

PILLAR DRILLING MACHINE
MAKE : SI / MODEL : SI-PDM-20



TECHNICAL SPECIFICATION

| | |
|--|---|
| Motorized Drilling capacity | 20 mm ,8 Speed, Swivel table |
| Speed range | 86 -3300 RPM |
| Spindle Nose | MT-2 |
| Spindle Center to column | 205 mm |
| Spindle Travel | 110 mm |
| Distance spindle to table | 750 mm |
| Distance spindle to base | 915 mm |
| Working surface of Base | 265 x 220 mm |
| Working surface of table | 260 x 270 mm |
| Column Diameter | 74 mm |
| Machine base | 470 x 290 mm |
| Motor Capacity | 0.75 KW 3 Phase, 440V with DOL starter 1440 RPM |
| Cooling System with tray and outlet. R/F Switch, Drill Vice, Drill Chuck & Key, Arbor, Sleeve drill drift. | |

PEDESTAL GRINDING MACHINE MAKE : SI / MODEL : SI-PGM-250



TECHNICAL SPECIFICATION

| | |
|---|---|
| Wheel dimensions | 250 Dia. |
| Pedestal body | Heavy duty cast iron |
| Drive | 2 HP Motor 3 Phase 415V, 1500 RPM with suitable starter, motor enclosed in the pedestal body Height of pedestal: 900 mm |
| ❖ Accessories : | |
| <ul style="list-style-type: none">▪ Twist drill grinding attachment :▪ Vision guards▪ Adjustable Tool rest▪ Wheel dresser abrasive stick▪ Coolant reservoir fitted with machine | |



ARC WELDING TABLE
MAKE : SI / MODEL : SI-AWT-16

TECHNICAL SPECIFICATION

Arc welding table (all metal top).

Size 1200 x 1200 x 750 mm (L x W x H).

Welding Table with Top of high grade 12mm thick M.S. material with 16 mm holes in Grid form of 50 mm x 50 mm and M.S. structure of M.S. angle of 35 x 35 x 5 mm.

Welding Fume dust / extraction table, cartridge filter, Automatic Filter cleaning system timer controller with control panel.

Table with suitable GTAW, GMAW welding Gun Holder & Air Compressor.

❖ **Welding Table supplied with suitable KIT of Jigs/ Fixtures / Clamps (Clamping and Holding Kit) for welding of different jobs like**

- Square Tube Framing
- Round Tube Framing
- I-Beam Framing
- Sheet metal Box welding
- LAP joint position
- Butt joint position
- T-joint position

Kit with various required clamps and accessories set, 20 nos To make different type of welding jobs to make one JOB at a time

All the Jigs / Fixtures / Clamps is insert into any hole on the table for quick and accurate Holding and mounting the job on the table. Tool box with locking arrangement.

Arc welding table with welding partition mounted on TOP of the table having removable frame on three sides of the Table with Partition height of 580 to 620 mm.

❖ **Accessories:**

- Cleaning brush
- Spanner set
- Allen key set
- Anti-spatter liquid 1 liter



**OXY - ACETYLENE GAS WELDING
MAKE : SI / MODEL : SI-OAGW-6**

TECHNICAL SPECIFICATION

Oxy- Acetylene Gas Welding set :

High Pressure welding blow pipe, six tip sizes

High pressure cutting torch suitable to cut 30 mm plate

Two stage oxygen

Two stage acetylene regulator

High pressure seamless empty cylinder for oxygen gas, water capacity. 40/47 liters (gas capacity 6/7 cm), fitted with valve

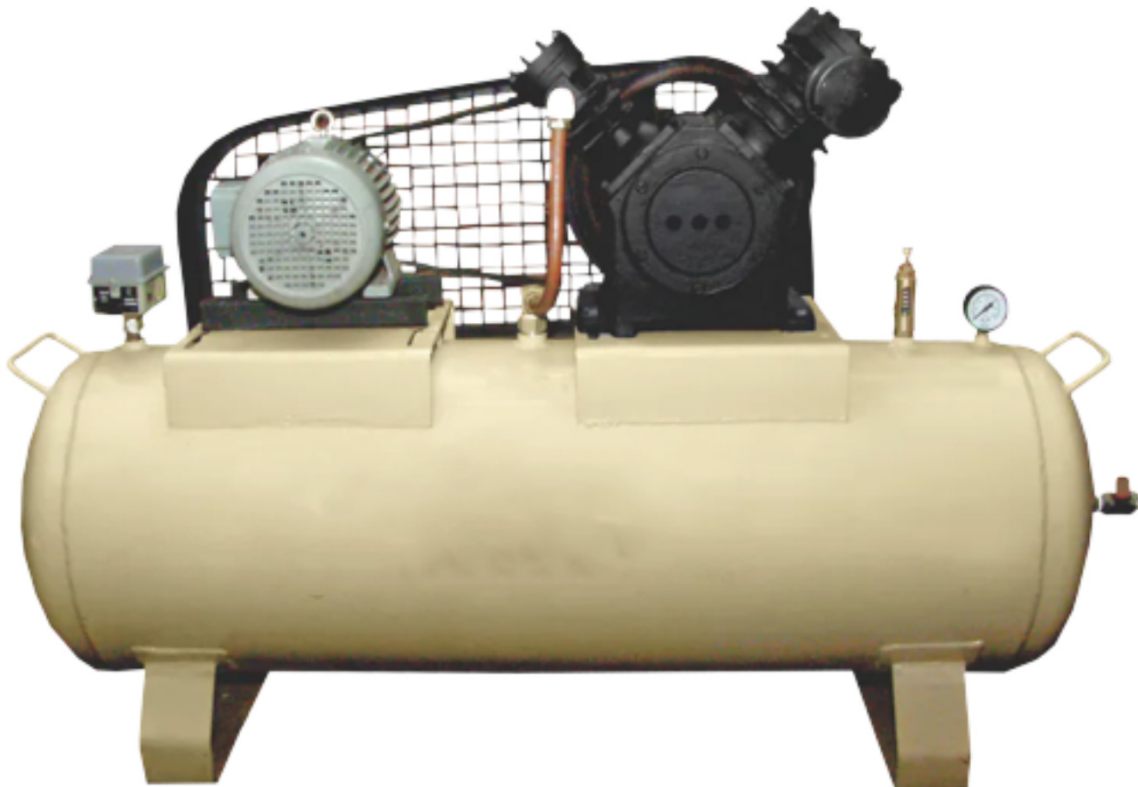
Empty dissolved acetylene gas cylinder, water capacity 40/41 liters (gas capacity) (6/6 23 cum) fitted with valve

Pressure gauges

❖ Accessories :

- 2 x 5 mm length 7 mm bore hose, four hose clips, one pair welders goggle, one pair cylinder outfit spindle keys, spark lighter, leather apron, wire brush etc

COMPRESSOR UNIT MAKE : SI / MODEL : SI-CU-8



TECHNICAL SPECIFICATION

| | |
|--|---------------------------|
| Type | Belt Driven Single stage. |
| Suitable for Pressure | 8 bar |
| Delivery | 50 lpm |
| Reservoir capacity | 24 Litres, 230V, 50 Hz |
| Pressure gauge, safety valve, Air control valve, Drain valve, Belt guard, Water separator & pressure switch. | |

**PNEUMATIC TRAINER KIT
MAKE : SI / MODEL : SI-PTK-50**



PNEUMATIC TRAINER KIT
MAKE : SI / MODEL : SI-PTK-50

TECHNICAL SPECIFICATION

Pneumatic Trainer kit Consisting of Pneumatic matching component and accessories, Power supply unit, Pneumatic Workstation with Pneumatic Components in working Condition, Carrier for mounting components such as PB & relay box, and cut section model of pneumatic components.

Pneumatic Trainer Kit:

Single acting cylinder Max. stroke length 50 mm, Bore dia 20 mm: 1 No

Double acting cylinder Max. stroke length 100 mm, Bore dia 20 mm, magnetic type: 1 No

3/2-way valve manually-actuated, Normally Closed: 2 Nos

3/2-way valve pneumatically-actuated, spring return: 1 No

One-way flow control valve: 2 Nos

5/2-way valve with manually-operated switch: 1 No

5/2-way valve pneumatically-actuated, spring return: 1 No

5/2-way pneumatic actuated valve double pilot: 1 No

3/2 position palm operated valve: 1 No

3/2-way roller lever valve direct actuation Normally Closed: 2 Nos

Shuttle valve: 1 No

Two-pressure valve: 1 No

Air filter Regulator: 1 No

Pressure gauge 0-16 bar: 1 Nos

Manifold with self-closing NRV, 6-way: 1 No

5/2-way roller lever valve direct actuation Normally Closed: 1 Nos

Proximity sensor: 4 No

Exhaust silencer: 5 No

Pushbutton station for electrical signal input with 3 illuminated momentary-contact switches (1 NO + 1 NC) and 1 illuminated maintained contact switch (1 NO + 1 NC), Contact load 2A 1 No.

Relay station with 3 relays each with 4 contact sets (3NO+1NC or Change-over type), 5 A: 1 No

3/2-way single solenoid valve with LED: 1 No

5/2-way single solenoid valve with manual override and LED: 1 No

5/2-way double solenoid valve with manual override and LED: 1 No

Pneumatic Rotary actuator 180 Deg movement.: 1 No

Pneumatic Motor with RPM 20000: 1 No

PNEUMATIC TRAINER KIT
MAKE : SI / MODEL : SI-PTK-50

TECHNICAL SPECIFICATION

Power supply unit, Input voltage 85 – 265 V AC, Output voltage: 24 V DC, Output current: 4.5 A, short-circuit-proof.: 1 No

PLC with Ethernet Communication:

No. Of Input: 16 Nos.

No of Output: 14 Nos.

Operating Voltage: 24 VDC

Programming Cable between PLC and PC:(Without Computer)

Software Tool for Programming PLC

Simulation software to understand working principal of pneumatic components, its symbols and circuits.

Pneumatic Workstation with 40 square mm aluminum profile legs :

wooden work surface, and one pedestal drawer unit having 5 drawers, each with handles and individual locks, on metallic full panel drawer slide:

Work Table – Size : L -1200mm x W-900mm x H-900mm with four castor wheels including two lockable wheels at the front side. Aluminum profile leg 40 mm-sq. wooden work surface. One pedestal drawer & five drawers with handle and locks. Vertical Profile plate Anodized Aluminum 1100 x 700 mm with carriers mounting frames and mounting accessories (fitted on side of the pneumatic workstation) and component easily removable when it need to remove from profile plate without using any tools.

Drawer – Size : L 460 mm x W 495mm x H 158 mm each

overall size of Drawer unit : L- 470mm x W-495mm x H-825mm. Drawer slide height : 85mm.

Every pneumatic component having pneumatic push pull connector on it so that it can performs various pneumatic circuits with different connections.

Carrier for mounting components, such as PB & relay boxes(Push button ,Relays, Terminals, Switch, Power supply, PLC mounted in single MS powder coated box).

List of Cut section Pneumatic components :

Single acting cylinder Max. stroke length 50 mm, Bore dia 20 mm: 1 No

Double acting cylinder Max. stroke length 100 mm, Bore dia 20 mm, magnetic type: 1 No

Rod less cylinder Max. stroke length 100 mm, Bore dia 25mm, magnetic type : 1Nos

5/2-way pneumatic actuated valve double pilot: 1 No

3/2-way roller lever valve direct actuation Normally Closed: 2 Nos

Two-pressure valve : 1 No

Pressure gauge: 1 Nos

Manifold 6-way: 1 No

3/2-way single solenoid valve with LED: 1 No

5/2-way double solenoid valve with manual override and LED: 1 No Pneumatic Trainer with Tool Kit to fitting of pneumatic components, & Assorted PU pipe provided with suitable size and length to conduct the experiments.

**HYDRAULIC TRAINER KIT
MAKE : SI / MODEL : SI-HTK-60**



HYDRAULIC TRAINER KIT MAKE : SI / MODEL : SI-HTK-60

TECHNICAL SPECIFICATION

Hydraulic Trainer kit Consisting of Hydraulic matching component, profile plate Hydraulic Workstation having drawers, Hydraulic Components mounted on profile plate in working Condition and cut section model of Hydraulic components.

Hydraulic Trainer Kit:

Hydraulic Power pack with

- External gear pump with delivery rate of 2.5 lpm, @ 1400 rpm operating pressure 60 bar, coupled to a single-phase AC motor (230 V AC) having start capacitor and ON/OFF switch and overload protection,
- Pressure relief valve adjustable from 0 – 60 bar,
- Oil reservoir, 15 litres capacity having sight glass, drain screw, filter, and P and T ports.

Pressure relief valve pilot-operated: 1 No

Drip tray, steel size 1160 mm x 760 mm. 1 No.

Pressure Gauge Glycerin-damped, Indication range of: 0 – 100 bar: 1 No.

Four-Way distributor with five ports, equipped with a pressure gauge: 1 No.

Double acting hydraulic cylinder with a control cam, Piston diameter 20 mm, Piston rod diameter 15 mm, Stroke length 150-200 mm.: 2 No.

Suitable Weight for vertical loading of hydraulic cylinder: 1 No.

Mounting kit for weight for realizing pulling and pushing load. : 1 No.

3/2-way directional control valve with hand lever actuation. 1 No.

4/2-way directional control valve with hand lever actuation. 1 No.

4/3-way directional control valve closed-centre position, with hand lever actuation.: 1 No.

Non-return valve. 1 No.

Pilot-operated check valve pilot to open. 1 No.

Hydraulic Motor: 1No

Proximity Sensor: 2 No

Electrical Limit switch: 2 No

4/3 solenoid valve: 1 No

4/2 solenoid valve: 1 no

2/2 electrical operated valve: 1 No

Pressure sequence valve: 1No

Pressure reducing valve: 1No

Electrical pressure switch – 1 No

One-way flow control valve with integrated check valve. 1 No.

HYDRAULIC TRAINER KIT
MAKE : SI / MODEL : SI-HTK-60

TECHNICAL SPECIFICATION

T-Connector with self-sealing coupling nipples (2 Nos.) and quick coupling socket (1No.) : 2 Nos.

- PLC with Ethernet Communication/HMI: No. Of Input: 16 Nos. No of Output: 14 Nos. Operating Voltage : 24 VDC -7" HMI - Programming Cable between PLC and PC: (without PC)

Software Tool for Programming PLC :

All above components in working condition to understand design and working principle of Hydraulic components and circuits. Simulation software provided to operate and understand working principal of Hydraulic components, its symbols and circuits. Hydraulic Workstation with 40 square mm aluminum profile legs, wooden work surface, and one pedestal drawer unit having 5 drawers, each with handles and individual locks, on metallic full panel drawer slide :

Work Table – Size : L-1200mm x W-900mm x H-900 mm. With four castor wheels including two lockable wheels at the front side. Vertical Profile plate Anodized Aluminum 1100 x 700 mm with carriers mounting frames, mounting accessories, Panel having Push button, Relays, Terminals, Switch, Power supply, PLC is mounted in single MS powder coated box. Every Hydraulic component having Hydraulic High-pressure Quick coupling connector on it so that it can performs various Hydraulic circuits with different connections.

Drawer – Size : L 460 mm x W 495 mm x H 158 mm each. overall size of Drawer unit : L 470 mm x W 495 mm x H 825 mm. **Drawer slide height** : 85 mm

Cut-section models for hydraulic components

Pressure relief valve pilot-operated: 1 No

Pressure Gauge: 1 No.

Double acting hydraulic cylinder Piston diameter 16 mm, Piston rod diameter 10 mm, Stroke length 200 mm. 1 No.

3/2-way directional control valve with hand lever actuation. : 1 No.

4/2-way directional control valve with hand lever actuation. 1 No.

4/3-way directional control valve closed-center position, with hand lever actuation .:1 No.

Non-return valve. 1 No.

Pilot-operated check valve pilot to open. 1 No.

4/3 solenoid valve: 1 No

4/2 solenoid valve: 1 no

2/2 electrical operated valve: 1 No

Pressure sequence valve: 1No

Pressure reducing valve: 1No

One-way flow control valve with integrated check valve. 1 No

Gear pump: 1 No.