



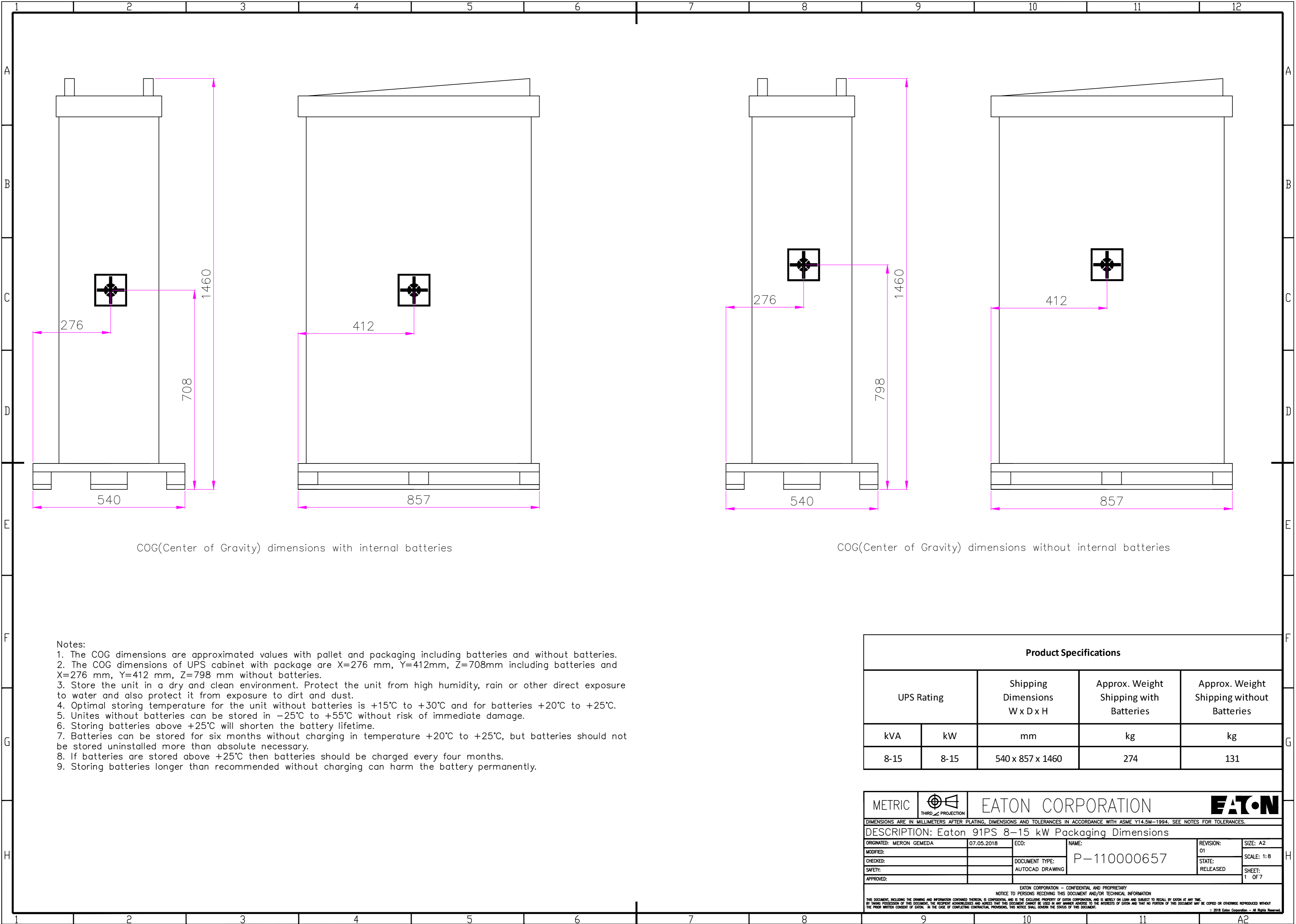
Powering Business Worldwide

SITE PLANNING DATA Eaton 91PS 8-15 kW

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METRIC		THIRD ANGLE PROJECTION		EATON CORPORATION			
DIMENSIONS ARE IN MILLIMETERS AFTER PLATING, DIMENSIONS AND TOLERANCES IN ACCORDANCE WITH ASME Y14.5M-1994. SEE NOTES FOR TOLERANCES.							
DESCRIPTION: Eaton 91PS 8-15 kW							
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COG(Center of Gravity) dimensions with internal batteries

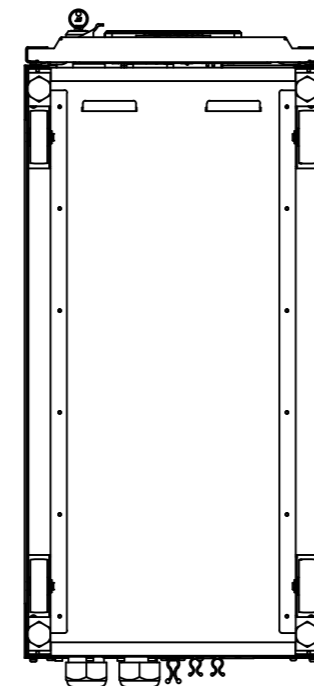
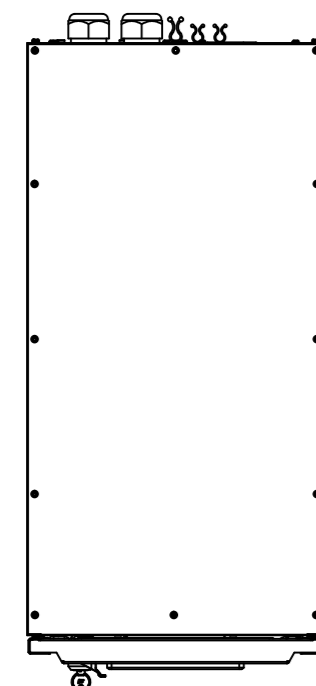
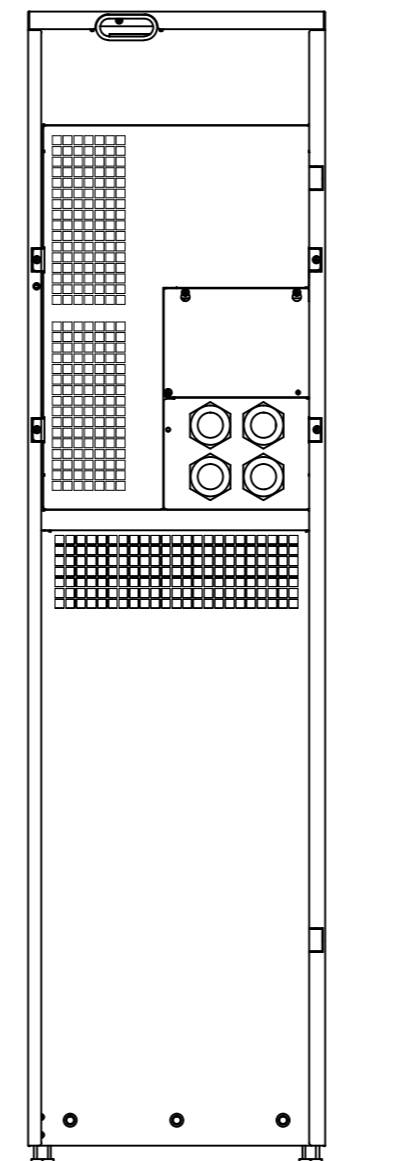
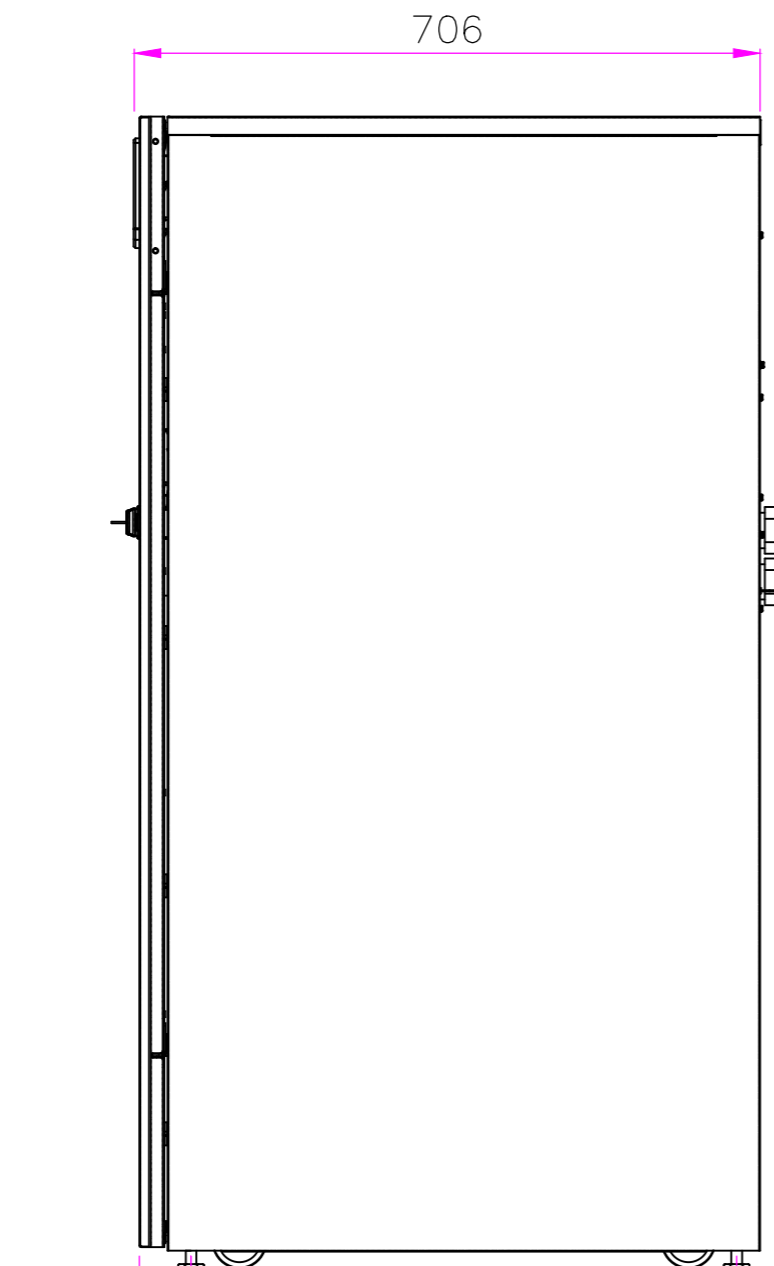
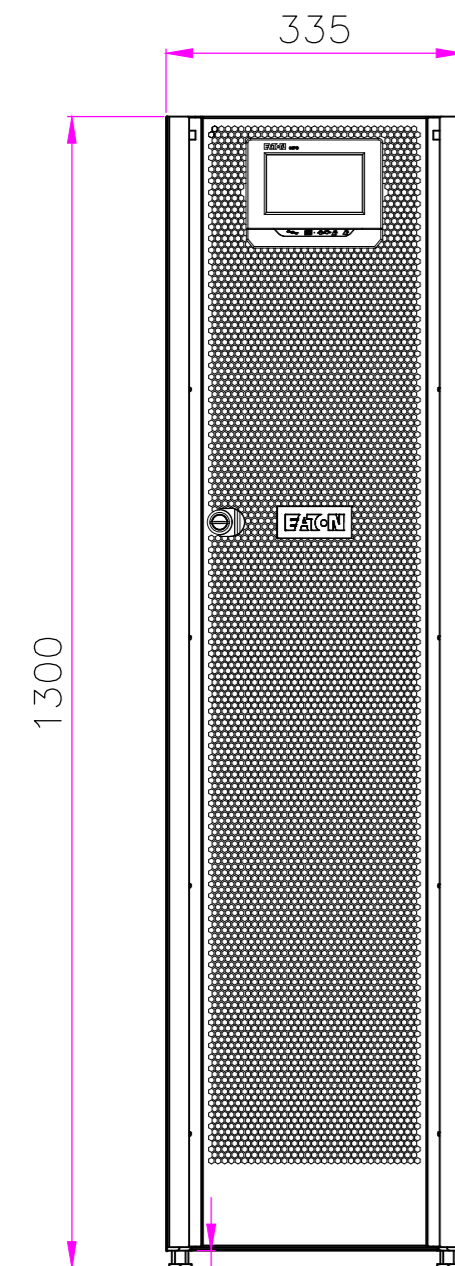
COG(Center of Gravity) dimensions without internal batteries

- Notes:
- 1. The COG dimensions are approximated values with pallet and packaging including batteries and without batteries.
 - 2. The COG dimensions of UPS cabinet with package are X=276 mm, Y=412mm, Z=708mm including batteries and X=276 mm, Y=412 mm, Z=798 mm without batteries.
 - 3. Store the unit in a dry and clean environment. Protect the unit from high humidity, rain or other direct exposure to water and also protect it from exposure to dirt and dust.
 - 4. Optimal storing temperature for the unit without batteries is +15°C to +30°C and for batteries +20°C to +25°C.
 - 5. Unites without batteries can be stored in −25°C to +55°C without risk of immediate damage.
 - 6. Storing batteries above +25°C will shorten the battery lifetime.
 - 7. Batteries can be stored for six months without charging in temperature +20°C to +25°C, but batteries should not be stored uninstalled more than absolute necessary.
 - 8. If batteries are stored above +25°C then batteries should be charged every four months.
 - 9. Storing batteries longer than recommended without charging can harm the battery permanently.

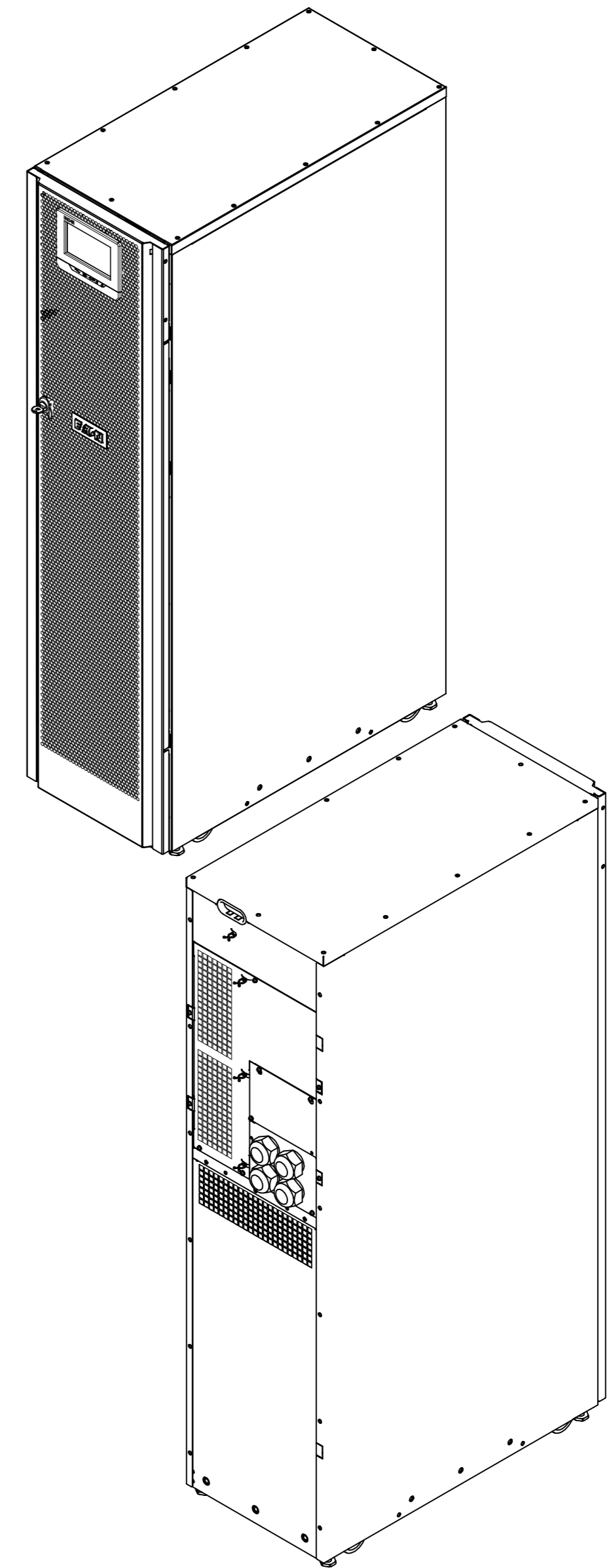
Product Specifications				
UPS Rating		Shipping Dimensions W x D x H	Approx. Weight Shipping with Batteries	Approx. Weight Shipping without Batteries
kVA	kW	mm	kg	kg
8-15	8-15	540 x 857 x 1460	274	131



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DESCRIPTION: Eaton 91PS 8-15 kW Packaging Dimensions							
ORIGINATED: MERON GEMEDA		07.05.2018		ECO:		NAME:	
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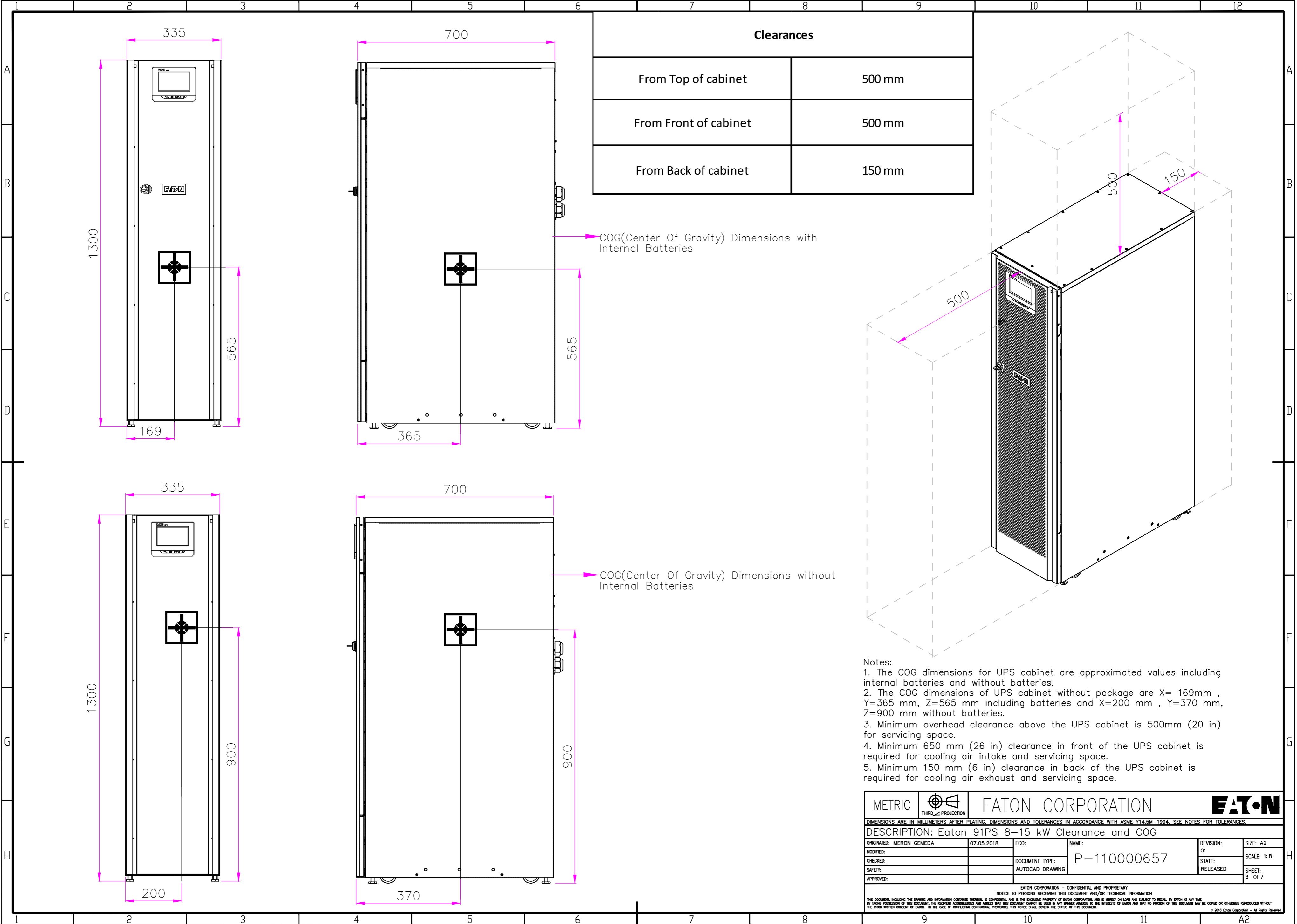
Product Specifications										
UPS Rating		Max Heat Dissipation at 100% Load	Cabinet Dimensions W x D x H	Shipping Dimensions W x D x H	Approx. Weight Cabinet With Batteries	Approx. Weight Cabinet without Batteries	Approx. Weight Shipping with Batteries	Approx. Weight Shipping without Batteries	Floor Landing	Cooling air
kVA	kW	W	mm	mm	kg	kg	kg	kg	kg/m²	l/s
8	8	368	335 x 750 x 1300	540 x 857 x1460	253	110	274	131	1007	60
10	10	460	335 x 750 x 1300	540 x 857 x 1460	253	110	274	131	1007	60
15	15	720	335 x 750 x 1300	540 x 857 x 1460	253	110	274	131	1007	60

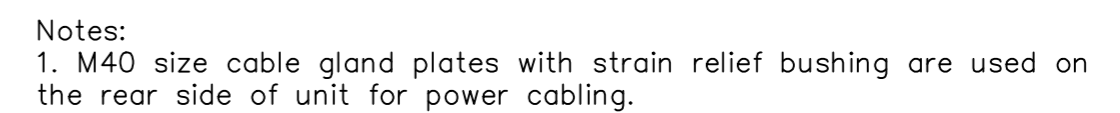




Notes:

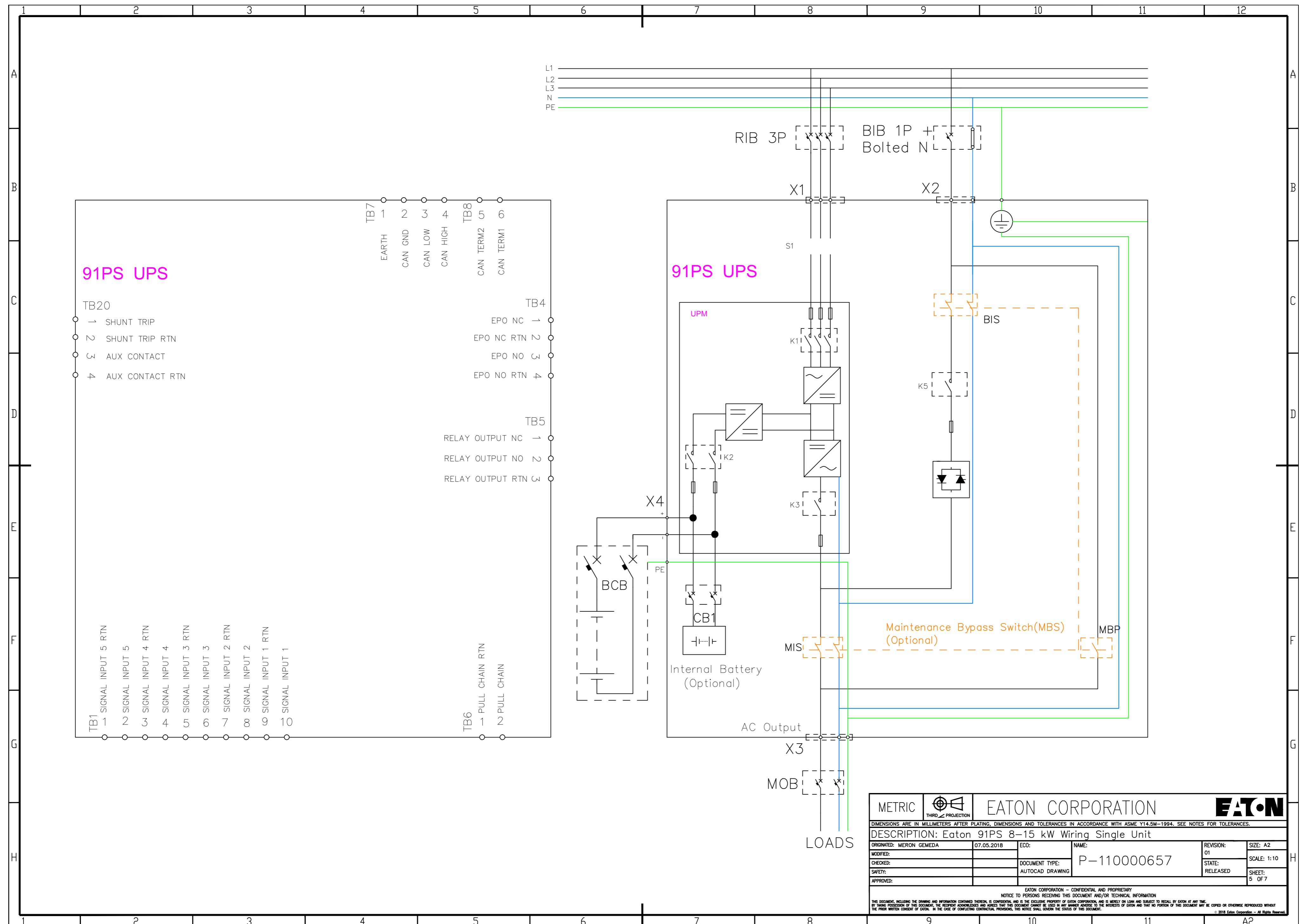


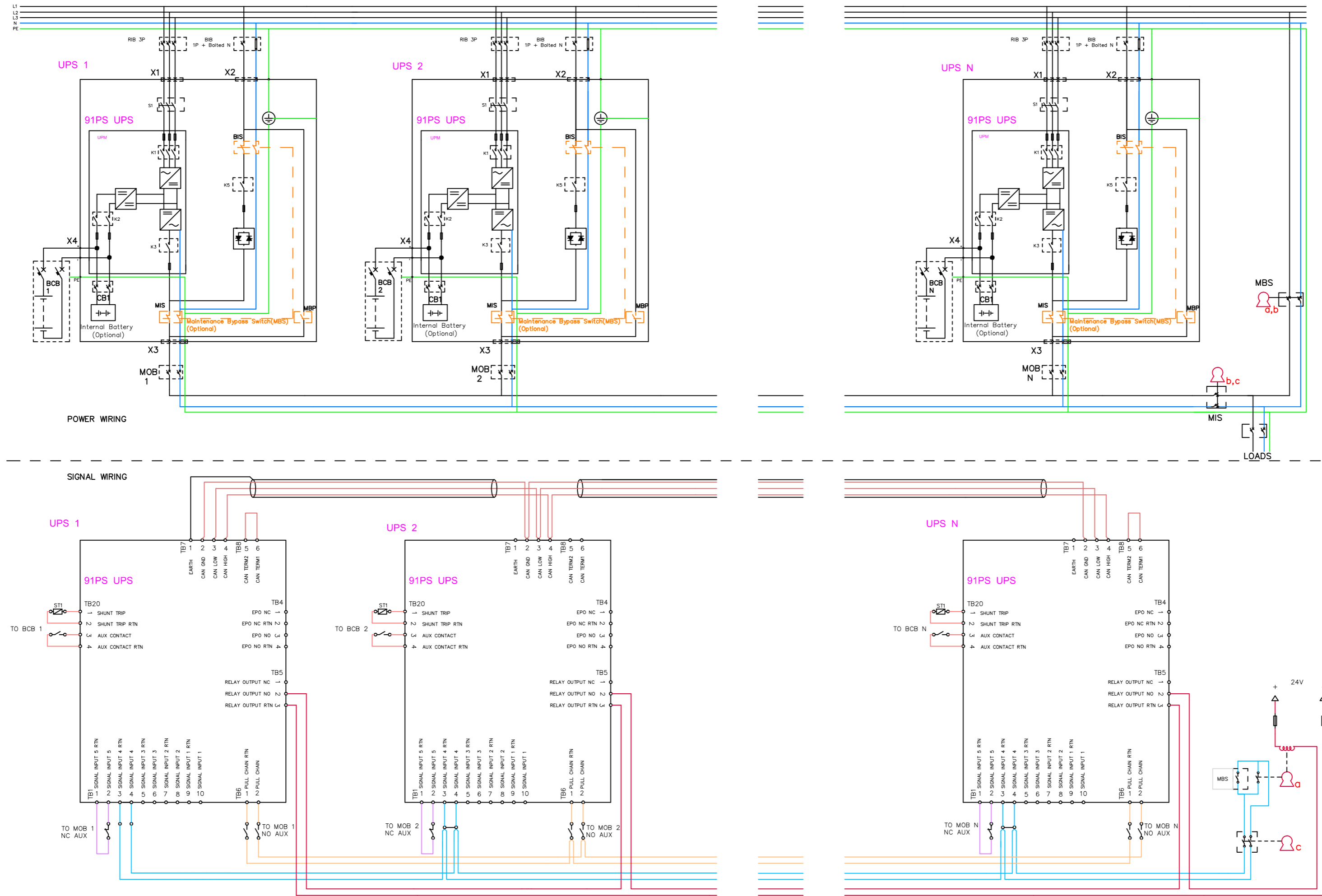
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DESCRIPTION: Eaton 91PS 8-15 kW Dimensional Drawing									
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MODIFIED:				DOCUMENT TYPE: AUTOCAD DRAWING		P-110000657			
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<h2 style="margin: 0;">DESCRIPTION: Eaton 91PS 8-15 kW Customer Connections</h2>					
ORIGINATED: MERON GEMEDA	07.05.2018	ECO:	NAME:	REVISION: 01	SIZE: A2
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Notes:
1. MBS switches should not be used when in parallel mode.

- MBS STATUS (Provided by others, Installed by others)
0.75 - 2.5mm² twisted pair (if possible, else shielded)
No earth needed
- PULL CHAIN (REDUNDANT ON BYP STATUS)
Provided by Eaton, Installed by Eaton
- MOB STATUS (Provided by others, Installed by others)
0.75 - 2.5mm² twisted pair (if possible, else shielded)
No earth needed
- ON BYPASS STATUS (NO INVERTORS ONLINE)
1.5 - 2.5mm², provided by others, Installed by others
- PCAN (DUAL AS OPTION)
Provided by Eaton, Installed by Eaton

- Mechanical bypass interlocking sequence
- Place UPS system to bypass. On bypass status (K3) will energize Key A solenoid to release it
 - Removing key A will switch on "force bypass" to the UPS system
 - Place key A to MBS breaker and close breaker. Key B will be released.
 - Aux contact of MBS will keep "force bypass" on UPS system
 - Place key B to MIS breaker and open MIS to isolate UPS system from load. Key C will be released
 - Place key C to it's dedicated keyhole to release "force bypass" command to allow UPS system testing

METRIC		THIRD ANGLE PROJECTION		EATON CORPORATION		EATON	
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DESCRIPTION: Eaton 91PS 8-15 kW Wiring Parallel Units							
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91PS 8-15 kW UPS Site Planning Data																		
Product Specifications																		
UPS Rating		AC Input	3P Rectifier Input Breaker (RIB)		Bypass AC Input	1P+Bolted N Bypass Input Breaker (BIB)			AC Output	2P Inverter AC output Breaker MOB			Battery Breaker (BCB) (Ratings at the end of discharge, 1.67 V/cell)				For Single Unit Maintenance Bypass Switch (MBS)	
			Nominal Current	Maximum Current		Nominal Current at 230 v Input	Maximum Current at 15% under voltage	Integrated Bypass Fuse		Output Current	Inverter Short Circuit Current	Auxiliary Switches	Rating	Separate Battery Configuration (UPM Bttery)	Common Battery Configuration (UPSBattery)	Trip Device (Shunt Trip)	Auxiliary Switches	Rating
kVA	kW	V	A	A	v	A	A	Type	V	A	A / 300 ms	Qty	VDC	A	A	VDC	Qty	A
8	8	400	12	18	230	36	41	3 x 160FEE (parallel)	230	36	156	2	500	NA	63	24	1	36
10	10	400	15	22	230	45	51	3 x 160FEE (parallel)	230	45	156	2	500	NA	63	24	1	45
15	15	400	23	29	230	68	77	3 x 160FEE (parallel)	230	68	156	2	500	NA	63	24	1	68

Minimum recommended cable and fuse sizes							
UPS RATING kW	Rectifier Cable [mm²]	Rectifier Fuse [A]	Bypass, output cable [mm²]	Bypass Fuse [A]	PE Cable [mm²]	POS. & NEG. Line [mm²]	Battery Fuse [A]
8	2,5	20	10	50	10	1*16	63
10	4	20	16	63	16	1*16	63
15	10	32	25	80	16	1*16	63


Maximum conductor cross section		
Rectifier	Bypass/Output	EX. Battery
Solid/stranded wire: 16 mm² Stranded wire with ferrule: 10 mm²	Solid/stranded wire: 50 mm² Stranded wire with ferrule: 70 mm²	Solid/stranded wire: 25 mm² Stranded wire with ferrule: 16 mm²

Notes:
1. Rectifier AC input current calculations: Nominal – 100% load without charging; Maximum – 100% load with maximum charging (Rectifier current limit).
2. Inverter AC output current calculation: At 100% rated output load.
3. The system must be installed on a level floor suitable for computer or electronic equipment.
4. All wiring and installations must be in accordance with applicable National and Local Electric Regulations.
5. Rectifier AC input to UPS: (3) phases and (1) ground.
Bypass AC input to UPS: (1) phase, (1) neutral, (1) ground.
AC output to load: (1) phase, (1) neutral, (1) ground.
DC input from battery to UPS: (1) positive, (1) negative, (1) ground.
6. All breakers should be adjusted according to the specified Ampere values to protect the UPS and installation.
7. For UPS installation that utilizes single feed input, The input breaker should be configured according to the rated rectifier input current.
8. Cable sizing is based on the standard IEC 60364–5–52 and IEC 60364–5–54.The sizing is for 70°C rated copper cables.
9. Specifications are subject to change.

METRIC



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DESCRIPTION: 91PS 8–15 kW Specifications

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