

MEGATRON CF and VF SERIES

INDUCTION HEATING POWER SUPPLIES

CF SERIES						VF SERIES			
kw rating at Given frequency			Dimensions in mm			kw & Freq	Dimensions in mm		
CF1	CF2	CF3	Front	depth	height	VF	Front	depth	height
0.25- 0.5 kHz	0.25 - 10kHz	3.0 - 60 kHz				0.5 - 30 kHz			
	50	60	1450	900	2000	100	1200	800	1600
	100	100	1100	900	2000	150	1200	800	1600
	150	150	1100	900	2000	200	1200	800	1600
	200	200	2500*	900	2000	250	1800	950	1600
	250	250	2500*	900	2000	300	1800	950	1600
	350	300	2800*	900	2000	400	1800	950	1600
	450	450	2800*	900	2000	500	2000	950	1600
	550		2800*	900	2000	600	2000	950	1600
	650	600	2800*	900	2000	750	2000	950	1600
	750		2800*	900	2000	900	2000	950	1600
	1000		2300	900	2000	1200	2000	950	1600
	1250		2300	900	2000				
1500	1500		2300	900	2000				
	1750		1500	1000	2000				
2000	2000		1650	1200	2000				
	2250		1650	1200	2000				
2500	2500		1650	1200	2000				
3000	3000		1650	1200	2000				
3500	3500		1650	1200	2000				
4000	4000		1750	1300	2000				
	4500		1750	1300	2000				
5000	5000		1750	1300	2000				
6000			3100	1000	2000				
7500			4500	1000	2000				
9000			5000	1000	2000				
10000			5000	1000	2000				
12000			5000	1000	2000				
15000			5000	1000	2000				

Cabinet dimensions subject to change depending on frequency rating and capacitor inclusion.



Parallel Tank Circuit Solid State Induction Heating Power Supply

MEGATRON, Current Fed [CF] and Voltage Fed [VF] series of Induction power supplies, have been developed by Megatherm using advanced digital control. A combination of advanced engineering, attention to detail and 20 years of experience in Induction Melting and Heating has helped Megatherm to produce world class Power supplies with many advanced features. Reliable and efficient for round the clock use for all type of Melting and Heating solutions.

In a standard configuration, MEGATRON is produced with a 6 pulse, 12 pulse or 24 pulse rectifier and is largely used for all type of Induction Melting, Holding and Metal Heating Industries. The digital controls can be run from a 50Hz or 60Hz frequency Input mains supply and can be fed from a 380/440V mains directly or through an Isolation Transformer with matched Input voltage.

Protective circuits with inbuilt current and voltage limits ensure safe operation The power supply is protected through various safety features and protection circuitry.



MEGATRON CF and VF SERIES

Features of CF series

- Multiple power /frequency combinations to suit most application.
- Jumper selected Voltage, Current, Power regulation of output.
- Interchangeable Factory calibrated Control boards with advanced features. Field replaceable for easy maintenance.
- Built in LED Annunciator for fault Indications.
- Constant power factor of 0.95 or above with IGBT chopper up to 5000kw.
- Semiconductor devices protected through thermal switches.
- Fully water cooled with leak proof PU piping and connectors.
- Dual frequency models available for Case hardening and forging application.
- Power sharing twin and tri track outputs for foundry .
- Option for remote operation through PLC and Megatherm Power optimiser.
- Direct reading kilowatt, frequency, voltage and current metering

Available in a wide range of power and frequency levels, Megatron CF are used in used in Foundry Ferrous and Non ferrous Melting, Large Steel melting other applications.

MEGATRON VF SERIES with **IGBT** Insulated Gate Bipolar Transistor.

Parallel Tank Circuit IGBT Induction Heating Power Supply

MEGATRON, Voltage Fed [CF] series of Induction power supplies, has been developed by Megatherm using state of the art single board Digital control with IGBT inverter. Reliable and efficient for round the clock use for all type of Induction Foundry Melting and Heating solutions.

Protective circuits with inbuilt current and voltage limits ensure safe operation The power supply is protected through various safety features and protection circuitry.



Features of VF series

- High performance new generation IGBT controlled Induction system with multiple power /frequency combinations to suit most application.
- Precise control of power, high energy efficiency and high power factor throughout operation cycle.
- LCD display
- Fibre optic connected IGBT driver
- Fully water cooled with leak proof PU piping and connectors.
- Dual frequency models available for Case hardening .
- Power sharing twin and tri track outputs for foundry .
- Option for remote operation through PLC and Megatherm Power optimiser.
- Digital reading kilowatt, frequency, voltage and current metering

Power Source Series	Inverter Topology	Power Control Method	Max Power Vs Frequency						
			0.5 KHz	1 KHz	3 KHz	6 KHz	10 KHz	30 KHz	60 KHz
Megatron CF1	Current Fed LC tuned Thyristor switched	Rectifier Phase Control	15000 kW	5000 kW	2500 kW	500 kW	250 kW	-	-
Megatron CF2	Current Fed LC tuned Thyristor switched	DC chopper	5000 kW	5000 kW	2500 kW	500 kW	250 kW	-	-
Megatron CF3	Current Fed LC tuned IGBT switched	DC chopper	-	-	-	600 kW	450 kW	300 kW	150 kW
Megatron VF	Voltage Fed L-LC tuned IGBT switched	Inverter Phase/Frequency Shift	1200 kW	900 kW	750 kW	500 kW	400 kW	250 kW	-