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COMET P/2008 A2 (LINEAR)

An apparently asteroidal object discovered by the LINEAR survey (discovery observation tabulated below), and posted on the Minor Planet Center's 'NEOCP' webpage, has been found to show cometary appearance on images obtained at Table Mountain: CCD images on Jan. 16.24–16.26 UT by J. Young (0.61-m reflector) show a $5''$-$6''$ round coma of mag 19.0 and a bright central condensation in marginal seeing, and a $4''$ coma is visible on images from Jan. 19.1. Young adds that the comet has changed brightness considerably, being at mag 19.5 on Jan. 14, 19.3 on Jan. 18, and 20.2 on Jan. 19 — though the coma is less pronounced on these other dates (the Jan. 18 images were obtained by D. Mayes).

2008 UT	α_{2000}	δ_{2000}	Mag.
Jan. 13.22223	$6^h03^m22^s.94$	$+43°46'02''.8$	20.1

The available astrometry, the following elliptical orbital elements, and an ephemeris appear on *MPEC* 2008-B18.

$$
\begin{array}{llll}
T = 2008\text{ June }12.932\text{ TT} & & \omega = 233^\circ.546 & \\
e = 0.59071 & & \Omega = 315.368 & 2000.0 \\
q = 1.30603\text{ AU} & & i = 19.260 & \\
a = 3.19100\text{ AU} & n^\circ = 0.172908 & P = 5.70\text{ years} &
\end{array}
$$

COMETS C/2007 T12–T14, C/2007 U3, C/2007 U4 (SOHO)

Further to *IAUC* 8910, additional Kreutz-sungrazing comets have been found on SOHO website images, as tabulated below. C/2007 T12 was small and diffuse (mag 7.5). C/2007 T13 was extremely faint (mag $\sim$ 8) and diffuse. C/2007 T14 was extremely faint (mag $\sim$ 7.5) and tiny in C3-coronagraph images, and stellar in appearance (mag 7.5) in C2 images. C/2007 U3 was stellar in appearance (mag $\sim$ 6) in C3 images, and fairly condensed with a hint of a thin, faint tail in C2 images. C/2007 U4 was diffuse and elongated (mag 7.5).

Comet	2007 UT	α_{2000}	δ_{2000}	Inst.	F	*MPEC*
C/2007 T12	Oct. 13.579	$13^h06^m.4$	$-\ 8°43'$	C2	AK	2008-A50
C/2007 T13	15.329	13 12.4	$-\ 9\ 11$	C2	HS	2008-A50
C/2007 T14	15.471	13 14.9	$-\ 9\ 55$	C3/2	HS	2008-A50
C/2007 U3	24.113	13 37.3	$-13\ 35$	C3/2	HS	2008-A51
C/2007 U4	24.146	13 46.9	$-12\ 39$	C2	HS	2008-A51

2008 January 19 *Daniel W. E. Green*