



Product Data Sheet

OK 48.15

E 'Manual metal-arc welding'
ESAB Perstorp AB Sweden

Prepared by P-O Oskarsson	Qualified by Tero Borg	Approved by J-P Ernoult	Reg no EN007042	Cancelling EN006739	Reg date 2016-02-10	Page 1 (2)
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REASON FOR ISSUE

Typical mechanical values added. AWS requirements added.

GENERAL

General purpose basic AC, DC+ (-) low hydrogen electrode for welding of carbon steels and carbon manganese steels. Very good running characteristics especially on AC.

Min AC OCV: 65

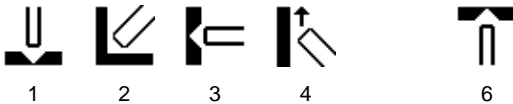
Polarity: AC, DC+(-)

Alloy Type: Carbon Manganese

Coating Type: Lime Basic

Diff Hydrogen: < 5 ml/100g

WELDING POSITIONS



CLASSIFICATIONS Electrode

SFA/AWS A5.1 E7018
EN ISO 2560-A E 42 3 B 32 H5

APPROVALS

ABS	E7018
ABS	3Y H5
BV	3Y H5
CE	EN 13479
DB	10.039.06
DNV	3Y H5
GL	3Y H5
LR	3Ym H5
PRS	3Y H5
RS	3Y H5
VdTÜV	00625

CHEMICAL COMPOSITION

All Weld Metal (%)

	Min	Max
C	0.02	0.10
Si	0.30	0.70
Mn	0.85	1.35
P		0.030
S		0.030



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MECHANICAL PROPERTIES OF WELD METAL

Properties	ISO			AWS
	As welded Min	Max	Typ	As welded Min
Rp0.2 (MPa)				400
ReL (MPa)	420		490	
Rm (MPa)	510	640	575	490
A4 (%)				22
A5 (%)	22		30	
Charpy V at -30°C (J)	47		60	27
	Comments: EN standard requires 500 Mpa and A5 min 20%.			Comments:

ECONOMICS & CURRENT DATA

Dimension (mm) Ø x Length	Current (A)		W	η	N	B	H	T	U	Welding Positions
	Min	Max								
2.0 x 300	55	80	1.3	125	0.61	125.0	0.70	43	22	1,2,3,4,6
2.5 x 350	65	110	2.5	125	0.60	67.0	1.00	60	22	1,2,3,4,6
3.2 x 450	100	140	5.1	125	0.66	31.0	1.40	84	23	1,2,3,4,6
4.0 x 450	140	200	7.1	121	0.66	21.0	2.00	89	24	1,2,3,4,6

W = Weight (kg / 100 electrodes)

η = Efficiency (g weld metal x 100 / g core wire)

N = Effective value (kg weld metal / kg electrodes)

B = Changes (number of electrodes / kg weld metal)

H = Deposit rate at 90% of max current (kg weld metal / hour arc time)

T = Fusion time at 90% of max current (s / electrode)

U = Arc voltage (V)