"SG-100D1" HV SWBD 6,6kV (UNIT A4)

FUNCTIONAL DIAGRAM

TRANSFORMER FEEDER TR200DE1

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+A4

DWG n° : 231151/SD/21

Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
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0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Cover

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 1

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

INDEX

Sheet	Description	Revision 0	1	2	3	4	5	6	7	8
1	Cover	X	X	X	X					
2	Sheets Index	X	X	X	X					
3	Legend	X	X	X	X					
4	Door Layout	X	X	X	X					
5	Protection Display REX640	X	X	X	X					
6	Selector Switch Diagram	X	X	X	X					
7	Power Diagram	X	X	X	X					
8	Power Diagram	X	X	X	X					
9	Power Diagram	X	X	X	X					
10	110Vdc / 24Vdc Distribution Voltage	X	X	X	X					
11	Composition Relay REX640	X	X	X	X					
12	230Vac Distribution Voltage	X	X	X	X					
13	110V Protection/Measure Distribution Voltage	X	X	X	X					
14	110V Protection/Measure Distribution Voltage	X	X	X	X					
15	"REX640"' Protection Wiring	X	X	X	X					
16	"REX640"' Protection Wiring	X	X	X	X					
17	"REX640"' Protection Wiring	X	X	X	X					
18	Extherm Device	X	X	X	X					
19	Command Circuit	X	X	X	X					
20	Command Circuit	X	X	X	X					
21	Command Circuit	X	X	X	X					
22	Command Circuit	X	X	X	X					
23	"REX640" Protection Wiring - Digital Input	X	X	X	X					
24	"REX640" Protection Wiring - Digital Input	X	X	X	X					
25	"REX640" Protection Wiring - Digital Input	X	X	X	X					
26	Availables Signals	X	X	X	X					

Sheet	Description	Revision 0	1	2	3	4	5	6	7	8
27	Terminal stripes	X	X	X	X					
28	Terminal stripes	X	X	X	X					
29	Terminal stripes	X	X	X	X					
30	Terminal stripes	X	X	X	X					
31	Bill of Materials	X	X	X	X					
32	Bill of Materials	X	X	X	X					
33	Bill of Materials	X	X	X	X					

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+A4

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Item n° : PF1113279

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IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Sheets Index

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 2

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

ACRONIMUS LEGEND

ITEM	DESCRIPTION
BB	ARC SENSOR PROTECTION ON MAIN BUS BARS
BGE	EARTHING SWITCH
C1	VOLTAGE PRESENCE
CB	ARC SENSOR PROTECTION ON C.B. / CONTACTOR COMPARTMENT
CC	ARC SENSOR PROTECTION ON CABLE COMPARTMENT
DCO	DOUBLE COMMAND OPERATED CONTACTOR
DI3	UNDERVOLTAGE CONTACTOR
DP1	ALARM RELAY MODULE TEMPERATURE
E1	INTERNAL LIGHT
E8	RESISTOR FERRO-RESONANCE
EH1	INTERNAL SPACE HEATER
Fn	MV FUSE
FP1	PROTECTION RELAY
GS1	DC/DC CONVERTER
HGR	THERMOSTAT
Kn	AUXILIARY RELAY
K1	MV CONTACTOR
K86	BLOCK RELAY
KT1	DE-ENERGIZATION TIMER
LS	MICRO SWITCH ON AUXILIARY DOOR
MAS	MOTOR SPRING CHARGER
MBC	CLOSING COIL
MBO1	OPENING COIL
MBU	UNDERVOLTAGE
ODn	VOLTAGE DISCHARGER
PU1	MEASURING VOLTAGE INSTRUMENT
PTT	V.T. TRUCK
QM	MV CIRCUIT-BREAKER

ITEM	DESCRIPTION
QDn	M.C.B. CIRCUITS PROTECTION
QVn	M.C.B FOR V.T. PROTECTION
RLE1	COIL FOR CONSET CLOSING CIRCUIT-BREAKER
RLE2	COIL FOR UNLOCKING RACK-IN/OUT OPERATION
RLE3	COIL FOR UNLOCKING OPERATION EARTHING
RLE4	COIL FOR UNLOCKING ENCLOSURE DOOR OPERATION
SU1	VOLTAGE SELECTOR
SWH...	ETHERNET SWITCH
TI-Ln	CURRENT TRANSFORMER
TO	OMOPOLAR RING CURRENT TRANSFORMER
TR1	TEMPERATURE CONTROL DEVICE

FUNCTIONAL OF THE PROTECTION RELAY OUTPUT CONTACTS:

SLOT "G":
RF = WATCHDOG RELAY
S01 = EARTHING SWITCH UNLOCKING
S02 = C.B. or CONTACTOR READY TO CLOSE
POSP1 = CLOSING COMMAND
S03 = C.B. or CONTACTOR TRUCK UNLOCKED
PODP1 = OPENING COMMAND
SLOT "B":
S01 = TRIP PROTECTION TO LOCKOUT RELAY
S02 = EARTHING SWITCH CLOSED
S03 = AVAILABLE OUTPUT (ON TERMINAL STRIP)
S04 = RESET LOCKOUT RELAY

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+A4
DWG n° : 231151/SD/21
Item n° : PF1113279

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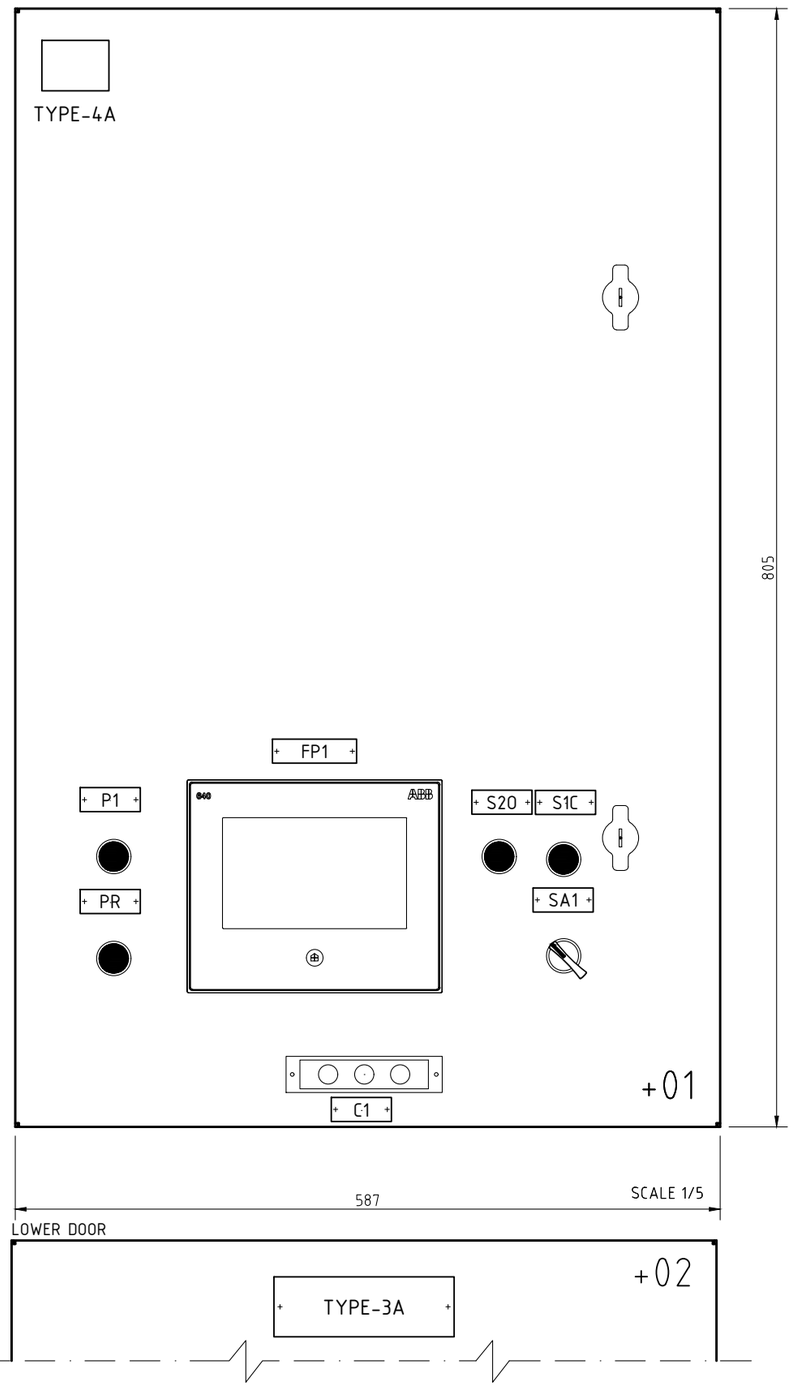
TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
Legend

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK
SCALE : NTS
A3
DRAWING NO. 1723002197-EL-DG-00021
SHEET 3
REV. 03

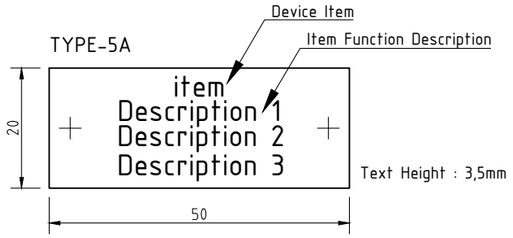
F.to UNI A3: 420mmx297mm

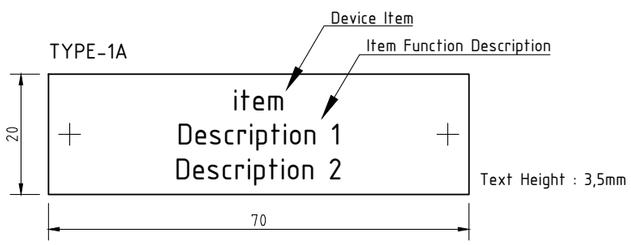
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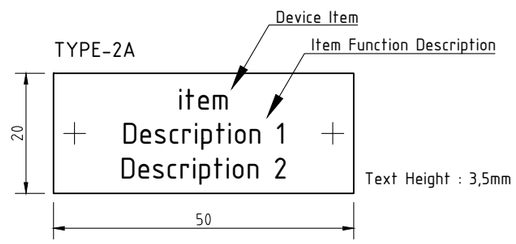
DOOR LAY-OUT

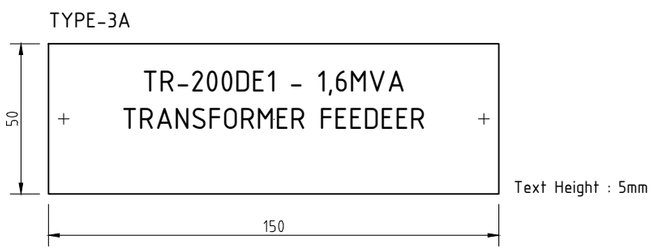


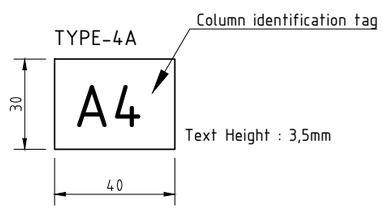
DEVICES name plate					
ITEM	COMPONENT	DESCRIPTION 1	DESCRIPTION 2	DESCRIPTION 3	NOTE
FP1	PROTECTION RELAY	PROTECTION RELAY			TYPE-1A
S2.O	PUSH BUTTON	OPEN	COMMAND	CONTACTOR	TYPE-5A
S1.C	PUSH BUTTON	CLOSE	COMMAND	CONTACTOR	TYPE-5A
SA1	SELECTOR SWITCH	LOCAL / REMOTE			TYPE-2A
PR	LIGHT PUSH BUTTON	RESET	LOCK-OUT	TRIP LOCK-OUT	TYPE-5A
C1	PILOT LIGHT	VOLTAGE	PRESENCE		TYPE-2A
P1	PUSH BUTTON	TRUCK-DOOR	EARTHING	ENABLING	TYPE-5A











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DWG n° : 231151/SD/21

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IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Door Layout

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

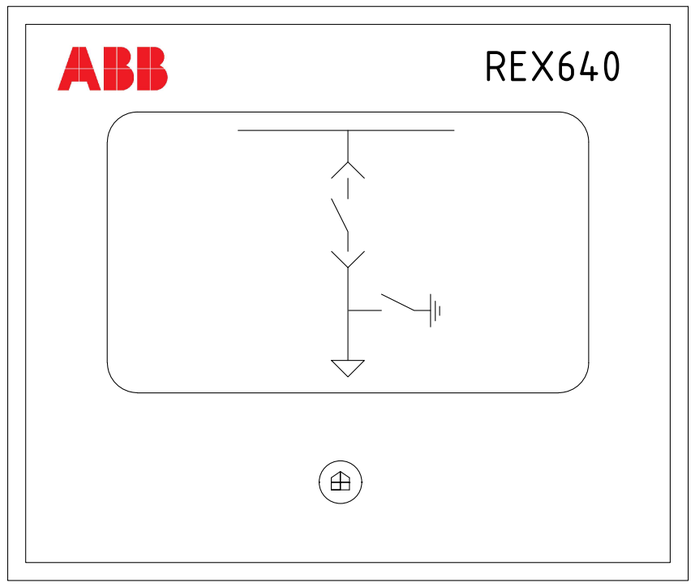
SHEET 4

REV. 03

File Name : 1723002197-EL-DG-00021 Rev.03

F.to UNI A3: 420mmx297mm

PROTECTION DISPLAY



LHMI - TOUCH DISPLAY

- COMMANDS "CLOSE CONTACTOR " AND "OPEN CONTACTOR" NOT ENABLED
- PUSH BUTTON "REMOTE / LOCAL" NOT ENABLED

LEDs PAGE 1				
Item	NAME PLATE	COLOUR		Note
		ALARM	OK	
LED-1	27-1/27-2/59-1/59-2 - VOLTAGE PROTECTION	RED	-	ALARM = OVER/UNDER VOLTAGE PROTECTION
LED-2	CONTACTOR READY (TCS)	-	GREEN	OK = TCS OK (CONTACTOR READY)
LED-3	SYNCHRO CHECK		GREEN	OK = SYNCHRONISM
LED-4	CONTACTOR READY TO CLOSE	-	GREEN	OK = CONTACTOR READY TO CLOSE
LED-5	50-1/51-1/67-1/67-2 - TRIPPED	RED	-	ALARM = OVERCURRENT PROTECTION TRIPPED
LED-6	51N/59N-1/59N-2 - TRIPPED	RED	-	ALARM = EARTH PROTECTION TRIPPED
LED-7	EARTHING SWITCH UNLOCKED	-	GREEN	OK = EARTHING SWITCH UNLOCKED
LED-8	RACK-IN/OUT ENABLED	-	GREEN	OK = CONTACTOR TRUCK UNLOCKED
LED-9	ARC PROTECTION TRIPPED	RED	-	ALARM = TRIP ARC PROTECTION
LED-10	GOOSE ALARM	RED	-	ALARM = GOOSE FAULT
LED-11	EMERGENCY OPENING BY SIS (ESD)	RED	-	ALARM = ESD TRIPPED

LEDs PAGE 2				
Item	NAME PLATE	COLOUR		Note
		ALARM	OK	
LED-12	SPACE HEATER "ON"	RED	-	ALARM = SPACE HEATER "ON"
LED-13	TRANSF. PROTECTIONS	RED		ALARM = PROTECTIONS TRIP
LED-14	FUSES TRIP	RED		ALARM = FUSES TRIP
LED-15	TRIP FROM L.V.	RED		ALARM = L.V. TRIP
LED-16				
LED-17				
LED-18				
LED-19				
LED-20				
LED-21				
LED-22				

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+A4

DWG n° : 231151/SD/21

Item n° : PF1113279

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CROSSWIND

IMESA ELECTRICAL ENGINEERING

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
Protection Display REX640

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

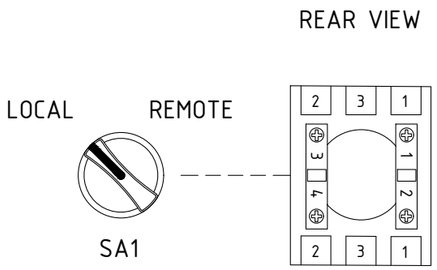
SHEET 5

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

SELECTORS SWITCH DIAGRAM



NOTES

THE DIAGRAM INDICATES THE FOLLOWING CONDITIONS:
-INSERTED CONTACTOR IN OPEN POSITION
-DE-ENERGIZED CIRCUITS
-EARTHING SWITCH OPEN

THE AUXILIARY CIRCUITS WILL HAVE THE FOLLOWING CHARACTERISTICS:
-110+ / 24+ 1,5mmq RED TYPE CABLE SH-W
-110- / 24- 1,5mmq WHITE TYPE CABLE SH-W
-AUXILIARY CONTACTS TO TERMINAL STRIP 1,5mmq BLACK TYPE CABLE SH-W
-230Vac 1,5mmq BLACK TYPE SH-W
-VOLTMETRICAL CIRCUITS 1,5mmq BLACK TYPE CABLE SH-W
-AMMETRICAL CIRCUIT 2,5mmq BLACK TYPE CABLE SH-W

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+A4
DWG n° : 231151/SD/21
Item n° : PF1113279

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CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
Selector Switch Diagram

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

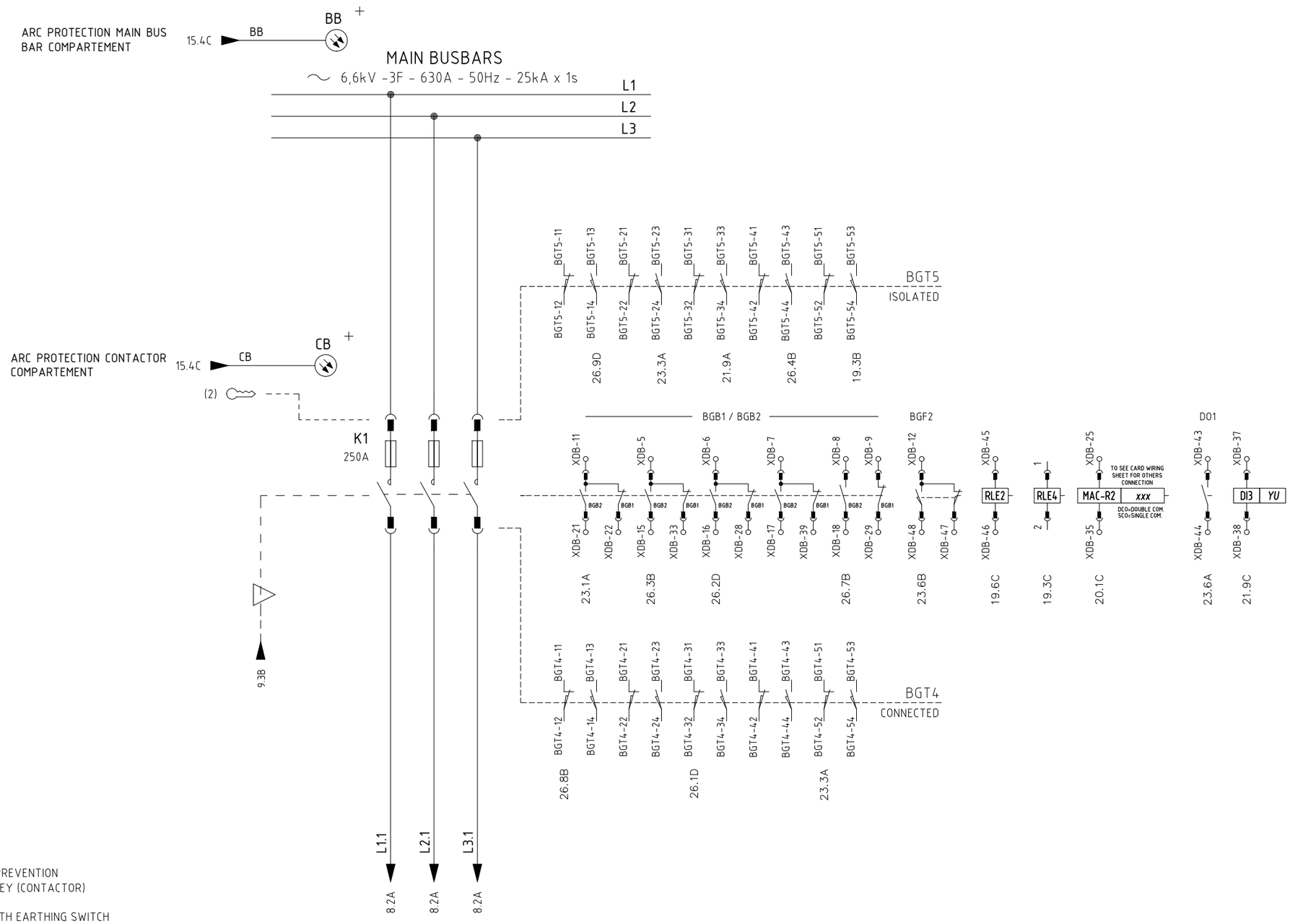
DRAWING NO. 1723002197-EL-DG-00021

SHEET 6

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03



(2) RACKING IN PREVENTION LOCK WITH KEY (CONTACTOR)

(3) FREE KEY WITH EARTHING SWITCH IN OPEN POSITION

(4) FREE KEY WITH EARTHING SWITCH IN CLOSED POSITION

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
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DWG n° : 231151/SD/21

Item n° : PF1113279

CROSSWIND

IMESA ELECTRICAL ENGINEERING

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Power Diagram

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

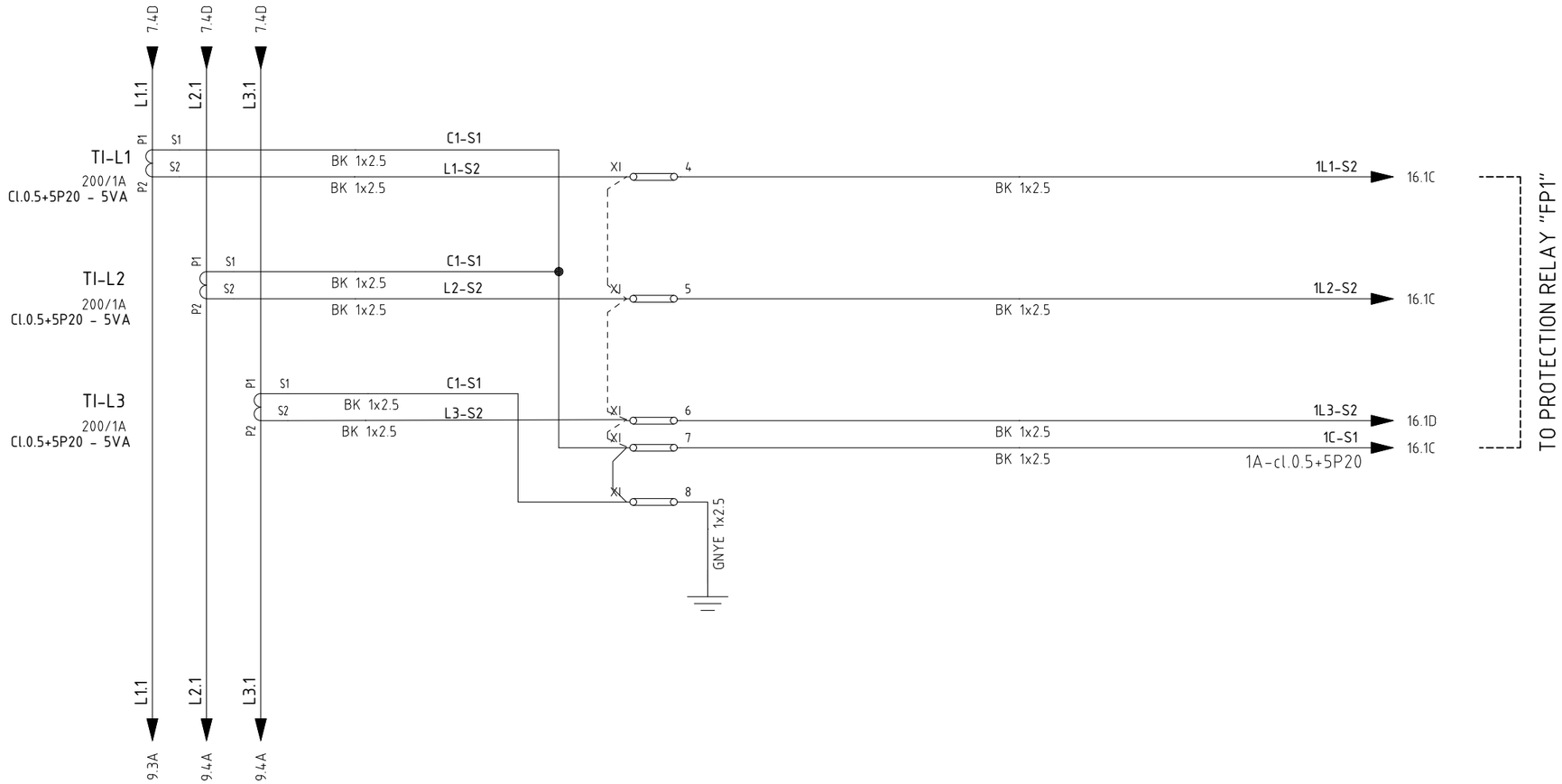
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SHEET 7

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03



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DWG n° : 231151/SD/21

Item n° : PF1113279

CROSSWIND

IMESA ELECTRICAL ENGINEERING

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Power Diagram

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

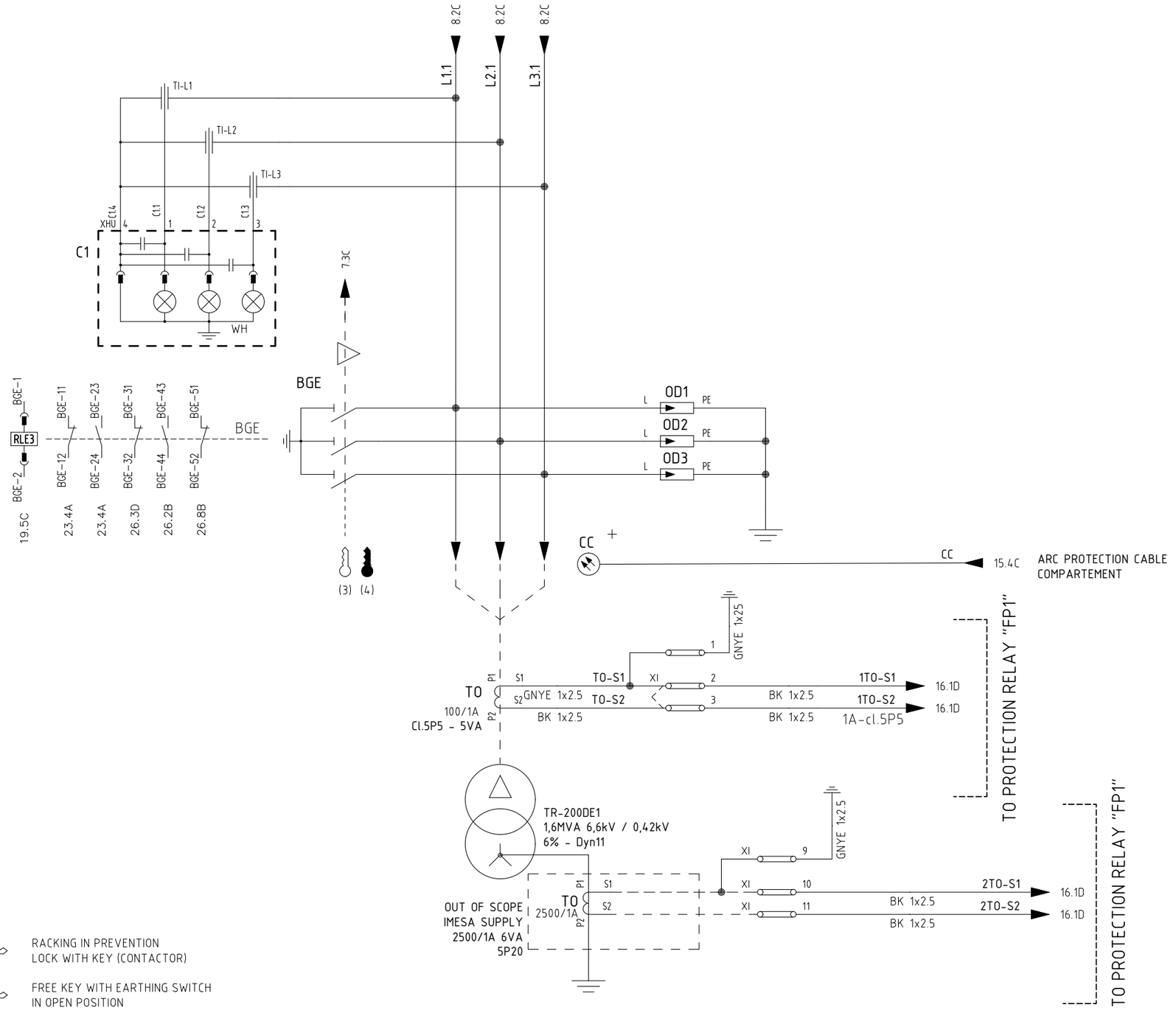
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SHEET 8

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03



(2) RACKING IN PREVENTION LOCK WITH KEY (CONTACTOR)

(3) FREE KEY WITH EARTHING SWITCH IN OPEN POSITION

(4) FREE KEY WITH EARTHING SWITCH IN CLOSED POSITION

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Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Power Diagram

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 9

REV. 03

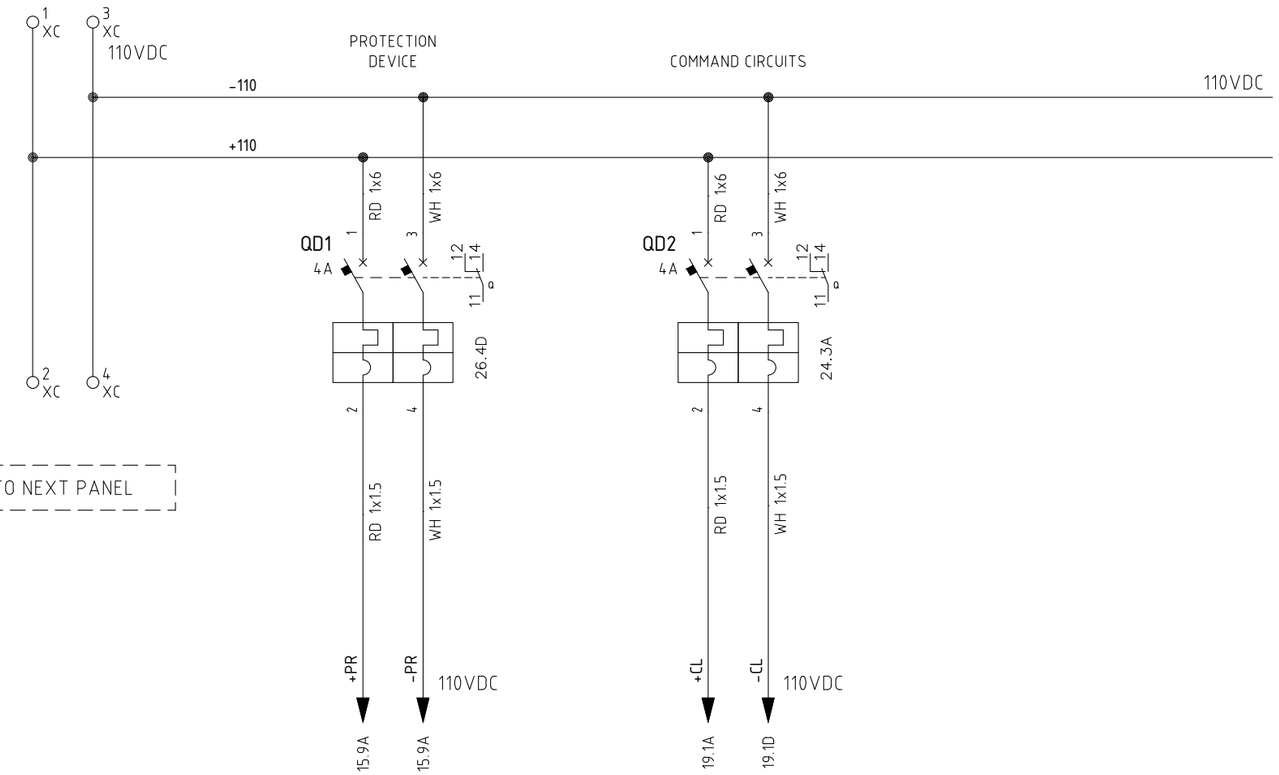
F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

110VDC DISTRIBUTION VOLTAGE

110Vdc Auxiliary Voltage
from Measuring Bus Bar Unit

FROM PREVIOUS PANEL

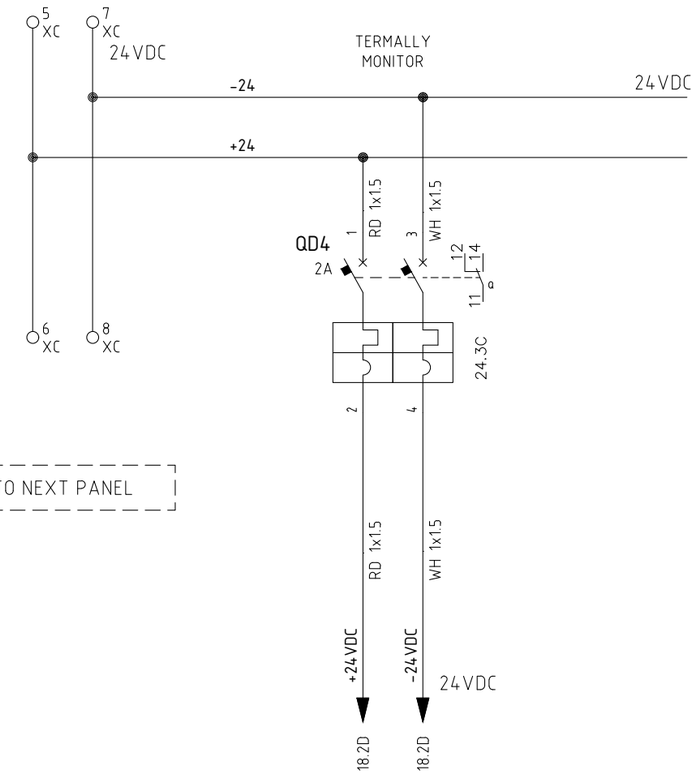


TO NEXT PANEL

24VDC DISTRIBUTION VOLTAGE

24Vdc Auxiliary Voltage
from Measuring Bus Bar Unit

FROM PREVIOUS PANEL



TO NEXT PANEL

= +A4							
DWG n° : 231151/SD/21	3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)	
Item n° : PF1113279	2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)	
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	0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)	
	REV.	DATE	DRN	CHKD	APPD	DESCRIPTION	

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
110Vdc / 24Vdc Distribution Voltage

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

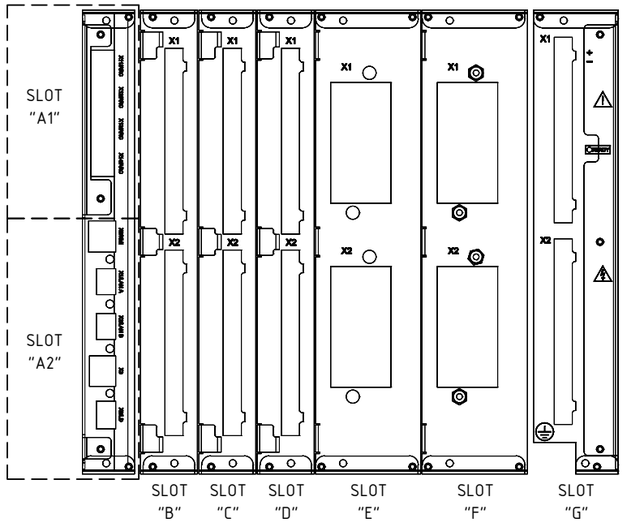
A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 10 | REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

COMPOSITION RELAY REX640

RACK VIEW



REX640B10NN+COM1+ARC1+BIO1+BIO1+BIO2+AIM1+AIM1+PSM3+MCT1+SCT1+CMP2+LNG1+PCL4

LEGEND		
SLOT	Module Type	Description Module
A1	ARC1001	n° 4 x ARC sensor inputs
A2	COM1001	n° 1 x RJ-45 (LHMI port) + n° 3 x RJ-45 + n° 1 x SFP100M LC
B	BIO1001	n° 14 Binary Input + n° 8 x SO
C	BIO1001	n° 14 Binary Input + n° 8 x SO
D	BIO1002	n° 9 Binary Input + n° 6 x SPO + n° 2 x SPO(TCS)
E	AIM1001	n° 4 x CT + n° 1 x CT (sensitive, for residual current only) + n° 5 x VT
F	AIM1001	n° 4 x CT + n° 1 x CT (sensitive, for residual current only) + n° 5 x VT
G	PSM1003	77...150 VDC, n° 3 x PO (TCS) + n° 2 x PO + n° 3 x SO + n° 2 x SSO
	PO = Power Output SO = Signal Output SPO = Static Power Output SSO = Static Signal Output	

=
+A4

DWG n° : 231151/SD/21
Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
Composition Relay REX640

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 1.1 | REV. 03

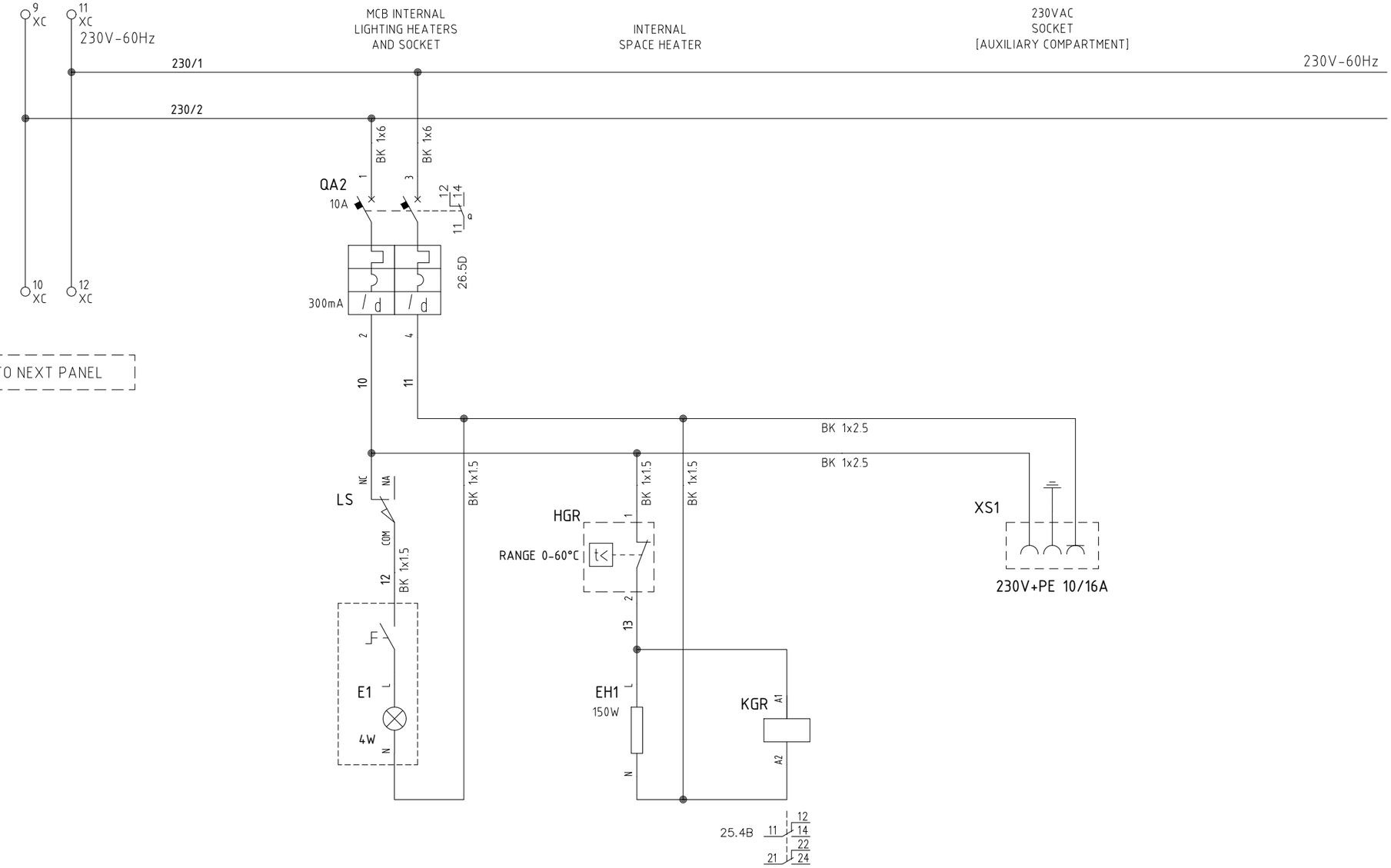
F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

230VAC DISTRIBUTION VOLTAGE

230Vac Auxiliary Voltage
from Measuring Bus Bar

FROM PREVIOUS PANEL



TO NEXT PANEL

		=					
		+A4					
	IMESA ELECTRICAL ENGINEERING	DWG n° : 231151/SD/21	3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
		Item n° : PF1113279	2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
			1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
CROSSWIND	ROSETTI MARINO		0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
			REV.	DATE	DRN	CHKD	APPD	DESCRIPTION

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

230Vac Distribution Voltage

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 12 | REV. 03

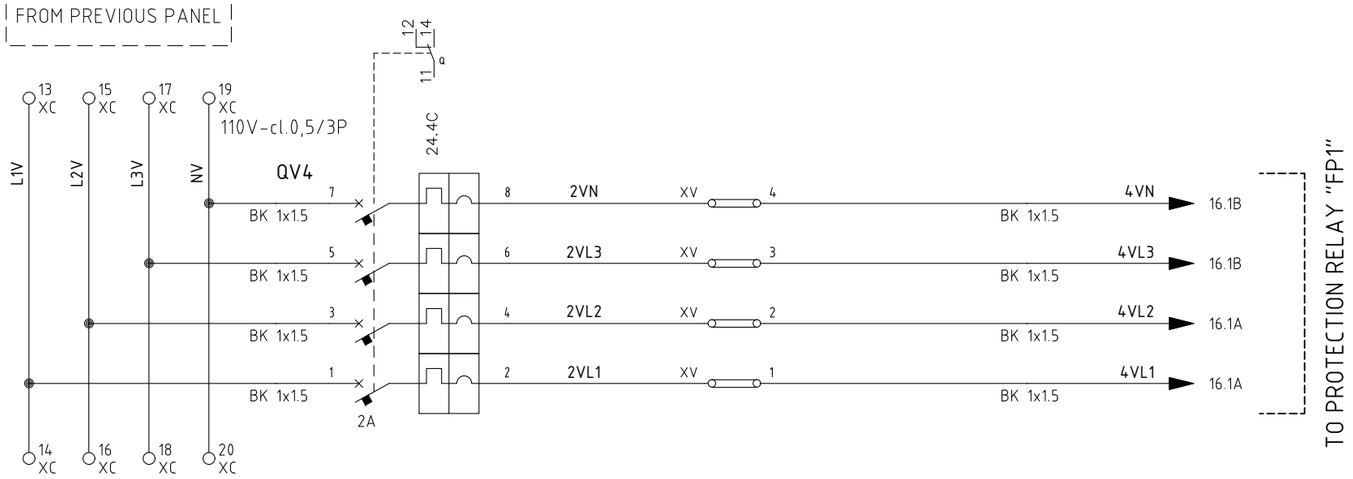
F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

110V: 1,73 DISTRIBUTION VOLTAGE VT'S FROM MAIN BUS BAR

MAIN BUS BAR
110:√3V VOLTMETRIC LINE - STAR
(FOR PROTECTION/MEASURE)

FROM PREVIOUS PANEL



TO NEXT PANEL

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

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+A4
DWG n° : 231151/SD/21
Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING
CROSSWIND
ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
110V Protection/Measure Distribution Voltage

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK
SCALE : NTS

A3
DRAWING NO. 1723002197-EL-DG-00021
SHEET 1,3
REV. 03

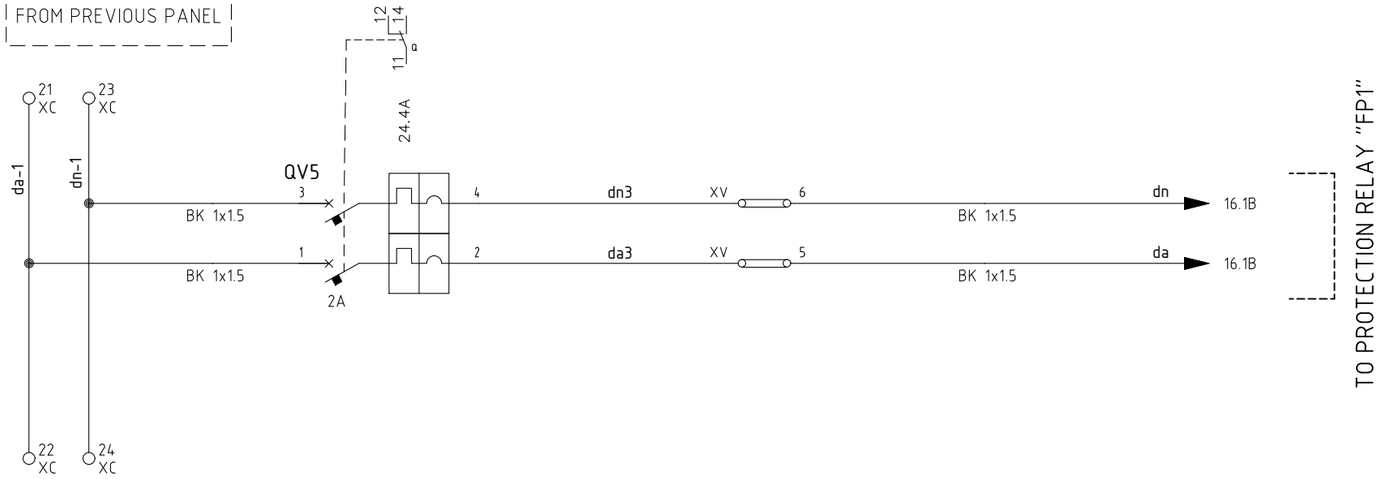
F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

110V:3 DISTRIBUTION VOLTAGE VT'S FROM MAIN BUS BAR

MAIN BUS BAR
110:3V VOLTMETRIC LINE -
DELTA OPEN
(FOR PROTECTION/MEASURE)

FROM PREVIOUS PANEL



TO PROTECTION RELAY "FP1"

TO NEXT PANEL

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

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+A4
DWG n° : 231151/SD/21
Item n° : PF1113279

CROSSWIND
IMESA ELECTRICAL ENGINEERING
ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
110V Protection/Measure Distribution Voltage

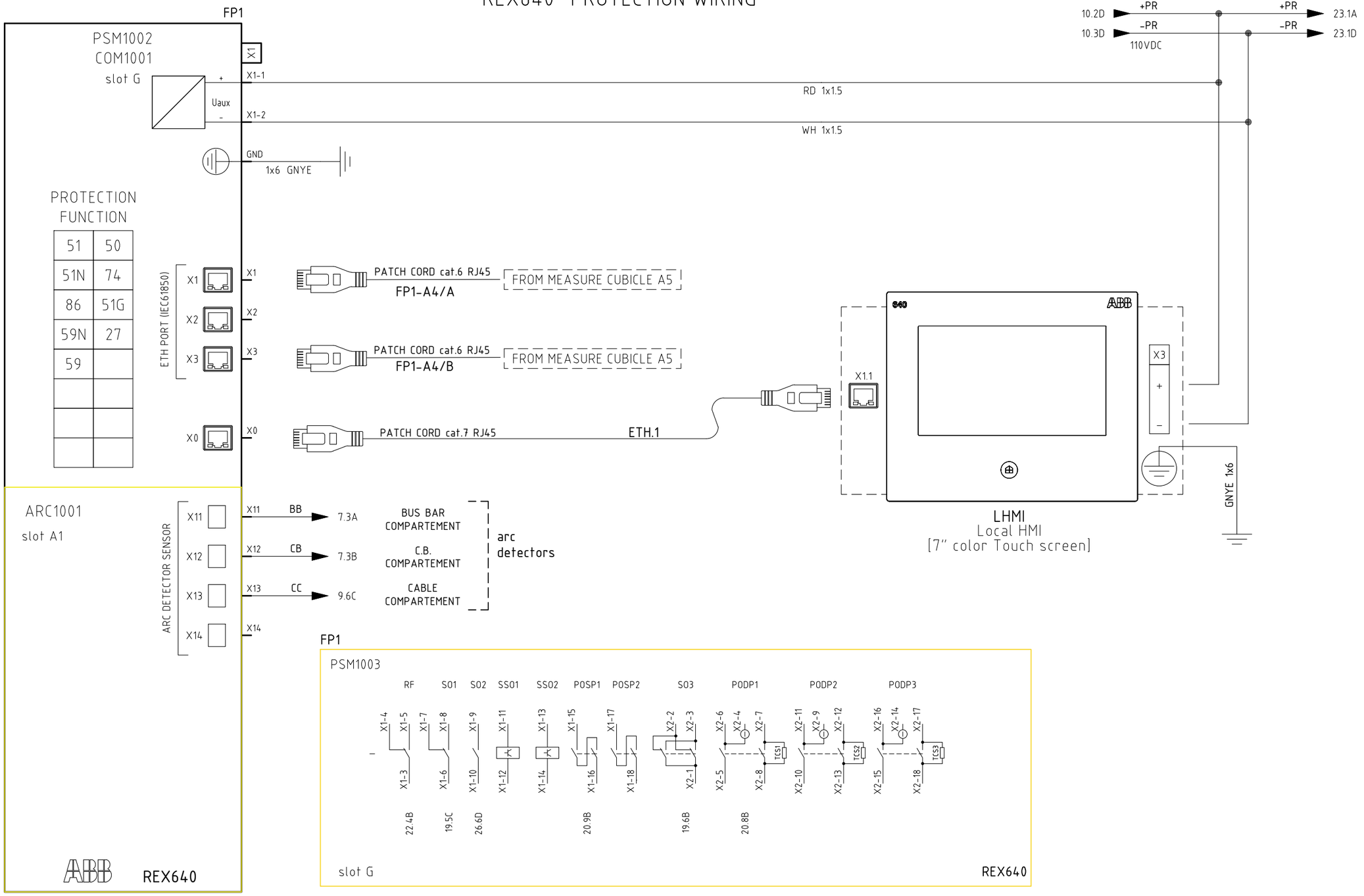
CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK
SCALE : NTS

A3
DRAWING NO. 1723002197-EL-DG-00021
SHEET 1.4
REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

"REX640" PROTECTION WIRING



	=						
	+A4						
	DWG n° : 231151/SD/21	3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
	Item n° : PF1113279	2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
		1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
		0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
		REV.	DATE	DRN	CHKD	APPD	DESCRIPTION

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
"REX640"' Protection Wiring

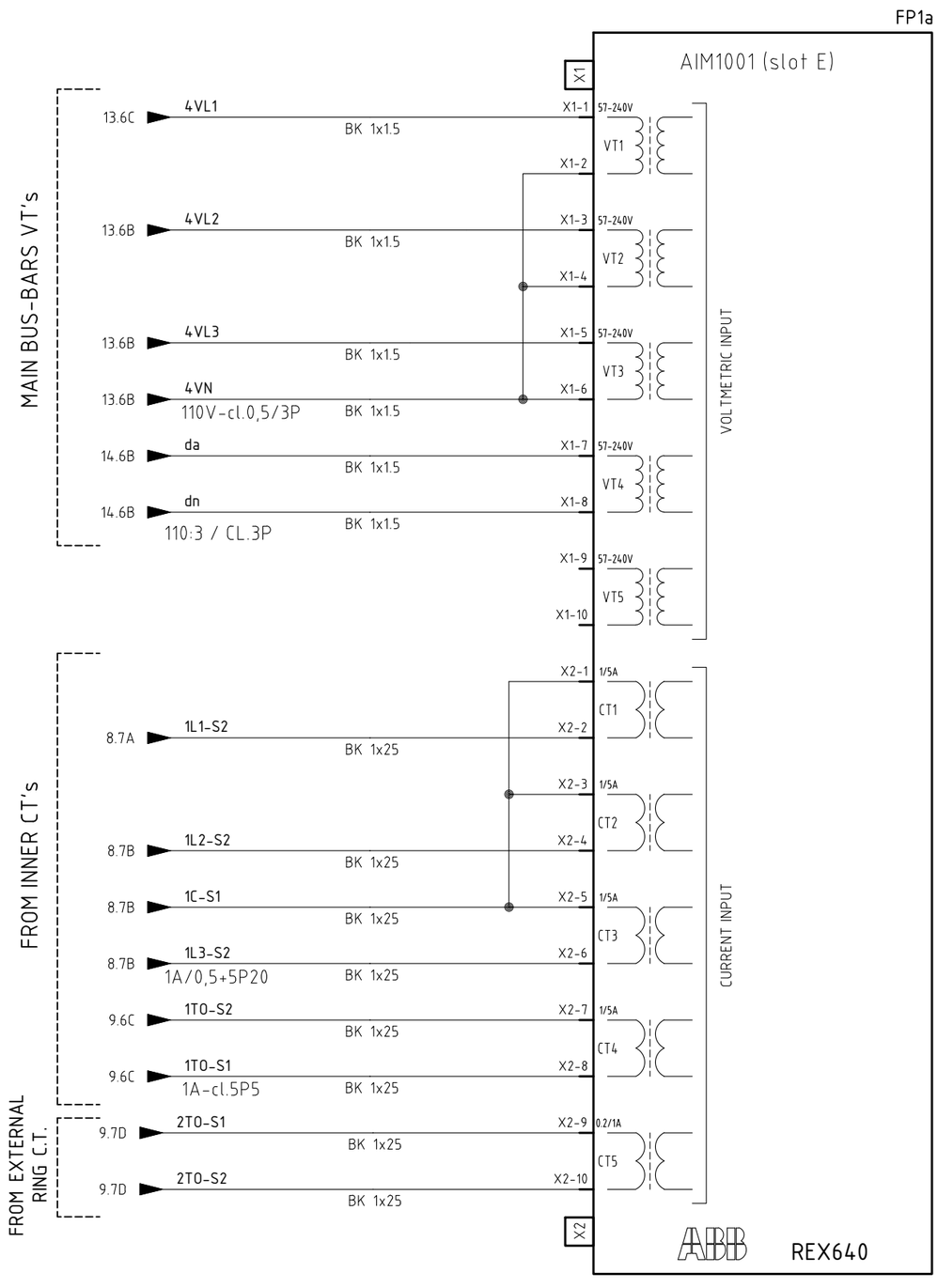
CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 15 | REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

"REX640" PROTECTION WIRING



REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

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+A4
DWG n° : 231151/SD/21
Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
"REX640"' Protection Wiring

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

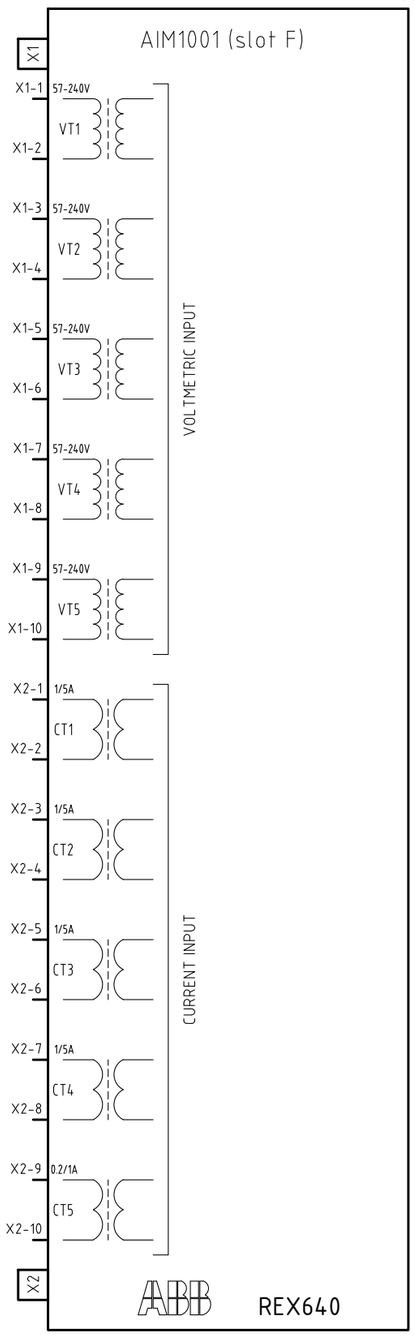
SHEET 1.6

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

"REX640" PROTECTION WIRING



		=					
		+A4					
	IMESA ELECTRICAL ENGINEERING	DWG n° : 231151/SD/21	3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
		Item n° : PF1113279	2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
			1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
CROSSWIND	ROSETTI MARINO		0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
			REV.	DATE	DRN	CHKD	APPD	DESCRIPTION

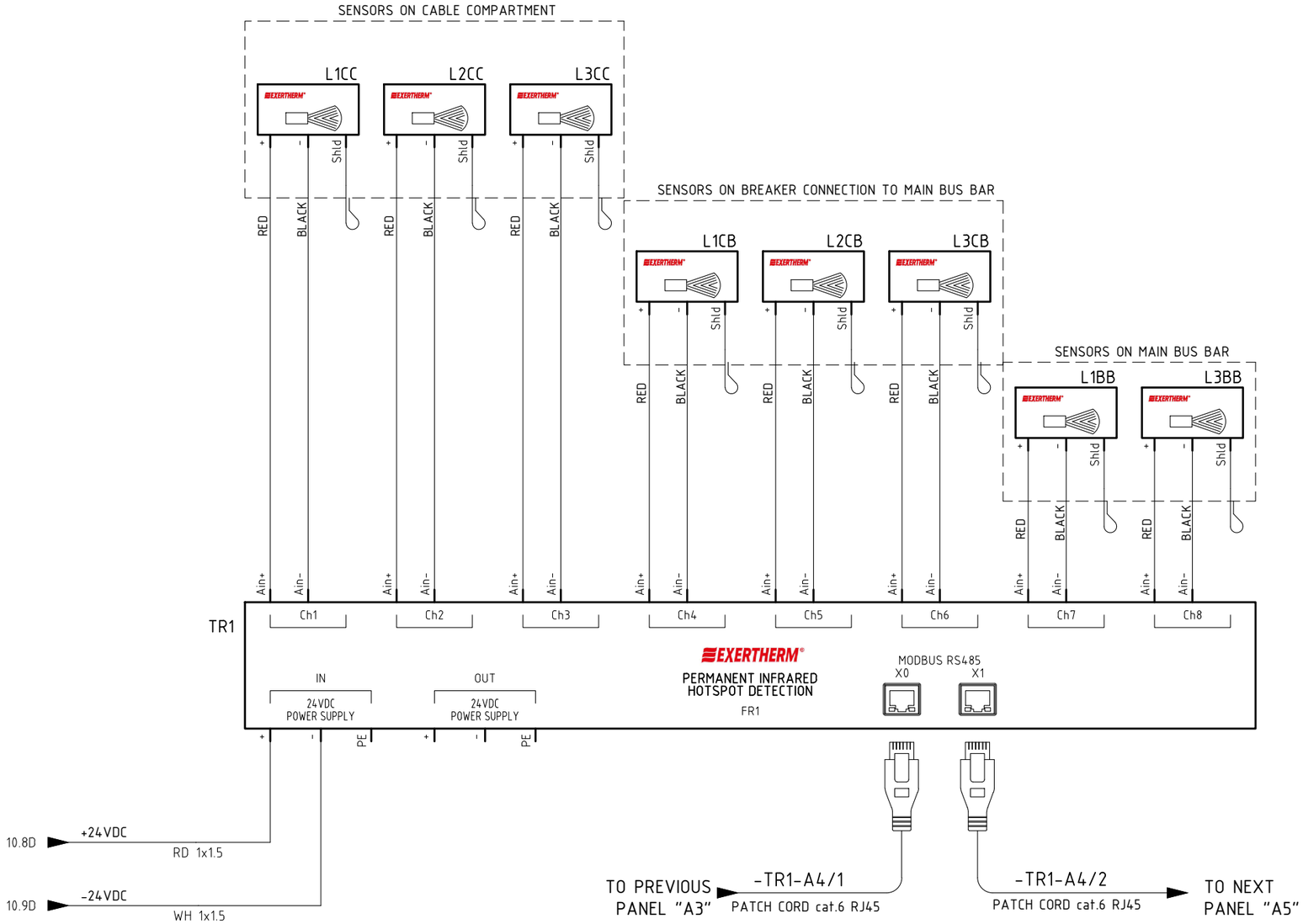
TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
"REX640"' Protection Wiring

CONTRACT NO./TITLE	SCALE :
CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK	NTS

	DRAWING NO.	SHEET	REV.
A3	1723002197-EL-DG-00021	1.7	03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03



REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

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+A4

DWG n° : 231151/SD/21

Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Extherm Device

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

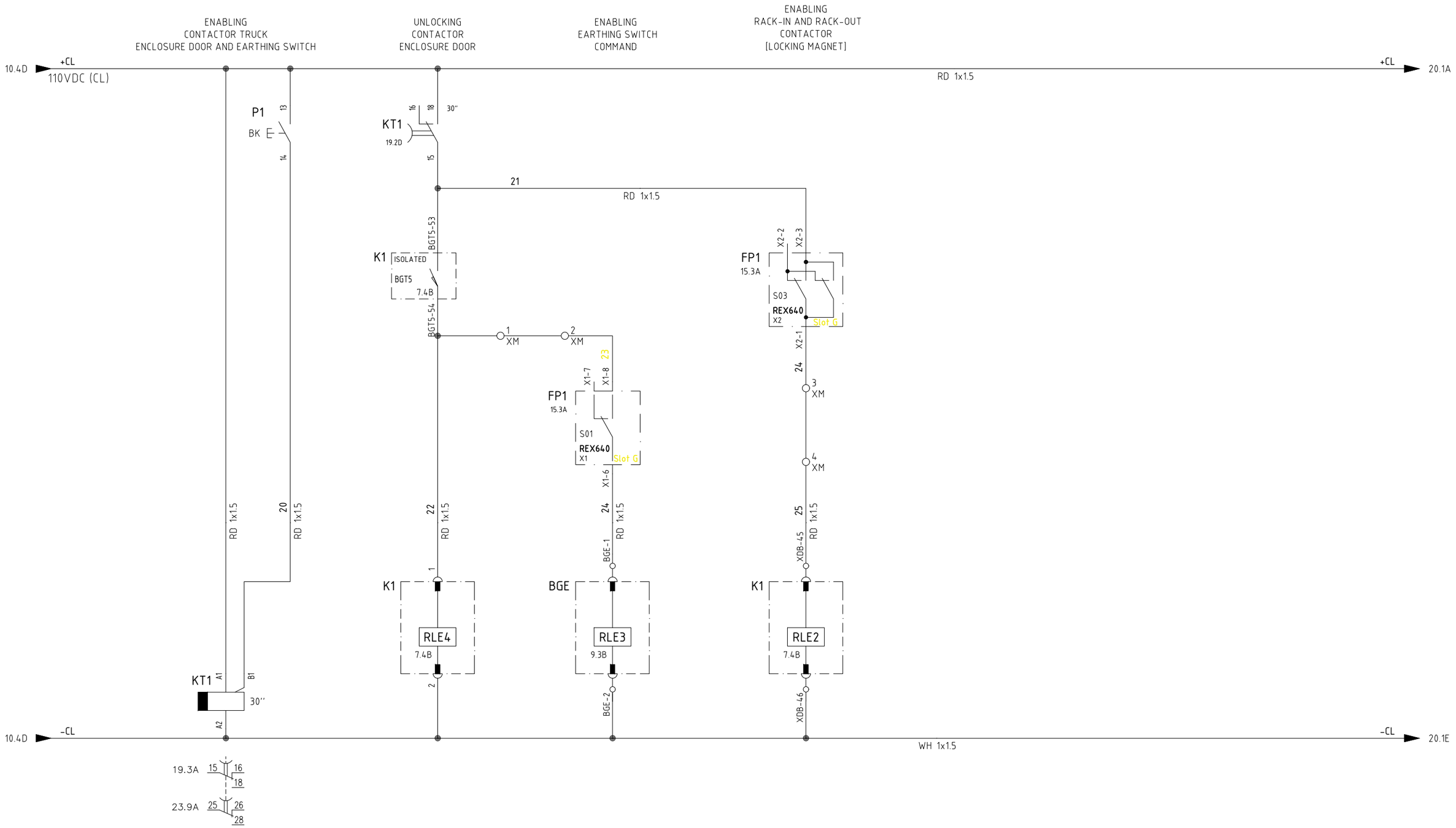
SHEET 18

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

COMMAND CIRCUITS



			3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
			2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
			1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
			0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
			REV.	DATE	DRN	CHKD	APPD	DESCRIPTION

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+A4

DWG n° : 231151/SD/21

Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Command Circuit

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

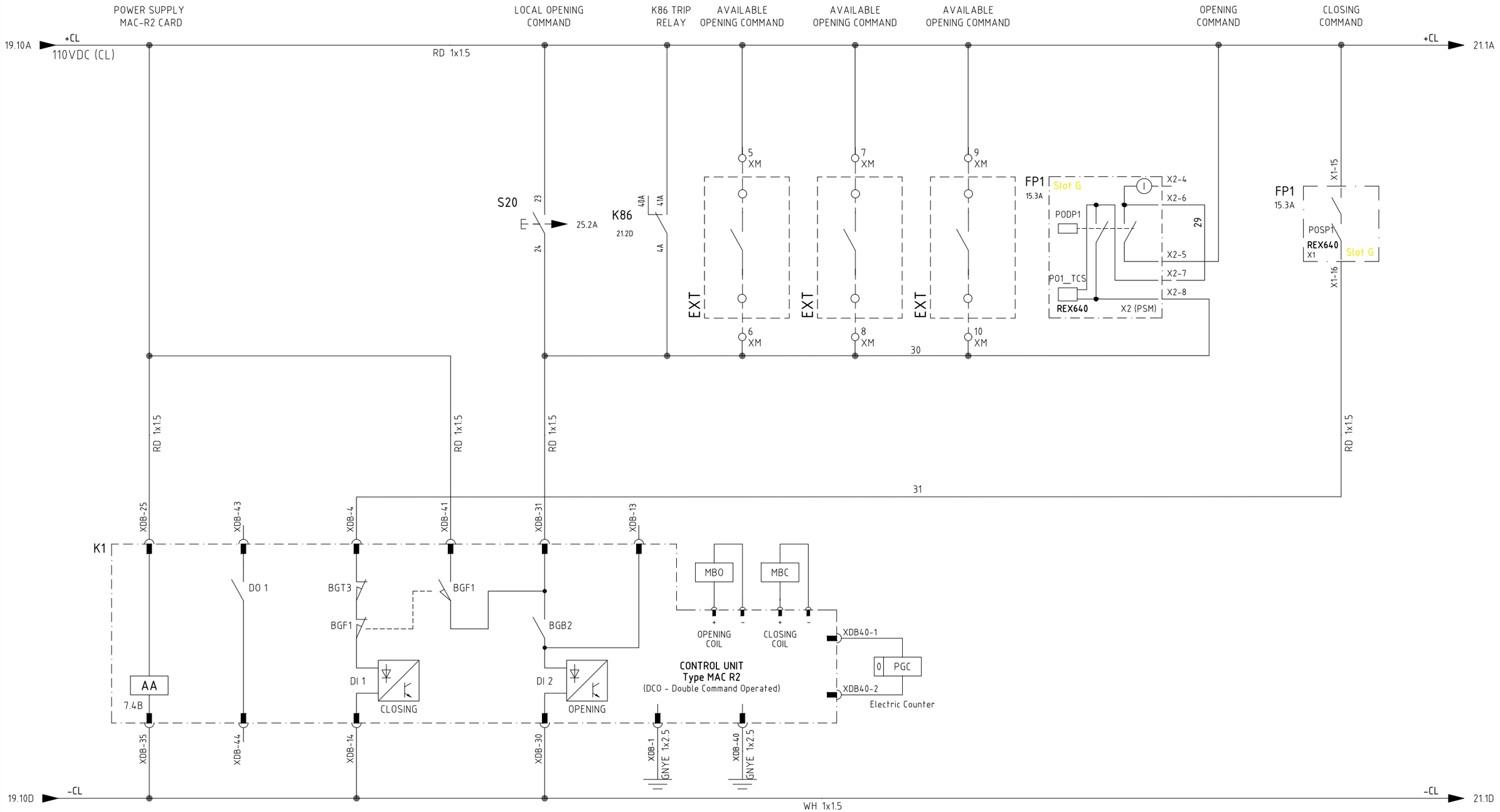
SHEET 1.9

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

CLOSING/OPENING COMMAND CIRCUITS



REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

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+A4

DWG n° : 231151/SD/21

Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
Command Circuit

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 20

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

COMMAND CIRCUITS

OUTPUT PROTECTION RELAY
AVAILABLE
AVAILABLE
TRANSFORMER TRIP BUCHHOLZ
TRANSFORMER TRIP OIL TEMPERATURE
TRANSFORMER TRIP PRESSURE RELAY
TRANSFORMER TRIP WINDING TEMPERATURE
LOCAL RESET
REMOTE RESET
TRIP LOCK-OUT RELAY
UNDERVOLTAGE
CONTACTOR ISOLATED

20.10A +CL 110VDC (OP)

RD 1x1.5

+CL 22.2A

FP1c 23.1C X2-4 S01 REX640 X2 Slot B X2-3

K94B 22.5D
K94OT 22.5D
K94P 22.6D
K94WT 22.7D

PR 21.7D X2 X1

FP1c 23.1C X2-10 S04 REX640 X1 Slot B X2-9

K86 21.2D 40B 41B 48

11 XM
13 XM
12 XM
14 XM
15 XM
16 XM

K1 BGT5-33 ISOLATED BGT5 7.4B BGT5-34

KIRF 22.4D 22 24 38 39 21

K86 21.2D 30B 31B 3B

35
36
37
40

RD 1x1.5

K86 B1 C S B2 C RESET 1

XDB-37
XDB-38

K1 DI 3 7.4B OPENING

PR 21.5A X1 X2

20.10E -CL

WH 1x1.5

-CL 22.1D

26.9B 2A 20A 21A 30A
3A 31A 40A
20.5B 4A 41A 10B
26.6B 1B 11B 20B
23.5A 2B 21B 30B
21.9B 3B 31B 40B
21.7B 4B 41B

KM-50-1

CROSSWIND

IMESA ELECTRICAL ENGINEERING

ROSETTI MARINO

= +A4

DWG n°: 231151/SD/21

Item n°: PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

TITLE :
SG-100D1 – FUNCTIONAL TRANSF FEEDER TR200DE1
Command Circuit

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

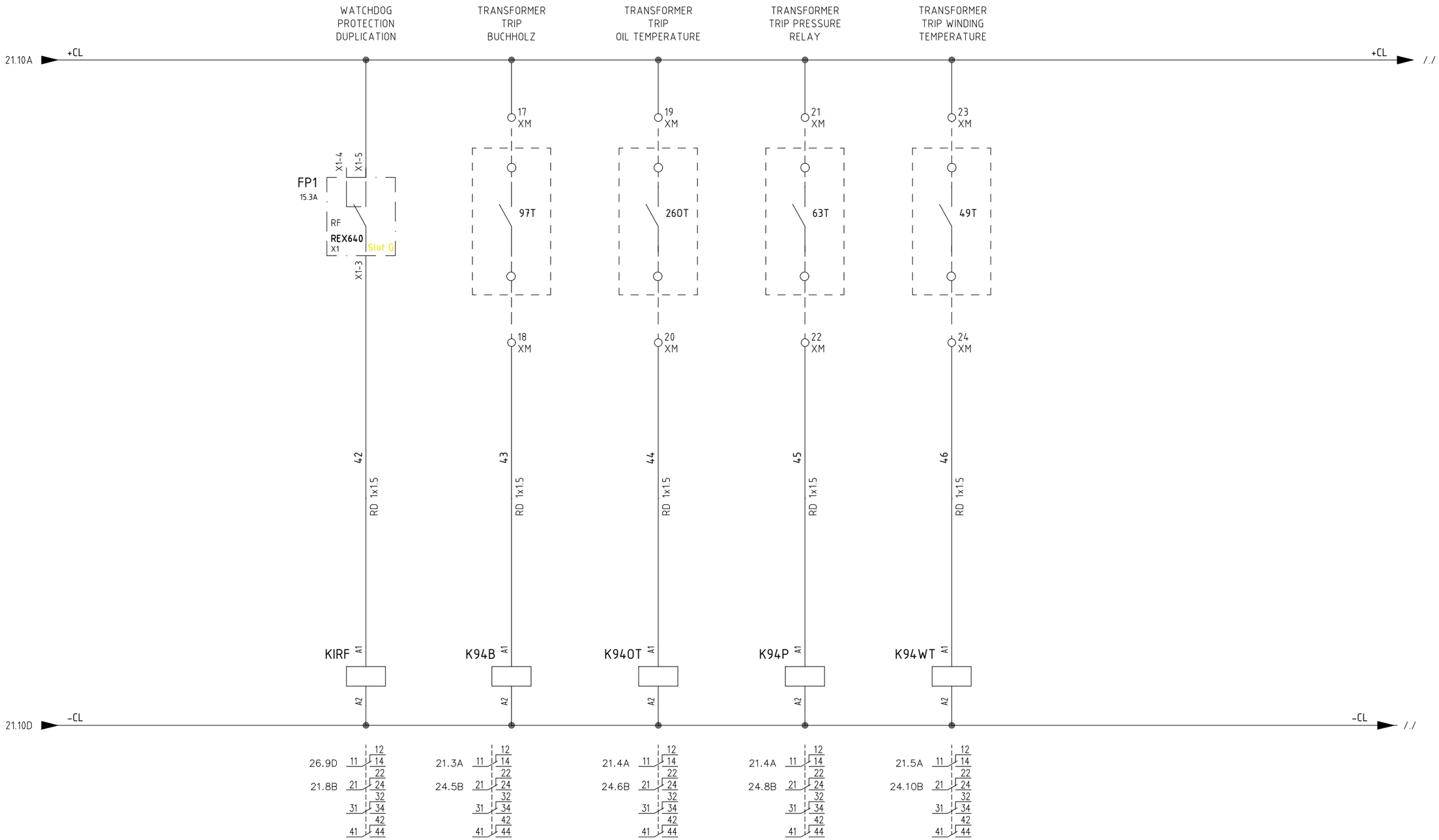
DRAWING NO. 1723002197-EL-DG-00021

SHEET 21

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03



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+A4							
DWG n° : 231151/SD/21	3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)	
Item n° : PF1113279	2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)	
	1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)	
	0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)	
	REV.	DATE	DRN	CHKD	APPD	DESCRIPTION	

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
Command Circuit

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 2.2 | REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

"REX640" PROTECTION WIRING - DIGITAL INPUT

CONTACTOR CLOSED | CONTACTOR OPENED | CONTACTOR SERVICE POSITION | CONTACTOR TEST POSITION | EARTH SWITCH OPENED | EARTH SWITCH CLOSED | K86 RELAY TRIPPED | CONTACTOR READY | FUSES TRIPPED | SELECTOR IN LOCAL POSITION | SELECTOR IN REMOTE POSITION | EXTERNAL CLOSING INTERLOCK | FROM L.V. SWBD CB OPENED (CLOSING INTERLOCK) | UNLOCKING EARHTING SWITCH/ TRUCK CONTACTOR

15.10A +PR 110VDC (PR) — RD 1x1.5 — +PR 24.1A

K1 BGB1/2 7.4B — XDB-11 / XDB-21 / XDB-22

K1 CONNECTED BGT4 7.4B — BGT4-51 / BGT4-52

K1 ISOALTED BGT5 7.4B — BGT5-23 / BGT5-24

BGE BGE 9.3B — BGE-11 / BGE-12

BGE BGE 9.3B — BGE-23 / BGE-24

K86 21.2D — 20B / 21B / 2B

K1 D01 7.4B — XDB-43 / XDB-44

K1 BGF2 7.4B — XDB-12 / XDB-48 / XDB-47

SA1 — 11 / 12

SA1 — 13 / 14

25 XM / 26 XM

L.V.SWITCHBOARD C.B. OPENED — 27 XM / 28 XM

KT1 19.2D — 26 / 28 / 30" / 25

RD 1x1.5	50	51	52	53	54	55	56	57	58	59	60	61	62	63
	X1-1	X1-2	X1-3	X1-5	X1-6	X1-7	X1-9	X1-10	X1-11	X1-13	X1-14	X1-15	X1-17	X2-1

FP1c — BIO1001 SLOT B — REX640

BI1 BI2 BI3 BI4 BI5 BI6 BI7 BI8 BI9 BI10 BI11 BI12 BI13 BI14

X1-4	X1-8	X1-12	X1-16	X1-18	X2-2								

15.10A -PR — WH 1x1.5 — -PR 24.1E

FP1c — BIO1001 SLOT B — REX640

	S01	S02	S03	S04	S05	S06	S07	S08
	X2-4	X2-6	X2-8	X2-10	X2-12	X2-14	X2-16	X2-18
	X2-3	X2-5	X2-7	X2-9	X2-11	X2-13	X2-15	X2-17
	21.1A	26.7D	26.8D	21.6A				

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+A4

DWG n° : 231151/SD/21
Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
"REX640" Protection Wiring - Digital Input

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 23 | REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

"REX640" PROTECTION WIRING - DIGITAL INPUT

EARTING SWITCH OPEN (FROM MEASURING UNIT) | CLOSED AUXILIARY CIRCUIT MCB's | CLOSED AUXILIARY V.T. SECONDARY MCB's | TRANSFORMER ALARM BUCHHOLZ | TRANSFORMER TRIP BUCHHOLZ | TRANSFORMER ALARM OIL TEMPERATURE | TRANSFORMER TRIP OIL TEMPERATURE | TRANSFORMER ALARM OIL LEVEL | TRANSFORMER OIL LEVEL VERY LOW ALARM | TRANSFORMER TRIP OIL PRESSURE | TRANSFORMER ALARM WINDING TEMPERATURE | TRANSFORMER TRIP WINDING TEMPERATURE

23.10A +PR 110VDC (PR) — RD 1x1.5 — +PR 25.1A

QD2 10.4B — QV5 14.2B — QD4 10.8B — QV4 13.2C

25 XC — 33 XC — BGE — 34 XC — 26 XC

29 XM — 97T — 30 XM

K94B 22.5D — 31 XM — 260T — 32 XM

K94OT 22.5D — 33 XM — 710T — 34 XM

35 XM — 710T_1 — 36 XM

K94P 22.6D — 37 XM — 49T — 38 XM

K94WT 22.7D

68 RD 1x1.5 — 69 RD 1x1.5 — 70 RD 1x1.5 — 71 RD 1x1.5 — 72 RD 1x1.5 — 73 RD 1x1.5 — 74 RD 1x1.5 — 75 RD 1x1.5 — 76 RD 1x1.5 — 77 RD 1x1.5 — 78 RD 1x1.5 — 79 RD 1x1.5 — 80 RD 1x1.5 — 81 RD 1x1.5

97801 — 97802 — 97803 — 97804

FP1d BIO1001 SLOT C — ABB REX640

X1-1 X1-2 X1-3 X1-5 X1-6 X1-7 X1-9 X1-10 X1-11 X1-13 X1-14 X1-15 X1-17 X2-1

BI1 BI2 BI3 BI4 BI5 BI6 BI7 BI8 BI9 BI10 BI11 BI12 BI13 BI14

X1-4 X1-8 X1-12 X1-16 X1-18 X2-2

23.10D -PR — WH 1x1.5 — -PR 25.1D

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+A4
DWG n° : 231151/SD/21
Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND — ROSETTI MARINO

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)
1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)
0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
"REX640" Protection Wiring - Digital Input

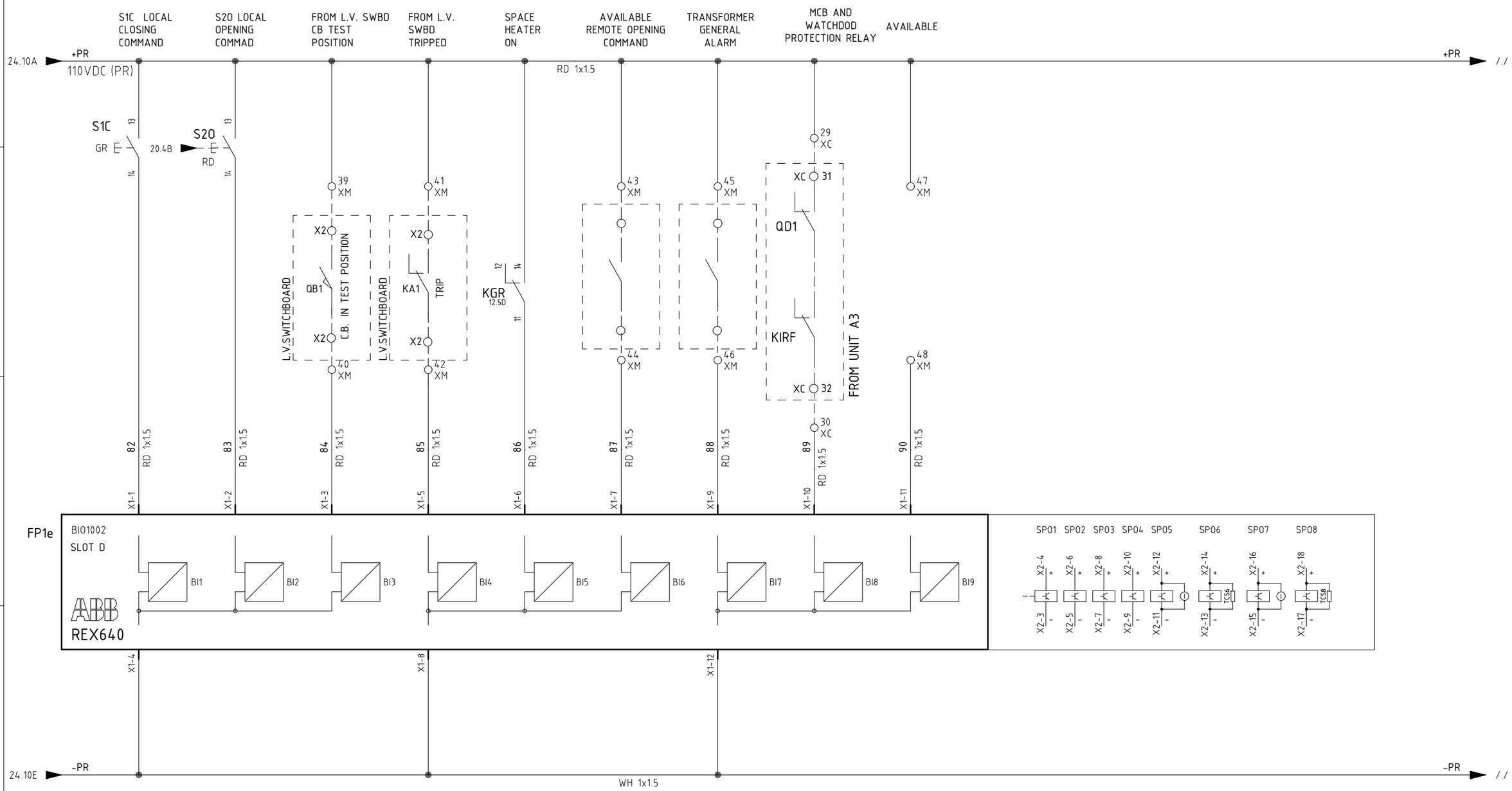
CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 24 | REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

"REX640" PROTECTION WIRING - DIGITAL INPUT



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DWG n° : 231151/SD/21	3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)	
Item n° : PF1113279	2	26/06/2024	Giulietti	Flamminio	Sigismondi	Accepted for Construction (AFC)	
	1	14/05/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)	
	0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)	
	REV.	DATE	DRN	CHKD	APPD	DESCRIPTION	

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1
"REX640" Protection Wiring - Digital Input

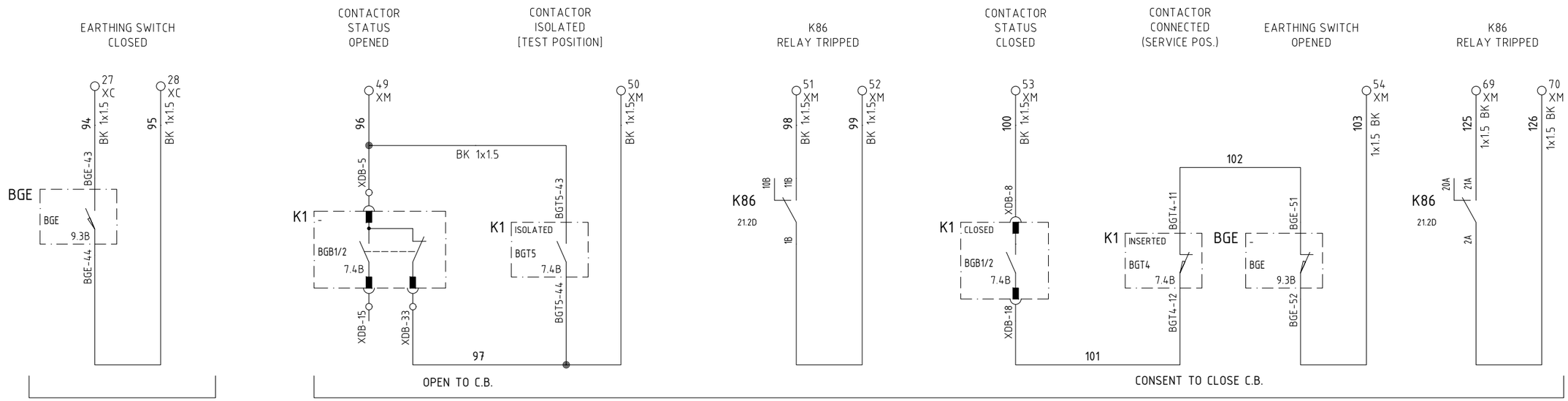
CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK | SCALE : NTS

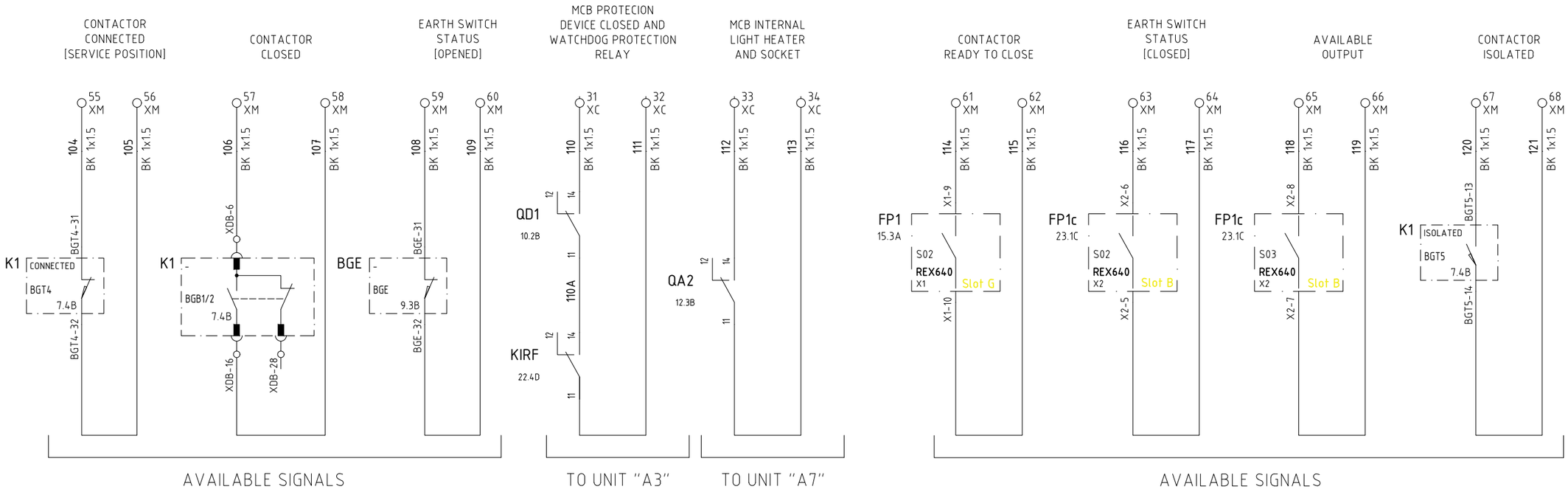
A3 | DRAWING NO. 1723002197-EL-DG-00021 | SHEET 25 | REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

AVAILABLE SIGNALS





REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
3	08/08/2024	Giulietti	Flamminio	Sigismondi	As-Built (ASB)
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0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

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DWG n° : 231151/SD/21
Item n° : PF1113279

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Availables Signals

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 2.6

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

TYP - TR200DE1

XI

Ammeter Terminals

NumM	Fg.	Sez.	Tipo	Costruttore	Descrizione
1	9.5C	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
2	9.5C	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
3	9.5C	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
			HB201GR	Cabur	HSCB.6/PT/GR End section - Grey
4	8.4A	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
5	8.4B	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
6	8.4B	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
7	8.4B	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
8	8.4B	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
			HB201GR	Cabur	HSCB.6/PT/GR End section - Grey
9	9.5D	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
10	9.5D	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
11	9.5D	6	HB220GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type
			HB201GR	Cabur	HSCB.6/PT/GR End section - Grey

TYP - TR200DE1

XV

Voltmetric Terminals

NumM	Fg.	Sez.	Tipo	Costruttore	Descrizione
1	13.4C	6	HB210GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type
2	13.4B	6	HB210GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type
3	13.4B	6	HB210GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type
4	13.4B	6	HB210GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type
			HB201GR	Cabur	HSCB.6/PT/GR End section - Grey
5	14.4B	6	HB210GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type
6	14.4B	6	HB210GR	Cabur	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type
			HB201GR	Cabur	HSCB.6/PT/GR End section - Grey

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DWG n° : 231151/SD/21

Item n° : PF1113279

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TITLE :

SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Terminal stripes

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 27

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

TYP - TR200DE1

XC

Interconnection Terminals

NumM	Fg.	Sez.	Tipo	Costruttore	Descrizione
1	10.1B	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
2	10.1C	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
3	10.1B	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
4	10.1C	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
			HM251GR	Cabur	HMT.4/PT/GR End section - Grey
5	10.7B	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
6	10.7C	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
7	10.7B	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
8	10.7C	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
			HM251GR	Cabur	HMT.4/PT/GR End section - Grey
9	12.1A	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
10	12.1B	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
11	12.2A	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
12	12.2B	6	HM320GR	Cabur	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)
			HM251GR	Cabur	HMT.4/PT/GR End section - Grey
13	13.1B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
14	13.1C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
15	13.1B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
16	13.1C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
17	13.1B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
18	13.1C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
19	13.2B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
20	13.2C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
			HM321GR	Cabur	HMT.6/PT/GR End section - Grey
21	14.1B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
22	14.1C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
23	14.1B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
24	14.1C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
			HM321GR	Cabur	HMT.6/PT/GR End section - Grey
25	24.3A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
26	24.3B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
27	26.2A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
28	26.2A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
29	25.6A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
30	25.6C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
31	26.4C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
32	26.4C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
33	26.5C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
34	26.5C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
			HM321GR	Cabur	HMT.6/PT/GR End section - Grey

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DWG n° : 231151/SD/21

Item n° : PF1113279

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CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Terminal stripes

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 28

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

TYP - TR200DE1

XM

Interface Terminals

NumM	Fg.	Sez.	Tipo	Costruttore	Descrizione
1	19.4B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
2	19.4B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
3	19.6C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
4	19.6C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
5	20.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
6	20.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
7	20.6B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
8	20.6B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
9	20.7B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
10	20.7B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
11	21.2A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
12	21.2B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
13	21.3A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
14	21.3B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
15	21.8A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
16	21.8B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
17	22.5A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
18	22.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
19	22.5A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
20	22.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
21	22.6A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
22	22.6B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
23	22.7A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
24	22.7B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
25	23.8A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
26	23.8B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
27	23.9A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
28	23.9B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
29	24.5A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
30	24.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
31	24.6A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
32	24.6B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
33	24.7A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
34	24.7B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
35	24.8A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
36	24.8B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
37	24.9A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
38	24.9B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
39	25.3B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
40	25.3B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
41	25.3B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type

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DWG n° : 231151/SD/21

Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
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TITLE :

SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Terminal stripes

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 29

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

TYP - TR200DE1

XM

Interface Terminals

NumM	Fg.	Sez.	Tipo	Costruttore	Descrizione
42	25.3B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
43	25.4B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
44	25.4B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
45	25.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
46	25.5B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
47	25.6B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
48	25.6B	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
49	26.3A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
50	26.5A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
51	26.6A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
52	26.6A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
53	26.7A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
54	26.9A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
55	26.1C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
56	26.2C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
57	26.2C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
58	26.3C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
59	26.3C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
60	26.3C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
61	26.6C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
62	26.7C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
63	26.7C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
64	26.8C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
65	26.8C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
66	26.8C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
67	26.9C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
68	26.9C	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
69	26.9A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
70	26.10A	4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
71		4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
72		4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
73		4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
74		4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
75		4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
76		4	HM250GR	Cabur	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type
			HM251GR	Cabur	HMT.4/PT/GR End section - Grey

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DWG n° : 231151/SD/21

Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
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0	04/04/2024	Giulietti	Flamminio	Sigismondi	Issued for review (IFR)

IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :

SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Terminal stripes

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 30

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

Nome/Item	Fg/Sh	Tipo/Type	Q.tà	Descrizione/Description	Costruttore/Manufacturer	Ubicazione (descrizione)	Quadro (descrizione)
BB	7	1VCF698000R0012	1	OPTICAL FIBER CABLE PRE-MANUFACT. LENS L=5M	ABB	A4	TRANSFORMER FEEDER TR-200DE1
BGE	9	1VCF599700R0131	1	EARTHING SWITCH ST-E 17.31 150	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599505R0001	1	5 AUX CONTACTS FOR EARTHING SWITCH	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599504R0063	1	KEY LOCKS ON EARTHING SWITCH	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599700R0290	1	EARTHING SWITCH OPERATING LEVER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
C1	9	43931118	1	VPIS 3,3÷36KV - DEVICE SIGNALLING VOLTAGE PRESENT KIT	ELECTRONSYSTEM	A4	TRANSFORMER FEEDER TR-200DE1
CB	7	1VCF698000R0012	1	OPTICAL FIBER CABLE PRE-MANUFACT. LENS L=5M	ABB	A4	TRANSFORMER FEEDER TR-200DE1
CC	9	1VCF698000R0012	1	OPTICAL FIBER CABLE PRE-MANUFACT. LENS L=5M	ABB	A4	TRANSFORMER FEEDER TR-200DE1
E1	12	74041	1	LED LAMP 4W 4000K 313x30x22	Beghelli	A4	TRANSFORMER FEEDER TR-200DE1
EH1	12	R1R150230	1	SPACE HEATER SKR 150W ALIM. 220VCA	Torresan	A4	TRANSFORMER FEEDER TR-200DE1
FP1	15	1VCF698331R0001	1	REX640B10NN+AIM1+AIM1+ARC1+BIO1+BIO1+BI+O2+CMP2+COM1+LNG1+MCT1+PCL4+PSM3+SCT	ABB	A4	TRANSFORMER FEEDER TR-200DE1
HGR	12	TRT-10A230V-NC	1	Regolable Thermostat -10÷80°C 1NC IP20 DIN Mounting	Fandis	A4	TRANSFORMER FEEDER TR-200DE1
K1	7	1VCF305661R3200	1	VACUUM CONTACTOR VSC7/P 3P 7,2KV 400A DOUBLE COMMAND (DCO)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309500R3881	1	VACUUM CONTACTOR FITTED FOR DIN E=442mm FUSES	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309500R0882	1	NAMEPLATE IN ENGLISH LANGUAGE	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309500R1881	1	VACUUM CONTACTOR FOR UNIGEAR/UNISEC	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309503R0881	1	MAC-R2 ELECTRONIC CONTROL MODULE TYPE STANDARD	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309503R1881	1	VACUUM CONTACTOR CONFORMS TO THE IRC 62271-106 STANDARDS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309588R0909	1	POWER SUPPLY VOLTAGE OF MAC-R2 ELECTRONIC CONTROL MODULE 110VDC	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309500R0100	1	OPERATIONS COUNTER FOR VSC/P VERSIONE FOR SHIPPINGS REGISTER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF349700R0407	1	MECHANICAL INTERLOCK WITH DOOR	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF339700R0291	1	POSITION CONTACTS FOR VD4	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF339700R1909	1	LOCKING MAGNET ON THE TRUCK 110Vdc (RLE2)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309503R0251	1	KIT FOR FUSES DIAMETER 87mm	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF309500R0192	1	LIFTING TOOL FOR SHIPPINGS REGISTERS VERSION	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF597111R0140	1	POWER CUBE PB1/E L600 12kV 400A 31.5KA 3S	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599700R0882	1	NAMEPLATE IN ENGLISH LANGUAGE FOR POWERCUBE	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599700R5886	1	PB FOR VSC	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599700R4882	1	PAINTED DOOR	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599504R0042	1	LOCK TO PREVENT RACKING-IN WITH EARTHING SWITCH	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599700R0162	1	58 POLES CONNECTOR + ATOXIC WIRING L=0.8mt	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599505R0111	1	FAIL-SAFE SHUTTER ELEMENTS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF579700R0909	1	ELECTROMECHANICAL ISOLATING INTERLOCK CIRCUIT-BREAKER/DOOR 110Vdc (RLE4)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1VCF599700R0280	1	INTERLOCK FOR DOOR EARTHING SWITCH	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		1YMB760741M4811	1	FUSE LINK FOR MOTOR PROTECTION 7,2kV 250A 442x65mm - CMF	ABB	A4	TRANSFORMER FEEDER TR-200DE1
K86	21	RMBE13-C110T	1	BISTABLE RELAY 110VDC 7SC-5A TROP.	Amra	A4	TRANSFORMER FEEDER TR-200DE1
		PAVM321	1	SOCKET WITH SCREW TO RELAY TYPE PAVM321	Amra	A4	TRANSFORMER FEEDER TR-200DE1
K94B	22	ER 589 2	1	CR-M110DC4L SUPPLY 110VDC 4C/O 250V/6A LED	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 686 6	1	CR-M4SS SOCKET STANDARD X 2/4 C/O(CR-M)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 728 6	1	CR-MH1 METAL RETAINING JUMPER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
K94OT	22	ER 589 2	1	CR-M110DC4L SUPPLY 110VDC 4C/O 250V/6A LED	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 686 6	1	CR-M4SS SOCKET STANDARD X 2/4 C/O(CR-M)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 728 6	1	CR-MH1 METAL RETAINING JUMPER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
K94P	22	ER 589 2	1	CR-M110DC4L SUPPLY 110VDC 4C/O 250V/6A LED	ABB	A4	TRANSFORMER FEEDER TR-200DE1

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+A4

DWG n° : 231151/SD/21

Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
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IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Bill of Materials

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 31

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

Nome/Item	Fg/Sh	Tipo/Type	Q.tà	Descrizione/Description	Costruttore/Manufacturer	Ubicazione (descrizione)	Quadro (descrizione)
K94P	22	ER 686 6	1	CR-M4SS SOCKET STANDARD X 2/4 C/O(CR-M)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 728 6	1	CR-MH1 METAL RETAINING JUMPER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
K94WT	22	ER 589 2	1	CR-M110DC4L SUPPLY 110VDC 4C/O 250V/6A LED	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 686 6	1	CR-M4SS SOCKET STANDARD X 2/4 C/O(CR-M)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 728 6	1	CR-MH1 METAL RETAINING JUMPER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
KGR	12	ER 686 6	1	CR-M4SS SOCKET STANDARD X 2/4 C/O(CR-M)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 728 6	1	CR-MH1 METAL RETAINING JUMPER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 552 0	1	CR-M230AC2L SUPPLY 230VAC 2C/O 250V/6A LED	ABB	A4	TRANSFORMER FEEDER TR-200DE1
KIRF	22	ER 589 2	1	CR-M110DC4L SUPPLY 110VDC 4C/O 250V/6A LED	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 686 6	1	CR-M4SS SOCKET STANDARD X 2/4 C/O(CR-M)	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		ER 728 6	1	CR-MH1 METAL RETAINING JUMPER	ABB	A4	TRANSFORMER FEEDER TR-200DE1
KT1	19	H3DKM2ACDC24240	1	MULTIFUNCTION TIMER RELAY Vaux=24÷240Vac/dc - 2SC	Omron	A4	TRANSFORMER FEEDER TR-200DE1
L1C	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L1I	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L1MS	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L2C	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L2I	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L3C	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L3I	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
L3MS	18	801100	1	IR SENSOR 10m CABLE	EXERTHERM	A4	TRANSFORMER FEEDER TR-200DE1
LS	12	Z15GW2-1-1453270	1	MICROSWITCH 1sc	Omron	A4	TRANSFORMER FEEDER TR-200DE1
		APB-PG	1	COVER TO MICRO-SWITCH	Omron	A4	TRANSFORMER FEEDER TR-200DE1
OD1	9	990003	1	MEDIUM VOLTAGE DISCHARGE DMI-9-10-1-L Ur=9kV	DEHN	A4	TRANSFORMER FEEDER TR-200DE1
OD2	9	990003	1	MEDIUM VOLTAGE DISCHARGE DMI-9-10-1-L Ur=9kV	DEHN	A4	TRANSFORMER FEEDER TR-200DE1
OD3	9	990003	1	MEDIUM VOLTAGE DISCHARGE DMI-9-10-1-L Ur=9kV	DEHN	A4	TRANSFORMER FEEDER TR-200DE1
P1	19	KW 080 2	1	MP1-10B BLACK PUSH BUTTON UNSTABLE	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 569 7	1	MCBH-00 FIXING SUPPORT 3 CONTACTS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 570 5	1	MCB-10 CONTACT NO FOR PUSHBUTTONS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
PR	21	KW 101 6	1	YELLOW LIGHT PUSH BUTTON	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		KV 022 5	1	MLBL-05W YELLOW LED BLOCK INTEGRATED 110÷130VAC	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 569 7	1	MCBH-00 FIXING SUPPORT 3 CONTACTS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 570 5	1	MCB-10 CONTACT NO FOR PUSHBUTTONS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
QA2	12	B427917	1	DDA202 AC 25A 300MA BLOCCO DIFFERENZIALE 2P	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		A563819	1	S2-CS/H6R CONTATTO DI SEGNALAZIONE/AUX 1SC	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		S550284	1	S202M C10 INTERRUTTORE AUTOMATICO 10KA 2P	ABB	A4	TRANSFORMER FEEDER TR-200DE1
QD1	10	A563819	1	S2-CS/H6R CONTATTO DI SEGNALAZIONE/AUX 1SC	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		S550253	1	S202M C 4 INTERRUTTORE AUTOMATICO 10KA 2P	ABB	A4	TRANSFORMER FEEDER TR-200DE1
QD2	10	S550253	1	S202M C 4 AUTOMATIC CIRCUIT-BREAKER 10KA 2P	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		A563819	1	S2-CS/H6R AUXILIARY STATE CONTACT 1CO	ABB	A4	TRANSFORMER FEEDER TR-200DE1
QD4	10	A563819	1	S2-CS/H6R AUXILIARY STATE CONTACT 1CO	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		S550239	1	S202M C 2 AUTOMATIC CIRCUIT BREAKER 10KA 2P	ABB	A4	TRANSFORMER FEEDER TR-200DE1
QV4	13	S550680	1	S204M C 2 AUTOMATIC CIRCUIT-BREAKER 10KA 4P	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		A563819	1	S2-CS/H6R AUXILIARY STATE CONTACT 1CO	ABB	A4	TRANSFORMER FEEDER TR-200DE1
QV5	14	S550239	1	S202M C 2 AUTOMATIC CIRCUIT BREAKER 10KA 2P	ABB	A4	TRANSFORMER FEEDER TR-200DE1

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DWG n° : 231151/SD/21

Item n° : PF1113279

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IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Bill of Materials

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 32

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03

Nome/Item	Fg/Sh	Tipo/Type	Q.tà	Descrizione/Description	Costruttore/Manufacturer	Ubicazione (descrizione)	Quadro (descrizione)
QV5	14	A563819	1	S2-CS/H6R AUXILIARY STATE CONTACT 1CO	ABB	A4	TRANSFORMER FEEDER TR-200DE1
S1C	25	EO 569 7	1	MCBH-00 FIXING SUPPORT 3 CONTACTS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 570 5	1	MCB-10 CONTACT NO FOR PUSHBUTTONS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		KW 076 0	1	MP1-10G PUSH BUTTON GREEN WITH BLACK RING	ABB	A4	TRANSFORMER FEEDER TR-200DE1
S2O	25	EO 569 7	1	MCBH-00 FIXING SUPPORT 3 CONTACTS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 570 5	1	MCB-10 CONTACT NO FOR PUSHBUTTONS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		KW 075 2	1	MP1-10R PUSH BUTTON RED WITH BLACK RING	ABB	A4	TRANSFORMER FEEDER TR-200DE1
SA1	23	EO 569 7	1	MCBH-00 FIXING SUPPORT 3 CONTACTS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 571 3	1	MCB-01 CONTACT NC FOR PUSHBUTTOM	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		EO 570 5	1	MCB-10 CONTACT NO FOR PUSHBUTTONS	ABB	A4	TRANSFORMER FEEDER TR-200DE1
		KW 329 3	1	M2SS2-10B HANDLE SELECTOR 2P 90° BLACK RING BLACK	ABB	A4	TRANSFORMER FEEDER TR-200DE1
TI-L1	8	ATB-10-BS__015	1	CURRENT TRANSFORMER 7,2kV 50Hz 200/1A cl.0,5-5P20 (5VA)- 25kA	ESITAS	A4	TRANSFORMER FEEDER TR-200DE1
TI-L2	8	ATB-10-BS__015	1	CURRENT TRANSFORMER 7,2kV 50Hz 200/1A cl.0,5-5P20 (5VA)- 25kA	ESITAS	A4	TRANSFORMER FEEDER TR-200DE1
TI-L3	8	ATB-10-BS__015	1	CURRENT TRANSFORMER 7,2kV 50Hz 200/1A cl.0,5-5P20 (5VA)- 25kA	ESITAS	A4	TRANSFORMER FEEDER TR-200DE1
TO	9	KAP-150/250-55	1	CURRENT TRANSFORMER 0,72/3/-kV 100/1 50Hz	ESITAS	A4	TRANSFORMER FEEDER TR-200DE1
TR1	18	800208	1	MODBUS DATACARD 8 CHANNELS	Exertherm	A4	TRANSFORMER FEEDER TR-200DE1
XC		HM320GR	12	HMM.6/GR Feed-through Terminal Block - Grey (6 mmq)	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
		HM250GR	22	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
		HM251GR	3	HMT.4/PT/GR End section - Grey	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
		HM321GR	3	HMT.6/PT/GR End section - Grey	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
XI		HB220GR	11	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - spring type	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
		HB201GR	3	HSCB.6/PT/GR End section - Grey	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
XM		HM250GR	76	HMM.4/GR Feed-through Terminal Block - Grey (4 mmq) - spring type	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
		HM251GR	1	HMT.4/PT/GR End section - Grey	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
XS1	12	E 9447 7	1	SOCKET	ABB	A4	TRANSFORMER FEEDER TR-200DE1
XV		HB210GR	6	HSCB.6/GR Disconnect by slide link Terminal Block - Grey (6 mmq) - Spring type	Cabur	A4	TRANSFORMER FEEDER TR-200DE1
		HB201GR	2	HSCB.6/PT/GR End section - Grey	Cabur	A4	TRANSFORMER FEEDER TR-200DE1

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DWG n° : 231151/SD/21

Item n° : PF1113279

REV.	DATE	DRN	CHKD	APPD	DESCRIPTION
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IMESA ELECTRICAL ENGINEERING

CROSSWIND

ROSETTI MARINO

TITLE :
SG-100D1 - FUNCTIONAL TRANSF FEEDER TR200DE1

Bill of Materials

CONTRACT NO./TITLE CW-I-WP4-2023-05/HOLLANDSE KUST NOORD WIND PARK

SCALE : NTS

A3

DRAWING NO. 1723002197-EL-DG-00021

SHEET 3.3

REV. 03

F.to UNI A3: 420mmx297mm

File Name : 1723002197-EL-DG-00021 Rev.03