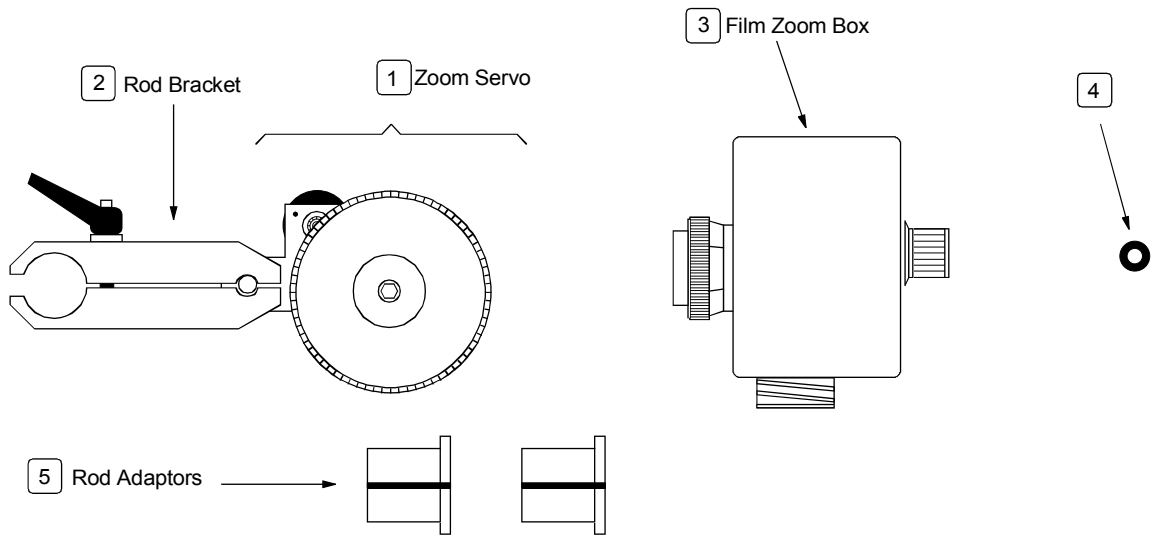


FILM ZOOM INSTRUCTIONS

If you are missing any of the following items contact Stanton Video immediately (602) 493-9505

1. Zoom Servo
2. Rod Bracket.
3. Film Zoom Box
4. O-Ring
5. Rod Adaptors



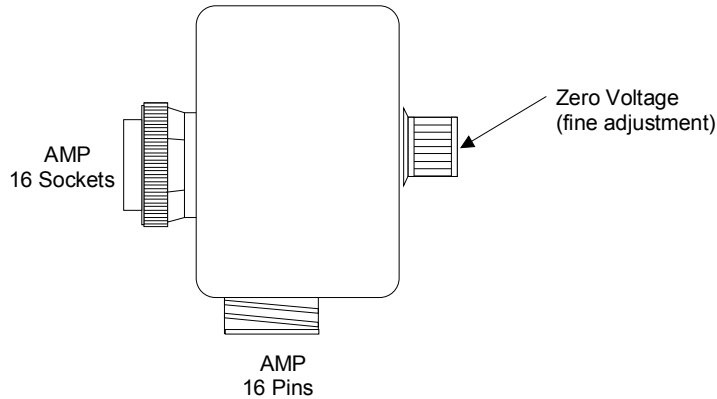
NOTE: The Film Zoom will work only on a Model #4 circuit board. This is clearly marked on the aboard.

The Film Zoom Kit converts the Iris axis that is used on video cameras, from a proportional system to a motor speed control. This is accomplished by adding a wire to the Control Box and connecting the Film Zoom Box between the control Cable and Control box then plugging the Zoom Servo into the Iris connector on the head. The gearhead on the Zoom Motor is a lower ratio than the gearhead used on the Focus motor.

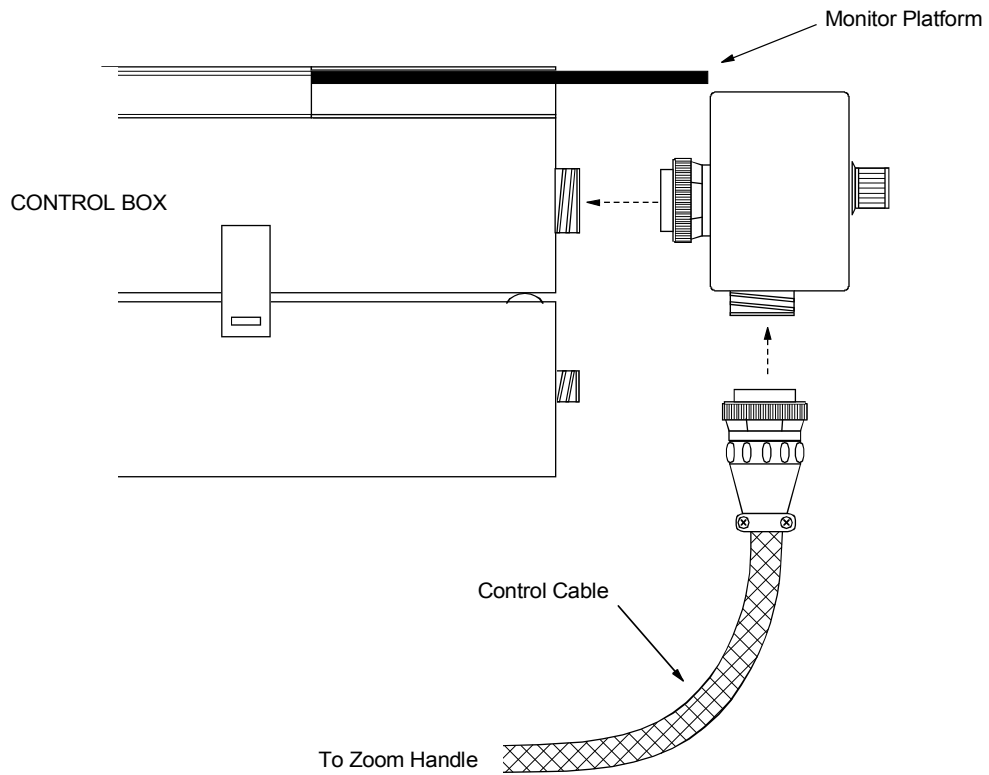
ZOOM BOX

The addition of the Zoom Box between the Control Box and the Control Cable converts the circuit from an Iris System to a Film Zoom System. In addition there are controls on the box that are necessary for proper adjustment of the circuit.

Zero Voltage The same function as the Center adjustment on the Control Box. Adjusts the Zoom Motor
Voltage as close to Zero as possible.



After the Jumper Wire is added and the Zoom Box is installed the Iris Axis is converted into a speed control similar to the pan or tilt axis. The speed of the Zoom is controlled in the normal fashion with the zoom rocker.



O-RING

Install the O-Ring under the Iris Control Knob on the front of the Control Box. The purpose of the O-Ring is to provide friction to the control. The Iris control is used as a "coarse" centering adjustment when the Film Zoom System is in use.

- a. Loosen the set screw and remove the knob.
- b. Push the O-Ring over the pot shaft
- c. Slide the knob on the shaft and while pushing it against the O-Ring tighten the set screw



ZERO VOLTAGE ADJUSTMENT

Unless the Zoom Rocker is depressed the voltage to the Zoom Motor must be as close to zero as possible. If this adjustment isn't made properly it can cause increased power and heat production, and the Zoom Rate control to malfunction. If the motor is straining hard enough in one direction it may cause the Thermistor Protection Circuit to turn off the Iris Axis.

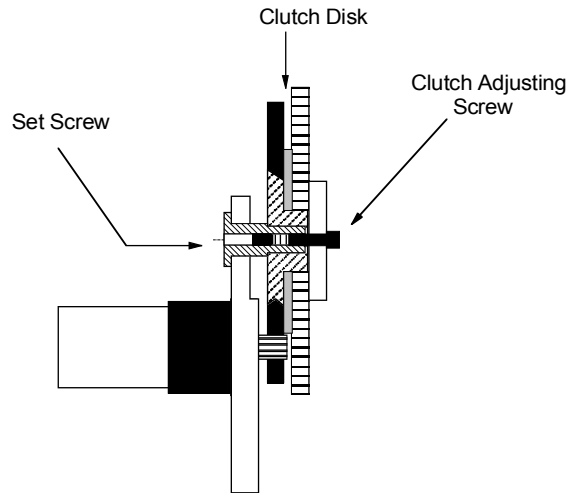
1. Make sure the control box is turned off and the Remote Head is set up. The Zoom Rate Knob on the Zoom Handle must also be set for maximum speed.
2. Plug the Zoom Servo into the Iris connector at the head and engage the gear ring on the lens.
3. Rotate the Zero Voltage adjustment on the Zoom box all the way in one direction. This is a 10 turn pot.
4. Turn the Zero Voltage adjustment in the opposite direction 5 turns. This will place the pot close to its electrical center.
5. Turn on the Control Box; the Zoom Servo will probably start running. Rotate the Iris Knob until the Zoom stops turning
6. Now rotate the Zero Voltage Knob on the Zoom Box until the Zoom runs in one direction. Rotate the knob in the opposite direction until the Zoom runs in the other direction. Now rotate the knob half way between these two points. This will get you close to the exact zero voltage position.

NOTE If the zoom rocker feels more sensitive in one direction than another, readjustment of the Zero Voltage Knob will correct this situation.

FILM ZOOM CLUTCH

A zoom servo must have a clutch system that will slip when the servo drives the lens up against the zoom stops. Because of the variation of friction from lens to lens the clutch must be adjustable.

1. Set up the Zoom System as previously described in the previous pages.
2. Engage the Zoom Servo Gear with the Zoom Gear built into the Lens.
3. Run the zoom to see if the lens can be rotated. Zoom the lens in and out and hit the stops in both direction.
4. If the clutch isn't set tight enough you must adjust the Clutch Adjustment Screw.



5. Loosen the Set Screw and tighten the Clutch Adjusting Screw. Only very small adjustments should be necessary.
6. Tighten the Set Screw against the Clutch Adjusting Screw. The Set Screw locks the Clutch Adjusting Screw in place.

NOTE: Do not over tighten the clutch. If it is set too tight it may not slip then you hit the lens stops and the gears will chatter. Possible damage could also be done to the Lens Stop. The clutch must be set so that it is just tight enough to rotate the lens reliably.

NOTE: It is extremely important that after the clutch adjustment is made, the Set Screw is tightened back up. If you do not tighten the Set Screw, the clutch will loosen and start slipping.