

03/07/06/ 17:42:51 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.07

Operator: elmore

Other observers: Bradford Elrod

Bert wavelength: 630

BERT DET_A Tape: 1

BERT DET_B Tape: 2

Project Number: Txxx

03/11/06/ 22:11:02 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.11

Operator: Elmore

Other observers: Gilliam Borrero

Bert wavelength: 554

BERT DET_A Tape: H56340

BERT DET_B Tape: H56341

Ernie wavelength: 630

ERNIE DET_A Tape: H56342

ERNIE DET_B Tape: H56343

Project Number: T722

03/11/06/ 22:17:29 -- Operation 1 Flat Field: 32 configurations

File Mark

03/11/06/ 22:25:36 -- Comment

Lamp flat 1500 micron slit

Mod Rate 3 - 20 Hz frame rate

Bert 553.7 HA30 ND 0.6

Ernie 630.2 HA30 ND 0.8

Sarnoff 525.0/524.7 HA30 ND 0.5

Rockwell 1564.8 1000mm lens

Sarnoff 1219 lens

Bert/Ernie 1000mm lens - bert folded

Weather inside is fine

Tile on ND in front of Bert

New AO optics. Now uses mirrors. Prime focus image

looks excellent on all cameras.

For future G-Band via dichroic bs. UBF off slit reflection

03/11/06/ 22:32:25 -- Operation 2 Flat Field: 32 configurations

File Mark

03/11/06/ 22:39:47 -- Comment

Uniform cirrus during telescope flat field

50 micron slit width on the Sun

03/11/06/ 22:45:39 -- Operation 3 Map: 240 steps of .00 arcsec each

File Mark

This 240 step map is used to phase the cameras.

Phase does not work so we run in map mode to set Hex, Index

Phase values that David arrived at were Hex = 5 and Index 657

03/11/06/ 23:00:19 -- Operation 5 Cal: 69 configurations

File Mark

03/11/06/ 23:42:49 -- Comment

ASP calibration

Light level variable (starting 3.3, ending 1.7)

Practice calibration

Suncenter with focus at 675

Hairlines out

AZTA mode (330, 15, 60, 105)
David's insurance code in place for this cal.
All optics moved in and out + rotation - no problems
Dark at start
clear + 16 optics positions at each AZTA position.
Practice

03/11/06/ 23:48:52 -- Comment

Declining light levels during the cal were a product of dust in the air
Solar elevation was also an effect on the light level.
High wind conditions in the Basin, David notices lots of dust/sand in our
line of sight.
Light level at start was 3.4 with the cal finishing at 1.7 with a solar
elevation of 15.0

File Mark

File Mark

03/12/06/ 13:53:02 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.12

Operator: Juan

Other observers: David/Mike/Doug

Bert wavelength: 553

BERT DET_A Tape: H56350

BERT DET_B Tape: H56351

Ernie wavelength: 630

ERNIE DET_A Tape: H56352

ERNIE DET_B Tape: H56353

Project Number: T722

03/12/06/ 23:11:36 -- Operation 2 Map: 240 steps of 0.07 arcsec each

File Mark

03/12/06/ 23:37:13 -- Operation 3 Map: 240 steps of .15 arcsec each

File Mark

03/13/06/ 13:50:39 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.13

Operator: Elmore, Borrero

Other observers: Gilliam, Elrod

Bert wavelength: 553

BERT DET_A Tape: H56350

BERT DET_B Tape: H56351

Ernie wavelength: 630

ERNIE DET_A Tape: H56352

ERNIE DET_B Tape: H56353

Project Number: T723

DST Cameras

CCD2 Dalsa CAD7 Gband

This camera will be run independant of SPINOR

One frame per minute rate with 25 msec exposure time

HSG slit width set to 50 micron

Bert 5537

Ernie 6302

Harry (Rockwell) 15648

Hagrid (Sarnoff) 5247

14:50 - Clouds are clearing (80 to 90% clear). There is a small amount of ice

(brine) on the back side of the Az portion of the turret. There is also some ice on one side of the elevation portion of turret. We have no way to clean the entrance window if water were to run down on it (elevator doors do not work). There is probably a fine layer of dust on the window and if water were to mix with it this would result in streaks and water spots. This will have a negative effect on AO performance. We must wait until all ice clears.

Synchro computer reset is first operation of series
A reboot of Cookie means we move to operation two for series start.

03/13/06/ 15:48:41 -- Operation 2 Map: 75 steps of .00 arcsec each
File Mark

03/13/06/ 16:02:46 -- Comment
ASP map (Practive)
This information can be used to get idea of Stokes
North 18.1, East 1.3
Active Region 10858
Light level of 5.5
PAH 2.7, PAG 338.5, RV 0.429
Seeing is bad for this run - starting out at 3.0 arcsec
Seeing range during map is 2.0 to 5.0 arcsec
Tip Tilt correction on with out AO
Tracking Rotation

03/13/06/ 16:07:27 -- Operation 3 Map: 200 steps of .00 arcsec each
File Mark

03/13/06/ 16:20:07 -- Comment
Stationary map of 200 steps used to check phase
Phase settings remain at Hex of 5 and Index of 657
No Change

03/13/06/ 16:26:00 -- Operation 4 Map: Polarization Calibration
File Mark

SPINOR polarization calibration
Light level is consistent at 5.5 for cal
No problems with optics (retarder or polarizer movement)
Hair lines out
Focus 675
Near Suncenter
AZTA mode 330,15,60,105
Dark slide position is good
clear+16 positions at each AZTA position are all good

ERROR on editing log. Log was left in vi mode during comments for the next to processes. The following is a reconstructed version.

03/13/06/ APPROX 17:09:00 -- Operation 5 Map: Flat Fielding
File Mark

SPINOR FLAT
Starting light level of 5.7

Hair lines out
Focus 675
Random guide in use

03/13/06/ APPROX 17:20:00 -- Operation 6 Map: 70 steps at .15 step size
File Mark
70 steps using step size of 150
North 18.1, East 0.4
Guider of 13.3
RV .429
PAH 0.8
PAG 336.6
Active Region 10858
Seeing range during map is 2.0 to 5.5
Tip Tilt correction only
AO will not work in these conditions
ERROR on Sarnoff (Hagrid)
SRNFCam64 MFC application error.
Error occurs at step 52 of 70
Camera continues to run and write data through end of series.

03/13/06/ APPROX 17:20:00 -- Operation 7 Map: 70 steps at .15 step size
File Mark
SPINOR map (a repeat of the previous map)
Testing to see if the same error message might occur.
North 18.1, East 0.2
Guider of 13.3
Seeing is bad (2.5 - 5.0)
No error occurs during this series

Last operation is a 200 step map. This is a practice set for observer phasing.
03/14/06/ 14:03:56 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.14
Operator: Borrero
Other observers: Gilliam, Elrod
Bert wavelength: 553
BERT DET_A Tape: H56360
BERT DET_B Tape: H56361
Ernie wavelength: 630
ERNIE DET_A Tape: H56362
ERNIE DET_B Tape: H56363
Project Number: T723

03/14/06/ 14:05:08 -- Comment
System start up for this morning is good - (No problems)

03/14/06/ 14:14:51 -- Comment
Check A and B chip alignments on Bert and Ernie cameras
Check focus on A and B chips on both cameras
Check Sarnoff focus and alignment
Check Rockwell 1564 focus and alignment

FOR THIS MORNING: the only adjustment made is to rotation on Bert A Chip
Gband focus looks good

NOTE: 1564 line position checked in relavance to the chip section lines.
This looks OK. Line is not centered in a section. (?)

03/14/06/ 14:18:08 -- Comment
Phase operation to double check values

03/14/06/ 14:19:24 -- Operation 1 Map: 200 steps of .00 arcsec each
File Mark

03/14/06/ 14:39:43 -- Comment
Phase map ended at step 106 of 200
Hex = 5
Index = 657
No changes made

03/14/06/ 14:42:30

A recheck of suncenter at a solar elevation of 17.2

03/14/06/ 14:56:30 -- Operation 2 Flat Field: 32 configurations
File Mark

03/14/06/ 15:03:20 -- Comment
SPINOR FLAT
Suncenter
Focus 675 with random guide
Light level is 5.04 at start
Hairlines out

03/14/06/ 15:42:21 -- Comment
Seeing is poor (range is 1.5 to 2.5 arcsec)
We will wait to see if conditions improve.

03/14/06/ 16:07:46 -- Operation 3 Map: 200 steps of .00 arcsec each
File Mark

03/14/06/ 16:25:22 -- Comment
Phase Practice
Seeing is bad so another practice for phasing.
The Index value from this morning was 657. It was not as dark as it could
have been. We are seeing a good zero cross at a Index of 450. We will
make the
change and redo the flat in case we do take data today.

03/14/06/ 16:40:35 -- Operation 4 Flat Field: 32 configurations
File Mark

03/14/06/ 16:47:34 -- Comment
2nd Flat today
Hair lines out
Suncenter
Focus 675
Random guide
Ligh level 5.58

Repeat flat incase change in Index value makes a difference.

03/14/06/ 16:52:18 -- Operation 5 Flat Field: 32 configurations
File Mark

03/14/06/ 16:59:11 -- Comment
3rd Flat for today
Practice (Seeing is bad)
We may do a practive cal next
Main reason for third flat is because write on Hagrid was
not enabled for first two

03/14/06/ 17:14:59 -- Operation 6 Map: 180 steps of .15 arcsec each
File Mark

This map started as a practice run.
Hair lines not in - practicing only.
About the time we started - the seeing came in.
South 9.0, East 0.6,
Guider is 13.3
PAH 162.6
PAG 138.2
RV .031
Seeing is good for this series
So what started out as practice may be usable BUT

At 17:30 Joe sees an error message from Sarnoff

First Error Involves Sarnoff (Harry Computer)
Joe notices that the Sarnoff camera has stopped

updating/writing

There was two error messages (one on top the other)
The top message reads "Instruction at 0x00405bc5 referenced
at 0x03120fc0 - memory could not be read". Joe says this is
the second error message that occured because it was on top
error message.

memory

actually

of the initial

application has

this error

Cookie window.

The bottom or first error message read "SRNFcam64 MFC
encountered a problem and needs to close". At the same time
message occurs a Hagrid connect error appears in the Synchro

but there was

Monday. If I remember

remainder of the

GUI actually

on the hand

David - this is the same error that you and I saw on Monday
no loss in communication between Synchro and Hagrid on
correctly the camera continued to update and write for the
map. On Tuesday, the camera quit acquiring/writing and the
dis-appeared while Joe was trying to record the error message
written log.

before it would It took 5 or 6 attempts at restarting the SPINOR/SARNOFF GUI
successfully come back up without any error messages.

 Once the Sarnoff camera was back up and successfully
acquiring data, it was
noticed that the Rockwell camera had stopped. The only thing
it took to
restart the Rockwell was a click on the -> arrow.

Seeing during this series was good with two windows of poor seeing 17:30 and
17:38

03/14/06/ 18:15:48 -- Operation 7 Map: 5 steps of .00 arcsec each

File Mark

03/14/06/ 18:17:09 -- Comment

SPINOR map

Main reason for running this map is to register hairlines

Hair lines were not in for previous map

Possible hairline spatial positions can be use for spatial overlay for
previmap

03/14/06/ 18:22:50 -- Operation 8 Cal: 69 configurations

File Mark

03/14/06/ 18:58:53 -- Comment

ASP calibration

Good cal - no clouds

Light level consistent at 5.75

David's safety code is in place

Optics move fine for all positions.

03/14/06/ 19:08:35 -- Operation 9 Map: 120 steps of .15 arcsec each

File Mark

03/14/06/ 19:31:09 -- Comment

No crashes during this map

120 step map

s 9.0 w 0.2

occasional good seeing with a few

periods of poor

03/14/06/ 19:37:24 -- Operation 10 Flat Field: 32 configurations

File Mark

03/14/06/ 19:44:26 -- Comment

flat field ok

there were a few clouds during the last part

of the flat

no problems with the computers

03/14/06/ 20:07:19 -- Operation 11 Flat Field: 32 configurations

File Mark

03/14/06/ 20:18:35 -- Comment

Slit width 1500 microns

File Mark

Data taken on this day was done so at a guider angle of 13.3.
Hector emailed in - taht data must be taken with the slit perpendicular to the horizon.

File Mark

03/15/06/ 14:06:24 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.15

Operator: Borrero, Navarro

Other observers: Gilliam, Elrod

Bert wavelength: 553

BERT DET_A Tape: H56370

BERT DET_B Tape: H56371

Ernie wavelength: 630

ERNIE DET_A Tape: H56372

ERNIE DET_B Tape: H56373

Project Number: T723

03/16/06/ 13:08:03 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.16

Operator: Navarro

Other observers: Joe/Mike

Bert wavelength: 553

BERT DET_A Tape: h56370

BERT DET_B Tape: h56371

Ernie wavelength: 630

ERNIE DET_A Tape: h56372

ERNIE DET_B Tape: h56373

Project Number: t723

Normal start up with asp and spinor
cameras. GUI in the hagrid was normal
with 4 restarts. Bert Ernie Harry and
Hagrid all active from the cookie window.
Check phase

03/16/06/ 13:57:29 -- Operation 2 Map: 240 steps of .00 arcsec each

File Mark

File Mark

sunrise

focus check

difference bert and ernie

sun centerao alignment

03/16/06/ 14:33:21 -- Operation 3 Map: 180 steps of .15 arcsec each

sun center s 7.2 w 0.0

AO on with tip tilt

seeing good gdran 127.9

File Mark

03/16/06/ 15:09:42 -- Operation 4 Flat Field: 32 configurations

cookie crashreboot cookie

03/16/06/ 15:15:05 -- Operation 5 Flat Field: 32 configurations

reboot cookie crash

03/16/06/ 15:23:38 -- Operation 6 Flat Field: 32 configurations
File Mark
03/16/06/ 15:31:08 -- Comment
 this flat ok no cookie crash

03/16/06/ 15:54:24 -- Operation 7 Map: 60 steps of .52 arcsec each
File Mark
03/16/06/ 15:56:31 -- Comment
 asp map ended early
 spinor cameras not recording

03/16/06/ 15:57:39 -- Operation 8 Map: 60 steps of .52 arcsec each
s 3.7 e 25.4
gdran 166.5

File Mark

03/16/06/ 16:11:58 -- Operation 9 Flat Field: 32 configurations
File Mark
03/16/06/ 16:19:26 -- Comment
 good flat
 no crashes

03/16/06/ 16:25:11 -- Operation 10 Map: 150 steps of .15 arcsec each
s 3.4 e 26.9 off point from pore
seeing fair

File Mark

03/16/06/ 16:57:17 -- Operation 11 Cal: 69 configurations
File Mark

03/16/06/ 17:40:31 -- Operation 12 Flat Field: 32 configurations
File Mark
03/16/06/ 17:48:10 -- Comment
 lamp flat ok

03/16/06/ 18:06:29 -- Operation 13 Map: 250 steps of .00 arcsec each
File Mark

03/16/06/ 19:00:04 -- Operation 14 Flat Field: 32 configurations
File Mark
03/16/06/ 19:20:21 -- Comment
 cookie crash.....reboot
 failed at the end of flat

File Mark

File Mark

03/17/06/ 16:08:43 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.17
Operator: mike
Other observers: joe
Bert wavelength: 854
BERT DET_A Tape: dummy

BERT DET_B Tape: dummy
Ernie wavelength: 849
ERNIE DET_A Tape: dummy
ERNIE DET_B Tape: dummy
Project Number: T640

03/18/06/ 16:11:17 -- Operation 1 Map: 50 steps of .15 arcsec each
File Mark

03/18/06/ 16:27:44 -- Operation 2 Map: 40 steps of .15 arcsec each
03/18/06/ 16:46:19 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.18
Operator: f
Other observers: f
Bert wavelength: -1
Bert wavelength: 630
BERT DET_A Tape: t
BERT DET_B Tape: y
Ernie wavelength: 557
ERNIE DET_A Tape: g
ERNIE DET_B Tape: h
Project Number: t567

03/18/06/ 16:49:57 -- Operation 2 Map: 40 steps of .15 arcsec each

03/18/06/ 16:54:54 -- Operation 3 Map: 200 steps of .00 arcsec each

03/18/06/ 17:05:30 -- Operation 4 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 17:16:58 -- Operation 5 Map: 40 steps of .15 arcsec each

03/18/06/ 17:52:46 -- Operation 6 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 18:01:32 -- Operation 7 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 18:12:49 -- Operation 8 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 18:27:58 -- Operation 9 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 19:56:07 -- Operation 10 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 20:16:40 -- Operation 11 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 20:24:54 -- Operation 12 Map: 40 steps of .15 arcsec each
File Mark

03/18/06/ 20:37:24 -- Operation 13 Map: 250 steps of .15 arcsec each
File Mark

03/18/06/ 21:27:45 -- Operation 14 Map: 250 steps of .15 arcsec each

File Mark

03/18/06/ 23:52:05 -- Operation 15 Map: 250 steps of .15 arcsec each
File Mark

03/19/06/ 17:37:58 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.19

Operator: mike

Other observers: doug

Bert wavelength: 849

BERT DET_A Tape: dummy

BERT DET_B Tape: dummy

Ernie wavelength: 852

ERNIE DET_A Tape: dummy

ERNIE DET_B Tape: dummy

Project Number: t724

File Mark

03/19/06/ 17:42:00 -- Operation 1 Map: 80 steps of .15 arcsec each
File Mark

03/19/06/ 17:59:08 -- Comment

Map completes OK

03/21/06/ 20:18:57 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.21

Operator: Test

Other observers: Test

Bert wavelength: 849

BERT DET_A Tape: 1

BERT DET_B Tape: 2

Ernie wavelength: 854

ERNIE DET_A Tape: 3

ERNIE DET_B Tape: 4

Project Number: T724

Summary of Optical Setup

Sarnoff Camera is aligned and focused.

Wavelength 5247

1000 mm lens - curved side towards grating

0.6 ND

HA 30

75 to 80 arcsec spatial (between hairlines)

Rockwell camera is aligned and focused.

Wavelength 15648

1000 mm lens - curved side towards mirror/grating

No ND

No HA30

75 to 80 arcsec spatial (between hairlines)

Photospheric (Bert) aligned and focused.

Wavelength 8498

1219 lens - curved side towards grating

ND of 0.1

No HA30
This is the 'straight through' beam
75 to 80 arcsec spatial (between hairlines)

Chromospheric (Ernie) aligned and focused.
Wavelength 8542
1219 lens - curved side towards grating
No ND
No HA30

This is the 'folded' beam
75 to 80 arcsec spatial (between hairlines)

CCD1 - SI805-205 UBF (Slit Jaw Image)
Wavelength 6562.808 +/- 0.35
Approx 120 arcsec
Focus is a bit soft - may have a bad lens

CCD2 - Dalsa CAD7 G-band is aligned and focused
Wavelength Gband
Approx 120 arcsec

2 Synchro resets for March 21

First reset was done approx 60 minutes after startup.
No one was near the ASP when it failed.
We had to wait approx 1 hour for ice to clear from turret.
Hang up occurred sometime during this hour

Second reset was done while setting up.
Synchro failure occurred when I started to unclamp the Ernie camera from bench.
This failure took out the Synchro and Demod computers.
It took several reboot attempts to get all three computers back up.
The main problem was the B channel video board in Ernie got into a state.
This is a problem that we have seen in the past and at the start of March.

Ernie alignment problem
The chromospheric camera focus (both) was too far back in the camera. When this happens, the mechanism inside the camera will lose travel in spatial A adjustment.
This took some time to figure out - we have experienced this in the past.

Beam splitter optic separation had changed? We are not real sure how this happened.

Slit jaw fold mirror had to be replaced - the mirror put in during the initial setup was in real bad shape. It should have never been put in to start with - my mistake.

Phase has not been checked yet - this will be done this morning. Index will not be changed. The only change that might be made would be in Hex (if required).
03/22/06/ 13:13:41 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.22
Operator: Judge
Other observers: Gilliam, Elrod
Bert wavelength: 849
BERT DET_A Tape: H56380
BERT DET_B Tape: H56381
Ernie wavelength: 854
ERNIE DET_A Tape: H6382
ERNIE DET_B Tape: H6383
Project Number: T724

Bert 8498
Ernie 8542
Sarnoff 5247
Rockwell 15648
CCD1 UBF H-alpha
CCD2 Gband

14:00 - alignment check of HOAO

14:05 - alignment/focus check of Gband and Halpha cameras

03/22/06/ 14:05:58 -- Comment

14:05 to 14:10 Clouds building over the ridge. Front just to the North of us.

We still need a good phase check map.

Slit width is verified at 50 micron or .375 A.

03/22/06/ 14:15:04 -- Operation 1 Map: 200 steps of .00 arcsec each

File Mark

03/22/06/ 14:30:58 -- Comment

Phase check (200 step stationary map for phase)

No Hex change - we maintain a value of 5 for today.

Index not to be touched.

03/22/06/ 15:48:48 -- Operation 2 Map: 1 of 4, 240 steps of .15 arcsec each

File Mark

03/22/06/ 16:38:11 -- Operation 3 Map: 2 of 4, 240 steps of .15 arcsec each

File Mark

File Mark

03/22/06/ 23:50:44 -- Operation 4 Map: 150 steps of .44 arcsec each

File Mark

03/23/06/ 13:21:06 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.23

Operator: Judge

Other observers: Gilliam, Elrod

Bert wavelength: 849

BERT DET_A Tape: H56380

BERT DET_B Tape: H56381

Ernie wavelength: 854

ERNIE DET_A Tape: H56382

ERNIE DET_B Tape: H56383

Project Number: T724

Bert A/B 8498

Ernie A/B 8542

Sarnoff 5247
Rockwell 15648
CCD1 Si805 UBF H-alpha slit jaw
CCD2 Dalsa Gband - no slit

Slit width is 50 micron (.375 arcsec)

03/23/06/ 13:22:27 -- Comment

Conditions at sunrise are clear with winds of 5 to 10mph (ground)
Slit width is checked at 50 micron (.375 arcsec)
Modulation is set at 20hz (1.25) rotations per sec (20 acc per sec)
SPINOR system start up this morning was real nice - no problems.
During the last two maps of yesterday, Ernie tape write errors were reported.

Joe cleaned all drives before shutting down last night.

03/23/06/ 13:42:13 -- Operation 1 Map: 200 steps of .00 arcsec each
File Mark

Hagrid reboots during this stationary phase map.
After reboot we see a fatal error message (Don't send)
Synchro does not want to end on the phase map.
We reboot Cookie.
Should I be running Harry and Hagrid during phase check? (probably not)

03/23/06/ 14:42:16 -- Comment

14:20 suncenter routine at solar EL of 15.3
14:24 UBF calibration at suncenter
14:36 Double check of all camera alignments and line positions.

03/23/06/ 14:48:42 -- Operation 2 Cal: 69 configurations
File Mark

03/23/06/ 15:26:49 -- Comment

SPINOR Pol cal
Hair lines out
Focus set at 675
Suncenter - not near any activity
AZTA 330 light level is 5.0
AZTA 15 light level is 5.08
AZTA 50 light level is 5.102
AZTA 105 light level is 5.166
Good calibration - no clouds
David's safety box checks are really nice.

03/23/06/ 16:00:48 -- Operation 3 Map: 214 steps of .37 arcsec each
File Mark

03/23/06/ 16:45:27 -- Comment

SPINOR map of 214 steps
North 12.3, West 3.3
Guider is at 343.5
RV 0.336
HPA 350.2 GPA 324.6
Seeing during this series is poor (1.5 - 3.0 arcsec)
Light level is 5.5 consistent
One issue during this map is Gband expose. We show high counts - 3600, which is close to saturation. We drop and ND during the map to

reduce counts. (place 2 NDs of 0.1 each). This will change focus slightly.
Second issue during series is the UBF/Gband is putting down three files during this sequence. This is because the nz command in camera_init was set to 80. Thus a 214 step map will result in three files (2 of 80 images) and a third of 54 images.
SEEING is the biggest issue during this map.
Gband expose will be moved back to 25msec.

03/23/06/ 16:52:56 -- Operation 4 Flat Field: 32 configurations
File Mark

03/23/06/ 17:11:30 -- Comment
SPINOR flat series 16 dark, 16 flat
Light level is 5.65 (no clouds)
Hairlines out
Suncenter
Focus is 675
Random guide in use

03/23/06/ 17:33:27 -- Operation 5 Map: 320 steps of .37 arcsec each
File Mark

03/23/06/ 18:40:00 -- Comment
SPINOR map series
320 steps at 0.375 step size
North 12.3 West 3.4
Guider set at 356.4 - slit parallel to horizon
PAH 350.0
PAG 324.4
RV 0.336
Light level is 5.7 for most all of map
Seeing is poor (2.0 to 3.0 for much of this series)
Sarnoff Camera stops at step 255 of 320
There is no error messages - nothing
Quiting out of the GUI and restarting took multiple attempts.
Camera was not restarted until step 290 of series.
We will run a second map of this size to see how things go.

03/23/06/ 18:55:39 -- Operation 6 Map: 320 steps of .37 arcsec each
File Mark

03/23/06/ 20:02:24 -- Comment
SPINOR map
This is more of a test series (Seeing is poor)
There is no failures during this map.
The only issue we have seen today is the Sarnoff stopping during the last series. I am fairly sure that the crash this morning with the Hagrid computer was an operator related error.
For this map we maintain North 12.3, West 4.1 at start
Seeing for this test series is poor (2.0 to 4.0 arcsec)

03/23/06/ 20:11:05 -- Operation 7 Cal: 69 configurations

03/23/06/ 20:14:49 -- Operation 7 Cal: 69 configurations
File Mark

03/23/06/ 21:16:38 -- Comment
cal end 2116

some clouds during cal

03/23/06/ 22:31:40 -- Operation 8 Flat Field: 32 configurations
File Mark
File Mark
File Mark
03/24/06/ 13:16:10 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.24
Operator: Judge
Other observers: Gilliam, Elrod
Bert wavelength: 849
BERT DET_A Tape: H56390
BERT DET_B Tape: H56391
Ernie wavelength: 854
ERNIE DET_A Tape: H56392
ERNIE DET_B Tape: H56393
Project Number: T724

03/24/06/ 13:17:32 -- Comment

Bert A/B	8498
Ernie A/B	8542
Harry Rockwell	15648
Hagrid Sarnoff	5247
CCD1 Si805	UBF slit jaw (H-alpha)
CCD2 Dalsa	G-band (no slit)

Slit width checked at 50 micron (.375 arcsec)

Mode of operation for this morning will be North/South along slit
We will operate at Guider of 13.3 - North up with East to West scan
direction
We will also operate at 193.3 - South up with West to East scan direction

03/24/06/ 14:19:47 -- Operation 1 Map: 200 steps of .00 arcsec each
File Mark

03/24/06/ 14:20:46 -- Comment

Startup on phase map - tapes not in ?????

03/24/06/ 14:30:24 -- Comment

Three of the drives would not except tapes.
Each time we put the tapes back in, the drives reject the tapes
Maybe the tapes are to old??
Try new tapes and everything seems to calm down.
The initail tapes were rejected on sunrise and this went un-noticed

03/24/06/ 14:34:53 -- Operation 2 Map: 200 steps of .00 arcsec each
File Mark

Phase confusion
David helps us out of this jam
Unable to see a blue color at any LSB value
Set Hex to 1 (from 5) and there is what we would expect
David mentions a 'wrap around issue'
Go back to Hex = 5 (opposing sign) Index is left at 450
Thanks David
So 1 and 9 are same sign with 5 and 15 opposite?

03/24/06/ 15:11:14 -- Operation 3 Map: 225 steps of .37 arcsec each

File Mark

03/24/06/ 15:57:41 -- Comment

SPINOR map

225 steps at 0.375 step size

South 2.2 West 22.2

Guider 193.3

PAH 281.0

PAG 255.3

Seeing at start is 0.5

Seeing is fair to good for most of this map.

At 193.3 we see South up on the slit with scan of East to West

Light level for this period is 5.2 to 5.4

Thin cirrus in the area.

NOTE: During this map Harry Rockwell only wrote .dat files for first 94 steps.

At step 95, Harry starts putting down a .hdr file with each .dat file. Possibly because camera_init, camera_scan and ubf files are in use?

03/24/06/ 16:09:17 -- Operation 4 Map: 2 steps of .37 arcsec each

File Mark

This two step map is ran because removing ubf file does not work.

'rm ubf' from ~cookie leaves a file somewhere

If we try to run flats we will get a factor of 4 times the data.

03/24/06/ 16:10:20 -- Operation 5 Flat Field: 32 configurations

File Mark

03/24/06/ 16:17:32 -- Comment

SPINOR flat

Two step map run before this flat was to dump the UBF file. Going to ~cookie

and trying a 'rm ubf' does not work. The UBF file can only be removed using

direct set command from Synchro - and the command can't be remembered at this time

Flat parameters are:

Hairlines out

Focus 675

Suncenter

Random guide

NOTE: First two darks of this flat have light 'Screen not in'

03/24/06/ 16:29:29 -- Operation 6 Map: 229 steps of .52 arcsec each

SPINOR system stops because there is no hand shake with CCD1

A look at CCD1 shows an SI805 time out.

SPINOR just waits for a reply back from DST camera - so we reboot.

03/24/06/ 16:35:53 -- Operation 7 Map: 229 steps of .52 arcsec each

File Mark

03/24/06/ 17:23:41 -- Comment

SPINOR map starts 6.5 minutes late of the mark

South 2.3 West 22.9

guider is 193.3

Seeing is 'in and out' during this series

We are at a guider of 13.3 - Scan direction is East to West

PAH of 284

PAG of 254.8

RV is 0.397

Rotation track, tip/tilt and HOAO are on
NOTE: Harry does not respond at the start of map (restart of GUI)
does not help.
We type a NoOp from Synchro while running to get Harry restarted.
We loose the first 19 steps of series with the 15648 line.
Seeing conditions are 'in and out' during map (times fairly good)
The signal for Q,U,V looks more or less like 'I' with noise?
NOTE: Harry puts down a .hdr file with each .dat file - no problems

03/24/06/ 17:27:41 -- Operation 8 Map: 229 steps of .52 arcsec each
File Mark

03/24/06/ 18:15:30 -- Comment

SPINOR map
Move in guider position from 193.3 to 13.3 for this map
South is now up on slit with a scan direction of West to East
South 2.3
West 23.4
Guider 13.3
HPA 280.2
GPA 254.5
RV .404
Seeing for this series is 'in and out' (0.5 - 2.5)
NOTE: Harry puts down .hdr files for every .dat file
David returns call concerning signal on Q,U,V
We seem to be OK on signal

03/24/06/ 18:22:49 -- Operation 9 Map: 20 steps of .00 arcsec each
File Mark

03/24/06/ 18:27:14 -- Comment

This is a stationary map (20 steps) of a spot near the limb
This map is ran in order to look at signal in Q,U,V
This is also done as a coordinate comparison for pointing with
previous maps.

03/24/06/ 18:31:13 -- Operation 10 Cal: 69 configurations
File Mark

03/24/06/ 19:09:27 -- Comment

Pol Calibration for SPINOR
light level is 5.8 consistent
Hairlines out
focus 675
Suncenter
Good calibration - no clouds

03/24/06/ 19:11:24 -- Operation 11 Flat Field: 32 configurations
File Mark

Focus 675
Hairlines out
Random Guide
Suncenter

03/24/06/ 19:19:54 -- Operation 12 Flat Field: 32 configurations
File Mark

03/24/06/ 19:27:53 -- Comment

A second SPINOR flat
Main reason for running this flat is to watch the file count.
Interesting issue with Sarnoff Hagrid, the flat is a 32 step operation.

The first 16 are darks (screen in front of slit)
The last 16 are flats with random guide and out of focus.
On both flats run the file count looks good to 18.
At the 19th step we see a complete saturation of the Sarnoff chip.
We also see that the 19th file is not put down but two file 20s are put
down.
The remaining part of the flat looks good.
This happened during both flats.

03/24/06/ 19:39:34 -- Operation 13 Flat Field: 32 configurations

File Mark

03/24/06/ 19:47:13 -- Comment

Lamp Flats

Slit width of 1.5mm

No issues with file writes for this 32 part series

Unless I have forgot something this is a good lamp flat.

We did check the beam with live B on Ernie and Bert to make sure the
light was homogenous. We also checked homogeneity on the slit.

NOTE: For the Lamp flat process there are no .hdr files on Harry - only
.dat files.

The previous solar flat run show .hdr files on Harry.

We used the 'Lamp plus Slit Widths' operation for the Lamp flats.

File Mark

File Mark

03/25/06/ 13:46:45 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.25

Operator: Anna

Other observers: Joe/Mike

Bert wavelength: 8498

Bert wavelength: 849

BERT DET_A Tape: h56400

BERT DET_B Tape: h56401

Ernie wavelength: 854

ERNIE DET_A Tape: h56402

ERNIE DET_B Tape: h56403

Project Number: t724

03/25/06/ 13:48:39 -- Comment

Normal start up

Ernie did not recognize tape drives reboot Ernie

After reboot, Ernie had no signal on Ernie B chip....reboot

after reboot of Ernie again, OK

Align Bert and Ernie check phase

03/25/06/ 14:05:15 -- Operation 1 Map: 200 steps of .00 arcsec each

03/25/06/ 14:07:14 -- Error WaitAccum: BERT timeout

03/25/06/ 14:07:49 -- Error WaitAccum: ERNIE timeout

File Mark

03/25/06/ 14:08:23 -- Error WaitShow: timeout bert

all of cookie messages highlighted and errors also

reboot of cookie then recheck phase

03/25/06/ 14:09:30 -- Operation 2 Map: 200 steps of .00 arcsec each

File Mark

03/25/06/ 14:12:17 -- Comment

Phase ok hex at 5 index 450

03/25/06/ 14:24:49 -- Comment

ubf cal, gband and ubf focus ok
bert and ernie focus ok
03/25/06/ 14:27:03 -- Comment
Sarnoff and rockwell focus check
Phillip Judge has a question about the 15648 line
it looks like it might be the right line, but
could be not. All other lines are ok.

03/25/06/ 14:50:12 -- Operation 3 Map: 90 steps of .52 arcsec each
File Mark
03/25/06/ 15:09:08 -- Comment
90 step map @ .5
slng 29.5 slat9.2
seeing good

03/25/06/ 15:13:17 -- Operation 4 Flat Field: 32 configurations
File Mark

03/25/06/ 15:31:23 -- Operation 5 Movie: 1 of 16, 7 steps of .52 arcsec each
File Mark
03/25/06/ 15:56:27 -- Comment
map 16 repeats of 7 steps
all cameras seem to be working ok
slat 8.7 w 30.8

03/25/06/ 16:01:03 -- Operation 6 Movie: 1 of 36, 5 steps of .52 arcsec each
File Mark
03/25/06/ 16:38:26 -- Comment
36 repeats of 5 steps
03/25/06/ 16:39:13 -- Comment
slat 8.7 slng 31.1
seeing fair

03/25/06/ 16:44:45 -- Operation 7 Map: 240 steps of .52 arcsec each
File Mark
03/25/06/ 16:46:26 -- Comment
abort to change nz

03/25/06/ 16:47:33 -- Operation 8 Map: 240 steps of .52 arcsec each
240 step map @ .525 step size
seeing poor to fair at times
File Mark
03/25/06/ 17:37:37 -- Comment
Since seeing is worse...time for flat and cal

03/25/06/ 17:41:02 -- Operation 9 Flat Field: 32 configurations
File Mark

03/25/06/ 17:51:47 -- Operation 10 Cal: 69 configurations
File Mark

03/25/06/ 18:34:26 -- Operation 11 Flat Field: 32 configurations
File Mark
03/25/06/ 18:43:25 -- Comment
Lamp flat. Slit adjusted to 1500 microns.
File Mark
File Mark

03/26/06/ 13:04:11 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.26

Operator: Anna

Other observers: Joe/Mike

Bert wavelength: 849

BERT DET_A Tape: h56410

BERT DET_B Tape: h56411

Ernie wavelength: 854

ERNIE DET_A Tape: h56412

ERNIE DET_B Tape: h56413

Project Number: t724

File Mark

03/26/06/ 14:08:43 -- Comment

alignment and focus check on all cameras

phase and difference asp cameras

sunrise load tapes h56410-h56413

ubf cal....table alignment with pupil

Today is the first day that all cameras and computers
started up without failures!

03/26/06/ 15:24:32 -- Operation 2 Cal: 69 configurations

File Mark

03/26/06/ 15:59:16 -- Comment

Cal OKClouds)(thin cirrus) during cal

light level fluctuated slightly

File Mark

File Mark

03/28/06/ 13:33:07 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.28

Operator: Anna

Other observers: Mike, Doug

Bert wavelength: 849

BERT DET_A Tape: H56410

BERT DET_B Tape: H56411

Ernie wavelength: 854

ERNIE DET_A Tape: H56412

ERNIE DET_B Tape: H56413

Project Number: T724

03/28/06/ 14:58:03 -- Operation 1 Map: 200 steps of .00 arcsec each

File Mark

03/28/06/ 15:09:21 -- Comment

First map is for phasing. Hex 5. Index 450.

03/28/06/ 15:42:07 -- Comment

At this time have closed turret. Thick clouds passing
overhead.

03/28/06/ 16:07:02 -- Operation 2 Map: 229 steps of .52 arcsec each

File Mark

03/28/06/ 16:19:11 -- Comment

South 10.0, West 5.0, RV 0.105, HPA 236.6, GDRAN 344.7.

Map aborted at step 59/229 and time 1618. Too many thick
clouds. Some good seeng.

03/28/06/ 17:08:53 -- Operation 3 Flat Field: 32 configurations

File Mark

03/28/06/ 17:16:28 -- Comment

Dark and flat for SPINOR. Sun center. Out of focus.
Hairlines removed. Not a good flat. Too many clouds.

03/28/06/ 17:22:10 -- Operation 4 Flat Field: 32 configurations
File Mark

03/28/06/ 17:29:32 -- Comment
Dark and flat for SPINOR. This is a better flat. Sun
center. Out of focus. Guider moving.
Light level 2/0-3.6.

03/28/06/ 17:39:02 -- Operation 5 Cal: 69 configurations
File Mark

03/28/06/ 17:54:29 -- Comment
Cal. Sun center. Out of focus. AZ-TA. Abort at
1754. Too many clouds.

03/28/06/ 18:01:58 -- Operation 6 Flat Field: 32 configurations
File Mark

03/28/06/ 18:08:22 -- Comment
Lamp flat for SPINOR.

File Mark

File Mark

03/29/06/ 14:09:57 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.29

Operator: Anna

Other observers: Mike/Doug

Bert wavelength: 849

BERT DET_A Tape: H56420

BERT DET_B Tape: H56421

Ernie wavelength: 854

ERNIE DET_A Tape: H56422

ERNIE DET_B Tape: H56423

Project Number: T724

03/29/06/ 14:12:03 -- Comment
Weather is overcast at this time.

03/29/06/ 16:38:33 -- Operation 1 Map: 200 steps of .00 arcsec each
File Mark

03/29/06/ 17:11:46 -- Operation 2 Movie: 1 of 20, 5 steps of .52 arcsec each
File Mark

03/29/06/ 17:32:46 -- Comment
South 13.8, East 23.4, HPA 109.0, RV 0.408, GDRAN 354.4.
Variable clouds and light level. A little bit of good
seeing. Noticed during this scan at every fifth
wavelength for the UBF, two images were taken.

03/29/06/ 17:39:42 -- Operation 3 Flat Field: 32 configurations
File Mark

03/29/06/ 17:48:03 -- Comment
Flats for SPINOR
Suncenter, Hairlines out, Focus 675
Light level during flat ranges from 2.2 to 4.1
Thick cirrus/cumulus conditions

03/29/06/ 17:52:18 -- Operation 4 Cal: 69 configurations
File Mark

03/29/06/ 18:01:45 -- Comment

SPINOR POL CAL

Thick cirrus conditions with cumulus

This cal is ended at step 6 of 69 because of clouds

File Mark

File Mark

03/30/06/ 13:25:20 -- Advanced Stokes Polarimeter Observer's Log

oscar:/d/asp/Logs/06.03.30

Operator: Anna

Other observers: Mike/Doug

Bert wavelength: 849

BERT DET_A Tape: H56430

BERT DET_B Tape: H56431

Ernie wavelength: 854

ERNIE DET_A Tape: H56432

ERNIE DET_B Tape: H56433

Project Number: T724

03/30/06/ 14:10:48 -- Operation 1 Map: 109 steps of .00 arcsec each

File Mark

03/30/06/ 14:17:17 -- Comment

Phase. Hex 5. Index 450.

03/30/06/ 14:46:47 -- Comment

Very poor seeing, so will do a cal and flat.

03/30/06/ 14:48:34 -- Operation 2 Flat Field: 32 configurations

File Mark

03/30/06/ 14:58:03 -- Comment

Flat and dark. Sun center. Out of focus. Guider moving.

Clear. Light level 4.9.

03/30/06/ 15:03:59 -- Operation 3 Cal: 69 configurations

File Mark

03/30/06/ 15:47:43 -- Comment

Cal. Sun center. Out of focus. AZ-TA. Clear.

Light level 5.1.

03/30/06/ 16:08:14 -- Operation 4 Map: 200 steps of .52 arcsec each

File Mark

03/30/06/ 16:49:44 -- Comment

South 12.3, east 33.9, HPA 102.2, RV 0.559, GDRAN 345.1.

Active region 10865. Clear Light level 5.4. Overall not very good seeing.

03/30/06/ 17:03:46 -- Operation 5 Movie: 1 of 20, 5 steps of .52 arcsec each

File Mark

03/30/06/ 17:13:28 -- Comment

South 12.9, east 31.4, HPA 103.8, RV 0.524, GDRAN 357.9.

During this scan the sarnoff and rockwell cameras for the most part stopped taking data except for a few frames. Aborting at 1713. Poor seeing.

03/30/06/ 17:23:16 -- Operation 6 Flat Field: 32 configurations

File Mark

03/30/06/ 17:31:49 -- Comment

Flat and dark for SPINOR. Sun center. Out of focus. Guider moving. A few thin clouds. Light level 5.3. The Sarnoff

did not write darks during this scan. I forgot to turn on
write after restarting the camera.

03/30/06/ 17:33:37 -- Operation 7 Flat Field: 32 configurations
File Mark

03/30/06/ 17:40:23 -- Comment
Flat and dark for SPINOR. Sun center. Out of focus. Guider
moving. Clear. Light level 5.7.

03/30/06/ 18:17:43 -- Operation 8 Flat Field: 32 configurations
File Mark

03/30/06/ 18:24:52 -- Comment
Lamp flat for SPINOR. Slit adjusted to 1500 microns

File Mark

File Mark

03/31/06/ 14:37:12 -- Advanced Stokes Polarimeter Observer's Log
oscar:/d/asp/Logs/06.03.31

Operator: Anna

Other observers: Gilliam, Elrod

Bert wavelength: 849

BERT DET_A Tape: H56440

BERT DET_B Tape: H56441

Ernie wavelength: 854

ERNIE DET_A Tape: H56442

ERNIE DET_B Tape: H56443

Project Number: T724

03/31/06/ 14:38:27 -- Comment

Date and time were off this morning, SetDate to correct time

Bert A/B 8498

Ernie A/B 8542

Rockwell 15648

Sarnoff 5247

CCD1 Si805 UBF 6562.808

CCD2 Dalsa G-band

03/31/06/ 15:41:18 -- Operation 1 Map: 200 steps of .00 arcsec each
File Mark

03/31/06/ 15:45:44 -- Comment

Phase check shows same results

Hex at 5

Index to be left at 450 (don't touch)

03/31/06/ 16:00:13 -- Operation 2 Map: 200 steps of .52 arcsec each
File Mark

03/31/06/ 16:23:03 -- Comment

SPINOR map started at 1600

South 6.6, West 0.0

Slit at 90 degrees to the horizon

Guider 351.2

Seeing at start ranges from 0.5 to 1.5

Cirrus conditions

We are clear to the West but cirrus continues to thicken

Map is aborted at step 109 of 200

light level ranging from 4.5 down to 1.5

03/31/06/ 16:32:06 -- Operation 3 Map: 320 steps of .37 arcsec each

File Mark
03/31/06/ 16:35:14 -- Comment
End map
End run
To cloudy to continue.