Select 720HP H4

Carbon Steel / Gas Shielded / Flux Cored

FEATURES

CONFORMANCES

AWS A5.20

AWS A5.29

E71T-12M-JH4

E81T1-GM-H4

 Designed for single & multiple pass welding of carbon steels, such as ASTM A36, A285, A515-Gr 70, & A516-Gr 70.

- Developed for low hydrogen deposits utilizing 75-80% Ar/balance CO2 sheilding gas.
- Microalloying and slag adjustments provide enhanced CVN toughness values at lower than required classification temperatures.
- Well suited for structural welding and general fabrication.
- A good choice for fine grained, high toughness steels, such as ASTM A572 and A633.

DIAMETERS (in (mm))

0.035 (0.9), 0.045 (1.2), 0.052 (1.3), 1/16 (1.6)

POSITIONS



SHIELDING GAS

75-80%Ar/Balance Flow Rate: 40 - 50 CFH

POLARITY

Direct Current Electrode Positive (DCEP)

TYPICAL WELD DEPOSIT CHEMISTRY (WT%)

| Shielding Gas | С | Cr | Cu | Mn | Мо | Ni | Р | S | Si | V |
|----------------|------|------|-------|------|-------|------|------|------|------|------|
| 75%Ar / 25%CO2 | 0.06 | 0.04 | 0.022 | 1.35 | <0.01 | 0.40 | 0.01 | 0.01 | 0.36 | 0.02 |

TYPICAL MECHANICAL PROPERTIES

| Shielding Gas | Tensile Strength ksi (MPa) | Yield Strength ksi (MPa) | Elongation (%) | Weld Condition | PWHT Temp | CVN @ -20°F (-30°C) ft-lb (J) | CVN @ -40°F (-40°C) ft-lb (J) | CVN @ -60°F (-50°C) ft-lb (J) |
|----------------|----------------------------------|--------------------------------|-------------------|-------------------|--------------|-------------------------------------|-------------------------------------|-------------------------------------|
| 75%Ar / 25%CO2 | 87 (600) | 76 (524) | 27 | As-Welded | - | 111 (151) | 95 (129) | 65 (88) |



Notice: Be sure to follow all your employers safety practices, policies and procedures when using this product. Refer to CSA W117.2 and ANSI Z49.1 Safety in Welding, Cutting and Allied Processes for further information and the manufactures SDS sheet. The results reported are based upon testing of the product under controlled laboratory conditions in accordance with American Welding Society Standards. Actual use of the product may produce different results due to varying conditions. An example of such conditions would be electrode size, plate chemistry, environment, weldment design, fabrication methods, welding procedure and service requirements. Thus the results are not guarantees for use in the field. The manufacturer disclaims any warranty of merchantability or fitness for any particular purpose with respect to its products.

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600 Enterprise Drive, P.O. Box 259, Fort Loramie, Ohio 45845-0259 • 800-341-5215 • www.Select-Arc.com

PRODUCT DATA SHEET

| Diameter in (mm) | Shielding Gas | Position | WFS* in/min (m/min) | Amps | Volts | CTWD* in (mm) |
|---------------------|----------------|-------------------|------------------------|------|-------|---------------------|
| 0.035 (0.9 mm) | | All-Position | 275 (7.0) | 120 | 22 | 1/2 - 5/8 (13 - 16) |
| | | All-Position | 320 (8.1) | 135 | 23 | 1/2 - 5/8 (13 - 16) |
| | 75% Ar/25% CO2 | All-Position | 420 (10.7) | 160 | 25 | 1/2 - 5/8 (13 - 16) |
| | | Flat & Horizontal | 465 (11.8) | 180 | 26 | 5/8 - 3/4 (16 - 19) |
| | | Flat & Horizontal | 570 (14.5) | 200 | 28 | 5/8 - 3/4 (16 - 19) |
| | | All-Position | 200 (5.1) | 145 | 22 | 1/2 - 5/8 (13 - 16) |
| | 75% Ar/25% CO2 | All-Position | 235 (6.0) | 160 | 23 | 1/2 - 5/8 (13 - 16) |
| 0.045 (1.2 mm) | | All-Position | 300 (7.6) | 185 | 25 | 1/2 - 5/8 (13 - 16) |
| | | Flat & Horizontal | 375 (9.5) | 215 | 26 | 5/8 - 3/4 (16 - 19) |
| | | Flat & Horizontal | 440 (11.2) | 235 | 28 | 5/8 - 3/4 (16 - 19) |
| 0.052 (1.3 mm) | | All-Position | 170 (4.3) | 155 | 22 | 5/8 - 3/4 (16 - 19) |
| | 75% Ar/25% CO2 | All-Position | 200 (5.1) | 175 | 23 | 5/8 - 3/4 (16 - 19) |
| | | All-Position | 250 (6.4) | 225 | 25 | 5/8 - 3/4 (16 - 19) |
| | | Flat & Horizontal | 310 (7.9) | 250 | 26 | 3/4 - 1 (19 - 25) |
| | | Flat & Horizontal | 395 (10.0) | 280 | 28 | 3/4 - 1 (19 - 25) |
| | | All-Position | 125 (3.2) | 165 | 22 | 5/8 - 3/4 (16 - 19) |
| | 75% Ar/25% CO2 | All-Position | 150 (3.8) | 195 | 23 | 5/8 - 3/4 (16 - 19) |
| 1/16 (1.6 mm) | | All-Position | 185 (4.7) | 225 | 25 | 5/8 - 3/4 (16 - 19) |
| | | Flat & Horizontal | 265 (6.7) | 280 | 26 | 3/4 - 1 (19 - 25) |
| | | Flat & Horizontal | 325 (8.3) | 320 | 28 | 3/4 - 1 (19 - 25) |

RECOMMENDED WELDING PARAMETERS **

* WFS = Wire Feed Speed, CTWD = Contact Tip To Work Distance

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while read speed, or while read speed, or while reading on the bisance **The parameters listed are recommended starting points of operation and the ranges for amperage, wfs, and voltage could be extended based on fitness for application. For products with "allposition" capability, as determined and listed in classification, the position recommendation can be determined based on operator skill and material thickness and isn't limited to the listing.

APPROVALS

| Agency | Approval | Shielding Gas | Diameter(s) in (mm) | |
|--------|-------------|----------------------|--------------------------|--|
| ABS | 4YSA H5 | M21 (75%Ar / 25%CO2) | 0.035 (0.9) - 1/16 (1.6) | |
| DNV | IV YMS (H5) | M21 (75%Ar / 25%CO2) | 0.035 (0.9) - 1/16 (1.6) | |

PACKAGING (lbs (kgs))

33 (15) Spools, 60 (27.2) Coils, 500 (226.8) Round Drum, 800 (362.9) Hex Drum, 900 (408.2) Hex Drum

*Some packaging options may not be available depending on diameter and product. Special package options may be available upon request.

STORAGE AND HANDLING

All products should be stored in original packaging, in dry conditions and handled with care. For more information refer to our website.



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