# **FERRUPS CTO Configuration Guide**



# FERRUPS FER4.3kVA 60 HZ Rackmount

Invensys Powerware Division 2727 Kurtz Street San Diego, CA 92110 U.S.A. 800.356.5794 www.powerware .com



# **Configuring Your FERRUPS UPS**

FERRUPS must be ordered using a Configure To Order (CTO) Number that reflects the cabinet style, VA rating, voltages, runtime, and other options pertaining to the FERRUPS configuration. As you select the options needed, they will become part of the CTO number.

Sample CTO Number: RJ040DC2A0A0A0A. See page 4.3k-5 for a CTO worksheet.

External battery packs, bypass switches and other external options will need to be ordered as separate line items.

Base Unit						
Base Model, Frequency, Cabinet Style	CTO Order Code	Base Price				
FER4.3kVA, 60 Hz Rackmount	RJ	\$4,085				

Input / Output Voltage							
Input Voltage	Output Voltage	CTO Order Code	Base Price				
120	120	0	\$250				
208	120/208	1	\$0				
208	120/240	2	\$0				
240	120/240	3	\$0				
240	240 (International Models)	6	\$0				

Battery and Battery Charger							
Battery Configuration Battery Charger CTO Order Code Option Price							
set up for external battery pack <sup>1</sup> standard 4							
set up for external battery pack <sup>1</sup>	10 amp internal upgrade <sup>2</sup>	5	\$270				

<sup>&</sup>lt;sup>1</sup> Order desired external battery pack as a separate line. See page 4.3k-3.

<sup>&</sup>lt;sup>2</sup> Required for external battery packs 2rd – 3rd. See page 4.3k-3.

Internal Maintenance Bypass Switch							
Internal Maintenance Bypass Switch CTO Order Code Option Price							
No internal maintenance bypass switch option available 0 \$0							

<sup>&</sup>lt;sup>1</sup> External maintenance bypass switch available for hardwired systems.

Order desired maintenance bypass switch as a separate line item on your order. See page 4.3k-3.

Input Connection								
Input Voltage Selected	Input Connection	CTO Order Code	<b>Option Price</b>					
Any	Hardwired	Α	\$0					
120 volt	5-50P	D	\$120					
000 040 !!	L6-30P	L	\$100					
208 or 240 volt	IEC309 32A <sup>1</sup>	Т	\$200					

#### **Output Connection**

Output Connection Configuration is designated by 8 digits within the unit CTO number. These eight digits allow selection of the type and quantity for up to four different types of receptacles. Additional output connections can be achieved by ordering external power distribution units. See page 4.3k-4.

- Up to three output slots available.
- If multiple quantities of one type of receptacle is desired, enter the type once with the total quantity (ex: B2 not B1B1).
- Always enter the receptacle types alphabetically (ex: B1C1 not C1B1).
- If hardwire output is desired, select type "A", quantity "0" for all receptacle types (ex: A0A0A0A0).
- If fewer than four types of receptacle are selected, complete the remaining receptacle digits with A0 (ex: B1C1A0A0).

Output Voltage Required	Output Connection	CTO Ord	der Code	Option Price
Output Voltage Required	Output Connection	Туре	Qty	per Panel
Any	Hardwired <sup>1</sup>	Α	0	\$0
400 volt	5-15R Duplex	В		\$50
120 volt	5-20R Duplex (UL)	С		\$50
000 040	6-15R Duplex	D		\$75
208 or 240 volt	6-20R Duplex	Е		\$75
	L5-15R Duplex	G		\$75
120 volt	L5-20R	Н		\$75
	L5-30R	I		\$75
	L6-15R Duplex	J		\$75
208 or 240 volt	L6-20R	K		\$75
	L6-30R	L		\$75
400/040	L14-20R	М		\$75
120/240 volt	L14-30R	N		\$75
Receptacle Output Connection				
Hardwire Output Connection C	TO Order Code	<u>AO AO</u>	<u> </u>	

<sup>&</sup>lt;sup>1</sup> Hardwired output requires hardwired input

Internal Options							
Option	CTO Order Code	Option Price					
No other option	A	\$0					
DVR (recommended when loads contain PFC power supplies)	В	\$200					
iSeries option (Formerly AS/400 option)	M	\$0					
iSeries option (Formerly AS/400 option) and DVR	N	\$200					
Neutral to Ground bond removal (For shipboard use)	Q	\$25					
Neutral to Ground bond removal and DVR (For shipboard use)	R	\$225					

## **External Options**

External battery packs, bypass switches and other external options are not a part of the CTO number and will need to be ordered as separate line items. Some external options require that the UPS be configured for use with the option.

External Battery Packs								
Runtime Full/Half Battery Charger Required Order Number List								
26m/61m	Standard Battery Charger <sup>1</sup> 10 Amp Battery Charger Upgrade Optional	EBPS4.3R	\$1,514					
1h11m/2h51m	Standard Battery Charger <sup>1</sup>		\$3,092					
2h6m/4h49m	2h6m/4h49m 10 Amp Battery Charger Upgrade <sup>1</sup>		\$4,658					
3h4m/6h46m	10 Amp Battery Charger Upgrade <sup>1</sup>	3rd	\$5,570					

<sup>&</sup>lt;sup>1</sup>Order battery charger as part of UPS. See page 4.3k-1.

External Maintenance Bypass Switches (Recommended for hardwired units)								
UPS Input Voltage Switch Type Order Number List Pri								
	BBM (Break Before Make)	BPE02BBM1A	\$450					
208 volt	BBM with AS/400 (iSeries) Option	BPE02BBMAS1A	\$450					
	BBM with Locking Handle	BPE02BBM1A/L	\$650					
	MBB (Make Before Break)	BPE02MBB1A	\$550					
120, 240 volt	MBB with AS/400 (iSeries) Option	BPE02MBBAS1A	\$550					
	MBB with Locking Handle	BPE02MBB1A/L	\$750					

<sup>&</sup>lt;sup>1</sup>Bypass Switch must be mounted on the wall near the UPS.

Other External Options							
Option	Order Number	List Price					
Voltage Matching Transformer – 208V input, 120/240V output Required for applications using MBB bypass with source voltage of 208V.	TRN-0244	\$735					
IBM AS/400 (iSeries) Interface Kit – UPS without maintenance bypass switch	IPK-0001	\$95					
IBM AS/400 (iSeries) Interface Kit – UPS with maintenance bypass switch	IPK-0002	\$120					
EnviroCom <sup>TM</sup> I	ENV-0100	\$439					
EnviroCom II	ENV-0200	\$949					
BestLink SNMP/WEB Adapter	IPK-0318	\$349					
Hand-held Remote Control Panel with Cable	RCK-0007	\$250					
Signal Splitter Box	IPK-0022	\$199					

PDU (Power Distribution Unit)								
Voltage         Input Connection         Output Connections         Order Number								
120/240	6 ft. line cord with L14-30P	(4) 5-15R, (8) 6-15R	PDU-0007	\$600				
120/240	6 ft. line cord with L14-30P	(4) 5-15R, (3) L6-30R	PDU-0008	\$400				
120/240	6 ft. line cord with L14-30P	(12) 5-15R	PDU-0009	\$300				
208 or 240	6 ft. line cord with L6-30P	(3) L6-20R, (1) L6-30R	PDU-0010	\$600				
208 or 240	6 ft. line cord with L6-30P	(4) L6-30R	PDU-0011	\$400				
120	6 ft. line cord with L5-30P	(8) 5-15R	PDU-0012	\$300				

# FER4.3kVA Quote Sheet

The UPS CTO Worksheet										
		UPS CTO Order Code			List Price	Discount	Net Price			
Base Unit: FER4.3kVA, 60 Hz Rack	RJ									
Input / Output Voltage										
Battery and Battery Charger										
Internal Maintenance Bypass Switch								-	-	_
Input Connection										
Output Connection										
Internal Options										
Complete UPS CTO Number	RJ									
	•				Į	JPS Subt	otal			
External Battery Pack										
Battery Pack Selected:										
Other External Battery Options Selected	d:									
External Maintenance Bypass	Switc	ch								
External Maintenance Bypass Switch S	electe	d:								
Other External Options										
Voltage Matching Transformer						TRN-02	244			
IBM AS/400 (iSeries) Interface Kit						IPK-00	01			
<ul> <li>UPS without maintenance bypass sw IBM AS/400 (iSeries) Interface Kit</li> </ul>	<u>ritch</u>									
UPS with maintenance bypass switch						IPK-00	02			
EnviroCom <sup>TM</sup> I						ENV-0	100			
EnviroCom II						ENV-02	200			
BestLink SNMP/WEB Adapter						IPK-03	18			
Hand-held Remote Control Panel with 0	Cable					RCK-00	007			
Signal Splitter Box						IPK-00	22			
PDU (Power Distribution Unit)						PDU				
						Sub T	otal			
									Freight	
									Insurance	
									Tax/Duty	
								(	Quote Total	
Special Instructions:										