Titan was observed in conjunction with the center of Saturn, North, and in contact with the ball, at 10^h + 42^m 2 Time obtained with precision. —

1878 Nov. 9. Egress of Titan from transit of Saturn. Position angle on Saturn's limb 305° 92.

First seen as a projecting point, at 6^h + 4^m

Fully off the limb, at 6^h + 14^m 6
All the observations were made by myself, and with the same micrometer eye Piece — Magnifying power 275.

Morrison Observatory, Glasgow Missouri,

May 1879.

C. W. Prichett.

Eclipses of Jupiter's Satellites observed at Windsor, N. S. Wales in 1878.

Date of Obs.	Satellite	Phase	Observat. Mean Time of Phase.	R e m a r k s.
June 28	I	D	10 ^h 20 ^m 22 ^s 0	Brilliant sky and excellent definition.
July 8	III	D	11.19.27.4	Clear sky and excellent definition.
" 22	H	D	11.20.39.4	Clear sky and excellent definition.
" 30	I	R	9.11. 7.7	{ Clear sky and excellent definition. Satellite came out close to the planets limb, but the observation was very good. Sky slightly hazy, but definition excellent. I was rather late in catching the first faint trace of the satellite. The reapp. occurred nearly seven minutes before the Nautical Almanac time.
" 30	IV	R	13. 0.19.7	
Aug. 6	I	R	11. 5.59.5	Sky beautifully clear, and definition excellent.
" 8	I	R	5.35.15.8	{ Sky beautifully clear. The planets belts were distinct, but the limb boiled considerably. Observation made in twilight.
" 9	H	R	8.37.36.7	
" 13	III	R	10.44.30.4	Sky beautifully clear, and definition good.
" 15	I	R	7.29.52.5	Sky clear and definition pretty good. Clear sky, but images rather unsteady and definition bad.

Date of Obs.	Satellite	Phase	Observat. Mean Time of Phase.	Remarks
Aug. 16	IV	R	7 ^h 7 ^m 41 ^s .3	{ Sky beautifully clear, with good definition. The recorded time is probably late to the extent of five seconds. Satellite had attained full brightness by 7 ^h 16 ^m 30 ^s . The reappearance occurred fully nine minutes before the time in the N. Almanac.
„ 16	I	R	11.13. 6.1	{ Sky still clear, but definition not so good. Not certain of the satellite at recorded time, but quite so five seconds late.
„ 22	I	R	9.24.48.3	Sky clear and definition pretty good.
Sept. 7	I	R	7.44. 6.9	{ Sky beautifully clear and definition good. The noted time is probably somewhat late owing to my eye being fixed on a point nearer to the planet.
„ 14	I	R	9.39.24.4	{ Much very thin hazy cloud, but apparently clear about planet. Good definition.
„ 18	III	R	6.48.21.4	Clear sky and good definition.
„ 25	III	R	10.49.49.9	Clear sky. Images unsteady, with imperfect definition.
Oct. 5	IV	D	9.10.41.2	Clear sky and pretty fair definition.
„ 12	II	R	8. 6 22.8	Reappearance observed through thin hazy cloud; bad definition.
„ 16	I	R	6.19. 1.2	{ Sky beautifully clear, but with strong twilight, the sun's upper limb having disappeared behind the horizon 11 min. previously.
„ 19	II	R	10.43.41.0	Clear sky and excellent definition.
„ 22	IV	R	7.54.42.0	{ Planet only occasionally seen through stratus cloud. At the recorded time the satellite was faintly seen through the cloud having obviously reappeared some time previously.
„ 23	I	R	8.14. 6.6	Sky beautifully clear, with excellent definition.
Nov. 7	III	D	7.28. 3.1	{ Clear sky and pretty good definition. I thought I could see a faint trace of the satellite five seconds after the recorded time. The fourth satellite was remarked to be unusually faint.
„ 7	III	R	10.58.16.6	{ Sky still clear. The definition was pretty good, although the planet was low and the limb boiled slightly.
„ 15	I	R	8.28.55.6	Sky somewhat hazy and definition imperfect.
Dec. 8	I	R	8.43. 9.8	{ Clear sky, but full moon present. The planet's limb boiled considerably.

The eclipse of August 8th was observed with the 4½ inch equatorial and a power of about 30 diameters, and that of August 13th with a telescope of 3¼ in. aperture and a power of 30. In all other cases the equatorial of 4½ in. aperture was employed with a power of 180. It appears from the observations that the errors of the theoretical eclipses of the fourth satellite were very large. This satellite was observed to transit the disk of its primary as a dark spot on August 24th, and the third presented the same phenomenon on September 7th and 14th, and October 20th.

Observatory, Windsor, N. S. Wales, April 21. 1879.

John Tebbutt.

Preisaufgaben der holländischen Gesellschaft der Wissenschaften zu Haarlem.

(Auszug aus dem Programm von 1879; ins Deutsche übersetzt und für die Astr. Nachrichten mitgeteilt von Dr. J. A. C. Oudemans.

1. Der Komet von Olbers, von welchem nur eine Erscheinung im Jahre 1815 beobachtet worden ist, muss nach den Rechnungen Bessels (Abh. der Math. Cl. der K. pr. Akademie der Wissenschaften, aus den Jahren 1812—1813, Berlin 1816) im Anfange des Jahres 1887 wieder sein Perihel erreichen.