

60 inch Telescope log

Spectrograph: FAST

Observer: CALKINS

Grating: CCD

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PI: All, Rines, Kishner, Huchra

Date: 9/17/98

| Number | Object      | R.A.  | Dec.  | L/R | Exp | Comments                               |
|--------|-------------|-------|-------|-----|-----|--|
| 1-10   | IRAC        |       |       |     | 15m | Binby 4                                |
| 11-20  | BEAS        |       |       |     | 0s  |  |
| 21-30  | FLAT        |       |       |     | 60s |  |
| 31-40  | BEAS        |       |       |     | 0s  | Binby 2                                |
| 41-50  | FLAT        |       |       |     | 12s |  |
| 51-55  | sky         |       |       | #56 | 5s  | Binby 4                                |
| 56     | comp        |       |       | ↑   |     |  |
| 57, 58 | AD192281    | 20 12 | 40 16 | #56 | 5s  |  |
| 59     | comp        |       |       | ↑   |     |  |
| 60     | NS866       | 15 06 | 55 45 | #57 | 4m  | dust large                             |
| 61     | comp        |       |       | ↑   |     |  |
| 62     | 42199.14    | 16 13 | 42 33 | #64 | 8m  |  |
| 63     | comp        |       |       | ↑   |     |  |
| 64     | 42199.15    | 16 12 | 41 39 | #64 | 10m |  |
| 65     | comp        |       |       | ↑   |     |  |
| 66     | 42199.16    | 16 12 | 38 54 | #64 | 15m | in <sup>not enough</sup> out of clouds |
| 67     | comp        |       |       | ↑   |     |  |
| 68     | sn/998dx    | 18 11 | 49 51 | #2  | 20m | bright star east                       |
| 69     | comp        |       |       | ↑   |     |  |
| 70     | 2M182326.4p | 18 23 | 23 13 | #68 | 5m  | bright star east by                    |
| 71     | comp        |       |       | ↑   |     |  |
| 72     | 2M185908.3p | 18 59 | 19 09 | #68 | 5m  | 2 stars east, 1 star west              |
| 73     | comp        |       |       | ↑   |     |  |
| 74     | 2M181130.7p | 18 11 | 21 01 | #68 | 5m  |  |
| 75     | comp        |       |       | ↑   |     |  |
| 76     | 2M184422.6p | 18 44 | 23 19 | #68 | 5m  | 2 stars east                           |
| 77     | comp        |       |       | ↑   |     |  |
| 78     | 2M184104.7p | 18 41 | 20 37 | #68 | 5m  | binby 2, super-impose star?            |
| 79     | comp        |       |       | ↑   |     |  |
| 80     | 2M182826.9p | 18 28 | 17 03 | #68 | 5m  |  |

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PI: Kulkarni, Mahdavi

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| Number | Object       | R.A.  | Dec.  | L/R    | Exp | Comments                              |
|--------|--------------|-------|-------|--------|-----|---------------------------------------|
| 81     | comp         |       |       | ↑      |     |                                       |
| 82     | 2M185453.7p  | 18 54 | 19 00 | 15" 68 | 15m | binby 2, bright star                  |
| 83     | comp         |       |       | ↑      |     | west                                  |
| 84     | 2M185903.0p  | 18 59 | 13 04 | 15" 68 | 14m | binby 2, clouds <sup>not enough</sup> |
| 85     | comp         |       |       | ↑      |     | (weak spectra!!)                      |
|        |              |       |       |        |     | wait out some clouds                  |
| 86     | 2M182451.5p  | 18 24 | 15 45 | 15" 68 | 10m | *                                     |
| 87     | comp         |       |       | ↑      |     |                                       |
| 88     | 2M183901.6p  | 18 39 | 13 24 | 15" 68 | 20m | *                                     |
| 89     | comp         |       |       | ↑      |     |                                       |
| 90     | 2M222640.7p  | 22 26 | 20 05 | 15" 68 | 12m |                                       |
| 91     | comp         |       |       | ↑      |     |                                       |
| 92     | 2M223918.8p  | 22 39 | 21 51 | 15" 68 | 5m  |                                       |
| 93     | comp         |       |       | ↑      |     |                                       |
| 94     | 2M223848.7p  | 22 38 | 21 15 | 15" 68 | 3m  | binby 2, star west                    |
| 95     | comp         |       |       | ↑      |     |                                       |
| 96     | 2M223606.7p  | 22 16 | 22 37 | 15" 68 | 5m  |                                       |
| 97     | comp         |       |       | ↑      |     |                                       |
| 98     | 2M223911.9p  | 22 19 | 16 08 | 15" 68 | 3m  |                                       |
| 99     | comp         |       |       | ↑      |     |                                       |
| 100    | 2M224231.5p  | 22 47 | 21 38 | 15" 68 | 10m |                                       |
| 101    | comp         |       |       | ↑      |     |                                       |
| 102    | 2M221713.2p  | 22 17 | 16 12 | 15" 68 | 5m  | star west                             |
| 103    | comp         |       |       | ↑      |     |                                       |
| 104    | 2M223553.8p  | 22 25 | 18 34 | 15" 68 | 15m |                                       |
| 105    | comp         |       |       | ↑      |     |                                       |
| 106    | src 60 B.101 | 22 50 | 10 52 | 15" 59 | 5m  |                                       |
| 107    | comp         |       |       | ↑      |     |                                       |

60 inch Telescope Log  
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 PI: Mahdavi, Kirshner, Bartoni  
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| Number   | Object        | R.A.  | Dec.   | L/R   | Exp | Comments                  |
|----------|---------------|-------|--------|-------|-----|---------------------------|
| 108      | src b013.104  | 22 50 | 12 33  | 15 59 | 8m  | clouds are back!          |
| 109      | comp          |       |        | ↑     |     |                           |
|          |               |       |        |       |     | wait out some more clouds |
| 110      | src b013.106  | 22 50 | 12 03  | 15 59 | 6m  |                           |
| 111      | comp          |       |        | ↑     |     |                           |
| 112      | src b013.107  | 22 50 | 11 14  | 15 59 | 15m |                           |
| 113      | comp          |       |        | ↑     |     |                           |
| 114      | src b013.108  | 22 51 | 11 45  | 15 59 | 20m |                           |
| 115      | comp          |       |        | ↑     |     |                           |
| 116      | src b013.105  | 22 50 | 11 56  | 15 59 | 20m | object to the east        |
| 117      | comp          |       |        | ↑     |     |                           |
| 118      | src b013.109  | 22 50 | 10 39  | 15 59 | 5m  |                           |
| 119      | comp          |       |        | ↑     |     |                           |
| 120      | sn 1998dk     | 00 14 | -00 44 | 15 59 | 20m |                           |
| 121      | comp          |       |        | ↑     |     |                           |
| 122      | sn 1998em     | 01 26 | -06 06 | 15 59 | 15m |                           |
| 123      | comp          |       |        | ↑     |     |                           |
| 124, 125 | larger star   | 02 38 | 05 29  | 15 56 | 2m  |                           |
| 126      | comp          |       |        | ↑     |     |                           |
| 127      | src gal - 120 | 01 52 | 35 47  | 15 73 | 10m | star east                 |
| 128      | comp          |       |        | ↑     |     |                           |
| 129      | src gal - 121 | 1 52  | 35 51  | 15 73 | 12m |                           |
| 130      | comp          |       |        | ↑     |     |                           |
| 131      | src gal - 132 | 01 57 | 33 12  | 15 73 | 6m  |                           |
| 132      | comp          |       |        | ↑     |     |                           |
| 133      | src gal - 139 | 01 57 | 32 12  | 15 73 | 6m  |                           |
| 134      | comp          |       |        | ↑     |     |                           |
| 135      | src gal - 140 | 01 58 | 03 05  | 15 73 | 5m  |                           |

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PI: Burdson, Garcia, All

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| Number   | Object    | R.A.  | Dec.   | L/R      | Exp    | Comments |
|----------|-----------|-------|--------|----------|--------|----------|
| 136      | comp      |       |        | ↑        |        |          |
| 137      | so991-141 | 01 58 | 03 05  | ↑<br>F73 | 18m    |          |
| 138      | comp      |       |        | ↑        |        |          |
| 139      | so991-144 | 01 59 | 02 34  | ↑<br>F73 | 12m    |          |
| 140      | comp      |       |        | ↑        |        |          |
| 141      | so991-145 | 02 00 | 23 35  | ↑<br>F73 | 15m    |          |
| 142      | comp      |       |        | ↑        |        |          |
| 143      | so991-146 | 02 02 | 09 57  | ↑<br>F73 | 7m     |          |
| 144      | comp      |       |        | ↑        |        |          |
| 145      | so991-147 | 02 02 | 09 58  | ↑<br>F73 | 6m     |          |
| 146      | comp      |       |        | ↑        |        |          |
| 147      | so991-148 | 02 02 | -00 07 | ↑<br>F73 | 15m    |          |
| 148      | comp      |       |        | ↑        |        |          |
| 149      | so991-149 | 02 02 | -00 06 | ↑<br>F73 | 12m    |          |
| 150      | comp      |       |        | ↑        |        |          |
| 151, 152 | CICAM     | 04 19 | 55 59  | ↑<br>F07 | 20, 90 |          |
| 153      | comp      |       |        | ↑        |        |          |
| 154      | so991-158 | 02 07 | 02 06  | ↑<br>F73 | 12m    |          |
| 155      | comp      |       |        | ↑        |        |          |
| 156      | so991-159 | 02 07 | 02 06  | ↑<br>F73 | 10m    |          |
| 157      | comp      |       |        | ↑        |        |          |
| 158      | so991-160 | 02 07 | 02 10  | ↑<br>F73 | 15m    |          |
| 159      | comp      |       |        | ↑        |        |          |
| 160      | Feige 25  | 02 38 | 05 28  | ↑<br>F56 | 5m     |          |
| 161      | comp      |       |        | ↑        |        |          |
| 162-171  | BIAS      |       |        |          | 0s     | Binby 4  |
| 172-181  | FLAT      |       |        |          | 6s     |          |
| 182-191  | BIAS      |       |        |          | 0s     | Binby 2  |
| 192-201  | FLAT      |       |        |          | 12s    |          |
| 202-211  | DARK      |       |        |          | 15m    |          |