

CLASSIFICATION

Flux	Flux/wire		
ISO 14174		AWS A5.17 / A5.23	ISO 14171-A : MR
S A FB 1 66 AC H5	888 / L-61	F7A6-EM12K	S 38 5 FB S2Si
	888 / L-50M (LNS 133U)	F7A8/F6P8-EH12K	S 42 6 FB S3Si
	888 / LNS 140A	F8A4-EA2-A2	S 46 4 FB S2Mo
	888 / L-70	F8A4-EA1-A2	S 46 4 FB S2Mo
	888 / LNS 160	F7A8/P8-ENi1-Ni1	S 42 5 FB S2Ni1*
	888 / LNS 162	F7A8/F7P8-ENi2-Ni2	S 42 6 FB S2Ni2*
	888 / LNS 164	F9A6/F9P4-EF3-F3	S 50 4 FB S3Ni1Mo
	888 / LNS 165	F8A6/F7P8-ENi5-Ni5	S 50 4 FB Sz
	888 / LNS 150	F7P6-EB2-B2	S 50 2 FB CrMo1
	888 / LNS 151	F8P6-EB3-B3	
	888 / LA-100	F10A4-EM2-M2	S 50 4 FB SZ

GENERAL DESCRIPTION

Basic flux designed for carbon and low alloy steels
 Easy slag removal in deep groove
 Robust mechanical properties including CTOD values
 Bruscato factor typically below 12 ppm with LNS150 & LNS151 wires
 Excellent in multi arc configurations
 Only available in Sahara ReadyBag™

APPROVALS

Wire grade	TÜV
L-61	✓

CHEMICAL COMPOSITION (W%), TYPICAL, ALL WELD METAL

Wire grade	C	Mn	Si	P	S	Ni	Mo	Cr	Bruscato factor
L-61	0.08	1.05	0.37	<0.02	<0.015				
L-50M (LNS 133U)	0.07	1.45	0.55	<0.02	<0.015				
LNS 140A (L-70)	0.07	1.0	0.35	<0.02	<0.015		0.4		
LNS 160	0.07	1.2	0.4	<0.02	<0.015	0.95			
LNS 162	0.07	1.1	0.4	<0.02	<0.015	2.1			
LNS 164	0.08	1.7	0.5	<0.02	<0.01	0.9	0.5		
LNS 165	0.06	1.50	0.5	<0.02	<0.015	0.97	0.2		
LNS 150	0.069	0.90	0.5	<0.02	<0.015		0.56	1.34	<10 ppm
LNS 151	0.062	0.85	0.3	<0.02	<0.015		0.93	2.15	<10 ppm
LA-100	0.06	1.60	0.7	<0.02	<0.015	1.8	0.42	0.08	

MECHANICAL PROPERTIES, TYPICAL, ALL WELD METAL

Wire grade	Condition*	Yield strength (N/mm ²)	Tensile strength (N/mm ²)	Elongation (%)	Impact ISO-V(J)			
					-20°C	-40°C	-50°C	-60°C
L-61	AW	415	515	31		135	100	
L-50M (LNS 133U)	AW	480	580	29			90	70
	SR	430	550	31		105		65
LNS 160	AW	470	550	26		115		
	SR	410	510	27		160		120
LNS 162	AW	500	580	25		100		55
	SR	440	550	25		160		120
LNS 164	AW	650	750	21		65		30
	SR	610	700	23		65		30
LNS 165	AW	530	620	26		70		40
	SR	495	595	27				70
LNS 150	SR	420	580	26	100			
LNS 151	SR	530	645	23				
LA-100	AW	680	760	25				

* AW : As welded - SR : Stress relieved

All information in this data sheet is accurate to the best of our knowledge at the time of printing. Please refer to www.lincolnelectric.eu for any updated information.

Fumes: Material Safety Data Sheets (MSDS) are available on our website.

EXAMPLES OF MATERIALS TO BE WELDED

Steel grades/Code	Type	Multirun													
		L-61	L-50M (LNS 133U)	L-70	LNS 164	LNS 165	LNS 150	LNS 151	LNS 160	LNS 162	LA 100				
		AW -50°C	AW -60°C	SR-60°C	AW	AW-40°C	AW-40°C	SR-60°C	SR-50°C	SR-50°C	AW	SR	AW	SR	AW-40°C
Ship plates															
	A to E	✓	✓	✓											
	AH(32),DH(36), EH(36)	✓	✓	✓		✓	✓	✓			✓	✓	✓	✓	
General structural steels															
EN 10025 part 2	S185, S235, S275	✓	✓	✓											
	S355	✓	✓	✓		✓	✓	✓			✓	✓	✓	✓	
Cast steels															
EN 10213-2	GP240R	✓	✓	✓											
Pipe materials															
EN 10208-2	L210, L240, L290	✓	✓	✓											
	L360	✓	✓	✓		✓	✓	✓			✓	✓	✓	✓	
	L415		✓			✓	✓	✓							
	L445, L480					✓	✓	✓							
EN 10216-1/10217-1	P235, P275	✓	✓	✓											
	P355	✓	✓	✓		✓	✓	✓			✓	✓	✓	✓	
Boiler & pressure vessel steels															
EN 10028-1	P235GH, P265GH, 295GH	✓	✓	✓											
EN 10028-2 (High temperature steel)	16 Mo 3				✓										
	13CrMo 4-5								✓	✓					
	10CrMo 9-10								✓	✓					
EN 10028-4/10222-3 (Low temperature steel)	11MnNi5-3, 13MnNi6-3						✓	✓			✓	✓	✓	✓	✓
Fine grained steels															
EN 10025 part 3/4	S275	✓	✓	✓											
	S355	✓	✓	✓		✓	✓	✓			✓	✓	✓	✓	
	S420		✓			✓	✓	✓					✓	✓	
	S460					✓	✓	✓							
High yield strength steels															
EN 10025 part 6	S460, S500					✓	✓	✓			✓	✓	✓	✓	

FLUX CHARACTERISTICS

Current type	AC / DC
Basicity (Boniszewski)	2.3
Solidification speed	High
Grain size (ISO 14174)	2 - 20

SUGGESTIONS FOR USE

Boiler and pressure vessels
Off-shore applications
Wind towers
Structural fabrications

PACKAGING AND AVAILABLE SIZES

Unit	Net weight (kg)
Sahara ReadyBag™ (SRB)	25