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**DAVID DUNLAP OBSERVATORY**

74" LOG BOOK

**VOL: 81**

Plate Nos: cC 331913 - cE 09810

DATE: May 31, 1995 - Sep. 11 1995
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**Emulsion Batches:**

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Emulsion Batches: 30 again
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### Observations

- **Spectr. Temp.** = 100
- **Dome Temp./Hum.** = 19.7°C/61.5%
- **Focus** = 6.74
- **Transparency Conditions** = Unclearly depicted

**Notes:**
- **Remarks**:
  - Saturation at red end, yet again in 23rd col.
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Dome Temp./Hum. ................ 17.0\textdegree C

Transparency Conditions: Slight haze

Remarks:
- FANS OFF
- 435 0 50 1024 4/1 scdnt

Notes:
- 1800 Hm, G = 5.9200
- G = 5.930
- 6400 x 3/4, focus test T = +17.1\textdegree C
- Focus setting at 6.7\textdegree F didn't need changing
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Emulsion Batches:

CSS 38 E Time OK

Date 1995 June 1/5

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Focus ............... 6.73/6.68° at 5745°/370
Spectr. Temp. ........... 19.6°/65.37%

425 6 50 1024 41 instant

All backed up to person only

13.5k

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Spectr. Temp. ........... 150°C
Dome Temp./Hum. .......... 15.3°C / 52.4% 
Focus ............... 244

Transparency Conditions ....... cloudy

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Focus .......... 2°H .......... Dome Temp./Hum. 13.1°C / 59.1%  

Transparency Conditions ... Clean and up in S.W. ...

Quality

9K
4K
9K
4.6K
9.4K

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- This image is likely from the 3rd october
- Fairly and north of image
- Brighter, south of image
- North and brightener I think
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**Transparency Conditions:** Full moon 24°

**Dome Temp./Hum.:** 14.5°C / 51.5% / 42%
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- Date: 1995 June 22
- Observers: L.K.K.

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Transparency Conditions: Clean, but windy.  
Full moon. 46°
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All to Persus and letter C55386; No worming.

Edelle: Worm disk has no indication of any June Directing even through it was made some of Fri's last obs supposedly write to worm (95-06).
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69 | HD 124897 | 14 11 06 | 19 42 11 | 23 37 22 | 23 35 W | | | ThA 1s |
70 | comp | | | | | | | |
71-77 | flash (7) | | | 23 49 | 23 37 W | | | ThA 1b |
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**Notes:**
- Dome Temp./Hum. 15.5°C...41.0% H
- Transparency Conditions: Slight cloud, haze
- Focus: 0.245
- Spectr. Temp.: 760 C

**Remarks:**
- NW & brighter of pair
- SE & fainter & pair - bad separation
- NW & smaller of pair
- Epoch = J2000
- Sign data above bug
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Focus .......... 6.74  
Dome Temp./Hum. .......... 15.2°C/49.5% @ seeing test  
Transparency Conditions .......... clear, full moon, high up now...  

FANS OFF  

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**Notes:**
- Transparency Conditions: Fine, hazy, hazy.
- Dome Temp./Hum.: 79.9°C/41.8%.
- Dome Temp./Hum.: 19.9°C/41.8%.
- No fan on; only 4100 vo 50 1024 51.

**Remarks:**
- Done SW, no wind, hazy.
- S fan just turned off before setting of star.
- Done, just slightly W.
- Increasing haze.
- Moon rising but shrouded by thick haze ≡ cloud.
- No features; blue at the center; feature at red end.
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**Spectr. Temp.** -100 °C

**Focus** -6.6.2

**Dome Temp./Hum.** 25.0°C / 61.5% @ FOCUS TEST

**Transparency Conditions** - Ha , Ys, Scland

**Dome Temp./Hum.** - BOTH FANS ON

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Transparency Conditions: mostly cloudy

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Notes:
- Dome Temp./Hum.: 30°C 58% 51.4°C
- Transparency Conditions: clear with haze
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Observations:

Date: 1995 June 20/21
Observers: [kk] Tr. (Smt)

Emulsion Batches:

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Spectr. Temp. -100 °C
Focus 6:70
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Focus  6.7 μm  
Dome Temp./Hum.  

Programs:  KK, A, ?, HA

Quality:  7 K, 8 K, 6 K, 8.4 K, 6.6 K, 8.5 K, 7.0 K
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- CCD Spectr. Temp. = -100
- Dome Temp./Hum. = 17.5°C/53.7%
- Transparency Conditions = Clear, no haze
- 470 050 1024 41 ccd+2
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Spectr. Temp. ... -100.5 °C ... Dome Temp./Hum. ... 119.8 °C 4898 H ...
Focus ... 6.7 F ...
Dome Temp./Hum. ... 190 °C 4808 H ...

Remarks:
- Spectra control failure
- Centred on 19th column

Quality:
- pMx
- 11.8 K
- 14.8
- 22 K
- 1.7 K
- 66 K
- 10 K
- 23 K
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**Notes:**
- Spectr. Temp.: 100.5°C
- Dome Temp./Hum.: 18.5°C/49.5% (100%)
- Transparency Conditions: Clear

**Remarks:**
- OG 560 in stellar region
- [R60 filter in comparison beam]
- V=13.5, R=12.4, Max
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**Companion Filter Key**
- S = Spectral Temp.
- F = Focuser Temp.
- T = Dome Temp./Hum.

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Spectr. Temp. -1.00°C   Dome Temp./Hum. 20.5°C/72.6%  Transparency Conditions hazy
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All files to Perseus & DAT

Quality: 11.0K, 9.5K, 13.2K, 14.0K

Focus Test

Still a bit too cool. I didn't drop to 13° C like forecast suggested.
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Emulsion Batches:

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- Fene Clear 20 sec
- Fene Clear 20 sec
- 1801
- 1800
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*Note: Projected slit width suggested slit not 19ta

23° 51' S1: it is ideal by Bla criterion

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23° 51' S1: it is ideal by Bla criterion

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**3/14 Focus Test**

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- Dome Temp./Hum. 13.5°C/85.3% Transparency Conditions: Clear, very light SW wind:
- Dome SW, very light SW wind, clear with hazy horizon 80% cloud cover.
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Emulsion Batches:
| 123 |

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- All to Persens & DAT

Spectra Temp. 10.9°C
Dome Temp./Hum. 11.9°C/75.8%
Dome Temp./Hum. 11.9°C/75.8%

Transparency Conditions Clear
Bill Hodges

Date 1995 July 6/7

Emulsion Batches:

CSS 286 clock ~ 13 sec ahead of WWV

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**Notes:****
- 4.1K: through 1 and 6 beginning 510:1 and end.
- 15.4K: closed shutter's a end. drive off done closed.
- 14.2K: done open now ~ 18h later.
- 7.5K: clear now, don't see when doing 510:1 but I don't know what I'm looking for.
- 7.5K: done W, no wind now, clear now, 90% catwalk.
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All to Perseus

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Focus 6.65
Spectr. Temp. 19.7°C/18.8°C

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9.75 200 200 26 115

Dome Temp/Hum: 14°C 76%

3" 10 100

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Transparency Conditions: cloudy

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Spectr. Temp. 100 °C
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Transparency Conditions Slight haze, full moon
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Date: 1995 July 11/12 Observers: [KK] Smy
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**Transparency Conditions:** patchy cloud, increasing

**Focus:** same as last night

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**Dome Temp./Hum.:** 21.2/54.9%
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All in Perseus

Variation

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**Dome Temp./Hum.**  
**Transparency Conditions**  

**Focus**  
**Spectr. Temp.**  
**Dome Temp./Hum.**
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**Spectr. Temp.** 100.2°  
**Dome Temp./Hum.** 19.0°/74.5%  
**Focus** 6.62/6.72  
**Dome Temp./Hum.** 19.0°/74.5%  
**Transparency Conditions** Clear  
**FANS ON** 154

Remarks:
- 420 0 50 1224 41 cool
- 430 0 50 1224 41 cool
- 51V ~ 550:1 12.4K
- Telluric Rale 12.5K
- Set a bit cool but T is falling 13K
- Cosmic rays
- 8.5K

**Quality**
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*Remarks:
- ACRE is ~ 15 sec behind WWV now.
- Seeing, test ACRE now, no wind now, clear, 1st set with C55. 326.
- Seeing test ACRE, no wind now, clear.
- No moon in sight, 95% craters.
- Wind picking up again.

*Quality:
- 6.2K
- 3.7K
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Smt. On July 19/20, took calibration exposures to find Bln Hβ region.
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All 6 Pension & D Att.

Cass 200, G=3267, 256a, 481-87a

±1" if Fechner are correct

line identified as 4847a RLS
on pixel row 514.

Centre using cedart
295° 50 1024 51

(but this seems to change every time grating is removed) will see if grinding mount repair has helped this.)
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<tr>
<th>Plate No.</th>
<th>Object</th>
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ACER clock reset to Smt's watch since WWV not available.

99       | COMP         |          |                  | 22 40* for real this time |                    |                 |              |                        |      |

cc34200  | BD+45 2743  | 18 32 26 | +45 39 53        | 22 44 09             | 0 17 W             |                 |              |                        |      |
| 01       | COMP         |          |                  |                      |                    |                 |              |                        |      |
| 02-04    | FLAT x 3     |          |                  |                      |                    |                 |              |                        |      |
| 05       | BIAS x 4     |          |                  |                      |                    |                 |              |                        |      |
|----------|--------|-----------|-----|-------|--------------|------|-----------|------|------------------|----------------------------------------------|
| 20/30    |        |           |     |       |              |      |           |      |                  |                                              |
| -        |        |           |     |       |              |      |           |      |                  |                                              |
| 27/20    |        |           |     |       |              |      |           |      |                  |                                              |
| 20       |        |           |     |       |              |      |           |      |                  |                                              |
| -        |        |           |     |       |              |      |           |      |                  |                                              |
| 20       |        |           |     |       |              |      |           |      |                  |                                              |
| 14       |        |           |     |       |              |      |           |      |                  |                                              |
| -        |        |           |     |       |              |      |           |      |                  |                                              |
| 20       |        |           |     |       |              |      |           |      |                  |                                              |
| 1200     |        |           |     |       |              |      |           |      |                  |                                              |
| 10       |        |           |     |       |              |      |           |      |                  |                                              |
| 5        |        |           |     |       |              |      |           |      |                  |                                              |

ASTRO clock was out the last time I checked.

8
9
10
11

no more safety badging - 12.0X

840 3" 9.83 M0

Marcy Std Velocity
Su45 1824 Spectrum
@ red 492

410 0.54 Coury 41 ccd hit
Sun of 4 biases

415 0.50 coury 41 ccd hit
Get a bit cooler for Tdrop

a few bits of cloud in the way. VERY WEAK. 5cm away a BIG Cosmosay, sky trees, Continuly and much much more...

*ALERT clock is 17 minutes ahead!!!*
<table>
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<th>Plate No.</th>
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Spectr. Temp. 70°C
Dome Temp./Hum. 21.9°C/80.6%
Focus 6.66
Dome Temp./Hum. 20.4°C/85.2%
Transparency Conditions: Clear

Remarks: 410 0 50 1024 4 1 ccd flat.
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All 6 Phoenix & OAT

**Notes:**
- Transparency Conditions: Hazy
- Focus: 6.62
- Dome Temp./Hum.: 20.7°C/79.4%
- FANS OFF

**Remarks:**
- 9/19: 91%, few wisps, hazy
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*W* on catwalk, rained a few hours ago.

Not written to FITS.

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Focus: 6:62
Spectr. Temp.: 160.5°C
Dome Temp./Hum.: 22.8°C/53.8°C
Transparency Conditions: hazy, only a few stars visible

FANS OFF, ops

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**Spectr. Temp.** - 100.5°C
**Dome Temp./Hum.** - 25.5°C/49.2% 
**Transparency Conditions** - Very Clear

**Focus** - 6.6K/6.6K
**Spectr. Temp.** - 6.6K/6.6K

410 050 1024 4 (174)
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Emulsion Batches: 

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Observers: Blm./Sm.
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Transparency Conditions: Clear

**Remarks:**
- 6µB error @ 15m and exposure ended prematurely by 5 minutes.
- 85% cloud cover.
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**Notes:**
- FANS OFF
- Dome Temp./Hum.: 22.9°C / 78.9% (Dome Temp./Hum.: 20.7°C / 81.5%) once dome opened.
- Transparency Conditions: Clear now
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All to Preserve & DAT
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Note: Flat 23 not done by usual "Repeat Flat..." method.

Plate 24 not done by Repeat, Batch, i.e. individually fixed.

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Spectr. Temp............  -101.7°C...........  Dome Temp./Hum. 21.0°C/77.2%  Transparency Conditions cloudy...dome closed

Focus...........  0.667

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**Dome Temp./Hum.**

-100°C

**Spectr. Temp.**

6:67

**Transparency Conditions**

Partly Cloudy

**Remarks**

- After Sp control reset
- A shell Bln/Wld (300/1 siv)
- A shell Bln/Wld (300/1 siv)
- A shell Bln/Wld
- Bln

**Quality**

- 6.3K
- 6.6K
- 5K
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**Transparency Conditions:** Part Clear

**Dome Temp./Hum.** +17.9°C ± 82.8

**Rapid Cooling in and Humidity Rise**

**Exp. Mtr.**

**CCD Temp.** -19.9°C

**Dome Temp./Hum.** +17.9°C ± 82.8
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Emulsion Batches:

Date: 1995 Aug. 9/10
Observers: [Rm] Smt

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Spectr. Temp. 100°C
Dome Temp./Hum. 70.8°C 69.8% H
Transparency Conditions Mosty clear, just partial

- Instrument Type: HSSCCD
- Slit Width: 1800 Å/mm, 1800 Å/mm
- Exposure Time: 30 sec
- Film Type: 6396 Å
- P.H.: 3/4

Program Notes:
- Focus Test
- Previous night's observing

Remarks:
- V350 Sgr very close
- V473 Lyr
- MW Cyg
- Halpha Stray Light
- V1404 Tauri
- Spectra comp: 1.8K
- C0 T = -99.9°C

Quality:
- 1.9K
- 0K
- 0K
- 0K
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### Observed Conditions
- **Spectral Temp.**: -100.7°C
- **Focus**: 6.46
- **Dome Temp./Hum.**: 118.4°C, 79.8%RH
- **Transparency Conditions**: Clear, just past full moon

### Observation Log

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### Observations
- **17**: Rm
- **18**: Std A1
- **19**: Rm
- **20**: Rm
- **21**: Rm
- **22**: Rm
- **23**: Rm
- **24**: Rm
- **25**: Rm
- **26**: Rm
- **27**: Rm

### Notes
- **Quality**: Very faint, too much above background.
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Emulsion Batches:

SAT/Sun

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**Remarks:***
- Grating presumably untouched from previous night. 
- Spectrophotograph control failures leave "G" field blank. 
- Restered and set Time Right. 
- Sluvel Encoders also normalized on this star. 
- Seeing test Dome SW. 
- No FINS, no wind. 
- Run p.m. Port cloudy here. 
- Run p.m. Checking here now. (Not likely) 
- Run p.m. Port cloudy here. 
- Run p.m. 
- Run p.m.
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**Focus** E90 | **Spectr. Temp.** 106:3°C | **Remarks**
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**Temperature and Humidity:**
- **Spectr. Temp.:** -109°C
- **Dome Temp./Hum.:** 24.9°C/50.7%
- **Transparency Conditions:** Cleared up. FANS ON. 4/16 0 50 1029 4 4:08AM

**Other Notes:**
- Fan off now.
- Telescope on E side of pier.
- Cloudy 5 at zenith, cloud crept up - cut short.
- 6/18 error - this an artifact.
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**Spectr. Temp.**...

**Dome Temp./Hum.**...

**Focus**...

**Spectr. Temp.**...

**Dome Temp./Hum.**...

**Transparency Conditions**...

**Both Dome Fans On**

4160 50 1024 4 1 662

---

**Exp. Mtr.**

**Seeing**

**Pigm. Mag.**

**Sp.**

**Inst.**

**Grating/ Tilt**

**Slit**

**Emulsion**

**P.H.**

**Program**

**Remarks**

**Quality**
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Spectr. Temp. ~100°F
Dome Temp./Hum. 21.5°F/71.7%
Focus 6.6.2

Transparency Conditions: Hazy, HQ, moon

Only N Dome Fan on (216)

416 050 1024 41 cloud

Cleaver top up, Ken
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Date: August 19/19

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Both fans off now.

416 050 1024 41 red


25 16 35K3 Vys 356

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25 19 Manyc Std Vel Vys 85A brighter

20 19

22 21 Focus TEST
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Remarks:
- Seeing test in and out of cloud
- Medium NW wind
- Humidity dropping fast
- Cloud steady
- CDT = -101.7°
- No usual evening
- Above 306 x 514
- 7 in headers
- Done outside of windows
- 1/2
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**Remarks:**
- CCO T = -100.6°C
- T = 21.0 F = .245
- T = +23.5
- T = +315° (no problem)
- Good for slightly cooler Temp
- CCO Fmt
- NCB

**Quality:**
- Max
- 404
- 88
- 78
- 13

**Program Notes:**
- 1/2
- 3
- 4 KK
- 3
- 4 KK
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- 4 KK
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- 5
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**Additional Notes:**
- Hard to separate
- South are not slightly
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- Dome Temp./Hum.: 16°C/60% 17°C
- Transparency Conditions: clear - slightly hazy
- 240
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**Spectr. Temp.** -100.3°

**Dome Temp./Hum.** 15.7°/70.8°

**Focus** 24.3

**Dome Temp./Hum.** <24x4x°

**Transparency Conditions** clear 

**Remarks**

- Poor separation
- K/ Vis Bin
- North one
- South End LOST
- More Acc (CO2 images)
- GIPIB problems. Rest OK
- So much for symmetry
- Barely separable—sometimes 4OK!
- Blended together—no surprising things, since sep in Y is < 2°
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**All to EXABYTE (last night's too)**

**Temperature and Humidity**
- Dome Temp./Hum.: 15.2°C/74.8%

**Remarks**
- "T=15.4°C, F=0.243, in focus nicely"
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Emulsion Batches: G. S. K. I. T. M. 157

(type: email BATCH 157)
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Emulsion Batches:

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Date: 1915 August 23/24

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**Dome Temp./Hum.** 19.1°C/69.5%  
**Transparency Conditions** clear, windy  
**Focus** 250  
**Spectr. Temp.** -102.5°C  
**Dome Temp./Hum.**  

**FANS OFF**

**254**

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Emulsion Batches:

Date: 1995 August 24/25  Observers: [kk] Tn / Smt
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Spectr. Temp. -100°C
Dome Temp./Hum. +16.5°C, 65%, 0.38 H
Transparency Conditions: Poor, Cloudy

Fans on

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Emulsion Batches:

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Note Sep 15/95, Found HD Catalogue

* Old Haan copy gives Brighter as HD207990*
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Emulsion Batches:

Date 1995 Aug 29.25 Observers [?/?] In Sun
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All to D1\ and Exabyte.

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Remarks:
- CCD at -120° by mistake
- peak 2600
- peak 1200
- brighter saturated
- CCD Temperature 10 -100°
- peak 3160

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All to B: To confirm CASS & Persons.

Transparency Conditions: Slightly hazy

Dome Temp./Hum. 41.5°C 86%
## Observers

**VOL. 16**

### Emulsion Batches:

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**Notes:**
- Dome Temp./Hum. +120°F 60% RH
- Transparency Conditions: Fine...partly cloudy...
- Focus: 6.78
- Spectral Temp.: 6.78

**Additional Notes:**
- Abbe 3.6° slit
- Seeing test only NE Fan on
- Dome West
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Footnotes:
- Note cc349 91 and cc349 92 are small files and were probably corrupted by a cc03/ window problem.
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**Note:** Feb 20/96 in C3490.2 is an 8sec dark due to flat misfire and PC crash probably.

**Exp. 1:**
- Dome Temp./Hum. +17.9°C 73%RH
- Transparency Conditions: Very Cloudy
- They quickly very cloudy
- Max

**Exp. 2:**
- Dome Temp./Hum. 18°C 74%RH
- Dome Temp./Hum. 18°C 74%RH
- Spectr. Temp. 6.70
- Transparency Conditions: Cloudy
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Data taken on August 29, 1960, Observers: Tk, Sat.
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- FANS OFF
- 410 0 50 1024 4 1 cc or 7420
- Std Vel
- Telluric Std
- Vink Cepheid
- BB Her
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- Fans Off: 294
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**Focus** 6.68

**Spectr. Temp.** 15.2°C / 77.4% @ B0mag

**Dome Temp./Hum.** 416 0 50 1024 9 1642 ft.

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Date: 19.95 Sep 1/2

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**Other Notes:**
- **Focus:** 4.88
- **Spectr. Temp.:** 100.2°C
- **Dome Temp./Hum.:** 17°C / 67%
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**Dome Temp./Hum.** - 15.8°C/78.5%  
**Transparency Conditions** - FANS OFF  
**Focus** - 6.60°  
**Dome Temp./Hum.** - 14.9°C/76.4% @ ZLI6  
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All To Di To- coron separ census & reasons and DAT

Spectr. Temp.          Dome Temp./Hum. 13.4°C/81.2%  Transparency Conditions clear, humid, partly cloudy
Focus 6.68
Spectr. Temp.          Dome Temp./Hum. 41.28°C/81.76%  1420 0 50 1024 4 1 60749

Focus test set for slightly warmer temp.
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- Emulsion Batches:
- Spectra:...
- Observers: [Blue] Smt.
|----------|--------|-----------|-----|-------|--------------|------|-------|---------|----------|--------------------------|----------|
| 6/35     |        |           |     |       |              |      |       | 3/4     | Focus/ Test | right in focus.            | 16K 
           |         |           |     | 1000K  | 1800:16um | 300m |       | 6603A     |                       | 15.3K    |
| 6        |        |           |     |       |              |      |       | 5       | Blm       | as close to saturation as possible | 10.6K 
           |         |           |     | 1000K  | 6100       |      |       |           |                       | 16.3K    |
| 6/45     |        |           |     |       |              |      |       | 6       | Blm       | 1/2 weaker response (1/7 sec) | 7.1K 
           |         |           |     | 1000K  | 6100       |      |       |           |                       | 7.1K     |
| 6/22     |        |           |     |       |              |      |       | 7       | Blm       | 1/2 strength of 1st. set. | 4.0K 
           |         |           |     | 1000K  | 6100       |      |       |           |                       | 3.9K     |
| 6/60     |        |           |     |       |              |      |       | 8       | Blm       | 1/4 strength of 1st. set. |                       |          |
| 6/22     |        |           |     |       |              |      |       | 9       |           |                          | 15.3K    |

- Scale set to 1000 so exposure says 45 sec.
- Scale set to 1000 so exposure says 22 sec.
- Scale set to 1000 again.

Spectr. Temp. .......... 100.6°C  
Dome Temp./Hum. .......... 12.5°C / 61.6% 
Focus .......... 6.6.8 
Dome Temp./Hum. .......... 

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Focus 64.76
Spectr. Temp. -100.5°C
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**Emulsion Batches:**
- During the day frame grabber, darks, taken by KK.
- c9.00111.115 -> c9.00111.145

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**Transparency Conditions** a few fast moving low clouds, after test

**Focus** 6.26  
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**Notes:**
- Dome Temp./Hum.: 11.3°C/56.3%  
- Transparency Conditions: clear

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**Spectr. Temp.** 6.16

**Dome Temp./Hum.** 9.6°C/40.1%

**Focus** 6.16

**Dome Temp./Hum.**

**Transparency Conditions** clear, full moon rising

**FANS on** 340

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**Note:** Rack moved to 3/15/50 to prevent saturation of sky.

| All to DAT, DN, M. | |

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**Remarks**

- Fan on 3/4
- Dome Temp./Hum. 8.1°C/72.4%
- Transparency Conditions: Clear, full moon going down
- Focus 6.76
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