



Schematic line diagram notes:

Distribution Board Name	DATA CENTRE - MAIN DB	Colour UPS Section	N/A
Cascading	Yes	Colour Door	ORANGE
Equipment Spare Space	20%	Material and Thickness	1.2mm Mild Steel
Unequipped Space	20%	Maximum Dimensions (WxHxD)	
Form Factor		IP Level Doors Closed	20
Form		Labels	Traffolyte
Switchgear Manufacturer		To be Manufactured	Panel Manufacturer
Switchgear Standards	SABS, IEC60989-1, IEC 60947	Shop Drawings Required	Yes
Panel Standards	SANS 1973, SANS 81439	Spare Ways For BMS	
Balancing of Phases	By Contractor	Cable Entry	Top and Bottom Entry
Colour Normal Section	ORANGE		
Colour Standby Section	N/A		

SYMBOLS FOR LINE DIAGRAMS			
	SWITCH GENERAL SYMBOL		TIME SWITCH
	CIRCUIT BREAKER		AMMETER
	ISOLATOR		VOLTMETER
	BYPASS SWITCH, LOCATED INSIDE DB (MUST BE A SWITCH, NOT A CIRCUIT BREAKER)		MOTOR
	LIGHT SWITCH INSTALLED AS SHOWN ON RELEVANT LIGHTING LAYOUT DRAWING		BUILDING MANAGEMENT SYSTEM
	POTENTIAL FREE RELAY CONTACT CONTROLLER BY BMS (MODBUS)		GENERATOR
	FUSE		CURRENT TRANSFORMER
	FUSE SWITCH		TRANSFORMER
	FUSE DISCONNECTOR		SURGE ARRESTOR
	CONTACTOR OR RELAY		REMOTE OCCUPANCY SENSOR
	WITHDRAWABLE CIRCUIT BREAKER		BUS COUPLER
	EARTH LEAKAGE		DAY NIGHT SWITCH
	EARTH LEAKAGE RELAY WITH OVERLOAD PROTECTION		DALI CONTROLLER FOR LIGHTING
	OPERATING DEVICE (LPS)		MODBUS TO TCP/IP GATEWAY FOR BMS COMMUNICATION
	ACTUATOR WITH KKK MODULE		ENERGY METER, MODBUS
	24V POWER SUPPLY FOR BMS		INPUT / OUTPUT MODULE FOR BMS

Revision Number	Revision Date	Revision Description
01	2022-02-18	Issue for tender

CLIENT:



Mr. Abongile Gobeni
CSIR

CONSULTANTS:

ELECTRICAL ENGINEERING SERVICES
PLP Consulting Engineers



Mr. Victor Sambokwe
ECSA Membership number- 200770044
PLP Consulting Engineers

PROJECT:
CSIR: BUILDING 9
DATA CENTER
Elec: DB layout

DESCRIPTION:
DATA CENTER MAIN
DISTRIBUTION BOARD

SCALE: 1:100	DRAWING NO: P181-TD-101
DRAWING DATE: 2022-02-18	REVISION NO: 0
DRAWN: LC	CHECKED: VS
	PLOT DATE: