electrical

ELECTRICAL

STEP-BY-STEP SPECIFICATION – 8-WIRE ELECTRICAL SYSTEM

 From the price list, select the CE8CP Pass-Through Cable that matches the calculated length. If the length is between listed sizes, use the next size up.
 Determine the location and circuitry of the receptacles. 1. Each powered Panel has four (4) potential locations for CE8RD Duplex Receptacles – 2 per side. (Exception: 24" wide Panel has only two potential locations – 1 per side.) 2. At each receptacle location there is a choice of four circuit options. Select a circuit option for each location. Circuits one & two are utility circuits; circuits A & B are dedicated circuits.

Data/Comm

Electrical

This modification allows for the integration of the commonly required "2+2" configuration (2 utility circuits, 2 dedicated circuits) found in the source power of most of today's North American buildings.

This system is rated for connection to:

1. A grounded 120/240V, single phase, 20 A, 60Hz

2. A 120/208V, 3 phase, 20 A, 60Hz branch circuit

EQUIPMENT AMPERAGE

Calculator	0.25
Electric Eraser	0.50
Pencil Sharpener	1.00
Radio	0.05
Paper Shredder4	.40 - 13.00
Electric Typewriter	1.20
Personal Computer	2.00 - 4.00
Video Display Terminal	
ridoo Biopidy forminar minimum minimum	
Draft / Letter Quality Printer	
	1.20 - 3.00

Desk Top Plotter	1.50
Fan	
Heater	8.50 - 12.50
Coffee Pot	
Task Light	
Slide Projector	

Opening Standard of 1.38 +/- .035 x 2.71 +/- .04

Compile's duplex receptacle openings (1.345 x 2.80) will conform to the ANSI/TIA/EIA Furniture

Since some equipment, such as large copiers, printers, plotters, heaters and coffee makers would occupy most of the circuit capacity, it is recommended that such devices be supplied with the power directly from the wall or building receptacle.

Wiring Schematic





Defining "2 + 2" Wiring Configurations

2 + 2 Configuration (8 wire, 4 circuit)

Two Utility Circuits [Compile's new #1 & #2 circuits] share one neutral wire and one ground wire. (2 hot [circuit] wires + 1 neutral wire^{***} + 1 green ground wire^{*} = 4 wires)

Two Dedicated Circuits [Compile's new "A" & "B" circuits] share one neutral wire and one ground wire. (2 hot [circuit] wires + 1 neutral wire *** + 1 green/yellow ground wire** = 4 wires)

Note:

It is the ground wire that makes the difference between "Utility" and "Dedicated" circuits. Refer to Wiring Schematics found above.

* A Green ground wire is a "system" ground. This means it could be grounded to any piece of metal, including the Panel.

** A Green/Yellow ground wire is isolated, within the wiring conduit, all the way back to the box at the source (building ground).

*** All Neutral Wires are 10 gauge rather than 12 gauge meaning they are larger than normal, allowing greater protection against "noise" or interference on the circuit.

This page provides an exploded view of a sample configuration highlighting each Electrical component required when specifying this configuration.

Components

- A. CE8PD36 Power Distribution Housing Note: 8 wire, 4 circuits, 2+2 configuration
- B. CE8CP17 Flexible Mesh Jumper Cable (connects two panels side by side or separated by a post)
- C. CE8RD Duplex Receptacle
- D. CE8CI-1 "I" Connector
- E. CE8CP Pass-Through Cable Note: Must run in a straight line application only Note: Pass-Through Extension Cable (CE8CPF154) available – extends power capability beyond 208".



CE8PD - POWER DISTRIBUTION HOUSING

- Power housing is specified per panel size (e.g. CE8PD36 is for use in a 36" panel).
- 8 wire, 4 circuits (4th circuit dedicated).
- Power distribution housing is required for each powered panel, the power distribution housing should equal the width of the panel that it is specified in.
- Provides two duplex receptacle ports per panel side on all panel widths except the 24" wide panel.
- 24" wide panel allows for only one (1) duplex receptacle on one panel side.
- Each power distribution housing supports 15-20 amps.
- Must specify Raceway Cover with Knockouts on panels, where Power Distribution Housings will be utilized.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIM H	ENSIONS/INC W	HES D
Power Distribution Housing	CE8PD24 CE8PD30 CE8PD36 CE8PD42 CE8PD48 CE8PD60	165 224 235 240 258 262		6 1/4 11 1/2 17 1/2 23 1/2 29 1/2 41 1/2	

CE8CP17 - FLEXIBLE MESH JUMPER CABLE

- 17" mesh jumper.
- Jumper cable is used to pass through a post or connect two panels together.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMEN: H	SIONS/INCHE W	ES D
Flexible Mesh Jumper Cable	CE8CP17	129		17	

CE8CP - PASS THROUGH CABLE

- Flexible metal conduit is used to distribute electrical power through non-powered panels.
- Metal conduit pass through cables should be in used in a straight runs. Metal conduit pass through cables cannot pass through a post.
- Flexible conduit is required to turn a post. This only comes as 17"w. If panels at the posts do not all have power distribution housings, they must be added even if duplexes are not specified.
- To calculate the length of a Pass-Through Cable, add the widths of the non-powered panels separating the powered panels (panels with distribution housing attached). To this add 16" (distance from the edge of the panel to the distribution housing x 2).
- Add additional 3" when passing through a corner post. See the Tips at the beginning of the section for more details.

	DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMENSIONS/INCHES
				H W D
M	Pass Through Cable	CE8CP28	171	28 1/2
		CE8CP40	179	40 1/2
The Management of the second		CE8CP46	185	46 1/2
C MANUL L		CE8CP52	191	52 1/2
· Mur		CE8CP58	201	58 1/2
He of		CE8CP64	211	64 1/2
		CE8CP70	217	70 1/2
		CE8CP76	220	76 1⁄2
		CE8CP82	228	82 1/2
		CE8CP88	235	88 1/2
		CE8CP94	241	94 1/2
		CE8CP100	248	100 1/2

CE8CP-H - HYBRID PASS THROUGH CABLES WITH WIRE MESH

- Flexible metal conduit with wire mesh distributes electrical power through non powered panels.
- Add additional 3" when passing through a post. See tips at the beginning of the section for more details.
- Hybrid Pass through cables with wire mesh allows to connect at 90 degree post at one end.
- Hybrid pass-through cables with wire mesh allows connection at 90 degree post at one end for panels.
- To calculate the length of a Pass-Through Cable, add the widths of the nonpowered panels separating the powered panels (panels with distribution housing attached). To this, add 16" (distance from the edge of the panel to the distribution housing x 2).

	DESCRIPTION	PRODUCT CODE	LIST PRICE	DIN	IENSIONS/INC	HES
				Н	W	D
ß	Hybrid Pass Through Cable	CE8CP40-H	111	2	401/2	.5
		CE8CP46-H	118	2	46 1/2	.5
and the second se		CE8CP52-H	127	2	52 1/2	.5
		CE8CP58-H	135	2	58 1/2	.5
		CE8CP64-H	143	2	64 1/2	.5
and all the second second		CE8CP70-H	154	2	70 1/2	.5
		CE8CP76-H	162	2	76 1/2	.5
		CE8CP82-H	171	2	82 1⁄2	.5
		CE8CP88-H	178	2	88 1/2	.5
		CE8CP94-H	187	2	94 1⁄2	.5
		CE8CP100-H	195	2	100 1/2	.5
		CE8CP106-H	204	2	106 1/2	.5
		CE8CP118-H	222	2	118 1⁄2	.5
		CE8CP130-H	238	2	130 1/2	.5
		CE8CP142-H	255	2	142 1/2	.5

CE8CI-1 - "I" CONNECTOR

- Female Female connector connects two Pass-Through Cables.
- Connects 17" Flexible Jumper Cable or ceiling feeds to pass through cables.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMEN H	SIONS/INCH W	ES D
 "I" Connector	CE8CI-1	95			

CE8RD - DUPLEX RECEPTACLE

- Up to 3 receptacles per circuit
- Up to 6 receptacles per circuit (24 per infeed), not to exceed total of 15 Amps per circuit.
- Duplex Receptacles standard in Black (BLK).

- CE8RD1 = Circuit #1 (utility circuit)
- CE8RD2 = Circuit #2 (utility circuit)
- CE8RDA = Circuit A (dedicated)
- CE8RDB = Circuit B (dedicated)
- CE8RD1 and CE8RD2 (#1 and #2 share common ground)
- CE8RDA and CE8RDB (A and B share common ground)

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIM H	ENSIONS/INC W	HES D
Duplex Receptacle	CE8RD1 CE8RD2 CE8RDA CE8RDB	36 36 36 36			

CE8RDXCA - CALIFORNIA CONTROLLED DUPLEX RECEPTACLE

- California Title 24 meets federal and LEED certification guidelines
- Allows circuit to be controlled or switched off when utility is not in use.
- Duplex receptacles are rated for 15 Amps.
- CE8RD1CA = Circuit #1 (utility circuit)
- CE8RD2CA = Circuit #2 (utility circuit)
- CE8RDACA = Circuit A (dedicated)
- CE8RDBCA = Circuit B (dedicated)

NOTE:

- CE8RD1CA and CE8RD2CA (#1 and #2 share common ground)
- CE8RDACA and CE8RDBCA (A and B share common ground)
- Up to 6 receptacles per circuit (24 per infeed), not to exceed total of 15 Amps per circuit.
- Available in BLK finish only.

DESCRIPTION	PRODUCT CODE	LIST PRICE		IENSIONS/IN	
			Н	W	D
Duplex Receptacle	CE8RD1CA	41	2	4 5⁄8	1 1⁄4
	CE8RD2CA	41	2	4 5⁄8	1 1/4
	CE8RDACA	41	2	4 5⁄8	1 1/4
	CE8RDBCA	41	2	4 5⁄8	1 1/4

CE8FR1 - REVERSIBLE FLOOR POWER ENTRY

- Takes the place of a duplex receptacle by snapping into the base power way.
- Includes 72" long flexible metal conduit.
- Must be hard wired to source power by a licensed electrician.
- Diameter is 0.85"

CE8FR2 - REVERSIBLE FLOOR POWER ENTRY

- Takes the place of a duplex receptacle by snapping into the base power way.
- Includes 144" long flexible metal conduit.
- Must be hard wired to source power by a licensed electrician.

· Must be hard wired to source power by a licensed electrician.

	DESCRIPTION	PRODUCT CODE	LIST PRICE	DIM H	ENSIONS/ING W	CHES D
A FR D	Reversible Floor Power Entry	CE8FR1 CE8FR2	372 479		72 144	

CE8F - FLOOR POWER ENTRY

- Snaps in end of power distribution housing.
- Includes flexible vinyl conduit.

	DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMENSI H	ONS/INCHES L D
C THE MANDER OF THE STATE	Reversible Floor Power Entry	CE8F1P CE8F2P	382 494		72 144

• Diameter is 0.85"

CMEB01 - ELECTRICAL BOX - CHICAGO

- Can be retrofitted in any size of panel at the receptacle location.
- 2 per panel ,except 24" panel only one

Note: A licensed electrician must provide hardware connection with the junction box.

Gives access from one side only at each location.Customer to supply conduit, wiring, receptacle, and face plate.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIM	ENSIONS/INC	CHES
			Н	W	D
Electrical Box - Chicago	CMEB01	109			



CMEB02NY - ELECTRICAL BOX - NEW YORK

- Shipped assembled.
- Comes with pig tail electric.
- Use with 30" wide Panel of larger

- Post extension cable capacities: without electric, 30 with electric, 20
- Includes ceiling bezel and screws.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMI H	DIMENSIONS/INCHES H W	
Electrical Box - New York	CMEB02NY	476			

CEPEXX - POST EXTENSION

- Same profile as post.
- Includes two post extension brackets, four screws and four trim inserts.
- Includes ceiling bezel and screws.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIME H	ENSIONS/INCHES W	D
Post Extension	CEPE64 CEPE82	206 258	64 82		

CE8ECX - CEILING FEED

- Snaps into the end of a Power Distribution Housing.
- Flexible metal conduit extends into the ceiling through a corner post and post extension.
- Must be hard wired to source power by a licensed electrician.
- 4" junction box included.
- Post extension ordered separately

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMI H	ENSIONS/INC W	HES D
Ceiling Feed	CE8EC1 CE8EC2 CE8EC3	286 502 568	132 144 180		

CMECC - CABLE COVER

- Attaches to panels vertically between modules to provide enclosures for power
 Available in Steel (STL), Black (BLK), Nevada (NEV) only.
 or data cords.
- Available in 21" and 36" lengths, 6 per pack.

	DESCRIPTION	PRODUCT CODE	LIST PRICE	DIM	ENSIONS/ING	CHES
				Н	W	D
01	Cord Cover	CMECC21	35	21	0.5	1
		CMECC36	54	36	0.5	1

CMLEDES - STARTER LED TASK LIGHT

- Undercabinet slim profile LED linear light fixture with lens and On/Off switch.
- May be used as stand-alone or extended with add-on section below (CMLEDES_DSC).
- Includes magnet mounting bracket with optional adhesive metal plate.
- Light enclosure in clear anodizing finish. Color temperature cool white 4000K.
- Lifespan rated 30,000 hours.
- Plug-in power supply with 72" cord length plus 78" DC cable.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMENSIONS/INCHES			
			Н	W	D	
Led Task Light	CMLEDES24	297	1	22.9	1	
	CMLEDES36	341	1	33.5	1	
	CMLEDES48	379	1	45.5	1	

CMLEDES - ADD-ON LED TASK LIGHT

- Undercabinet slim profile LED linear add-on light fixture with lens.
- Daisy chain unit with 39" linking cable, no power supply.
- Add-on units can only be linked up to a total of 48 watts per power supply; this is
 equivalent to 10 feet of nominal length of light per power supply.
- Includes magnet mounting bracket with optional adhesive metal plate. Light enclosure in clear anodizing finish. Color temperature cool white 4000K. Lifespan rated 30,000 hours.

DESCRIPTION	PRODUCT CODE	LIST PRICE	DIM H	ENSIONS/IN W	CHES D
Led Task Light	CMLEDES24DSC CMLEDES36DSC CMLEDES48DSC	243 286 325	1 1 1	24 36 48	39 39 39

CMLEDESOS - OCCUPANCY SENSOR

• Inline add-on controller for dimming and occupancy sensor.

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• Sensor bypass switch.
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DESCRIPTION	PRODUCT CODE	LIST PRICE	DIMENSIONS/INCHES		HES
			Н	W	D
Occupancy Sensor	CMLEDESOS	122	6	2.4	2

