



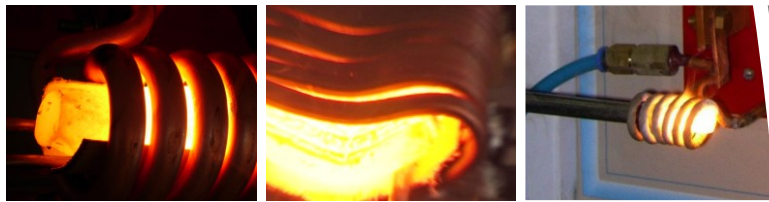
10 KVA



20 KVA



50 KVA



100 KVA

### **Advantages of Induction Heating**

- Controlled heating
- Selective heating
- Non polluting
- Energy efficient
- No 'start-up' time
- User friendly
- High speed of production

### **Salient features**

- Digital display
- Touch control switches
- On screen counter
- Auto/manual mode
- Fully solid state
- Robustly built
- 100% duty cycle operation
- Application specific machines
- Large variation of load characteristics
- Controlled heating variable frequency
- Load sensing self tuning

# **Sohal<sup>®</sup>**

## **THROUGH HEATING INDUCTION**

In industry, lot of energy is wasted in several ways. The heating process based on fuel is a major segment in wastage of energy & no idea is found to solve the problem in fuel based furnaces because the medium (air) itself consume nearly 40% of energy. Now, the energy can be saved by replacing conventional technique with Induction heating. Induction is a phenomenon to transfer electrical energy from a coil to another coil. In induction heating we use same technique, the workpiece act as another coil and consume transferred energy itself that heats it up to the desired temperature. The ITH series machines are constructed on medium topology to penetrate heat deeply. It's common applications are Annealing, Hardening, Forging of Ferrous and non-ferrous metals.

This solid-state and durable machine is developed by years of hard work. All components and techniques used are up-to-date and tested. The transformer core is low loss soft ferrite and coils are copper wound with H-class covering & an extra insulating wall is provided to isolate output winding. The water cooled design of transformer make it more efficient. The inverter section incorporates high quality capacitors which has a Q-factor > 1000. The switching device used are the fastest devices than their counterparts. To prevent any type of damage two hall sensors, a water sensor, a supply sensor & a saturation sensor is attached to its micro controller powered main board. An interface filter prevents line disturbance. A new type of exclusive circuit prevents the MCB's repetitive tripping.

MODEL	ITH 5	ITH 10	ITH 20	ITH 50	ITH 100
Supply	415V, 3Ph, 50Hz	415V, 3Ph, 50Hz	415V, 3Ph, 50Hz	415V, 3Ph, 50Hz	415V, 3Ph, 50Hz
Power	5 KVA	10 KVA	20 KVA	50 KVA	100 KVA
Duty	100 %	100 %	100 %	100 %	100 %
Efficiency (INV.)	90 %	90 %	90 %	90 %	90 %
Insulation	H Class	H Class	H Class	H Class	H Class
Programs	9	9	9	9	9
Heating cycle	2	2	2	2	2
Counter	6 Digit	6 Digit	6 Digit	6 Digit	6 Digit
Placement	Tabletop	Tabletop	Ground	Ground	Ground
Coolant	DM Water	DM Water	DM Water	DM Water	DM Water
Coolant Pressure	1-2 Kg cm <sup>2</sup>	1-2 Kg cm <sup>2</sup>	1-2 Kg cm <sup>2</sup>	1-2 Kg cm <sup>2</sup>	1-2 Kg cm <sup>2</sup>
Size (L x W x H) in.	15 x 30 x 10	17 x 21 x 26	35 x 25 x 50	46 x 34 x 72	90 x 37 x 75
Weight	40 Kg	70 Kg	220 Kg	400 Kg	600 Kg
Feeder	No	No	Optional	Optional	Optional
Suitable Rod Dia	3 to 6 mm	6 to 12 mm	10 to 20	18 to 36	25 to 50

\* Note: In view of modifications, All specification are subjected to change without prior notice

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