



Product: FabCO Element 71C
Diameter: 1/16"
Shielding Gas: C1 (100% CO2)
Current/Polarity: DCEP
Classification: E71T1-GC H8
Specification: AWS A5.29/A5.29M:2010
Test Completed: 2/14/2020

Certificate of Conformance

For AWS D1.8/D1.8M, Seismic Supplement

This is to certify that the product named is of the same classification, manufacturing process, and material requirements as the material, which was used for the test which was concluded on the date shown, the results of which are shown below. All test required by the code or specifications were performed at that time and the material tested met all requirements. The product was manufactured and supplied by the Quality System Program of Hobart Brothers, which meets the requirements of ISO 9001:2015, ANSI/AWS A5.01, and other specification and Military requirements, as applicable.

Test Settings	High Heat Input	Low Heat Input	Lot- # C604351904291	AWS D1.8 Requirements	High Heat Input	Low Heat Input
	82.3 kJ/in	30.3 kJ/in	Mechanical Properties		82.3 kJ/in	30.3 kJ/in
			Test Reference #		PD9092	PD9091
Voltage	25	27	Tensile Strength (psi) Yield Strength (psi) Elongation (%) Average Charpy V-notch Impact Properties ft•lbs @ +70 °F	70,000	74,000	77,000
Current (amps)	225	275				
WFS (ipm)	180	240				
Travel Speed (ipm)	4.1	14.7				
Stick Out	3/4"	3/4"				
# of passes	8	17				
# of layers	4	7				
Preheat Temp. °F	300+/-25	RT				
Interpass Temp. °F	500+/-50	200+/-25				
Weld Position	3G	1G				

Test Settings	High Heat Input	Low Heat Input	Lot- # Z601232203162	AWS D1.8 Requirements	High Heat Input	Low Heat Input
	78.5 kJ/in	28.2 kJ/in	Mechanical Properties		78.5 kJ/in	28.2 kJ/in
			Test Reference #		PD9068	PD9065
Voltage	25	27	Tensile Strength (psi) Yield Strength (psi) Elongation (%) Average Charpy V-notch Impact Properties ft•lbs @ +70 °F	70,000	71,000	79,000
Current (amps)	225	300				
WFS (ipm)	180	240				
Travel Speed (ipm)	4.3	17.2				
Stick Out	3/4"	3/4"				
# of passes	8	14				
# of layers	4	6				
Preheat Temp. °F	300+/-25	RT				
Interpass Temp. °F	500+/-50	200+/-25				
Weld Position	3G	1G				

Test Settings	High Heat Input	Low Heat Input	Lot- # V612211904181	AWS D1.8 Requirements	High Heat Input	Low Heat Input
	80.4 kJ/in	29.1 kJ/in	Mechanical Properties		80.4 kJ/in	29.1 kJ/in
			Test Reference #		PD9046	PD9058
Voltage	25	27	Tensile Strength (psi) Yield Strength (psi) Elongation (%) Average Charpy V-notch Impact Properties ft•lbs @ +70 °F	70,000	72,000	78,000
Current (amps)	220	275				
WFS (ipm)	170	230				
Travel Speed (ipm)	4.2	15.3				
Stick Out	3/4"	3/4"				
# of passes	8	17				
# of layers	4	7				
Preheat Temp. °F	300+/-25	RT				
Interpass Temp. °F	500+/-50	200+/-25				
Weld Position	3G	1G				

Diffusible Hydrogen - Tested in accordance with AWS A5.20/A5.20M, Clause 16 & Extended Exposure - in accordance with AWS D1.8/D1.8M

Condition	Lot - #	Test Reference #	Average (ml/100g)
As Received	B022682701712	HB3890	5.3 (ml/100g)
7 Day Exposure	B022682701712	HB3941	8.6 (ml/100g)

The information contained or otherwise referenced herein is presented without guarantee or warranty. Hobart Brothers Company ("Hobart") expressly disclaims any liability incurred from any reliance thereon. Data for the above-supplied product are those obtained during the welding process and tested in accordance with the above specification with electrodes of the same manufacturing processes and material requirements. All tests for the above classification were performed satisfactorily. No data is to be construed as a recommendation for any welding condition or technique not controlled by Hobart. **Hobart produces welding consumables under continuing quality assurance programs audited and approved by the American Bureau of Shipping ("ABS").** Please refer to the Hobart Brothers Company website at www.hobartbrothers.com for current Safety Data Sheets ("SDS").

David A. Thomas, Quality Assurance Representative