

## FEATURE OF THE MONTH



## CEPHEUS ( $40.8^{\circ} \mathrm{N}-45.8^{\circ} \mathrm{E}$ )

Sketch and Text by Robert H. Hays, Jr. - Worth, Illinois, USA December 21, 2001 - 6 inch Newtonian - 170X - Seeing 7/10

I sketched this crater and vicinity on the evening of December 20/21, 2001, while the 4th magnitude star Tau Aquarii was behind the moon. Earlier, I had watched 69 Aquarii graze the southern limb, disappearing and reappearing twice in 4-1/2 minutes. This crater is located east of Lacus Somniorum, and was fairly well placed due to favorable libration. Cepheus has a very small central peak and a small crater pit immediately to the south of this peak. The northeast rim is pushed in by Cepheus A, and there is a pronounced corner at the southeast rim. This crater also shows some terracing on its inside walls.

I noticed some wrinkling north of Cepheus, and shading outside the west rim, indicating a possible dropoff in that area. There is a curved string of modest hills south and west of Cepheus. The area southeast of Cepheus was duskier than elsewhere in the vicinity, almost giving the impression of a bit of mare material between Cepheus and Franklin (not sketched, southeast of Cepheus).

Editor: Cepheus and vicinity can be found on Map 15 of Rukl's Atlas of the Moon.

## LUNAR NOTEBOOK



## Report by Lee Smojver - Tukwila, Washington, USA

The sketches in two recent Lunar Observers (October and November 2001) were by Colin Ebdon and Nigel Longshaw. I worked from Colin's sketch since I was unable to determine with certainty which part of Nigel's sketch was the actual dome.

I've had time to examine Rukl's Plate 34 and Plates 107 and 132 in Dinsmore Alter's Lunar Atlas. Rukl's seems to show an outline of a ridge or elevated plateau, while in the Alter photos there is a bright spot in the area of the sketch of the dome, which may also be associated with a ridge or plateau. Although the Alter photos, based on a Lick plate, show a definite highlight in the area of the dome in the sketch, there are other highlights in what seems to be an elevated area. My first photograph doesn't sufficiently resolve the area to differentiate from an elevated ridge/plateau area or a dome. In this photo, the lighting and resolution certainly seem to indicate a low rounded area reminiscent of a dome swelling but finer detail is blurred and the general area is not well resolved.

The detail in the second photo is much finer. The sun is not quite so high, the relief is very good but the increased shadow, while helping reveal fine relief detail, does hide some of the area. It's still not completely clear to me if there is a dome ..... or a series of hills and plateaus ..... and/or possibly some other smaller dome(s) in the immediate vicinity.

## OBSERVATIONS RECEIVED

ED CRANDALL - WINSTON-SALEM, NORTH CAROLINA, USA
CCD Images of Copernicus \& Eratosthenes, Reinhold \& Lansberg, Copernicus \& Fauth
DANIEL DEL VALLE - AGUADILLA, PUERTO RICO
CCD Images of Kepler Rays, Schiller, Plato, Clavius (2), Maginus Sunrise Ray, Aristarchus, Proclus Rays, Wargestin \& Nasmyth, Sirsalis

Also, sketch of NE Mare Crisium
COLIN EBDON - COLCHESTER, ESSEX, ENGLAND
Sketches of Boussingault, Encke \& Kepler, Aristarchus, Western rim of Mare Crisium, Prinz \& Montes Harbinger, Altai Scarp

ROBERT H. HAYS, JR. - WORTH, ILLINOIS, USA
Sketches of Lexell-A, Cepheus, Daniell
Also, 67 timings of stars occulted by the Moon
WALT KUPSON - MIDDLEBURY, CONNECTICUT, USA
CCD Images of Sinus Iridum, Rupes Recta, Plato, Hevelius \& Vicinity
CLAUDE LIBERT - GENT, BELGIUM
CCD Image of Sinus Medii
JOSEPH H.C. LIU - SALINAS, CALIFORNIA - USA
CCD Images of Darwin \& Rima Sirsalis, Wilhlelm \& Longomontanus
LEE SMOJVER - TUKWILA, WASHINGTON, USA
CCD Images of Dome near Julius Caesar (2)

## LUNAR CALENDAR - MAY 2002 (UT)

| 4 | 02:00 | Moon 4.2 Degrees SSE of Neptune |
| :---: | :---: | :---: |
| 4 | 07:17 | Last Quarter |
| 7 | 19:00 | Moon at Apogee (251,955 miles - 405,472 km) |
| 12 | 10:46 | New Moon (Start of Lunation 982) |
| 14 | 07:00 | Moon 1.1 Degrees NNW of Saturn |
| 14 | 23:00 | Moon 0.84 Degrees SSE of Venus |
| 19 | 19:42 | First Quarter |
| 23 | 11:51 | Full Moon |
| 26 | 10:00 | Moon 4.3 Degrees SSE of Neptune |

## TOPOGRAPHICAL STUDIES



SINUS MEDII
CCD Image by Claude Libert - Gent, Belgium April 10, 2002-12 inch SCT - 2X Barlow


NORTH-EASTERN MARE CRISIUM
Sketch by Daniel del Valle - Aguadilla, Puerto Rico January 1, 2002-8 inch SCT - 339X - Seeing 7/10

