

# ULTRASHADE™



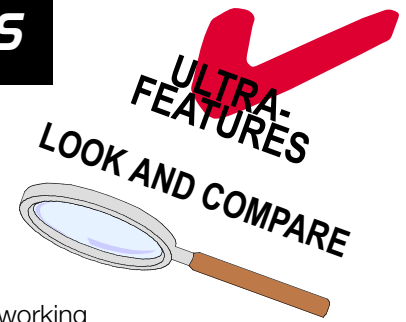
Professional Auto-Darkening Helmets

**LINCOLN**®  
**ELECTRIC**

THE WELDING EXPERTS

# ULTRASHADE™ AUTO-DARKENING HELMETS

## ADVANTAGE LINCOLN



UltraShade welding helmets from Lincoln Electric provide a more convenient, lower fatigue working environment for professional welders.

- Automatic shade cartridges improve efficiency and precision with the highest level of safety.
- User-friendly design combined with precision optics and high-tech electronics enables you to perform top quality welding.
- Adjustable settings for maximum personal comfort in all working conditions.
- UltraShade welding helmets are made to the highest quality standards for long life.
- Lightweight design (only 16 oz.).

### ✓ Sensor Bar

Eliminates the influence of surrounding bright light or when welding adjacent to other welders.

### ✓ Solar Cells

Solar energy is used eliminating the need for an on/off switch or inconvenient battery changeovers.

### Visibility

Lens automatically darkens within a fraction of milliseconds to the correct level of protection when an arc is detected.



### Potentiometer Knob (Platinum Model Only)

Infinite, fine adjustment from 9-13 according to the welder's degree of sensitivity.

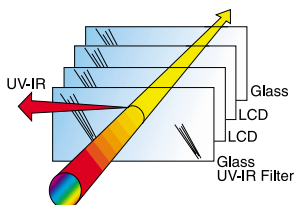


**ULTRASHADE PLATINUM**  
Automatic Continuous Shade  
Protection between Level 9 through 13

**ULTRASHADE SILVER PLUS**  
Selectable Automatic Shade  
Protection between Level 10 or 11

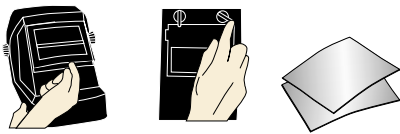
### ✓ Bonded 4-layer optic block

Provides continuous protection over the entire field of vision when light or dark. Special filters assure protection against UV and IR radiation. Tough and rigid shade cartridge holds up to abuse.



### ✓ Removable Lens Frame with Replaceable Spatter Cover Lens

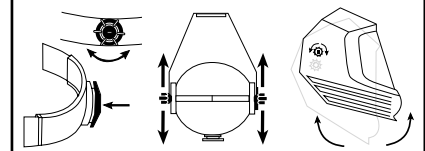
Curved design ensures optical quality and true color.



### ✓ Fully Adjustable Head Band for Comfort

The **only** helmet with horizontal adjustment to adjust the closeness of the helmet to the face.

Eccentric knob adjusts the tilt of the mask to the chest.



# TECHNICAL SPECIFICATIONS

Model & Order No.	UltraShade Platinum K1731-1	UltraShade Silver Plus K1729-2
Type	Automatic Shade Cartridge with Shade Selection from 9 - 13. Make Infinite Fine Adjustments Using the Potentiometer Knob.	Selectable Automatic Shade Cartridge, Shades 10 or 11
Cartridge Dimensions	3.5 x 4.3 x .28 in. (89 x 110 x 7 mm)	3.5 x 4.3 x .28 in. (89 x 110 x 7 mm)
Viewing Dimensions	3.9 x 1.5 in. (99 x 38 mm)	3.9 x 1.5 in. (99 x 38 mm)
Light Transmittance	Ultraviolet/Infrared Protection, Maximum at Any Shade Setting  Visible Range Activated, Shade Level 9 - 13  Visible Range Not Activated, Shade Level 4	Ultraviolet/Infrared Protection, Maximum at Any Shade Setting  Visible Range Activated, Shade Level 10 or 11  Visible Range Not Activated, Shade Level 4
Switching Time Advantage	Light to Dark, 0.0004 s (0.4ms) at Room Temp. 0.0001 s (0.1ms) at 131°F/55°C	Light to Dark, 0.0004 s (0.4ms) at Room Temp. 0.0001 s (0.1ms) at 131°F/55°C
Switching Time Advantage	Dark to Light, Position "Fast" 0.1 - 0.35 s <sup>1</sup> Position "Slow" 0.3 s - 0.6 s	Dark to Light, 0.2 - 0.3 s
Operation Temperature	14°F to 158°F / -10°C to +70°C	14°F to 158°F / -10°C to +70°C
✓ Power Supply Sensors	Solar Cells, Two Above the Eyes Variable Detection Angle with Detachable Sensor Bar, No Battery Changes.	Solar Cells, Two Above the Eyes Variable Detection Angle with Detachable Sensor Bar, No Battery Changes.
✓ Optically Correct Distortion Free Spatter Shield	Curved, Reflection-Free Front Cover Lens and Inside Cover Lens	Curved, Reflection-Free Front Cover Lens and Inside Cover Lens
Water-Resistance	Waterproof, According to IP 67 (testing time 30 minutes, testing depth 3.28 ft. / 1 m)	Waterproof, According to IP 67 (testing time 30 minutes, testing depth 3.28 ft. / 1 m)
✓ Light Weight	17 oz. / 482 g.	16.6 oz. / 471 g.
Standards	CE, DIN, ANSI, CSA, AS/NZS	CE, DIN, ANSI, CSA, AS/NZS
Recommended Application Ranges for Welding	All Electric Arc Welding Processes <sup>2</sup> Stick Electrode (SMAW) MIG/MAG (GMAW) GMAW High Melting Rate Process Flux-Cored Welding (FCAW) TIG Welding (GTAW) Plasma Arc Welding (PAW) Micro Plasma Arc Welding	Stick Electrode (SMAW) MIG Steel (GMAW) MIG Aluminum (GMAW) MIG Stainless Steel (GMAW)
✓ Warranty	2 Years	2 Years

1. Ideal for fast production weld-tacking applications.

2. Usable in applications requiring shades 13 or less.

# REPLACEMENT PARTS



### Replacement Mask:

S24558-10 Silver Plus Model  
S24558-11 Platinum Model



### Head Band:

S24558-4 All Models



### Shade Cartridge:

S24558-16 Silver Plus Model  
S24558-8 Platinum Model  
S24558-7 Gold Model \*



### Economy Sweat Band:

S24558-13 5-Pack

\* Gold Model is discontinued but replacement cartridges are still available.

### Sensor Bar:

S24558-12 All Models



### Deluxe Sweat Band:

S24558-15 2-Pack



### Lens Frame:

S24558-1 All Models



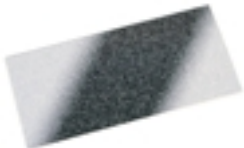
### Clear Outside Cover Lenses:

S24558-2 10-Pack (All Models)



### Potentiometer Knob:

S24558-5 Platinum Model Only



### Clear Inside Cover Lenses:

S24558-3 5-Pack (All Models)



### Eccentric Knob:

S24558-1 All Models

**LINCOLN**<sup>®</sup>  
**ELECTRIC**

**THE WELDING EXPERTS**

**THE LINCOLN ELECTRIC COMPANY**

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**Magnum**  
**E12.205 3/01**

#### Customer Assistance Policy

The business of The Lincoln Electric Company is manufacturing and selling high quality welding equipment, consumables, and cutting equipment. Our challenge is to meet the needs of our customers and to exceed their expectations. On occasion, purchasers may ask Lincoln Electric for advice or information about their use of our products. We respond to our customers based on the best information in our possession at that time. Lincoln Electric is not in a position to warrant or guarantee such advice, and assumes no liability, with respect to such information or advice. We expressly disclaim any warranty of any kind, including any warranty of fitness for any customer's particular purpose, with respect to such information or advice. As a matter of practical consideration, we also cannot assume any responsibility for updating or correcting any such information or advice once it has been given, nor does the provision of information or advice create, expand or alter any warranty with respect to the sale of our products.

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