

GRID SIZE = 100x100mm

- A1 MAIN SWITCHBOARD
- B1 SUB BOARD FOR MOTOR CONTROL
- B2 TRAFFIC LIGHT (INSIDE GARAGE)
- B3 TRAFFIC LIGHT (OUTSIDE GARAGE)

- H1 LIGHT 1
- H2 LIGHT 2
- H3 LIGHT 3
- H4 LIGHT 4

- S1 TWO WAY OR INTERMEDIATE SWITCH
- S2 TWO WAY OR INTERMEDIATE SWITCH
- S3 TWO WAY OR INTERMEDIATE SWITCH
- S4 TWO WAY OR INTERMEDIATE SWITCH
- S5 KNX SWITCH (JUNG)
- S6 ROOM CONTROLLER (JUNG)
- S7 ROOM CONTROLLER (ABB)
- S8 2-GANG SWITCH (WITH FUSE)

- P1 SOCKET (HEATER)
- P2 SOCKET (AIR CONDITION)

- O1 SOCKET OUTLET 1
- O2 SOCKET OUTLET 2
- O3 SOCKET OUTLET 3
- O4 SOCKET OUTLET 4
- O5 SOCKET OUTLET 5

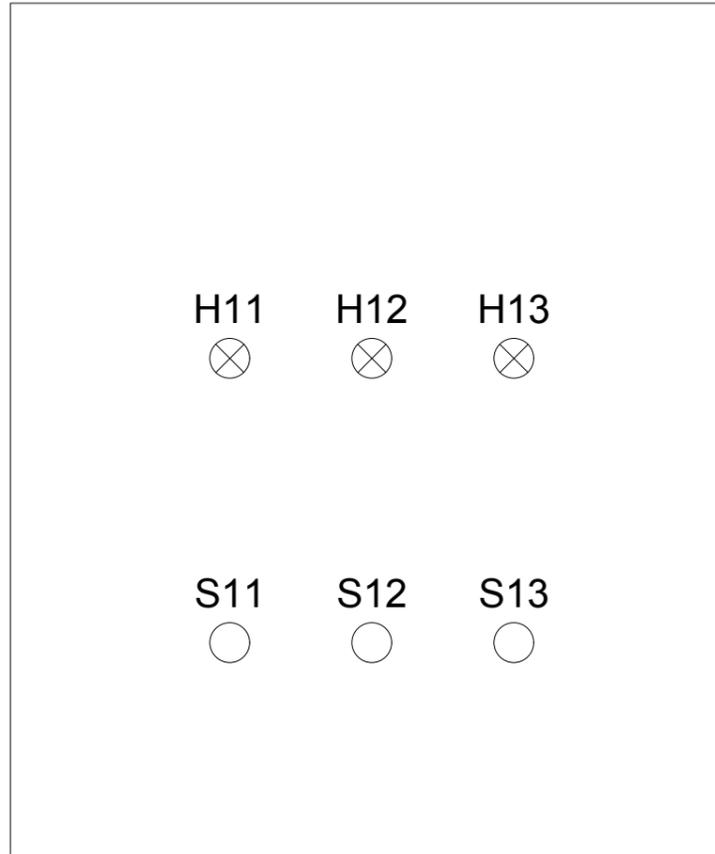
- PS POWER SUPPLY INLET
- M1 MOTOR 1

- MESH TRAY
100x60
- TRUNKING
100x60
- MINI TRUNKING
16x25mm
- FLEXIBLE PVC CONDUIT
20mm
- PVC CONDUIT
20mm
- CABLE
H x W

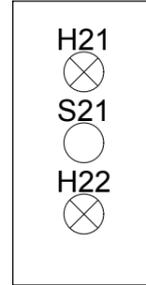
Test Project for the 45th WorldSkills
Competition in Kazan, Russia 2019.
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Skill: Electrical Installations 18				
Scale: 1/20 A3	Date: 11.03.2019	Paper: A3		
Drawn / Design by: SCM			Drawing No: WSC2019_TPM1_18_I-&P_L	
Description: INSTALLATION AND PROGRAMMING			Rev: 22.08.2019	Page: 1/3
LAYOUT				

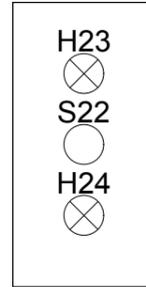
B1 (FRONT)



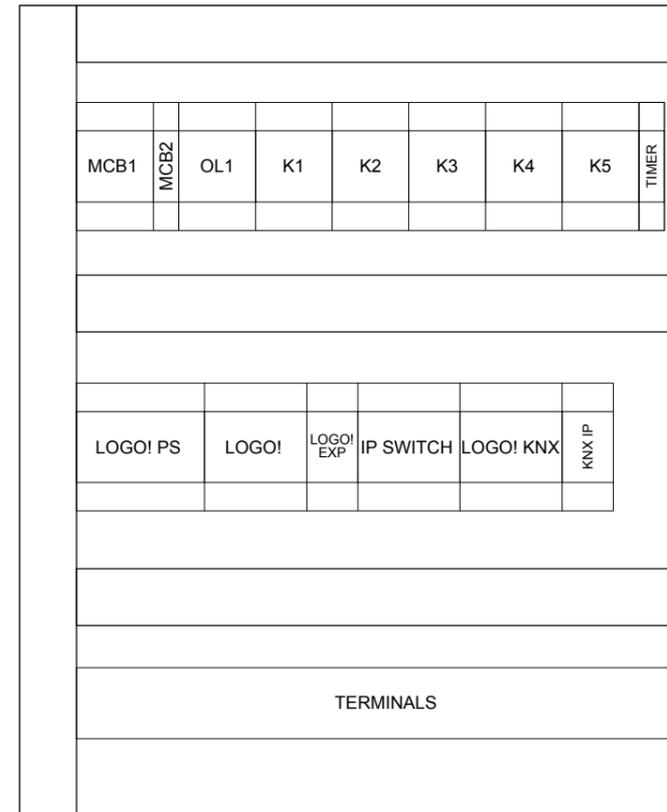
B2



B3



B1 (MOUNTING PLATE)



- S11 PUSH BUTTON (GREEN) CALL FOR OPENING GATE (FORWARD)
- S12 EMERGENCY STOP PUSHBUTTON
- S13 PUSH BUTTON (GREEN) CALL FOR CLOSING GATE (REVERSE)
- S21 PUSHBUTTON (WHITE) CALL FOR DRIVE ACKNOWLEDGEMENT (OUT)
- S22 PUSHBUTTON (WHITE) CALL FOR DRIVE ACKNOWLEDGEMENT (IN)
- S23 BACKWARD IN AUTO MODE (LOGO! INPUT)
- H11 INDICATION LIGHT (GREEN) GATE OPENING (FORWARD)
- H12 INDICATION LIGHT (RED) MOTOR OVERLOAD TRIPPED
- H13 INDICATION LIGHT (GREEN) GATE CLOSING (REVERSE)
- H21 INDICATION LIGHT (RED) NO DRIVE ACKNOWLEDGEMENT (OUT)
- H22 INDICATION LIGHT (GREEN) DRIVE ACKNOWLEDGEMENT (OUT)
- H23 INDICATION LIGHT (RED) NO DRIVE ACKNOWLEDGEMENT (IN)
- H24 INDICATION LIGHT (GREEN) DRIVE ACKNOWLEDGEMENT (IN)

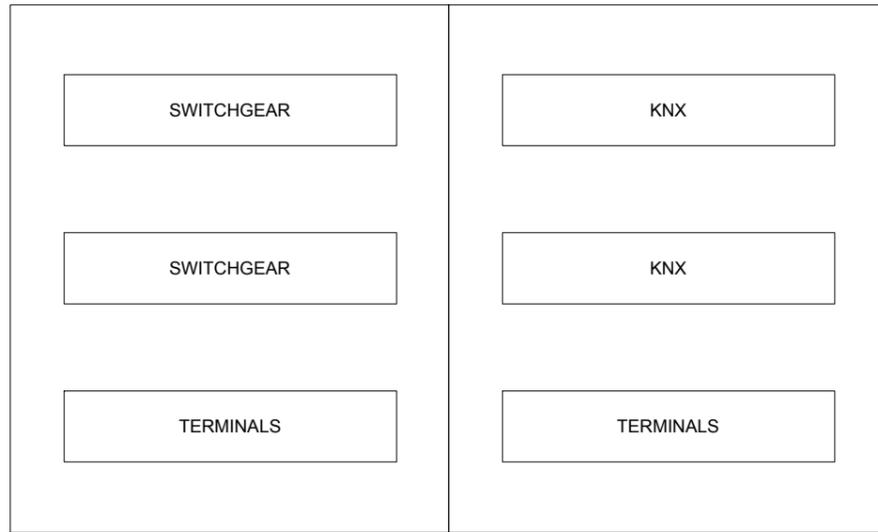
- MCB1 MAIN SWITCH
- MCB2 FEED CONTROL CIRCUIT IN B1
- OL1 MOTOR OVERLOAD PROTECTION
- K1-5 CONTACTORS FOR STAR/DELTA-FORWARD/REVERSE GATE
- TIMER TIMER RELAY STAR/DELTA
- LOGO! PS LOGO! POWER SUPPLY
- LOGO! LOGO! MAIN UNIT WITH DISPLAY
- LOGO! EXP LOGO! EXPANSION MODULE
- IP SWITCH IP SWITCH
- LOGO! KNX LOGO! / KNX GATEWAY
- KNX IP KNX / IP ROUTER

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A1



MCB: MINIMUM CABLE SIZE:
 6A >0,75 MM2
 10A >1,00 MM2
 16A >1,50 MM2
 =>20A >2,50 MM2

MAIN SWITCH MUST ISOLATE ALL CIRCUITS
 RCD OR RCBO MUST AT LEAST PROTECT ALL OUTLET CIRCUITS
 FREE POSITIONING OF DEVICES IN A1 IN SPECIFIED AREAS.

FEED BETWEEN SWITHBOARDS 2.5 MM2 REGARDLESS PROTECTION.
 FEED TO HEATER 2,5 MM2 REGARDLESS PROTECTION

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LAYOUT					