AMTEK
STRUCTURAL STEEL ROBOTIC AUTOMATION

Instructions for installing an automated steel lifting and conveying system

HUY: 714-325-8762

NGOC: 714-728-9287

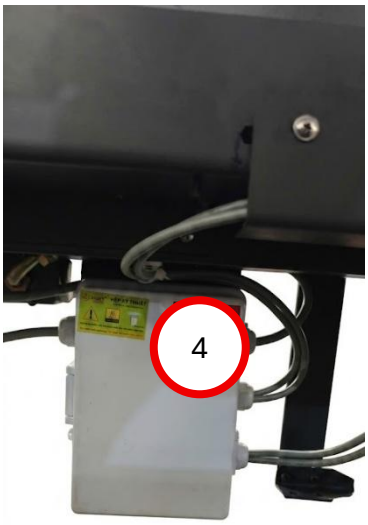
THANH: 714-366-9957

List

1. Identify the device

1.1 Electrical equipment of the steel lifting/handling system.

1. Main control panel
2. Operator control pedestal
3. cable trunking
4. Junction box at the lifting equipment
5. Wire

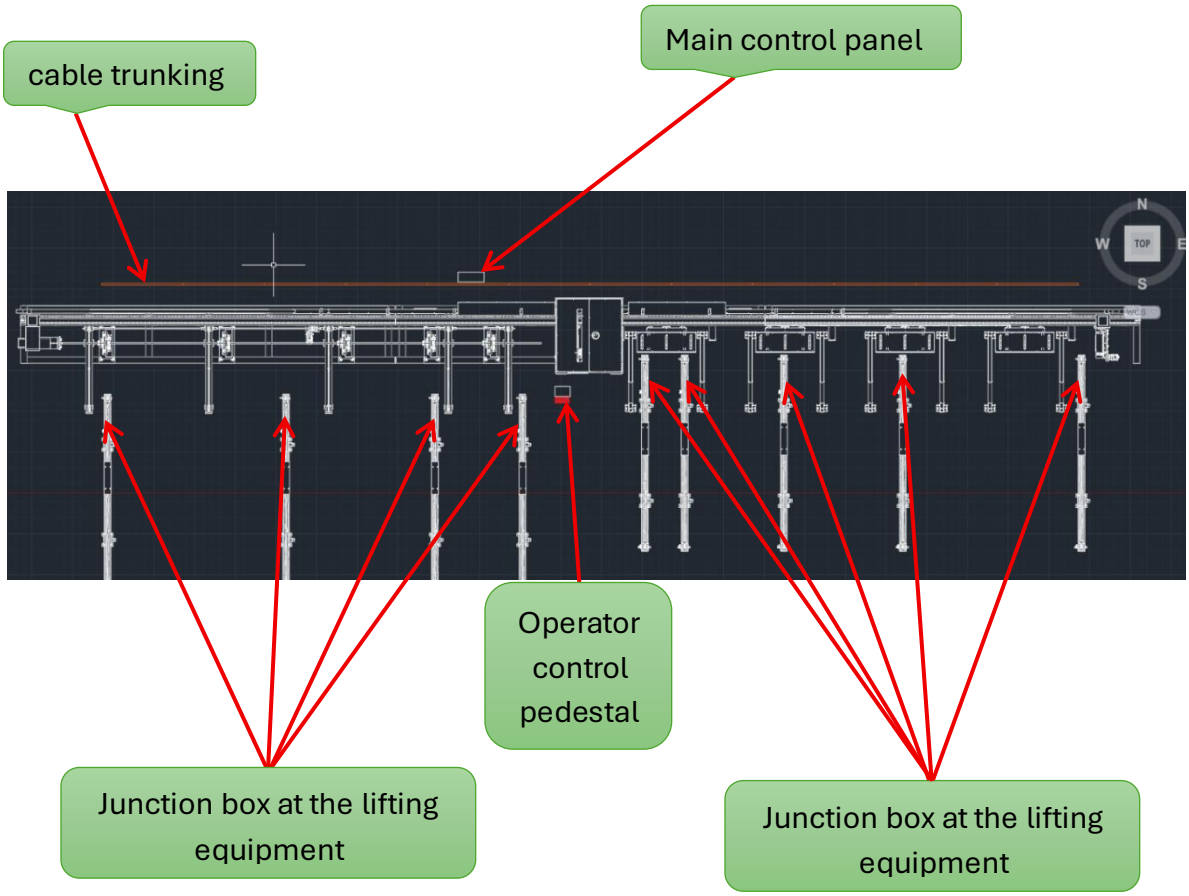


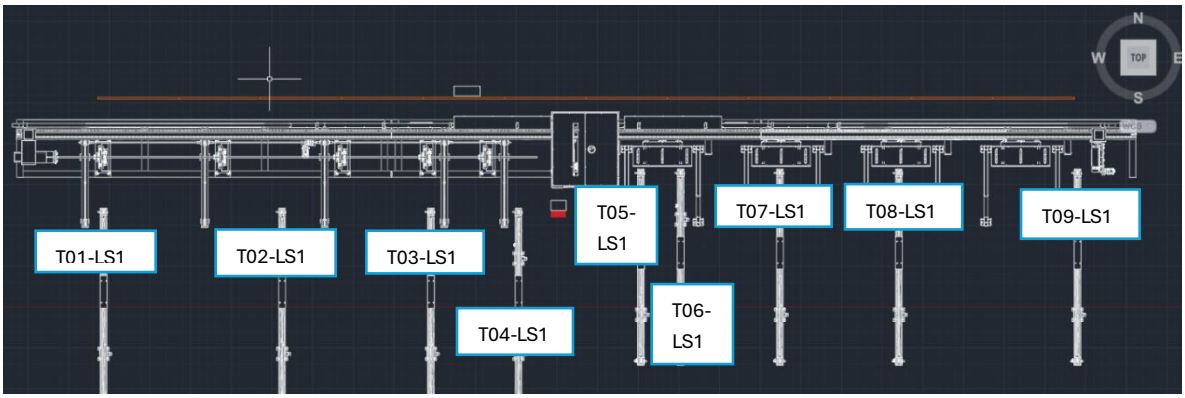
1.2 Included accessories/components

Item	Part Name	Quantity	Unit	Location			Note
D03	5mm x 2p screws	150	sets	Below control pillar			Screws for attaching electric tray to support bracket
	Electric tray connector	100	pcs	Below control pillar			
	8mm x 1p tray connector nuts/bolts	400	sets				

D04	Relay 12VDC	4	unit	Inside the painted inverted electrical cabinet		Spare parts
	Z-bracket to tray mounting screws	32	pcs			
	Screws for Z-bracket tool holder	32	pcs			
	Drill bit 3.2mm	1	unit			
	Drill bit 4.3mm	1	unit			
	Drill bit 5.2mm	1	unit			
	Hole saw 22mm	1	unit			

2. Determine the location for the device.





Note:

1. The cable tray will run together with the hydraulic pipe support.

2. The cable tray will be located on the electrical cabinet side.

3. The hydraulic piping and cable tray will be located between the electrical cabinet and the machine.

4. The identification numbers on the technical boxes must be arranged in the correct order.

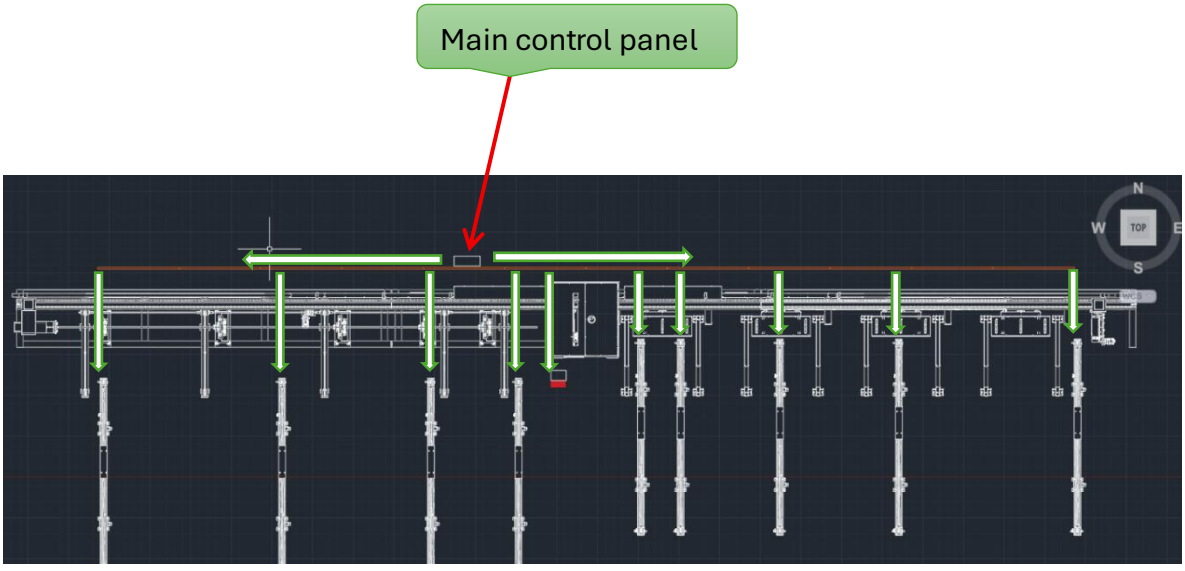
3. Electrical wiring route

- The system has a total of 12 cable trays.

- The green arrow indicates the cable routing direction

- At the cable entry points to the lifting equipment, you need to cut cable slots if they are not already available on the cable tray.

- The cable will be routed from the cable tray -> under the machine frame -> and into the connection point at the lifting equipment.



4. Interface point with the lifting/handling system

- There will be one technical box under each lifting device for cable connection.

- Each technical box will require two cables.

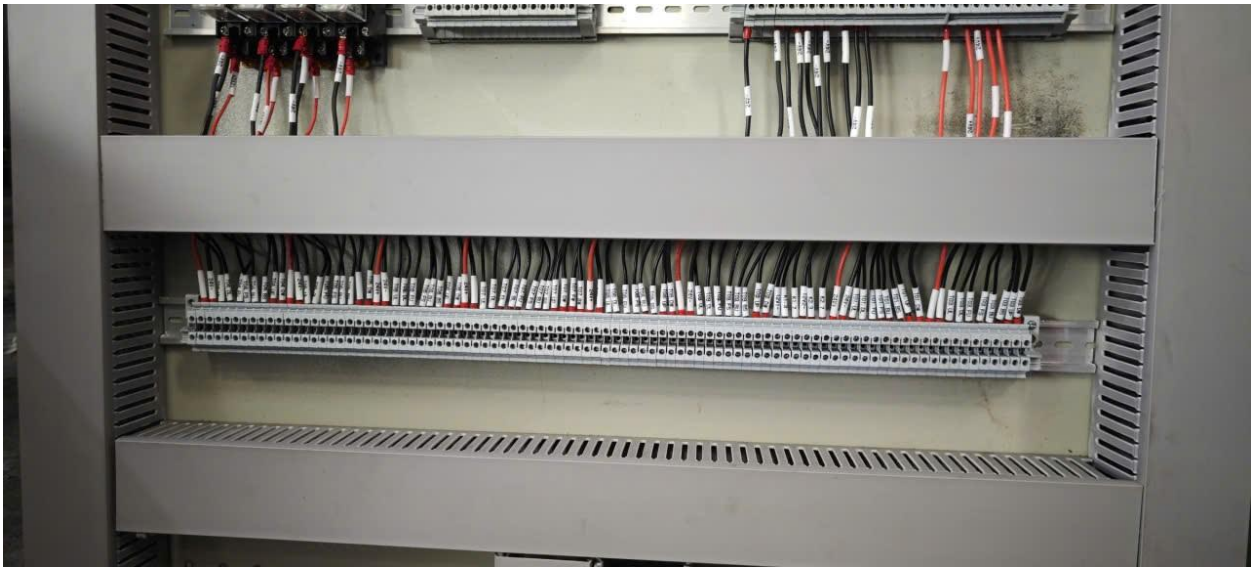
- Please route the correct cables with the matching identification numbers to the pre-installed technical boxes

- The connection will be made using connectors at the technical box.

Ex: T01-LS1 -> T01-LS1

5. Electrical cabinet connection

At the central electrical cabinet, connect the cables to the terminal block according to the pre-applied labels.



6. Pre-energization testing and inspection

Before powering on the system, you need to:

1. Check and retighten all screws inside the electrical cabinet.

2. Check for short circuits at the power input (L-L, L-N, L-PE).

3. Check for phase-to-ground faults.

4. Check for short circuits in the 24V DC power supply.

5. Inspect the wiring system for any crushed or broken cables.

6. Check whether the input voltage has any voltage drop or incorrect power supply