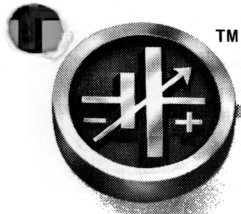


# INSTRUCTION MANUAL



## KEPCO

### ENCLOSURES AND HARDWARE SYSTEMS

**RA-32**  
RACK ADAPTER

#### GENERAL DESCRIPTION (Refer to FIG. 1)

The Kepeco Model RA-32 Rack Adapter is designed for the installation of Kepeco equipment into a standard 19 inch-rack. As seen in the illustration (FIG. 1), one-half of the Model RA-32 Rack Adapter consists of a housing for (3) Kepeco plug-in modules (1/6 rack width each) or it can be fitted with one or more of the listed Kepeco Filler Panels (refer to the "Accessories" paragraph). The other half of the RA-32 Rack Adapter is constructed as a shelf for acceptance of either (2) 1/4-rack units, (1) 1/2-rack unit, or filler panels.

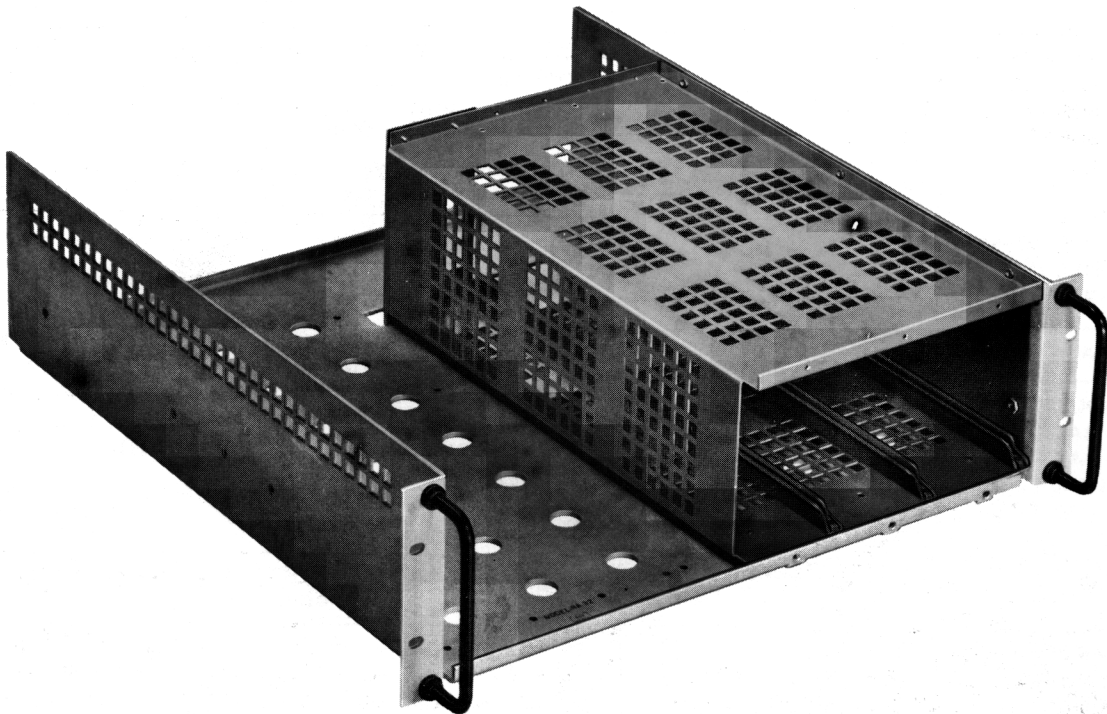


FIG. 1 KEPCO MODEL RA-32 RACK ADAPTER.

## INSTALLATION OF RA-32 RACK ADAPTER INTO RACK

The Kepco Model RA-32 Rack Adapter may be permanently bolted to a standard 19 inch-rack, it can be placed on a rack-shelf, or it may be installed with slides. The front flanges are drilled for standard (2 1/4") mounting hole distance. The sides are drilled and tapped for "JONATHAN" slides (refer to FIG. 2).

## INSTALLATION OF KEPCO EQUIPMENT INTO RA-32 ADAPTER

(Refer to Table 1 and FIG. 2.) The Kepco Model RA-32 Rack Adapter is predrilled on the left (shelf side) to accept one of the 1/2-rack models or (2) of the 1/4-rack models listed in Table 1. The equipment may be permanently attached through the bottom of the adapter by placing the units in the adapter, matching their bottom mounting holes with the adapter clearance holes, and fastening the units with the (4) supplied mounting screws. The 1/6-rack equipment (as listed in Table 1) is installed into the housing part (right side) of the Model RA-32 Rack Adapter. Plastic slide guides on top and bottom are provided which assist in guiding the units into the housing and into the terminating plug-in adapter in the rear. Unused spaces on the RA-32 Rack Adapter can be covered using filler panels (refer to "Accessories" paragraph).

**NOTE:** TABLE 1 SHOWS A LISTING OF KEPCO EQUIPMENT SUITABLE FOR INSTALLATION INTO THE MODEL RA-32 RACK ADAPTER. THE MODEL RA-32 RACK ADAPTER CAN ACCEPT THE FOLLOWING COMBINATIONS:

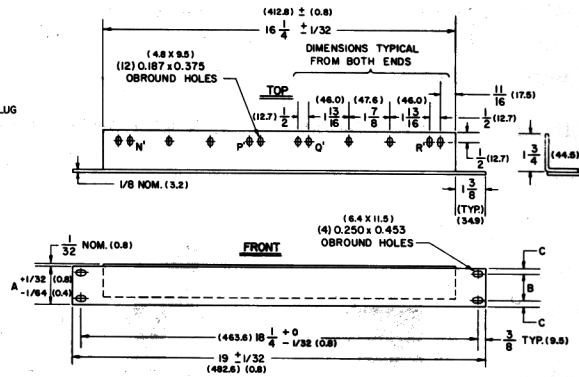
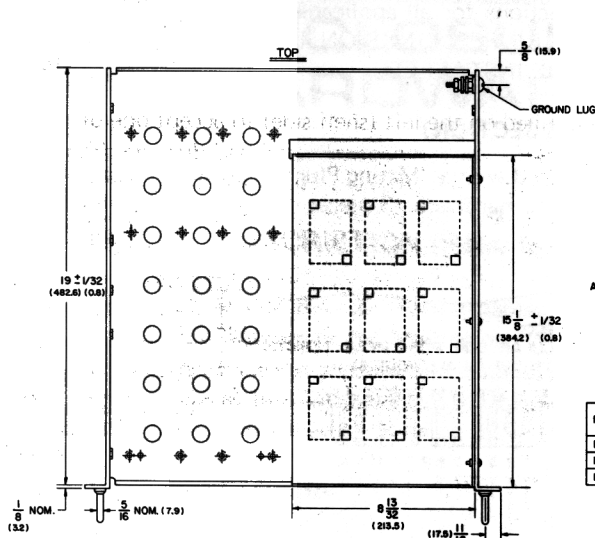
- 1) ONE (1) UNIT FROM GROUP "A" AND (3) UNITS FROM GROUP "C," OR,
- 2) TWO (2) UNITS FROM GROUP "B" AND (3) UNITS FROM GROUP "C."

TABLE 1

GROUP	1/2 RACK UNITS	MOUNTING HOLE (SEE FIG. 2)	INSTALLATION INSTRUCTIONS FOR ALL MODELS IN GROUP "A" AND "B"
A	JOE 1/2 RACK SERIES CPS 1/2 RACK SERIES MODEL BOP 36-1.5(M) MODEL BOP 36-5(M) OPS-GROUP IX DPD SERIES CDT SERIES MODEL PVS 100-1M MODEL NTC 2000 OPS GROUPS VI, VII	ADJM ADJM EHJM ADJM EHJM EHJM ADJM ADJM EHJM ADJM	<p>NO optional mounting accessories required.</p> <p>1) REMOVE FEET, SIDE-BRACKETS AND BAIL, IF UNIT IS SO EQUIPPED.</p> <p>2) REFER TO FIG. 2, "MODEL RA-32, MECHANICAL OUTLINE DRAWING."</p> <p>3) PLACE UNIT ON THE RA-32 ADAPTER AND LINE UP THE (4) MOUNTING HOLES ON THE UNIT TO BE INSTALLED*, WITH THE DESIGNATED CLEARANCE HOLES IN THE RA-32 ADAPTER BOTTOM SHELF.</p> <p>4) USE (4) OF THE SUPPLIED MOUNTING SCREWS AND FASTEN UNIT TO THE ADAPTER.</p> <p>*NOTE: EACH KEPCO 1/4-RACK OR 1/2-RACK UNIT HAS (4) MOUNTING HOLES WITH PLASTIC INSERTS AT THE BOTTOM. ON METERED UNITS, THEY ARE USED TO HOLD THE (4) FEET. THE FEET MUST, THEREFORE, BE REMOVED BEFORE UNIT CAN BE INSTALLED.</p>
GROUP	1/4 RACK UNITS		
B	CA-6 HOUSING JOE 1/4 RACK SERIES CPS 1/4 RACK SERIES JMK 1/4 RACK SERIES MODEL NTC 200 OPS GROUPS IV, V	EFJK or GHLM ABJK or CDLM ABJK or CDLM ABJK or CDLM ADJK or CDLM	
GROUP	1/6 RACK UNITS	REAR TERMINATION PROVIDED:	INSTALLATION INSTRUCTIONS FOR ALL MODELS IN GROUP "C"
C	PCX-MAT SERIES OPS-BTA (GROUP II) CC SERIES MODEL VP-1PX MODEL VP-2PX SN SERIES <sup>(2)</sup>	MODEL PC-2 ADAPTER <sup>(1)</sup> MODEL PC-2 ADAPTER <sup>(1)</sup> MODEL PC-2 ADAPTER <sup>(1)</sup> MODEL PC-2 ADAPTER <sup>(1)</sup> MODEL PC-2 ADAPTER <sup>(1)</sup> MODEL SNK-1 (OPTIONAL) MOUNTING KIT REQUIRED. REMOVE PC-2 ADAPTER.	<p>1) SN MODELS ONLY: MOUNT SN MODEL ONTO THE MODEL SNK-1 MOUNTING KIT, REMOVE THE PROVIDED PC-2 ADAPTER FROM THE REAR OF THE RA-32 AND INSTALL BACK PLATE AS DIRECTED IN THE SNK-1 INSTRUCTION MANUAL.</p> <p>2) SLIDE MODULAR UNIT INTO THE RA-32 ADAPTER USING THE PROVIDED PLASTIC SLIDE-GUIDES.</p> <p>3) AFTER INSERTION, SECURE MODULAR UNIT WITH THE (2) CAPTIVE FRONT-PANEL SCREWS.</p>

<sup>(1)</sup>A "Mating Plug-to-Cable" interface, replacing the PC-2 barrier-strip terminals can be provided for Kepco equipment installed into the housing section of the RA-32. Order Kepco Model PC-8 Adapter Assembly and mount in place of the standard PC-2 Adapter.

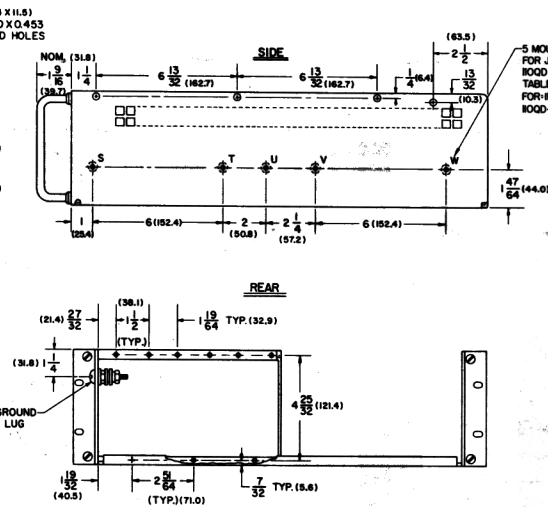
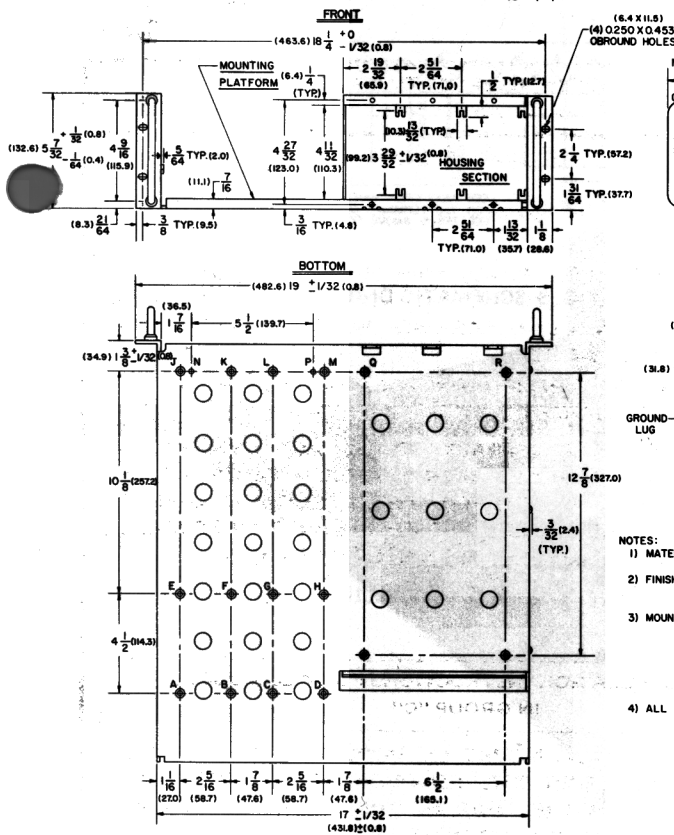
<sup>(2)</sup>SN models may also be installed into the Model CA-6 Housing which accepts up to (2) SN units. The CA-6 Housing may then be mounted into the Model RA-32 Rack Adapter as a group "B" unit.



MODEL	DIMENSION		
	A	B	C
FSB-1	1 23/32 (43.7)	1 1/4 (31.8)	15/64 (6.0)
FSB-3	3 15/32 (88.1)	3 (76.2)	15/64 (6.0)
FSB-5	5 7/32 (132.8)	2 1/4 (57.2)	1 31/64 (37.7)

- NOTES:  
 1. MAT'L - NO. 11 GAUGE C.R.S.  
 2. FINISH - LIGHT GRAY PER FED. STD. 595 COLOR NO. 26440.  
 3. N, P, Q, R ARE MOUNTING HOLES FOR RA-32 ADAPTER.

FIG. 3 OPTIONAL SUPPORT BRACKET



SLIDE TYPE	USE MOUNTING HOLES (X)				W
	S	T	U	V	
HOOD-20-2	X	X	NA	X	"W" HOLE: MUST BE ADDED TO ALL SLIDE TYPES. DRILL A .199 DIA. HOLE IN LINE WITH ALL OTHER MTG HOLES AND AT A DISTANCE OF 16 1/4 FROM "S" HOLE.
HOOD-22-2	X	NA	X	NA	
HOOD-24-2	X	NA	NA	NA	

- NOTES:  
 1) MATERIAL: A) HOUSING SECTION: 16 GA COLD ROLLED STEEL.  
 B) MOUNTING PLATFORM AND FRAME: ALUMINUM ALLOY, 1/8 IN. THICK.  
 2) FINISH: A) HOUSING SECTION: CADMIUM PLATED, CHROMATE WASH.  
 B) MOUNTING PLATFORM AND FRAME: IRIDIUM 14.  
 C) FLANGES: FED. STD. 595, COLOR NO. 26440, LIGHT GRAY.  
 3) MOUNTING HOLES:  
 A) "A" THROUGH "M", TWELVE (12) 0.187 DIA. HOLES, C'SINK 82° FARSIDE, FOR NO. 8, TYPE B THREAD, PHILLIPS RECESSED FLAT HEAD (SCREWS, 12 PC. SUPPLIED).  
 B) "N", "P", "Q", "R", FOUR (4) 0.187 DIA. HOLES, FOR MOUNTING "FILLER SUPPORT BRACKET". NOTE - "Q" AND "R" ARE NORMALLY USED TO HOLD THE HOUSING SECTION.  
 C) "S", "T", "U", "V", "W", ARE EXTENSION NUT STEEL INSERTS, 10-32 THREAD, FIVE (5) ON EACH SIDE (FOR SLIDE MOUNTING).  
 4) ALL DIMENSIONS ±1/64 EXCEPT AS NOTED.  
 (0.4)

FIG. 2 MECHANICAL OUTLINE DRAWING, MODEL RA-32 RACK ADAPTER.

## TERMINATIONS ON THE RA-32 RACK ADAPTER (HOUSING SECTION) (See FIG. 3)

Each slot in the Kepco RA-32 Rack Adapter is terminated with a Model PC-2 Plug-In Adapter. The adapter is designed to provide the correct terminations for Kepco modular equipment, mounted into the Kepco RA-32 Rack Adapter. The Model PC-2 adapter consists of a printed circuit card which contains the mating connector for the modular unit and a barrier-strip with (11) terminals. Once the modular unit is plugged into the RA-32 Rack Adapter, input/output connections are transferred to the barrier-strip of the PC-2 adapter. NOTE: The barrier-strip is equipped with removable jumper links: THESE LINKS MUST BE INSTALLED IN ACCORDANCE WITH INSTRUCTIONS FOR THE MODULAR UNIT USED WITH THE ADAPTER.<sup>(1)</sup> The table below shows the required jumper connections for all applicable modular units. ON MODULAR UNITS EQUIPPED WITH MINIATURE BARRIER-STRIPS, THE JUMPER LINKS ON THESE MINIATURE BARRIER-STRIPS MUST BE COMPLETELY REMOVED BEFORE THE UNIT IS INSTALLED.

## ALTERNATE TERMINATIONS ON THE RA-32 RACK ADAPTER (HOUSING SECTION)

The standard rear terminations on the RA-32 Rack Adapter (PC-2) can be replaced with a "Mating Plug To Cable" interface (PC-8). The PC-8 is mounted in place of the PC-2, using the same mounting hardware (3 pieces 4-40 x 1/2 Machine Screws).

**WARNING**

FOR PERSONAL SAFETY THIS RACK ADAPTER MUST BE GROUNDED. WHEN THE A-C POWER CONNECTIONS ARE WIRED TO THE INDIVIDUAL PLUG-IN ADAPTORS (SEE FIG. 3), THE LINE CORD GROUND WIRE SHOULD BE CONNECTED TO EACH PLUG-IN ADAPTOR (TERMINAL 3) AND ALSO TO THE GROUND TERMINAL PROVIDED ON THE RACK ADAPTOR CASE (SEE FIG. 2).

TABLE 2

MODULAR UNIT KEPCO DESIGN GROUP	JUMPERLINKS ON PC-2:
PAX, PBX, PBX-MAT, PCX	(4)-(5), (6)-(7), (10)-(11)
OPS	(4)-(5), (6)-(7)
OPS-TA	DO NOT CONNECT ANY LINKS
OPS-B (GROUP I)	(6)-(7)-(8)
<sup>(1)</sup> OPS-BTA (GROUP II)	(7)-(8)
<sup>(1)</sup> CC-M	(8)-(9), (10)-(11)
<sup>(1)</sup> PCX-MAT	(4)-(5), (6)-(7), (8)-(9), (10)-(11)

<sup>(1)</sup>Equipped with front panels. All other units need Model BPA-22 PANEL ASSEMBLY.

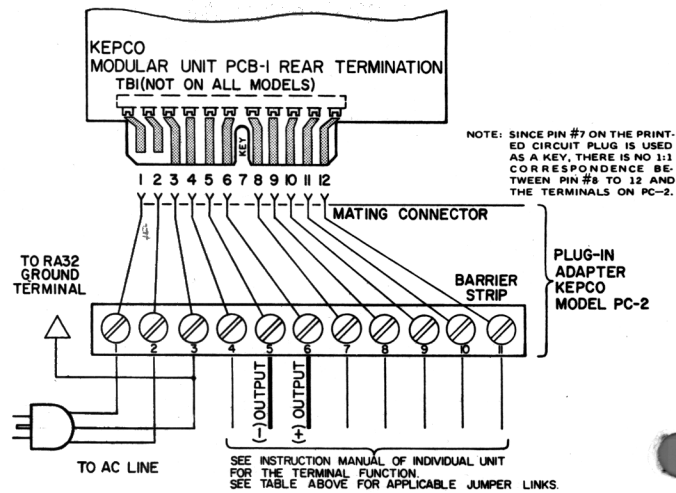


FIG. 3 SCHEMATIC DIAGRAM, PC-2.

## AVAILABLE ACCESSORIES (NOT SUPPLIED)

- a) Kepco Model PC-8 Plug-In Adapter. Needed if a "Mating Plug-to Cable" interface is desired. To be mounted for each 1/6-RACK unit installed into the RA-32 Rack Adapter. NOTE: NOT NEEDED WITH KEPCO MODEL SNK-1 ADAPTER.
- b) FILLER PANELS FOR HOUSING SECTION
  - 1) Kepco Model RFP 22-3 Filler Panel. Covers the *total* front area of the housing section.
  - 2) Kepco Model RFP 22-2 Filler Panel. Covers *two-thirds* of the front area of the housing section.
  - 3) Kepco Model RFP 22-1 Filler Panel. Covers *one-third* of the front area of the housing section.
- c) FILLER PANELS FOR SHELF SECTION
  - 1) Kepco Model RFP 24-2 Filler Panel. Covers *total* shelf area.
  - 2) Kepco Model RFP 24-1 Filler Panel. Covers *one-half* shelf area.
- d) Support Brackets. Needed if total adapter load exceeds 50 lbs. (See FIG. 2.)

## MECHANICAL SPECIFICATIONS

- 1) See FIG. 2.

## SUPPLIED ACCESSORIES:

EIGHT (8) SCREWS, FLAT PHILLIPS HEAD, 8/18 X 5/8, TYPE B POINT, SELF-THREADING.

<sup>(1)</sup>Jumper links are contained in the small polyethylene bag, delivered with the RA-32 RACK ADAPTER.