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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

Rotator
 ROTATOR
 SHEET-3

STD Crate
 Crate Detail
 SHEET-2

Prolog

CE200

CCD

PS200

Power Box
 Power Control
 SHEET-7

Distribution Box
 Dist Box Circuit
 SHEET-5

Slit/Decker

CCD Interface
 Audio Circuit
 SHEET-10

Video Out

Slit Camera
 Camera Gain
 SHEET-8

Not Used
 RS-232C Driver
 SHEET-9

Terminal Server

Lamp Slide

Grating Slide
 GRATING
 SHEET-11

Cyl. Lens Slide
 Cyl. Lens Slide
 SHEET-13

Ethernet

Waveplate/Filter Slide
 Waveplate/Filter Slide
 SHEET-12

COMPANY: University Of Wisconsin
 Astronomy Department

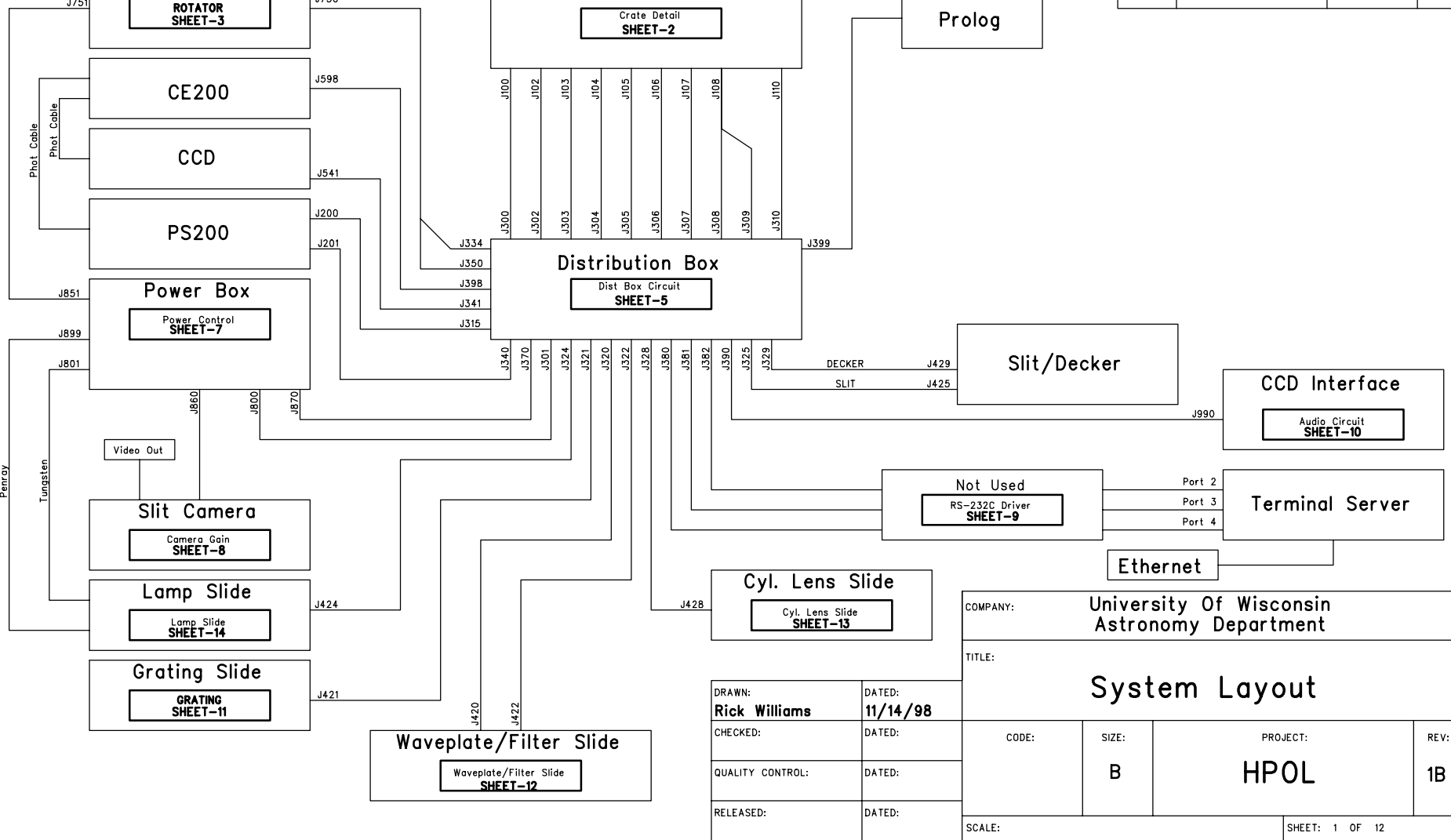
TITLE: System Layout

DRAWN: Rick Williams	DATED: 11/14/98
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1B
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SCALE: SHEET: 1 OF 12

Phot. Cable
Penray
Tungsten



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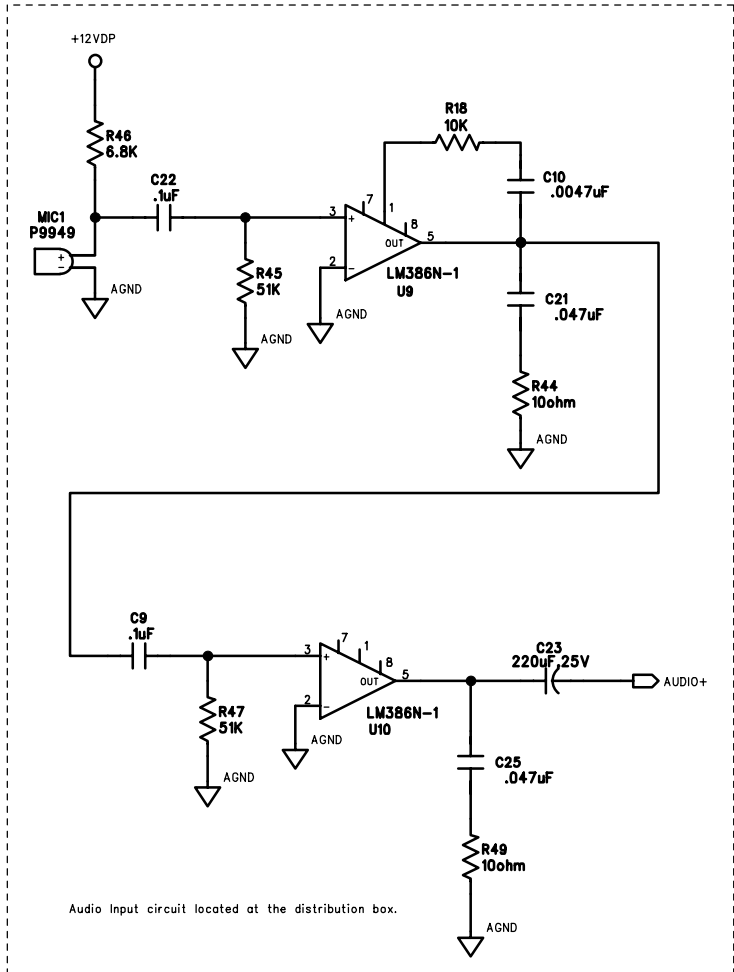
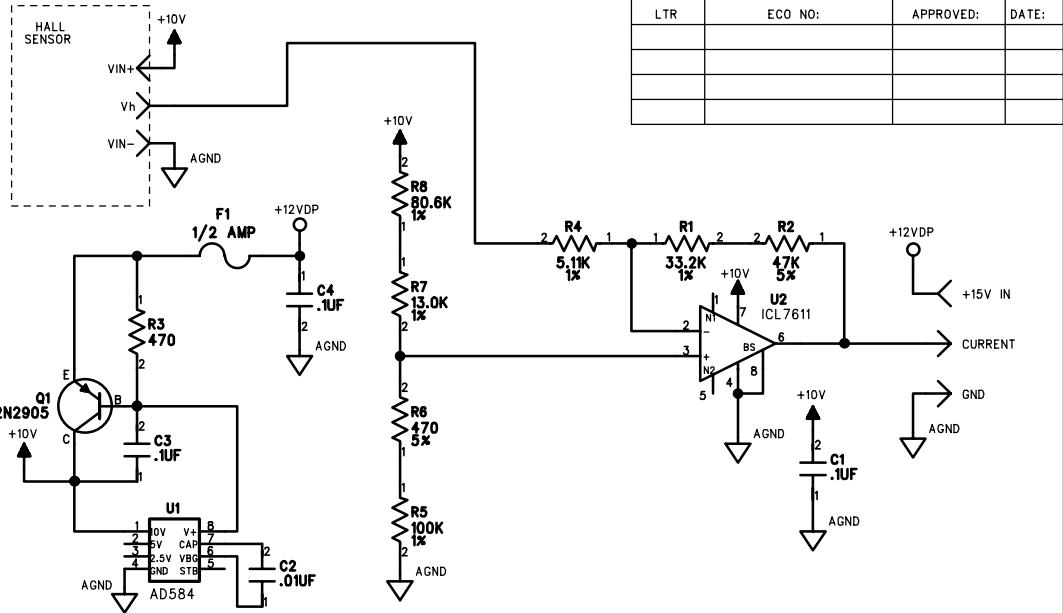
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



Dist. Circuit Layout SHEET-6

Audio Input circuit located at the distribution box.

COMPANY: University Of Wisconsin Astronomy Department

TITLE: Current Sensor/Audio

DRAWN: Rick Williams	DATED: 2/21/95
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
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SCALE: SHEET: 0F

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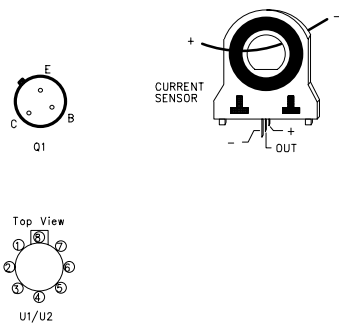
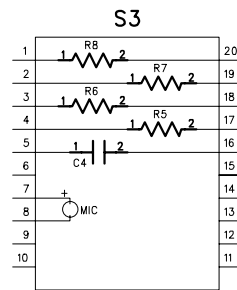
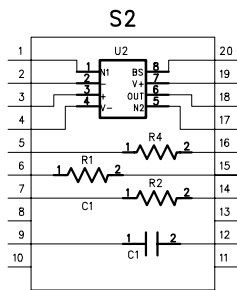
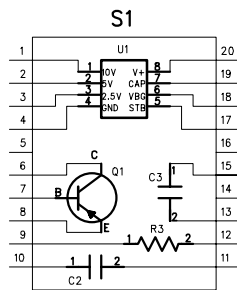
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: University Of Wisconsin Astronomy Department			
TITLE: Distribution Box Circuit Layout			
DRAWN: Rick Williams	DATED: 8/10/95	CODE:	PROJECT: HPOL
CHECKED:	DATED:	SIZE: B	REV: 1A
QUALITY CONTROL:	DATED:	SHEET: OF	
RELEASED:	DATED:	SCALE:	

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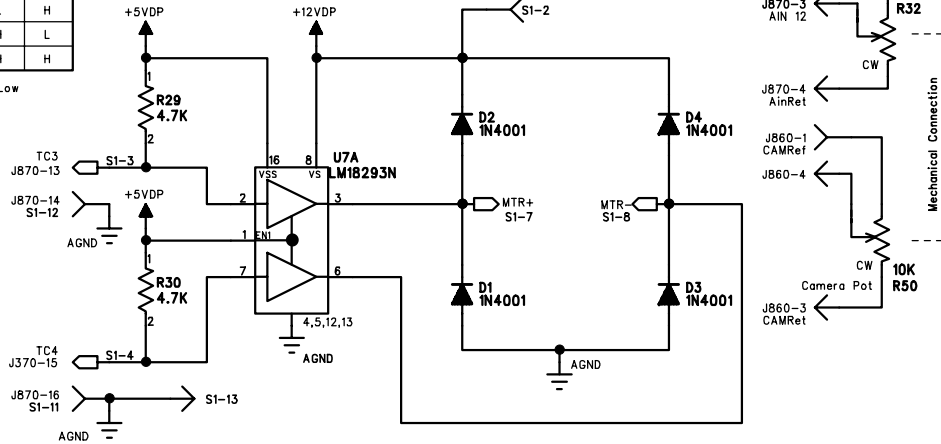
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

Function	TC4	TC3
Fast Stop	L	L
Turn CW	L	H
Turn CCW	H	L
Fast Stop	H	H

H=High L=Low

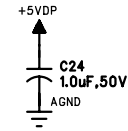
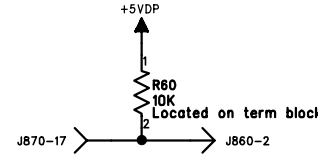
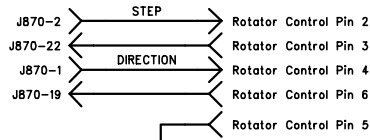
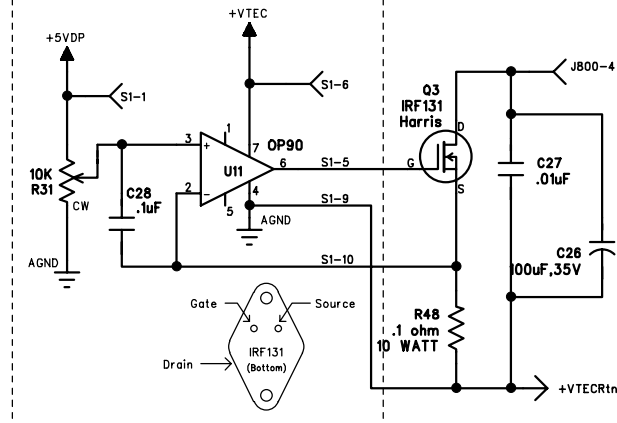
Camera Motorized Pot Control



TEC Current Limiter

Adjust to 4.5 Amps with load (3.7 Amps shorted)

Heat Sink



Rotator Power Cntrl Inverter

COMPANY: University Of Wisconsin Astronomy Department			
TITLE: Power Box Circuit Board			
CODE: B	SIZE: HPOL	PROJECT: HPOL	REV: 1C
SCALE:			SHEET: 4 OF 14

DRAWN: Rick Williams	DATED: 03/04/99
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

COMPANY: University Of Wisconsin Astronomy Department			
TITLE: Cylindrical Lens Slide			
CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
SCALE:			SHEET: OF

DRAWN: Rick Williams	DATED: 6/2/98
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

COMPANY:				University Of Wisconsin Astronomy Department			
TITLE:				Calibration Lamp Slide			
CODE:		SIZE:		PROJECT:		REV:	
		B		HPOL		1A	
SCALE:				SHEET: OF			

DRAWN:	DATED:
Rick Williams	6/1/98
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

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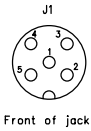
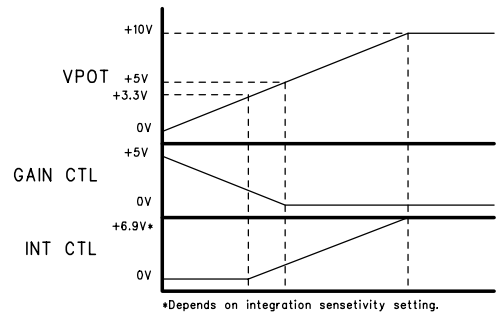
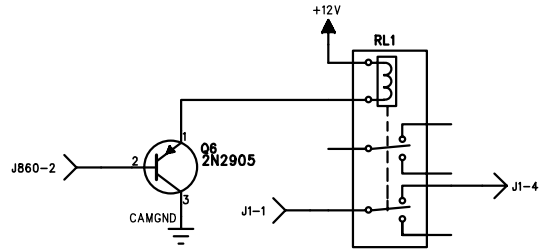
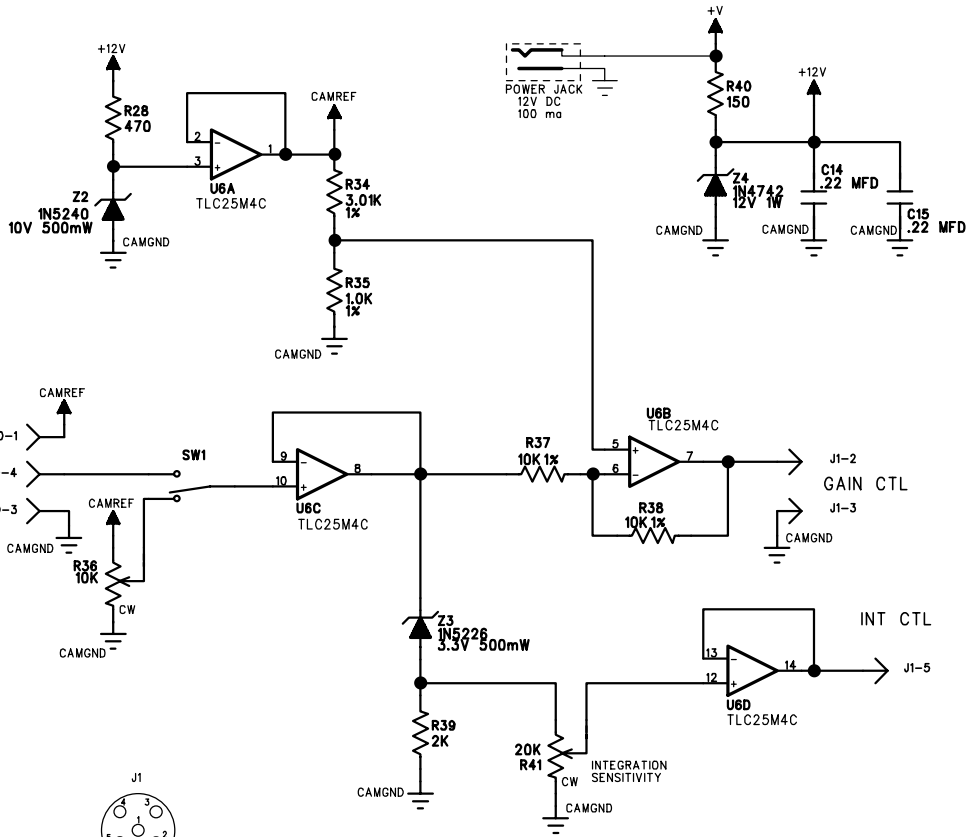
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



NOTE: Pin 11 of U1 goes to CAMGND, and Pin 4 of U1 goes to +12V.

COMPANY: University Of Wisconsin Astronomy Department

TITLE: Camera Control Circuit

DRAWN: Rick Williams	DATED: 03/04/99
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
SCALE:		SHEET: OF	

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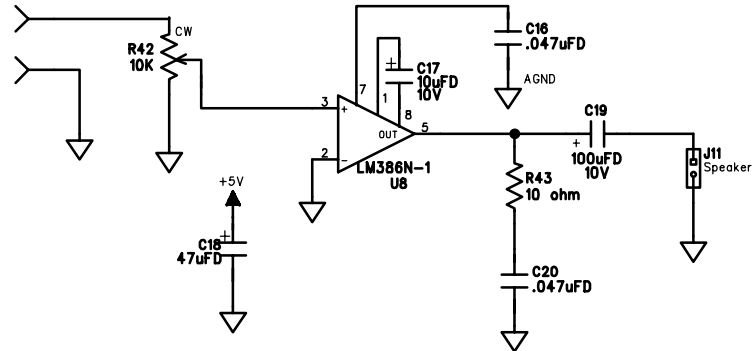
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

Note: Pin 6 of U1 is tied to +12V; pin 4 of U1 is tied to GND.



COMPANY: University Of Wisconsin Astronomy Department			
TITLE: Audio Circuit			
CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
SCALE:		SHEET: OF	

DRAWN: Rick Williams	DATED: 6/2/98
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

COMPANY: University Of Wisconsin
Astronomy Department

TITLE: RS-232C Driver Circuit

DRAWN: Rick Williams	DATED: 9/12/95
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
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SCALE: SHEET: 14 OF 14

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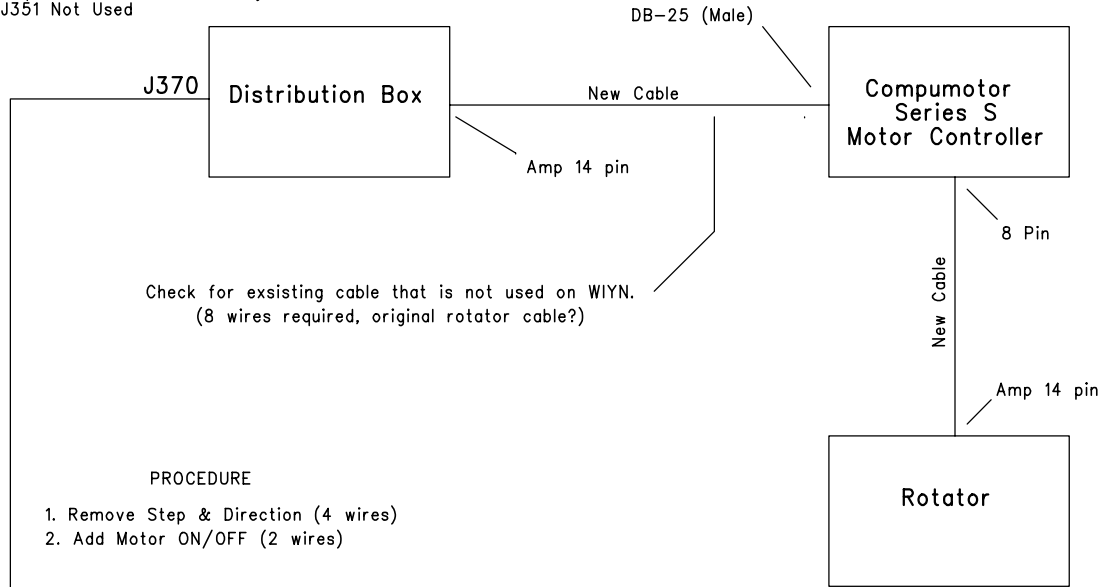
1

Modification to move Rotator Control to the back of WIYN

REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

NOTES

1. Step & Direction are already at Distribution Box.
2. J351 Not Used



Check for existing cable that is not used on WIYN.
(8 wires required, original rotator cable?)

PROCEDURE

1. Remove Step & Direction (4 wires)
2. Add Motor ON/OFF (2 wires)

Power Box

Distribution Box

Compumotor Series S Motor Controller

Rotator

J370

DB-25 (Male)

New Cable

Amp 14 pin

8 Pin

New Cable

Amp 14 pin

COMPANY: University of Wisconsin Astronomy Department

TITLE: Rotator Motor Driver Mod

DRAWN: Rick Williams DATED: 6/1/98

CHECKED: DATED:

QUALITY CONTROL: DATED:

RELEASED: DATED:

CODE: SIZE: DRAWING NO: REV:

B HPOL

SCALE: SHEET: OF

PROBLEM: With HPOL turned ON and the Power Box turned OFF, there will still be motor current on the Rotator motor.

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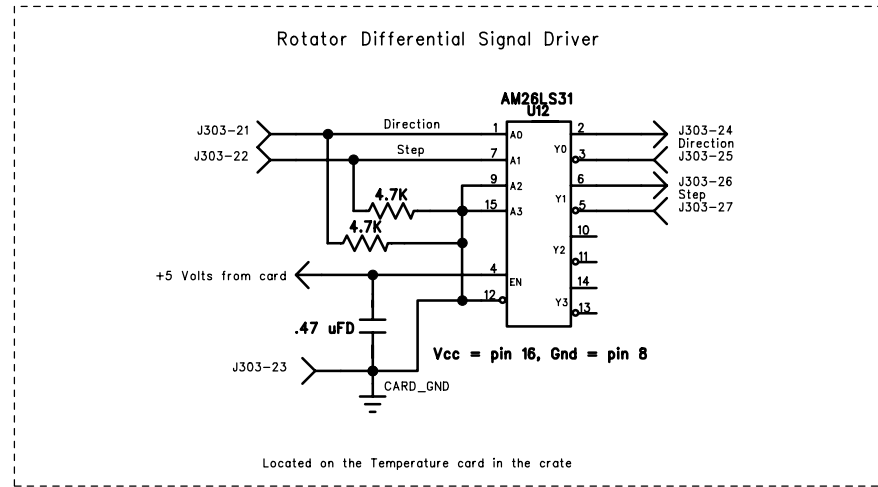
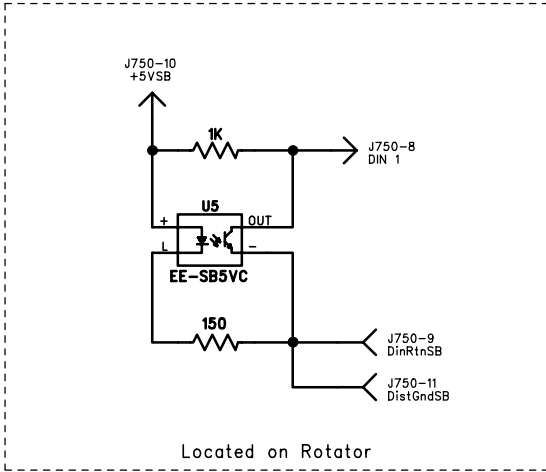
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: University Of Wisconsin
Astronomy Department

TITLE: Rotator Feducial

DRAWN: Rick Williams	DATED: 03/04/99
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
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SCALE: SHEET: OF

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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:

COMPANY: University Of Wisconsin
Astronomy Department

TITLE: **Crate Detail**

DRAWN: Rick Williams	DATED: 6/2/98
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
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SCALE: SHEET: OF

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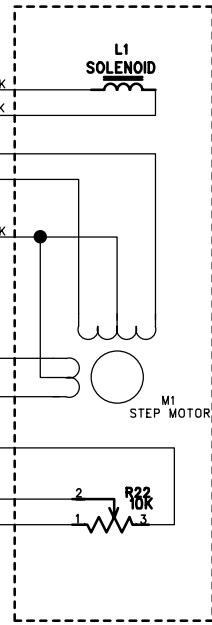
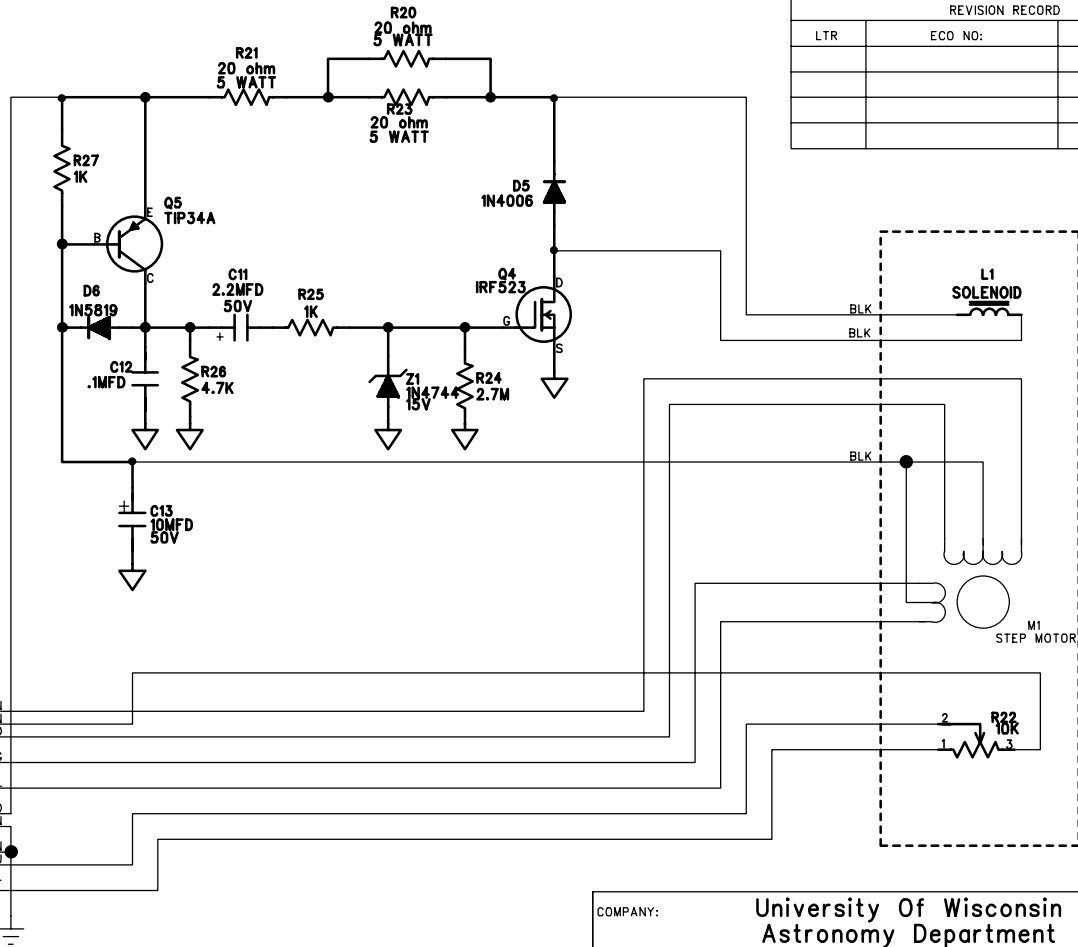
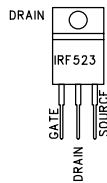
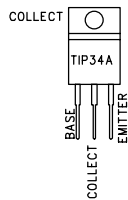
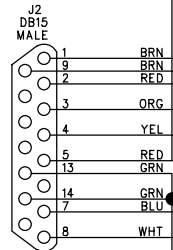
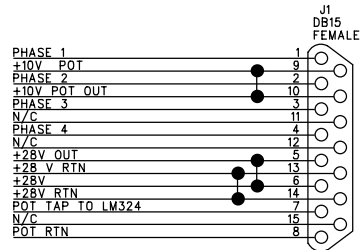
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: University Of Wisconsin Astronomy Department			
TITLE: Grating Slide			
CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
SCALE:	SHEET: OF		

DRAWN: Rick Williams	DATED: 1/22/96
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

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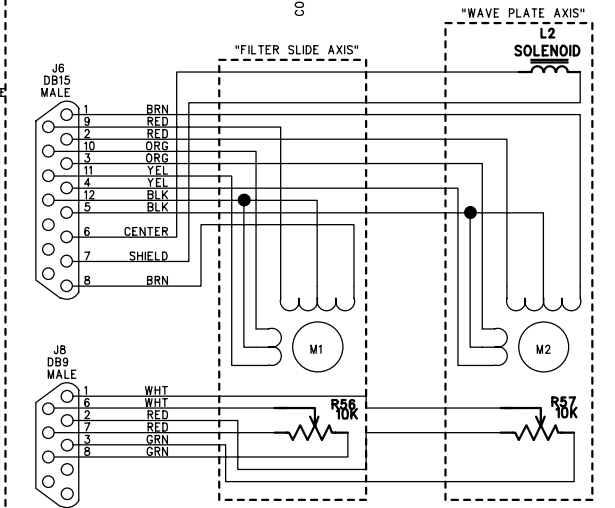
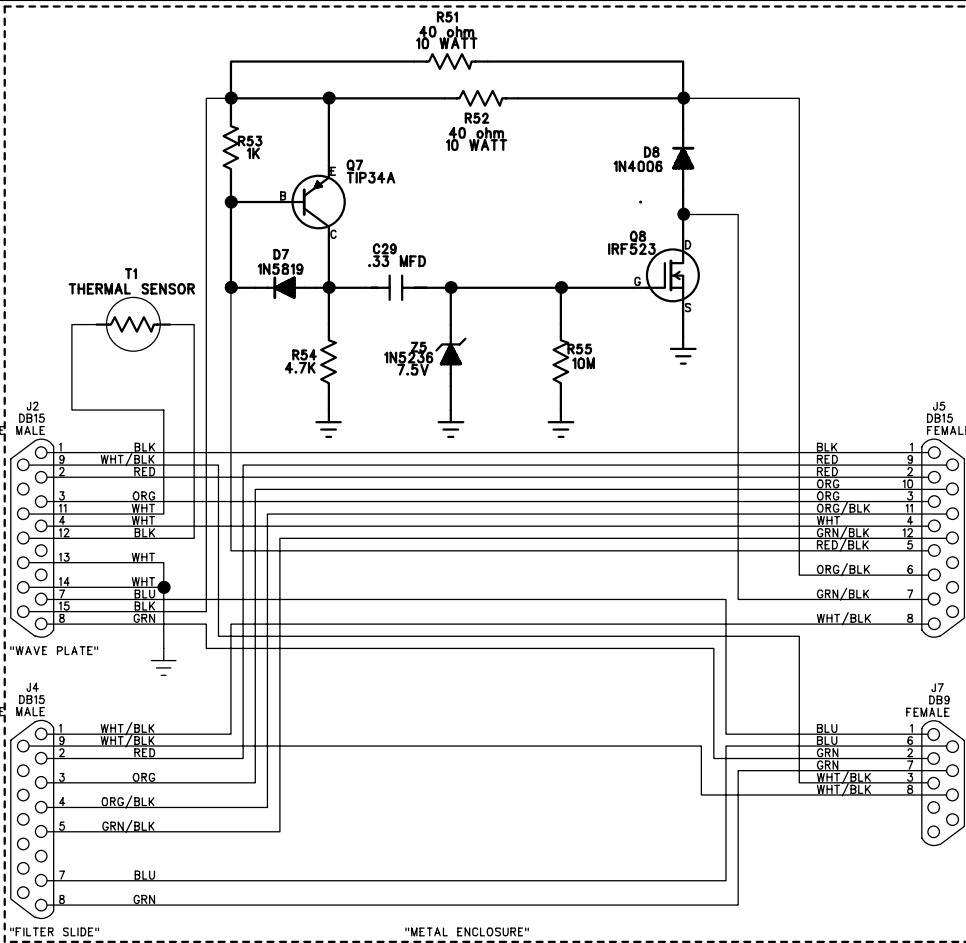
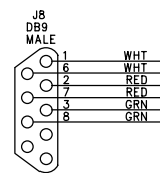
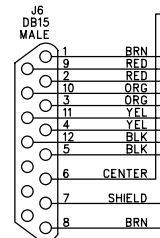
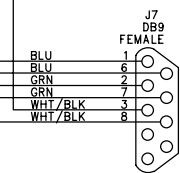
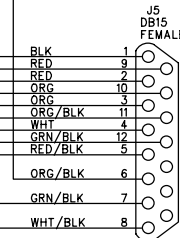
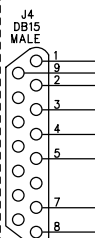
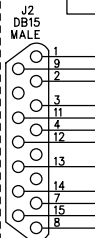
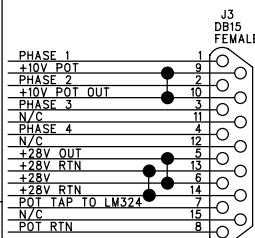
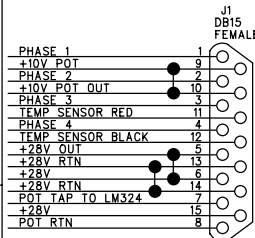
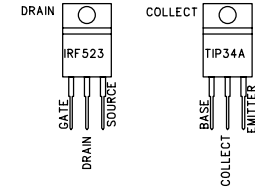
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REVISION RECORD			
LTR	ECO NO:	APPROVED:	DATE:



COMPANY: University Of Wisconsin
Astronomy Department

TITLE: Wave Plate/Filter Slide

DRAWN: Rick Williams	DATED: 8/22/96
CHECKED:	DATED:
QUALITY CONTROL:	DATED:
RELEASED:	DATED:

CODE:	SIZE: B	PROJECT: HPOL	REV: 1A
SCALE:		SHEET: OF	