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INTERNATIONAL ASTRONOMICAL UNION**

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*COMET C/2007 K6 (McNAUGHT)*

R. H. McNaught reports his discovery of another comet on 0.5-m Uppsala Schmidt telescope images obtained in the course of the Siding Spring Survey (discovery observation tabulated below), the object displaying a marginal coma of diameter  $\sim 6''$ . Additional images by McNaught on May 30.8 UT show an almost, but-not-quite-asteroidal appearance in excellent seeing, the coma diameter given as  $4''$  (FWHM).

2007 UT	$\alpha_{2000}$	$\delta_{2000}$	Mag.
May 27.79676	22 <sup>h</sup> 50 <sup>m</sup> 33 <sup>s</sup> .10	-42°40'59".9	18.9

The available astrometry, the following preliminary parabolic orbital elements, and an ephemeris appear on *MPEC* 2007-K82.

$$\left. \begin{array}{l} T = 2007 \text{ June } 21.950 \text{ TT} \\ q = 3.46556 \text{ AU} \end{array} \right\} \begin{array}{l} \omega = 334.978 \\ \Omega = 298.186 \\ i = 105.095 \end{array} \left. \vphantom{\begin{array}{l} T \\ q \end{array}} \right\} 2000.0$$

*COMET C/2007 K5 (LOVEJOY)*

Additional precise astrometry of this comet (cf. *IAUC* 8840) has been published on *MPEC* 2007-K80, where the following preliminary parabolic orbital elements also appear:

$$\left. \begin{array}{l} T = 2007 \text{ Apr. } 26.977 \text{ TT} \\ q = 1.12113 \text{ AU} \end{array} \right\} \begin{array}{l} \omega = 250.115 \\ \Omega = 191.798 \\ i = 65.141 \end{array} \left. \vphantom{\begin{array}{l} T \\ q \end{array}} \right\} 2000.0$$

*COMET C/2007 JA<sub>21</sub> (LINEAR)*

Further to *IAUC* 8837, J. Young reports that his CCD images taken on May 14.29–14.36 UT with the Table Mountain 0.61-m *f*/16 Cassegrain reflector show a coma of diameter  $5''$ – $6''$  that was slightly elongated along the comet's path of motion, with a faint fan-shaped tail extending  $20''$  spanning p.a.  $315^\circ$ – $25^\circ$ . Improved orbital elements from *MPEC* 2007-K78:

$$\left. \begin{array}{l} T = 2006 \text{ Nov. } 10.980 \text{ TT} \\ q = 5.35972 \text{ AU} \end{array} \right\} \begin{array}{l} \omega = 93.308 \\ \Omega = 65.556 \\ i = 89.825 \end{array} \left. \vphantom{\begin{array}{l} T \\ q \end{array}} \right\} 2000.0$$