



# RAINBOW



DESIGNER: SPREAFICO DESIGN - ITALY

## INVERTER POWER SOURCES FOR ELECTRODE WELDING

RAINBOW's represent the latest evolution in inverter technology DC welding equipment. These powerful 100 KHz power sources are based on latest generation IGBT's and fitted with a flat transformer. RAINBOW's, with their lightness, reduced size and their excellent characteristics in electrode MMA and TIG welding with "Lift" mode arc striking, are the most suitable solution for maintenance and light fabrication works. RAINBOW 153 CELL and 183 CELL VRD are special versions for cellulosic electrodes.



CC

Inverter

DC  
+ -

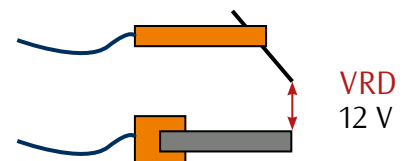


- ▶ Superior exceptionally high welding characteristics with any type of electrode
- ▶ Three available welding processes
- ▶ Possibility to work with adequate size power generator sets.
- ▶ Low energy consumption and high electrical efficiency
- ▶ All the data are referred to 40° C environment temperature
- ▶ Suitable to be used with 100 m length cable without power loss
- ▶ Shock-proof fibre compound main structure with protected control panel
- ▶ Dust-proof electronic components, thanks to the innovative "Tunnel" fan cooling system, allow its use in the toughest work environments
- ▶ Sloping front control panel, easy to read and adjust and highly visible from any direction
- ▶ Built-in Arc Force to automatically select the best welding arc dynamics
- ▶ Automatic Hot Start to improve the arc striking with the most difficult electrodes
- ▶ Electrode Antisticking function



### VRD - VOLTAGE REDUCTION DEVICE

RAINBOW 150 VRD and 183 CELL VRD, fitted with Voltage Reduction Device to make the maximum open circuit voltage less than 12 V, grants additional safety protection in all highly hazardous environments



## CONTROL PANEL

1. Welding current electronic adjustment
2. Mains voltage LED
3. Thermostatic protection LED
4. Welding process selector switch
  - MMA: welding of coated electrodes: rutile, basic, cast iron and aluminium (Hot Start and Arc-Force functions are on)
  - MMA CrNi: welding of stainless steel with a smooth and very stable arc for high quality welding
  - TIG: by the innovative “Lift” mode arc striking with thermic control (TCS), quick and precise striking is achieved, by minimising any tungsten inclusion and avoiding any incision onto the workpiece



## ACCESSORIES

- Carrying belt
- RAINBOW bag
- RAINBOW 150 fiber carry case kit

TECHNICAL DATA		RAINBOW				
		150	150 VRD	153 CELL	180	183 CELL VRD
Single phase input 50/60 Hz	V $\begin{matrix} +20\% \\ -20\% \end{matrix}$	230	230	230	230	230
Input Power @ I <sub>2</sub> Max	kVA	7,6	7,6	7,9	11,3	11,3
Delayed Fuse (I <sub>eff</sub> )	A	16	16	16	20	20
Power Factor / cos $\phi$		0,64/0,99	0,64/0,99	0,64/0,99	0,67/0,99	0,67/0,99
Efficiency Degree		0,84	0,84	0,82	0,82	0,82
Open circuit voltage	V	88	12	103	88	12
Current range	A	5 - 150	5 - 150	5 - 150	5 - 180	5 - 180
Duty cycle at (40°C)	A 100%	100	100	90	110	100
	A 60%	120	120	110	130	120
	A X%	150 (30%)	150 (30%)	150 (20%)	180 (20%)	180 (20%)
Standards		EN 60974-1 • EN 60974-10				
		[S]				
Protection Class	IP	21 S	21 S	21 S	23 S	23 S
Dimensions	↗ mm	340	340	340	390	390
	→ mm	115	115	115	135	135
	↑ mm	260	260	260	300	300
Weight	kg	4,2	4,2	4,2	6	6,5

Other voltages available on request

These power sources are built for industrial environment use. EMC (CISPR 11): class A

