



FreFlow™ V1

Respiratory Welding Helmet

Filter efficiency
≥ 99.97%



Easy Operation



Curved 3D Feature



High-impact Resistance



Infinite Adjustment



Wide Application



Weld / Grind Easy Switch



Patented Headgear



Applicable with PAPR



Product Features

Multiple working modes

Suitable for welding / cutting / external grinding control.

Eye / Facial protection

Protect welders from arc radiation and spatter.

Rechargeable Li-ion battery

Rechargeable battery for longer lifetime.
Fast-charging option makes charging only 1 hour.



Respiratory protection

Filter efficiency $\geq 99.97\%$, preventing inhalation of dust, pollutants, fine particles as well as other contaminants.

Intelligent air supply

Respirator will self-adjust the flow rate according to the blockage of the filter automatically.

Real-time display indicator

Filter status / airflow rate / battery capacity indicator, real-time monitoring and displaying.

Auto-alarm system

Flashing indicator, beeping sound, together with vibrating blower to ensure safety.

Respirator Specifications

Airflow Rate	Low speed: 170+lpm (6+cfm) High speed: 210+lpm (7.4+cfm)
Battery Type	Rechargeable Li-ion Battery
Battery Duration	9 hours (Standard battery, 170+lpm) 5 - 6 hours (Standard battery, 210+lpm) 15 hours (Extended battery, 170+lpm) 9 hours (Extended battery, 210+lpm)
Battery Charge Time	1 hours (Standard battery) 2 hours (Extended battery)
Battery Life	≥ 500 charges
Filter Efficiency	$\geq 99.97\%$
Alarms	Visible, Audible and Vibrate
Operating Temp.	-5 °C ~ +55 °C (23 °F ~ 131 °F)
Storing Temp.	-10 °C ~ +55 °C (14 °F ~ 131 °F)
Operating Relative Humidity	< 90%
Storage Relative Humidity	< 85%
Weight (Blower Unit+Battery)	1020 g
Respirator Approval	EN 12941 TH2 P R SL NIOSH 42 CFR Part 84 AS/NZS 1716

ADF Specifications

Optical Class	1 / 1 / 1 / 1
Viewing Area	97 x 62 mm (3.82" x 2.44")
Cartridge Size	133 x 114 x 9 mm (5.25" x 4.50" x 0.35")
Arc Sensor	4
Light State	DIN 3.5
Grind State	Variable Shade 5 ~ 8 / 9 ~ 13
Cutting Shade	Internal, Variable Shade
Welding Shade	Automatic On / Off
Shade Control	Low ~ High, by infinitely dial knob
Power On / Off	Up to Shade DIN16 at all times
Sensitivity Control	Solar cell. Battery replaceable, 2 x CR2450 lithium battery
UV / IR Protection	1/25,000 s. from Light to Dark
Power Supply	0.1 ~ 1.0 s by infinitely dial knob
Switching Time	≥ 2 amps (DC); ≥ 2 amps (AC)
Grinding	Yes
Delay (Dark to Light)	Yes
Low Amperage TIG Rated	Yes
Operating Temp.	-10 °C ~ +55 °C (14 °F ~ 131 °F)
Storing Temp.	-20 °C ~ +70 °C (-4 °F ~ 158 °F)
Helmet Material	High Impact Resistance Nylon
Approved	



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