

PHOTOGRAPHIC POSITIONS OF COMET *f* 1913 (DELAN),

By WILLIAM O. BEAL.

The plates from which these positions have been obtained were taken with the 10½-inch equatorial of the University of Minnesota. The exposure times varied from five to twelve minutes. The scale of the plates is 1^{mm} = 1'. The measurements were made with the Repsold measuring machine, and the star places were

taken from the A. G. Zones. In the table the following designations are used:

B = WILLIAM O. BEAL,
F = G. LEE FLEMING,
K = BESSIE L. KIRK,
W = HUGH B. WILCOX.

	Minneapolis M.T. 1914	α 1914.0	δ 1914.0	log $p\Delta$		No. of Exposures	No. of Comp. Stars	Computer	Photo. by
				a	δ				
1	Feb. 27 ^d 7 ^h 56 ^m 25 ^s	2 41 55.89	3 25 17.6	9.537	0.776	2	4	B	B
2	Mar. 3 7 48 49	2 43 17.85	4 9 7.4	9.545	0.773	2	4	B	B
3	Mar. 8 7 25 24	2 45 18.87	5 4 15.9	9.539	0.768	2	3	B	B
4	Mar. 11 7 28 46	2 46 41.69	5 37 42.3	9.556	0.767	4	5	B	B
5	Mar. 12 7 32 58	2 47 10.53	5 48 54.7	9.564	0.767	4	6	B	B
6	Mar. 15 7 34 19	2 48 42.50	6 22 33.0	9.576	0.767	3	6	B	B
7	Mar. 19 7 47 40	2 50 55.76	7 7 46.3	9.598	0.770	4	6	B	B
8	Mar. 23 7 47 40	2 53 20.28	7 53 11.8	9.606	0.771	2	5	K	B and F
9	Sept. 24 7 41 11	11 11 24.02	47 42 9.9	9.672	0.855	1	4	B	B and W

Minneapolis, Minn., January 22, 1916.

OBSERVATIONS OF ASTEROIDS,

MADE AT THE U. S. NAVAL OBSERVATORY WITH THE PHOTOGRAPHIC TELESCOPE,

By GEORGE H. PETERS.

[Communicated by Captain J. A. HOOGWERFF, U. S. Navy, Superintendent.]

Name	Mag.	Date 1915	G. M. T.	α 1915.0	δ 1915.0
(230) <i>Athamantis</i>	10.1	July 14	18 ^h 23 ^m .2	22 ^h 1 ^m 27 ^s .0	+3° 26' 19"
(230) <i>Athamantis</i>	10.1	July 18	18 39 .0	21 59 49.7	+3 40 48
(420) <i>Bertholda</i>	12.4	Sept. 8	17 32 .0	23 11 25.5	+4 35 00
(69) <i>Hesperia</i>	11.0	Sept. 10	16 07 .1	23 6 33.8	-1 15 33
New	12.5	Sept. 10	17 47 .0	23 42 03.0	+7 34 47
(403) <i>Cyane</i>	12.5	Sept. 12	14 55 .0	22 00 15.6	+2 00 00
(420) <i>Bertholda</i>	12.4	Sept. 12	16 22 .0	23 8 46.8	+4 17 08
New	12.5	Sept. 12	17 38 .0	23 40 15.1	+7 34 35
(69) <i>Hesperia</i>	11.0	Sept. 13	15 14 .0	23 4 26.0	-1 35 35
(420) <i>Bertholda</i>	12.4	Sept. 13	16 34 .5	23 8 06.3	+4 12 24
(469) <i>Argentina</i>	13.5	Sept. 15	16 40 .2	23 44 28.2	+4 49 43
(124) <i>Alkeste</i>	10.5	Sept. 15	18 15 .0	0 53 03.7	+5 50 03
(239) <i>Adrastea</i>	13.0	Sept. 15	18 15 .0	0 58 46.6	+5 27 32
(167) <i>Urda</i>	13.0	Sept. 15	18 15 .0	0 59 29.2	+5 3 34
(787) [1914 U Q]	12.4	Sept. 15	18 15 .0	1 6 10.6	+5 37 02
(469) <i>Argentina</i>	13.5	Sept. 16	16 45 .0	23 43 42.5	+4 47 05
(124) <i>Alkeste</i>	10.5	Sept. 16	18 47 .0	0 52 21.1	+5 44 26
(239) <i>Adrastea</i>	13.0	Sept. 16	18 47 .0	0 58 18.4	+5 20 40
(167) <i>Urda</i>	13.0	Sept. 16	18 47 .0	0 58 50.4	+4 58 38

OBSERVATIONS OF ASTEROIDS (Continued)

Name	Mag.	Date 1915	G. M. T.	α 1915.0	δ 1915.0
(787) [1914 U Q]	12.4	Sept. 16	18 ^h 47 ^m .0	1 ^h 5 ^m 37 ^s .0	+5° 25' 09''
(377) <i>Campania</i>	11.1	Oct. 9	15 54 .0	0 29 48 .1	+6 59 59
(57) <i>Mnemosyne</i>	10.1	Oct. 9	15 54 .0	0 30 26 .6	+6 56 38
(518) <i>Halawe</i>	12.7	Oct. 9	16 45 .2	0 50 42 .3	+7 33 18
(377) <i>Campania</i>	11.1	Oct. 10	15 05 .0	0 29 04 .4	+6 52 06
(57) <i>Mnemosyne</i>	10.1	Oct. 10	15 05 .0	0 29 49 .6	+6 47 05
(377) <i>Campania</i>	11.1	Oct. 11	13 15 .3	0 28 23 .0	+6 44 36
(57) <i>Mnemosyne</i>	10.1	Oct. 11	13 15 .3	0 29 14 .5	+6 37 59
(518) <i>Halawe</i>	12.7	Oct. 12	14 21 .8	0 48 29 .6	+7 4 52
(184) <i>Dejopeja</i>	12.7	Oct. 12	16 24 .3	1 07 23 .2	+8 25 05
(377) <i>Campania</i>	11.1	Oct. 25	13 09 .1	0 19 17 .7	+4 56 48
(184) <i>Dejopeja</i>	12.7	Oct. 27	15 30 .0	0 56 49 .1	+7 21 33

In the above list have been incorporated the corrections kindly furnished by PROFESSOR COHN, Director of the Royal Astronomical Computing Bureau of Berlin. Several designations were changed by him, and those that were in doubt were identified. One asteroid is new.

Asteroid observations are taken at the Naval Observatory in the following zones:

March, April, September, October + 4° to + 8°;
 May to August, inclusive, + 0° to + 4°;
 November to February, inclusive, +12° to +16°.

A NEW VARIABLE STAR,

1855.0 α 17^h 0^m 50^s.7 δ + 17° 22'.0
 1900.0 17 2 50.4 + 17 18.2

By E. E. BARNARD.

I have found a new variable star on my photographs with the Bruce telescope of this observatory. Its position with reference to *BD* + 17° 31' 68" (9.3) on 1916 March 18 was

Position Angle 26°.9
 Distance 248".8

from which the above position was determined. Visually

the star is yellow. It was bright (about 9½ magnitude) on 1916 March 6, and faint on 1911 May 24.

PROF. E. C. PICKERING kindly informs me that the variable is new. It is shown on a number of H. C. O. plates where it ranges from 10.1 magnitude to perhaps less than 15th magnitude. This data will be very valuable for the determination of its period and light curve.

Yerkes Observatory, Williams Bay, Wisconsin, 1916 March 27.

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