

BLUE MAX[®] MIG 410

Stainless ▪ AWS ER410

KEY FEATURES

- Designed to weld stainless steels of similar chemical composition as well as to overlay carbon steels to impart corrosion, erosion and abrasion resistance
- Preheat and inter-pass temperature of 400 °F (200 °C) or greater are recommended during welding
- Q2 Lot[®] Certificate showing actual wire composition and higher are recommended available online

WELDING POSITIONS

All

CONFORMANCES

AWS A5.9/A5.9M: 2012	ER410
ISO 14343: 2009:	13
ASME SFA-5.9:	ER410

TYPICAL APPLICATIONS

- Surfacing Steel Mill Rolls
- Furnace and Burner Parts
- Turbine Parts

SHIELDING GAS

98% Argon / 2% Oxygen
90% Helium / 7.5% Argon / 2.5% Carbon Dioxide

DIAMETERS / PACKAGING

Diameter in (mm)	33 lb (15 kg) PLW Steel Spool	500 lb (227 kg) Speed Feed [®] Reel	1000 lb (454 kg) Speed Feed [®] Reel
0.035 (0.9)	ED035139	ED035141	ED035142
0.045 (1.1)	ED035140		
1/16 (1.6)	ED035143		

WIRE COMPOSITION⁽¹⁾ – As Required per AWS A5.9/A5.9M: 2012

	%C	%Cr	%Ni	%Mo	%Mn
Requirements AWS ER410	0.12 max	11.5 - 13.5	0.6 max	0.75 max	0.6 max
Typical Performance⁽²⁾	0.11	12.5	0.1	0.03	0.45
	%Si	%P	%S	%Cu	
Requirements AWS ER410	0.5 max	0.03 max	0.03 max	0.75 max	
Typical Performance⁽²⁾	0.39	0.01	0.01	0.14	

TYPICAL OPERATING PROCEDURES

Diameter in (mm)	Voltage (volts)	Amperage	Gas Flow	Gas
0.035 (0.9)	26-29	160-210	30-50 CFH	98/99% Argon + 2/1% Oxygen 97% Argon + 3% CO ₂
0.045 (1.1)	28-32	180-250		

⁽¹⁾Typical wire chemistry. ⁽²⁾See test results disclaimer

IMPORTANT: SPECIAL VENTILATION AND/OR EXHAUST REQUIRED

Fumes from the normal use of some welding products can contain significant quantities of components - such as chromium and manganese - which can lower the 5.0 mg/m³ maximum exposure guideline for general welding fume.

BEFORE USE, READ AND UNDERSTAND THE MATERIAL SAFETY DATA SHEET (MSDS) FOR THIS PRODUCT AND SPECIFIC INFORMATION PRINTED ON THE PRODUCT CONTAINER.

Material Safety Data Sheets (MSDS) and Certificates of Conformance are available on our website at www.lincolnelectric.com

TEST RESULTS

Test results for mechanical properties, deposit or electrode composition and diffusible hydrogen levels were obtained from a weld produced and tested according to prescribed standards, and should not be assumed to be the expected results in a particular application or weldment. Actual results will vary depending on many factors, including, but not limited to, weld procedure, plate chemistry and temperature, weldment design and fabrication methods. Users are cautioned to confirm by qualification testing, or other appropriate means, the suitability of any welding consumable and procedure before use in the intended application.

CUSTOMER ASSISTANCE POLICY

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 information or advice about their use of our products. Our employees respond to inquiries to the best of their ability based on information provided to them by the customers and the knowledge they may have concerning the application. Our employees, however, are not in a position to verify the information provided or to evaluate the engineering requirements for the particular weldment. Accordingly, Lincoln Electric does not warrant or guarantee or assume any liability with respect to such information or advice. Moreover, the provision of such information or advice does not create, expand, or alter any warranty on our products. Any express or implied warranty that might arise from the information or advice, including any implied warranty of merchantability or any warranty of fitness for any customers' particular purpose is specifically disclaimed.

Lincoln Electric is a responsive manufacturer, but the selection and use of specific products sold by Lincoln Electric is solely within the control of, and remains the sole responsibility of the customer. Many variables beyond the control of Lincoln Electric affect the results obtained in applying these types of fabrication methods and service requirements.

Subject to Change – This information is accurate to the best of our knowledge at the time of printing. Please refer to www.lincolnelectric.com for any updated information.