

## AERO-MOTIVE COMPANY

A Woodhead Industries, Inc. Subsidiary



### IMPORTANT SAFETY INSTRUCTIONS

Please read this manual carefully and follow its instructions. Improper use or failure to follow these instructions could result in serious injury, death or property damage. Operators should be instructed in the safe and proper use and maintenance of this product. Keep this manual for future reference.

The following safety precautions call attention to potentially dangerous conditions.

**DANGER:** Immediate hazards which **WILL** result in severe personal injury or death.

**WARNING:** Hazards or unsafe practices which **COULD** result in severe personal injury or death.

**CAUTION:** Hazards or unsafe practices which **MAY** result in *minor* personal injury or product or property damage.

**NOTE:** Instruct operators in the safe, proper use and maintenance. Keep this manual for future reference.

### INSTALLATION

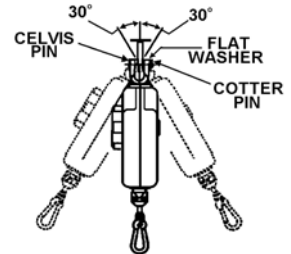
**WARNING:** Improper use or failure to follow these instructions lead to hazards or unsafe practices that **COULD** result in severe personal injury or death.

**CAUTION:** Operator should be instructed in the safe, proper use and maintenance of this product. Hazards or unsafe practices **MAY** result in *minor* personal injury or product or property damage.

### SWIVEL MOUNTING

**CAUTION:** Always use a **NEW** cotter pin when securing clevis pin. Hazards or unsafe practices **MAY** result in *minor* personal injury or product or property damage.

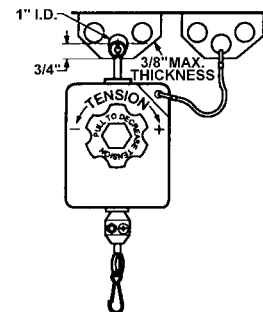
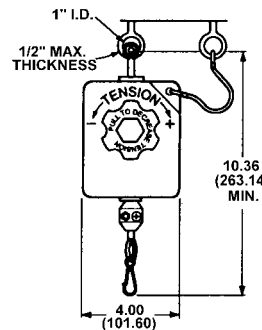
Hang balancer directly over work area by the swivel fork provided at the top of the balancer. Support component must confirm to guidelines indicated by the adjacent diagram. The support component must allow swivel fork to pivot 30 degrees from vertical axis, perpendicular to clevis pin axis. Balancer must not be pulled sideways more than 30 degrees or exceed the free play between support component and swivel fork. To complete balancer mounting, install clevis pin through swivel fork and support component. Install flat washer and secure with a new cotter pin (in plastic bag).



### SECONDARY SUPPORT

**WARNING:** Always use secondary cable to protect personnel in case of mounting components or support structure failure. Hazards or unsafe practices which **COULD** result in severe personal injury or death.

Attach one end of secondary support chain or cable to secondary support point on balancer. Attach the other end of secondary support chain or cable to a support component other than that which supports the balancer. The chain or cable should be as short as possible allowing the balancer to drop no more than 6 inches if the primary connection is released.



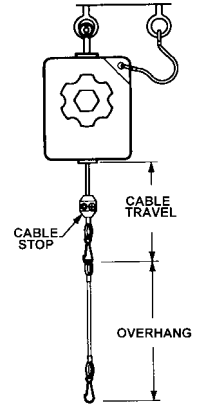
## ADJUSTMENT

**WARNING:** Never pull cable to device to be retracted. Always lift object to hook. If the hook is accidentally released when it is extended, it will snap back. Hazards or unsafe practices which COULD result in severe personal injury or death.

### TOOL ATTACHMENT

Balancer is furnished with a tool clip. Attach tool complete with hose or cable along fittings. To adjust length of overhang, remove all tension. Pull cable down and position hook at desired height. Loosen cable stop, slide cable stop upward to roller guide, and tighten. Move cable stop upward and lengthen overhang of cable will reduce active travel distance 6'3". For every foot more of overhang, the active travel will be reduced by a foot.

Overhang can be adjusted by moving cable stop. If, after installation, it is determined that the overhang of the reel for the active travel required is not sufficient, an overhang extension cable can be used to extend overhang without reducing active travel. This is available as an optional item from **AERO-MOTIVE**.

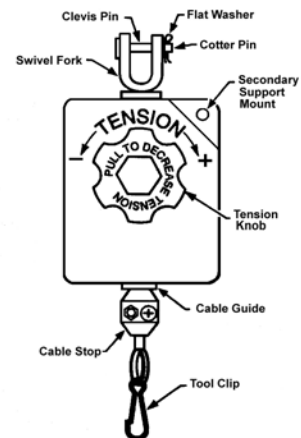


### SPRING TENSIONING

**WARNING:** Failure to hold knob could result in damage to internal ratchet components. Hazards or unsafe practices which COULD result in severe personal injury or death.

**NOTE:** Attach full load including all attachments before adjusting tension.

If the tool attached to balancer cable descends, there is not enough tension on the balancer mainspring. To increase tension, turn knob (on the front of the balancer) clockwise until desired tension is achieved. Make sure knob has engaged ratchet teeth on front case before releasing knob. If the cable stop is tight up against the cable guide, there is too much tension on the balancer main spring. To decrease tension, pull knob out and turn counter-clockwise until pre-load is relieved from cable stop. Make sure knob has engaged ratchet teeth on front case before releasing knob. After adjusting tension, pull cable to fullest extension to ensure proper travel is achieved. If cable does not reach full extension, some tension must be released. If proper tension and extension cannot be achieved, consult factory.



## SERVICE

**WARNING:** This unit is NOT to be disassembled. Hazards or unsafe practices which COULD result in severe personal injury or death.

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