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INTERNATIONAL ASTRONOMICAL UNION**

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COMET P/2002 EX₁₂ (NEAT)

An apparently asteroidal object reported by NEAT, and designated 2002 EX₁₂ (discovery observation given below; cf. *MPS* 52825), has been reported as showing a cometary appearance by observers at two different sites. B. D. Warner, Colorado Springs, CO, writes that his CCD frames taken with a 0.35-m Schmidt-Cassegrain reflector on 2005 July 28.26 UT show a 77'' tail in p.a. 144°, while frames taken on July 29.26 show a 90'' tail in p.a. 145°. A. Fitzsimmons, Queen's University, Belfast, reports that the object showed no coma but a faint, straight tail extending 30'' in p.a. 145° on *R*-band images taken on July 29.5 with the 2.0-m 'Faulkes Telescope North' at Haleakala; he adds that observations with that telescope on 2005 May 10.5 and with the 3.5-m New Technology Telescope on May 14.3 did not obviously show a tail.

2002	UT	α_{2000}	δ_{2000}	Mag.
Mar.	15.26990	12 ^h 19 ^m 20 ^s .62	-0°28'06''.9	19.8

The following orbital elements are taken from *MPEC* 2005-P01:

$$\begin{array}{l}
 \text{Epoch} = 2005 \text{ Aug. } 18.0 \text{ TT} \\
 \left. \begin{array}{l}
 T = 2005 \text{ Sept. } 17.8587 \text{ TT} \quad \omega = 217^\circ 9272 \\
 e = 0.767520 \quad \Omega = 176.2462 \\
 q = 0.605325 \text{ AU} \quad i = 11.3189
 \end{array} \right\} 2000.0 \\
 a = 2.603775 \text{ AU} \quad n^\circ = 0.2345843 \quad P = 4.202 \text{ years}
 \end{array}$$

COMET C/2005 O1 (NEAT)

Another apparently asteroidal object found by NEAT (discovery observation below) has also been found to show cometary activity by Fitzsimmons, his *R*-band CCD frames taken with the 2.0-m reflector on July 31.5 UT showing a roughly symmetrical coma extending to 3''.5 from the object's condensation.

2005	UT	α_{2000}	δ_{2000}	Mag.
July	27.39588	22 ^h 31 ^m 49 ^s .38	-21°25'10''.7	19.1

The available astrometry, preliminary parabolic orbital elements ($T = 2005$ May 23.987 TT, $q = 3.61757$ AU, $\omega = 325^\circ 726$, $\Omega = 304^\circ 594$, $i = 156^\circ 196$, equinox 2000.0), and an ephemeris appear on *MPEC* 2005-P09.