

Style 1000-DM Clock/Carillon Control

INSTALLATION & OPERATIONS MANUAL

After unpacking this equipment, inspect it carefully to make certain that no damage has been caused during shipment. With the various units in full view, review these instructions and all drawings supplied with the equipment. After all items have been carefully checked, proceed with installation.

DRAWINGS:

Clock carillon enclosure	A-4874
Electrical wiring diagram	A-4554
Horn wiring diagram	A-5896

INITIAL INSTALLATION:

1. Disconnect power to any circuit(s) which you will be wiring to, or you may come in contact with.
2. Install the chime enclosure to the wall by means of the key holes on the back of the cabinet.
3. Wire the input power, clock circuit, and speakers, to the cabinet strip, per attached drawings A-4554, and A-5896 following your local and national electric codes.
4. Set the tower & system clocks to 12:00 noon (12:00.00 PM)
5. Attach the input power to the system and energize the clocks.

Note: The clock control will be set to the proper local time and the system clock counter set to 12:00 noon by the factory. If not, see how to set below.

The alphanumeric LED display should read the correct time & date. If not, see how to set below.

Tower and system clocks should be advancing or stopped, or reading the correct time. If not, see how to set: TIME below.

Description of 99A Functions

To access any function you must first unlock the control by pressing "*" & "1" at the same time. The display will then read "-unlock-" momentarily. After you have finished using the control, lock the control by pressing "*" & "1" again. The display will then read "locked" momentarily.

The menu key is "*". Press this key to page through the following functions. Press "#" to access the function.

set:TIME Enter the current time in the form HH:MM using the keypad. Use "#" to alternate between "AM" and "PM". Press "*" when done.

Note: when "*" is pressed, the clock second counter is reset to zero, i.e. 11:59:00.

set:DATE Enter the current date in the form MM/DD/YY. Then select the day using the "#" to scroll through the display. Press "*" when done.

Note: It is important the day of the week is set properly for the daylight/standard time feature to work properly.

set:MODE Allows you to select if you wish seconds to be displayed on the alphanumeric LED display. Use the "#" to alternate between show min & show sec. Press "*" when complete.

set:EVENT Allows programmable "ON" & "OFF" times of the optional illumination circuit. Enter the time you desire the illumination to turn on, and the time to turn off, following the steps for set:TIME above. This feature may be disabled or enabled. Press "#" to alternate, and "*" when complete.

man:EVENT Allows manual control of the event circuit. Press "#" to alternate between "event on" & "event off". Press "*" when complete.

adv:CLK Allows manual advancing of the tower clocks. When selected, advances the tower clocks. Press "*" when complete.

Note: The internal tower clock counter is not updated when this feature is selected. Therefore set:HANDS must be always be done afterwards.

stop:CLK Allows manual stop of the tower clocks. When selected, stops the tower clocks. Press "*" when complete (see note below).

Note: The internal tower clock counter is not updated when this feature is selected. Therefore set:HANDS must be always be done afterwards.

set:HANDS Allows you to enter the current position of the clock hands on the tower clock. When this function is selected by pressing "#", the tower clocks will stop. Enter the time displayed by the hands using the keypad. If you make a mistake you must re-enter the time.

set:CHIME Controls the Westminster chime and hour strike. Allows you to enter a window that the chime will operate at full volume and reduced volume, as well as the number of times per hour it will play within that window.

When selected, first enter the time the chime will operate and the time the chime should be turned off. The default is 8:00 AM to 12:01 AM. Enter the time following the steps for set:TIME above. Then enter the start of quiet time, to select the period that the chimes operate at a reduced volume. The default is from 9:00 PM until the chime end time.

Then Select number of times an hour chime will play.

Select "1/4 hour" - Chimes every quarter hour, tolls on the hour

Select "hourly" - Chimes and tolls on the hour only.

set:VOL Allows you to set the maximum output of the amplifier on a scale of 1 to 99, 99 being the highest output. In addition you can set the quiet volume(see set:CHIME above).

tst:CHIME Test the chime at both full output and quiet output.

The local volume control allows you to adjust the volume of the local speaker. It does not affect the main speaker. In our BOSE system the this feature is disabled.

Configuration Settings

(0 = no jumper, 1 = jumper in)

Jumper 1: (U16 pin 1 to pin 16)	Select dual frequency
Jumper 2: (U16 pin 2 to pin 15)	Selects DST disabled
Jumper 3: (etc.)	Selects Display blanking after 20 seconds <u>Note:</u> This is a future option.
Jumper 5:	Selects split phase drive logic. <u>Note:</u> Jumper 1 must not be installed for correct 10x speed reset.
Jumper 6:	Select 50 Hertz input

Note: When Jumper 4 is in, Jumper 2 should also be in.**FUSES:**

F1	Main Fuse	10 Amps
F2	99A Control	3 Amps
F3	Chime Board	1 Amp
F4	Amplifier	3 Amps

Should you encounter any difficulty with the installation, operation of this equipment, please let us know exactly what has occurred. Proper and complete advice at the start may save time, aggravation and expense later. For further information regarding this equipment, please feel free to contact us.

Electric Time Company, Inc.
45 West Street
PO Box 466
Medfield, MA 02052
Telephone (508) 359-4396
FAX (508) 359-4482

E:\M134.DOC



PROJECTOR HORNS FOR UNIFORM SOUND DISPERSIONS

DR Series



FEATURES

- Multi-Purpose Reflex Sound Horns for High Intelligibility Sound Distribution and Voice and Signal Applications
- Accepts All Standard High Efficiency Compression Drivers with 1-3/8" - 18 Male Threads
- Exponentially-Flared for Uniform Sound Distribution
- Weatherproof, All-Metal Construction for Year Round Use

APPLICATIONS

DR Series double re-entrant horns have proven their capability and ruggedness in permanent and temporary applications in recreational, commercial and industrial applications for over sixty years. When used with PD or SD Series compression drivers, they assure intelligible audio transmission over long distances or through high background noise levels and are consistently recommended for sport facilities, amusement parks, church towers, warehouses, factories, military sites, transportation terminals and other environmentally-demanding locations.

GENERAL DESCRIPTION

Atlas/Soundolier DR Series double re-entrant horns are designed for use with compression driver units to offer superior music and voice communications over distance and ambient noise. The circular projectors are equipped with a resonance damping ring for best response through an extended frequency range. Weather-resistant units will accommodate Atlas/Soundolier PD and SD Series compression drivers or any driver with standard 1-3/8" -18 male thread coupling. The integral "U-type" steel mounting bracket provides maximum directional aiming flexibility and enhances installation capability when used outdoors or in industrial environments. The rugged all-metal, exponentially-flared horns are finished in durable grey epoxy. Atlas/Soundolier Models SS-40X, SS-70X or SS-100X loudspeaker stands with SSA Series adaptors are recommended for temporary installation of DR Series projector loudspeakers (see SL11-1389 and SL11-1357 for information). Loudspeaker stands feature telescoping action, positive-locking hardware and diecast safety collar and offer vertical extension range from 5 to 8 feet (1524 to 2438mm) height.

MODELS	DISPERSION	LOW END CUT-OFF	AIR COLUMN LENGTH	SOUND LEVEL*	DIRECTIVITY FACTOR (Q)**	WEIGHT
DR-32	95°	190 Hz	2-1/2' (762 mm)	*	10.7	11 lbs. (4.9 kg.)
DR-42	85°	140 Hz	3-1/2' (1067mm)	*	14.7	13 lbs. (5.9 kg.)
DR-54	75°	115 Hz	4-1/2' (1372mm)	*	16.8	20 lbs. (9.0 kg.)
DR-72	65°	85 Hz	6-1/2' (1981mm)	*	19.3	25 lbs. (11.3 kg.)

* Determined by associate compression driver (see chart on reverse side of this sheet).

** One octave band of pink noise at 1 kHz.



ATLAS / SOUNDOLIER

ATAPCO SECURITY & COMMUNICATIONS GROUP

1859 INTERTECH DRIVE / FENTON, MISSOURI 63026 U.S.A. / TELEPHONE: (314) 349-3110 / FAX: (314) 349-1251

ARCHITECTS AND ENGINEER'S SPECIFICATIONS

The reflex sound projector shall be Atlas/Soundolier Model _____ (Model DR-32, DR-42, DR-54 or DR-72) or approved equal. The weatherproof exponential-flared unit shall have a rated low frequency cut-off of _____ and sound dispersion of _____. Air column length shall be _____.

_____. It shall accommodate compression driver units with standard 1-3/8" -18 male threads. The horn, less driver shall measure _____ and weigh _____. "U-type" steel mounting bracket shall be provided (for mounting). Finish shall be grey epoxy.

ACCESSORIES: SS-40X / SS-70X Variable Height 48" - 72"H and 60" - 96"H Loudspeaker/ Equipment Stands
 SS-100X Lightweight Variable Height 60" - 90"H Loudspeaker/Equipment Stand
 SSA Series Top adaptors for SS Series Loudspeaker/Equipment Stands

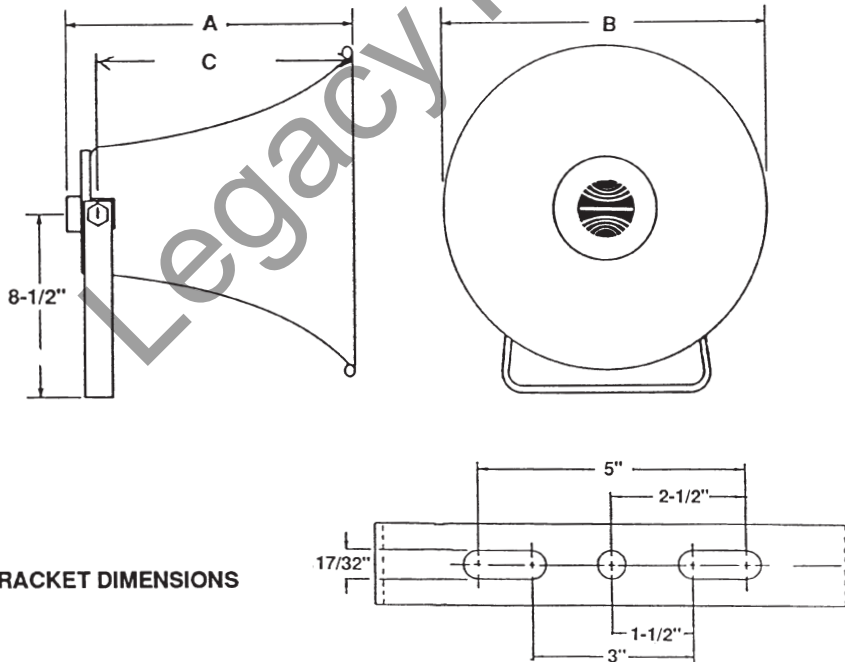
SOUND PRESSURE LEVELS OF DR SERIES MODELS WITH ATLAS/SOUNDOLIER COMPRESSION DRIVERS

MODEL	MODEL PD-30T	MODEL PD-5VH/PD-5VT	MODEL PD-60/PD-60T	SD-70
DR-32	124 dB	124 dB	130 dB	129 dB
DR-42	125 dB	125 dB	131 dB	130 dB
DR-54	125 dB	127 dB	132 dB	132 dB
DR-72	127 dB	129 dB	135 dB	134 dB

Measured at Full Power at 1M

DR SERIES DIMENSIONS

MODEL	A	B	C
DR-32	12-1/2" (319mm)	16-1/2" (419mm)	10-1/2" (267mm)
DR-42	16" (406mm)	21" (533mm)	13-3/4" (349mm)
DR-54	19" (483mm)	26" (660mm)	17" (432mm)
DR-72	28" (711mm)	31" (787mm)	24-1/4" (616mm)

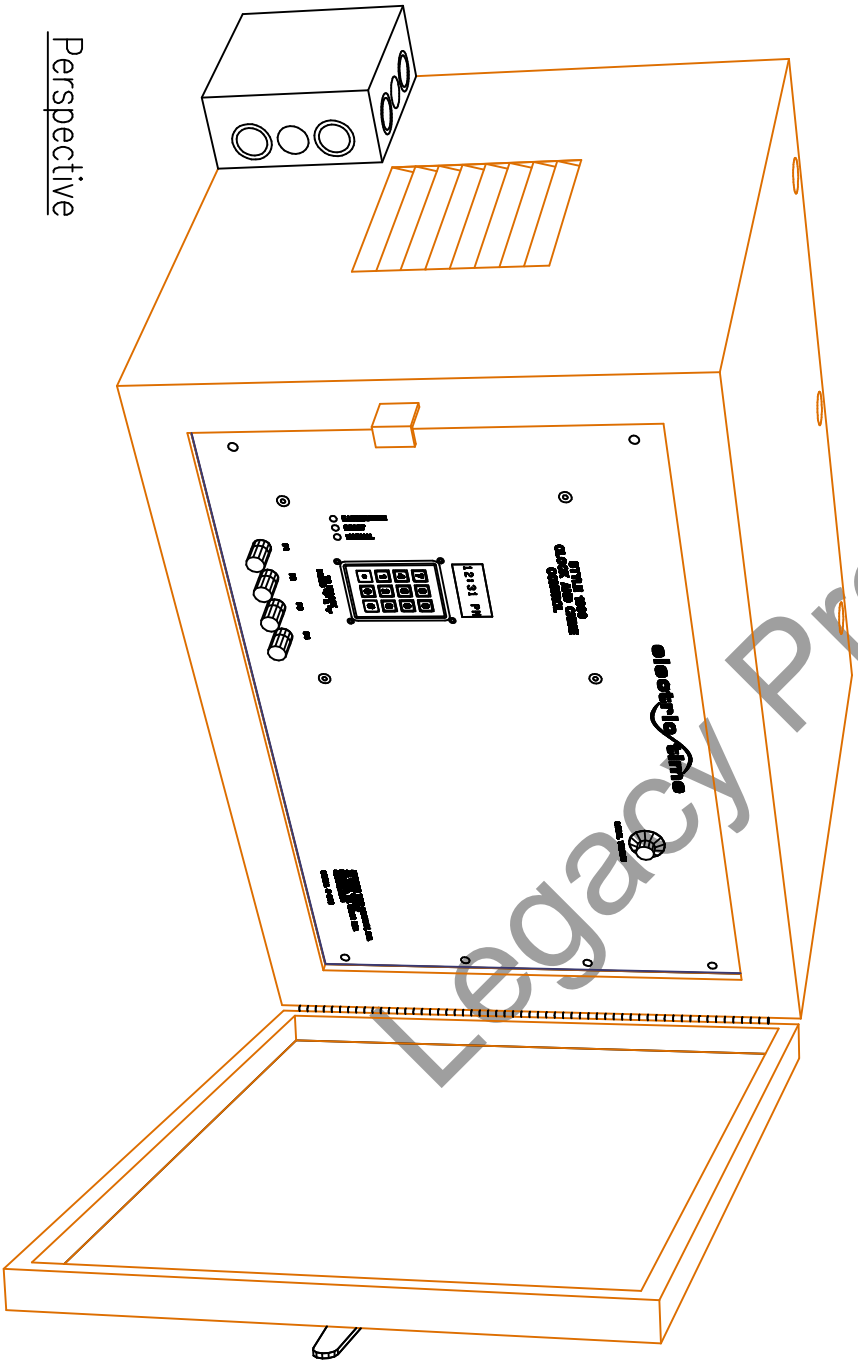
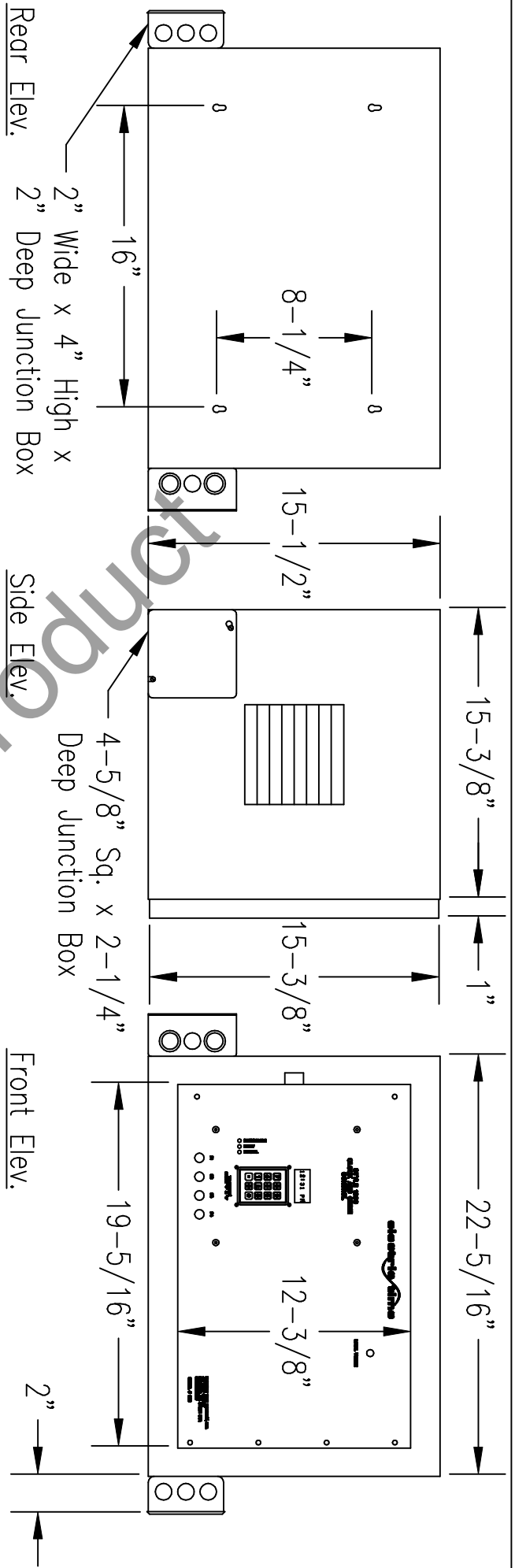


MOUNTING BRACKET DIMENSIONS



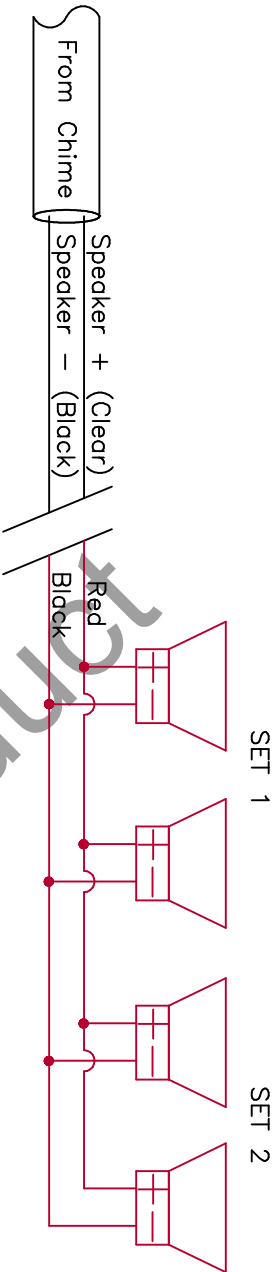
ATLAS / SOUNDOLIER ATAPCO SECURITY & COMMUNICATIONS GROUP

1859 INTERTECH DRIVE / FENTON, MISSOURI 63026 U.S.A. / TELEPHONE: (314) 349-3110 / FAX: (314) 349-1251



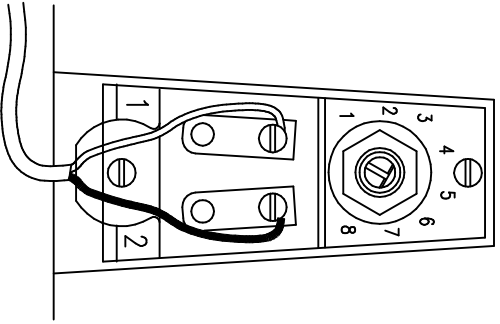
VIEW	PATH D:\ACAD10\A-4874.DWG			
	TITLE Chime Control Enclosure Details			
REVISIONS	● SCALE	DATE	DRAWN	APP'V
	None	9-3-93	TDE	JPL
 company, inc medfield, ma				
DRAWING A-4874				

Note: 250' of #16/2 wire may be placed in conduit

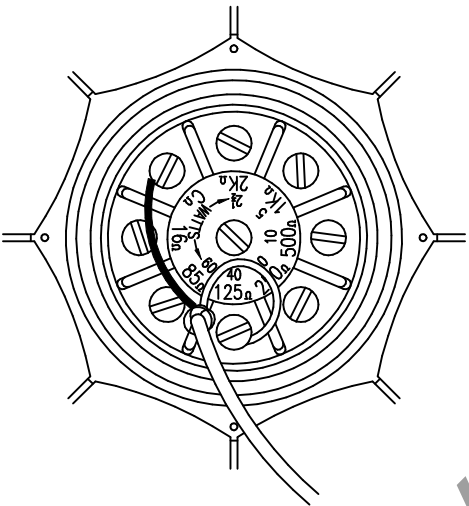


VARI-TAP 70V/Watts	30 Watts	Speakers	SET	Ohms
1.8	---	1	2500	
3.7	---	2	1300	
7.5	---	3	666	
15.0	1.8	4	333	
30.0	3.7	5	167	
---	7.0	6	89	
---	15.0	7	45	

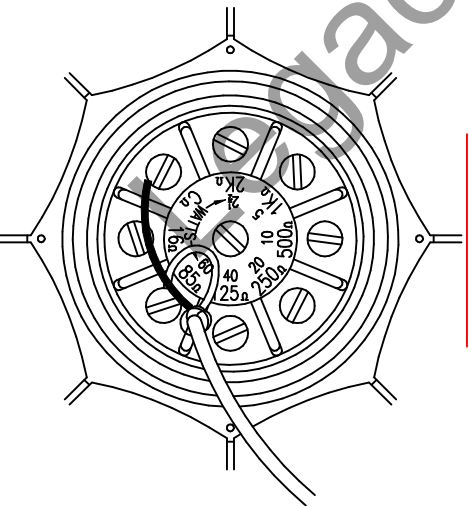
PD30T Driver



PD-5VT Driver



PD-60T Driver



*See chart for other settings

All Drivers C terminal to Speakers Neg. Wire
 PD-5VT Drivers use 125 Ohms (40 watts) tap
 PD-60T Drivers use 85 Ohms (60 Watts) tap
 PD30T Drivers use setting 5, 167 Ohms (30 Watts)

VIEW	PATH D:\ACAD10\A-5896.DWG			
	TITLE Style 1000 Chime Clock Control - HORNS			
	● SCALE	DATE	DRAWN	APP'V
	None	12-2-96	WOR	TDE
	REVISIONS			
	Rev A 12-12-96 WOR			
	DRAWING A-5896			