SARMA TUBULARA
FLUX CORED WIRE

SARME TUBULARE PENTRU SUDAREA MIG-MAG

An dupa an, utilizarea industriala a sarmelor tubulare a progresat foarte mult. Calitatea acestor produse, in ultimii ani a evoluat constant atat sub aspect operational cat si in planul fiabilitatii; de subliniat de asemenea constanta caracteristicilor mecanice (metal depus) si chimice a imbinarilor sudate. Astazi cu sarme tubulare se poate obtine calitatea metalurgica permisa de electrozii inveliti si productivitate mult crescuta in raport cu sarmele pline.

Daca oferta SAF-FRO este atat de mare, se explica prin domeniul de aplicatii foarte vast.

Usurarea alegerii unei sarme tubulare se face in functie de diferite criterii de utilizare – grosime si tip de material de baza, norme de protectie si securitate, etc.si este obiectivul acestei introduceri.

Norme

Principalele norme care permit clasificarea sarmelor tubulare sunt urmatoarele:

- EN ISO 17632 (ex EN 758): simbolizarea sarmelor tubulare pentru sudarea otelurilor nealiate si a otelurilor cu granulatie fina.
- EN ISO 17634-A (ex EN 12071): simbolizarea sarmelor tubulare pentru sudarea otelurilor rezistente la fluaj.
- EN ISO 18276-A (ex EN 12535): simbolizarea sarmelor tubulare pentru sudarea otelurilor de inalta rezistenta
- EN ISO 17633 simbolizarea sarmelor tubulare pentru sudarea otelurilor inox si inox refractare
- AWS SFA – 5.18: clasificarea sarmelor pentru sudarea otelurilor carbon (pline si tubulare fara zgura)
- AWS SFA – 5.20: clasificarea sarmelor tubulare ce depun un otel nealiat
- AWS SFA – 5.29: clasificarea sarmelor tubulare ce depun un otel slab aliat
- AWS SFA – 5.22: clasificarea sarmelor tubulare ce depun un otel inoxidabil.

Tipuri de sarme tubulare

Sarme tubulare cu flux rutilic (depun zgura)

- Sunt sarmele cel mai usor de manuit
- Caracterizate printr-o mare rata de depunere si in particular si pentru vertical ascendent
- Depun un material cu un foarte bun aspect, buna racordare la materialul sudat
- Ideal pentru stratul de radacina, se recomanda suportu ceramic KERALINE
- Se utilizeaza cu gaz: CO_2 sau Mix gaz (Ar/CO_2 - 80/20)

Sarme tubulare cu pulberi metalice

- Utilizate pentru realizarea stratului de radacina.
- Prezinta un risc minim de fisurare la rece. H2 difuzibil foarte jos (≈ 2 ml conf. ISO 3690)
- Au o inalta rata de depunere la orizontal.
- Ideala pentru lucrari de cazangerie si automatizarea sudurii.
- Randament: 95 %
- Se utilizeaza cu gaz: Mixt gaz (Ar/CO_2 - 80/20)
- In gama SAF-FRO exista de asemenea produse cu emisii scazute de fum (reducere de 50 % a fumului cu amestec Ar/CO_2 - 80/20 si de 80% cu amestec $Ar/CO_2/O_2$)

Sarme tubulare cu flux bazic

- Prezinta un risc minim de fisurare la rece pentru ca H_2 difuzibil este foarte redus (< 3 ml conf. ISO 3690)
- Au o rata de depunere la pozitia vertical ascendant mai mare decat sarmele cu pulberi metalice
- Au un bun comportament metalurgic dupa tratament termic
- Se utilizeaza cu gaz: Mix gaz (Ar/CO_2 – 82%/1 8%) sau CO_2

Sarme tubulare pentru sudare fara gaz

- Componentele insertiei acestor sarme permit realizarea unei protectii gazoase autonome
- Este o solutie ideala pentru aplicatiile de santier (fara butelii de gaz)
- Este o solutie particulara pentru cordoanele de lungimi mici (numeroase amorsari).
- Fum fara bariu.

Sarme tubulare inoxidabile

Pozitia PF (vertical ascendent)

- Sarme speciale pentru sudare la pozitie ce permit sudare de 4 ori mai repede decat sarmele pline.
- Sarme tubulare standard permit sa se sudeze: + 12% in raport cu sarme pline, + 58% in raport cu electrod.

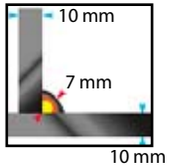
Pozitia PG (vertical descendent)

- Sarme tubulare standard permit sa se sudeze: + 40% in raport cu sarme pline.

Pozitia PA (orizontal)

- Sarme tubulare standard permit sa se sudeze: + 38% mai repede

Productivitatea sarmelor tubulare INOXCORED



Sudarea in pozitie vertical ascendent (PF)

	Electrod	Sarma plina	Sarma tubulara	
			standard	pozitie "P"
Diametru mm	4,0	1,2	1,2	1,2
Curent A	90	130	130	220
Viteza cm/min	5,2	7,3	8,2	30

STEELCORED M8

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 46 2 MM 1 H5
EN ISO 17632-B:	T 55 2 T 15-IMA-UH5
AWS A5.18:	E70C-3MH4

AUTORIZARI / *APPROVALS*

TÜV:	T 46 2 M M 1 H5 - EN 758	**GL:**	3Y 40-S H5
RINA:	3Y 3S H5	**BV:**	SA 3 - 3YM S H5
LRS:	3S - 3Y40S H5	**DNV:**	IIIY 40 M S H5
DB			

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata, umpluta cu pulberi metalice (fara zgura). Usor de utilizat, cu o rata mare de depunere si viteza mare de sudare. Sudabilitate optima chiar si in cazul sudarii pe table ruginite sau cu calamina. Absenta totala a stropilor. Recomandat pentru utilizarea intr-o singura trecere sau in mai multe, in aplicatii semi-automate, automate sau robotizate. Pentru sudarea multistrat nu este necesara curatarea stratului anterior. Se recomanda utilizarea folosind amestec de gaze, pentru a obtine caracteristici mecanice ridicate pana la -20°C , Ar/CO2 (M 21 - EN 439).

MAIN FEATURES

Seamless copper coated metal-cored wire (no slag). Easy use with high deposition rate and welding speed. Good bead appearence and wetting characteristics without undercuts also on "calamined" and rusted plates. No spatters. Suitable for single and multipass welding semi-automatic, automatic and robot application. Multipass welding without in-between cleaning. To be used for mechanical properties down to -20° C with mix Ar/CO_2 (M 21 - EN 439) Gas.

DOMENII DE APLICATIE

Constructii metalice in general;
Constructii feroviare si material rulant;
Masini agricole;
Construirea podurilor etc.
Recipienti sub presiune, boilere.

MAIN APPLICATIONS

General structural work;
Rolling stock construction;
Agricolture machines;
Earth moving machines;
Bridge cranes, cranes construction;
Tank, vessels, boilers construction.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX Ar / CO_2 (M21 - EN 439)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.04 - 0.09	1.10 - 1.60	0.55 - 0.85	≤ 0.02	≤ 0.02				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
Mix	Stare sudată/*As welded*	530 - 680	≥ 460	≥ 24	≥ 50	
Mix	Dupa/*after 620°C x 1h*	510 min	≥ 420	≥ 26	≥ 60	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg	W000281600	W000281602	W000281604	W000281606			
Drum	200 kg	W000281601	W000281603	W000281605	W000281607			

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STEELCORED M10

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 46 4 M M 1 H5
EN ISO 17632-B:	T 55 4 T 15-IMA-UH5
AWS A5.18:	E70C-6MH4

AUTORIZARI / *APPROVALS*

ABS:	4SA-4YSA H5	**RINA:**	4 S4Y S H5
LRS:	4Y40S H5	**DNV:**	IV Y40MS (H5)
GL:	4YSH5	**DB:**	N° 42.047.04
BV:	SA3YM-A3YM-H5 (KV40)		
TÜV:	E71T-1		

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata, umpluta cu pulberi metalice, fara zgura, pentru sudare intr-un strat sau in mai multe, cu caracteristici ridicate de depunere si caracteristici mecanice excelente pana la -40°C, in stare sudata si dupa tratamentul termic de detensionare. Aceasta proprietate face ca aceasta sarma tubulara sa fie comparabila din toate punctele de vedere cu sarmele tubulare bazice. In special recomandata pentru aplicatii automate si robotizate. Se recomanda a se utiliza cu protectie de Ar/CO_2. Este posibil sa se foloseasca deasemenea in mediu de CO_2.

MAIN FEATURES

Seamless copper coated cored wire, special type with metal powder filling, no slag, for welding in single or multirun technique. Excellent weldability, high deposition rate, very good impact values at low temperatures, down to -40°C as welded and post weld heat treatment. These properties make the M10 also comparable to the basic flux-cored wires. Especially suitable for automatic and robotic applications. To be used with mix Ar/CO_2 shielding gas. Suitable also in CO_2.

DOMENII DE APLICATIE

Constructii metalice, recipienti sub presiune;
Poduri, masini de decopertat;
Constructii navale;
Constructii material rulant.

MAIN APPLICATIONS

Structural steelwork, boiler-works;
Bridges, earth moving equipments;
Shipbuilding;
Rolling stock construction.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.06 - 0.11	1.30 - 1.75	0.30 - 0.60	≤ 0.020	≤ 0.020				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	
Mix	Stare sudată/*As welded*	550 - 650	≥ 460	≥ 25	≥ 60	
Mix	Dupa/*after 620°C x 1h*	530 - 620	≥ 420	≥ 26	≥ 90	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg	W000281609	W000281612	W000281614	W000281617			
B 200	5 kg	W000281608	W000281611		W000281616			
Drum	200 kg	W000281610	W000281613	W000281615	W000281618			

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SAFDUAL 206A

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A:	T 42 2 M M 1 H5
EN ISO 17632-B:	T 49 2 T 15-IMA-UH5
AWS A5.18:	E70C-3MH4

AUTORIZARI / ***APPROVALS***

BV:	SA3YM H5 (P)	**TÜV**	(09567.02/0)
DB	42.116.11	**DNV:**	IIIY40MS H5 (P)
LRS:	3YS H5 (P)		

CARACTERISTICI PRINCIPALE

Sarma tubulara, umpluta cu pulberi metalice, fara zgura, cu un aspect deosebit de bun al cordonului, recomandata sudarii intr-un strat sau in mai multe, cu caracteristici mecanice garantate pana la -30°C. Se recomanda a se utiliza folosind amestec de gaze Ar/CO2, la constructii metalice in general, constructii de poduri, feroviare si material rulant, recipienti sub presiune, boilere. Inalta rata de depunere si si o excelenta stabilitate a arcului.

MAIN FEATURES

Metal cored wire for welding in single or multipass technique, with mechanical properties quaranteed down to -30°C. Recommended for steel construction of bridges, rolling stock construction, boilers and pressure vessels. Slag free, very good bead appearance. To be used with mix Ar/CO2 shielding gas.High deposition rate and excellent arc stability.

DOMENII DE APLICATIE

Constructii metalice, recipienti sub presiune;
Poduri, masini de decopertat;
Constructii navale;
Constructii material rulant.

MAIN APPLICATIONS

Structural steelwork, boiler-works;
Bridges, earth moving equipments;
Shipbuilding;
Rolling stock construction.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.06	1.50	0.60	0.020	0.012				

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	**Tratament termic/*Heat treatment***	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -30°C	
Mix	Stare sudată/*As welded*	500 - 640	≥ 420	≥ 20	≥ 60	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg	W000281620	W000281622	W000281625	W000281627			
Drum	200 kg		W000281621					

SAFDUAL 206

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A:	T 46 4 M M 1 H5
AWS A5.18:	E70C-6MH4

AUTORIZARI / ***APPROVALS***

BV:	SA3YM H5 (P)	**DNV:**	IIIY40MS (P)
LRS:	3YS H5 (P)	**TÜV**	(07596.02/0)
DB	42.116.11		

CARACTERISTICI PRINCIPALE

Sarma tubulara, umpluta cu pulberi metalice, fara zgura, cu un aspect deosebit de bun al cordonului, recomandata sudarii intr-un strat sau in mai multe, cu caracteristici mecanice garantate pana la -40°C. Se recomanda a se utiliza folosind amestec de gaze Ar/CO_2, la constructii metalice in general, constructii de poduri, feroviare si material rulant, recipienti sub presiune, boilere.

MAIN FEATURES

Metal cored wire for welding in single or multipass technique, with mechanical properties quaranteed down to -40°C. Recommended for steel construction of bridges, rolling stock construction, boilers and pressure vessels. Slag free, very good bead appearance. To be used with mix Ar/CO_2 shielding gas.

DOMENII DE APLICATIE

Constructii metalice, recipienti sub presiune;
Poduri, masini de decopertat;
Constructii navale;
Constructii material rulant.

MAIN APPLICATIONS

Structural steelwork, boiler-works;
Bridges, earth moving equipments;
Shipbuilding;
Rolling stock construction.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.05	1.50	0.60	0.020	0.012				

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	**Tratament termic/*Heat treatment***	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	
Mix	Stare sudată/*As welded*	530 - 680	≥ 460	≥ 20	≥ 47	
Mix	Dupa/*after PWHT 580°C x 2h*	500 - 640	≥ 420	≥ 20	≥ 47	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg	W000281629	W000281630	W000281633	W000281634			
Drum	200 kg		W000281632					

STEELCORED 206 HP

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 42 2 M M 1 H5
EN ISO 17632-B:	T 49 2 T 15-IMA-UH5
AWS A5.28:	E70C-6MH4

AUTORIZARI / *APPROVALS*

LRS:	3S-3Y H5	**TÜV**	
BV:	3Y M H5		
DNV:	IIIY 40 MS		

CARACTERISTICI PRINCIPALE

O noua generatie de sarme tubulare "low fume" cu reducerea emisiilor de fum la sudare cu pana la 50% (sudare cu gaz M 21) pana la 80% (gaz M 14) fata de sarmele standard. Sarma cu insertie de pulbere metalica, fara zgura, cu inalta capacitate de transfer la curent mare de sudare. Aproape fara stropi cand se sudeaza in spray-arc. Buna reamorsare, chiar cu sarma rece, fiind recomandata la aplicatiile robotizate. Caracteristici: o inalta rata de depunere si implicit viteza mare de sudare, buna topire, excelenta depunere a cordonului, fara santuri marginale, chiar nici pe suprafata metalelor contaminate si corodate.

MAIN FEATURES

This new low fume copper coated metal cored wire generates less fume than similar standard products. It enables fume emission rate reduction of up to 50% (standard shielding gas M 21) up to 80% (shielding gas M 14). Slagless metal powder tubular cored wire with high current carrying capacity. Allmost splatter-free when welding in the spray-arc range. Good restriking, even with a cold the wire tip, thus being suitable for a robot applications. Characteristics features: high desition rate and welding speed, good wall fusion, finely rippled welds, without undercutting into the base metal, not even on contamined or corroded metal surfaces.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Constructii sudate, boilere;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Structural steelwork, boiler-works;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: M21 (Ar / CO_2); M14 (Ar / CO_2 / O_2)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % (valori tipice) / *ALL-WELD METAL CHEMICAL ANALYSIS % (typical values)*

GAZ/*GAS*	C	Mn	Si	S	P				
Ar / CO_2	0.02	1.50	0.80	≤ 0.005	≤ 0.013				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	510 - 610	≥ 420	≥ 26	≥ 65	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
			1.2	1.4				
B 300	16 kg		W000263887	W000263888				
Drum	230 kg		W000263889	W000263890				

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STARDUAL 208 HP

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 42 3 M M 1 H5
AWS A5.28:	E70C-3MH4

AUTORIZARI / *APPROVALS*

LRS:	SY 40S H5	**DNV:**	IIIY 40 MS H5
BV:	SA3-3Y M H5	**DB**	
GL:	3Y 40 H5S		

CARACTERISTICI PRINCIPALE

O noua generatie de sarme tubulare cuprate "low fume" cu reducerea emisiilor de fum la sudare cu pana la 40% fata de sarmele standard (sudare cu gaz M 21). Sarma cu insertie de pulbere metalica, fara zgura, cu excelente proprietati de sudare in domeniul short-arc si spray-arc. Aproape fara stropi cand se sudeaza in spray-arc. Buna reamorsare, chiar cu sarma rece, fiind recomandata la aplicatiile robotizate. Caracteristici: o inalta rata de depunere si implicit viteza mare de sudare, buna topire, excelenta depunere a cordonului, fara santuri marginale, chiar nici pe suprafata metalelor contaminate si corodate.

MAIN FEATURES

This new low fume copper coated metal cored wire generates less fume than similar standard products. It enables fume emission rate reduction of up to 40% (standard shielding gas M 21). Slagless metal powder tubular cored wire with outstanding welding properties in the short-arc and spray-arc ranges. Allmost splatter-free when welding in the spray-arc range. Good restriking, even with a cold the wire tip, thus being suitable for a robot applications. Characteristics features: high desition rate and welding speed, good wall fusion, finely rippled welds, without undercutting into the base metal, not even on contamined or corroded metal surfaces.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Constructii sudate, boilere;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Structural steelwork, boiler-works;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: M21 (Ar / CO_2)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Ar CO_2	0.02	1.60	0.80	≤ 0.005	≤ 0.013				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	510 - 600	≥ 420	≥ 24	≥ 50	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
			1.2	1.4				
B 300	16 kg		W000263891	W000263892				

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

SAFDUAL 255

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 18276-A:	T 55 5 1.5 NiMo MM1-H5
AWS A5.29:	E 91 T5 K3
AWS A5.28:	E 90 C G M H4

AUTORIZARI / *APPROVALS*

LRS:	4Y 55S H5
DNV:	IV Y50 MS
BV:	UP H5

CARACTERISTICI PRINCIPALE

Sarma tubulara cu pulberi metalice pentru sudarea in toate pozitiile. Recomandata sudarii otelurilor cu limita de curgere ridicata, de tipul E 420, E 460R si FP, E 500R si FP, E 550FP.
Hidrogenul difuzibil < 2 ml/100g, confera materialului depus inalta rezistenta la fisurare; caracteristici mecanice ridicate.
Pentru stratul de radacina cu patrundere back.
Este recomandata pentru sudarea echipamentelor de ridicat, turbinelor, armamentului.

MAIN FEATURES

Metal cored wire for welding in all position. Suitable for high yield strength steels. Corresponding steel classes: E 420, E 460R and FP, E 500R and FP, E 550FP.
Diffusible hydrogen < 2 ml/100g confer of weld metal, very high resistance to cracking; high mechanical characteristics.
For root pass with back penetration.
It is recommended for welding lifting equipments, turbines, armaments.

DOMENII DE APLICATIE

Echipament de ridicat;
Turbine;
Armament;
Instalatii publice (canalizare).

MAIN APPLICATIONS

Lifting equipments;
Turbines;
Armaments;
Forced piping.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: Mix. (Ar/ CO_2) (M21 - EN 439)
H_2 DIF. / *DIFF. H_2*: 5 ml / 100 gr max.

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	Ni	Mo	S	P		
Ar/CO_2	0.09	1.30	0.40	1.70	0.40	0.013	0.010		

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	Kv J -50°C
Ar/CO_2	Stare sudată/*As welded*	720	650	19	80	70

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281737		W000281738			

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

SAFDUAL 270

SARMA TUBULARA / *METAL CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 18276-A:	T 69 5 Mn2NiMo MM1-H5
EN ISO 17632-B:	T 78 5 T 15-1MA-NM2-UH5
AWS A5.29:	E 111 T5 K3
AWS A5.28:	E 100 C G M H4

AUTORIZARI / *APPROVALS*

ABS:	UP
DNV:	IV Y62 MS H5
BV:	UP H5

CARACTERISTICI PRINCIPALE

Sarma tubulara cu pulberi metalice pentru sudarea in toate pozitiile. Recomandata sudarii otelurilor cu limita de curgere ridicata, de tipul E 620R si FP, E 690R si FP.
Hidrogenul difuzibil < 2 ml/100g, confera materialului depus inalta rezistenta la fisurare; caracteristici mecanice ridicate.
Pentru stratul de radacina cu patrundere back.
Este recomandata pentru sudarea echipamentelor de ridicat, turbinelor, armamentului.

MAIN FEATURES

Metal cored wire for welding in all position. Suitable for high yield strength steels. Corresponding steel classes: E 620R and FP, E 690R and FP.
Diffusible hydrogen < 2 ml/100g confer of weld metal, very high resistance to cracking; high mechanical characteristics.
For root pass with back penetration.
It is recommended for welding lifting equipments, turbines, armaments.

DOMENII DE APLICATIE

Echipament de ridicat;
Turbine;
Armament;
Instalatii publice (canalizare).

MAIN APPLICATIONS

Lifting equipments;
Turbines;
Armaments;
Forced piping.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: Mix. (Ar/ CO_2) (M21 - EN 439)
H_2 DIF. / *DIFF. H_2*: 5 ml / 100 gr max.

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	Ni	Mo	S	P		
Ar/CO_2	0.07	1.80	0.60	2.40	0.65	0.013	0.010		

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	Kv J -50°C
Ar/CO_2	Stare sudată/*As welded*	840	740	18	80	60

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281740					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 14 HD

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 46 2 P M 1 H5
EN ISO 17632-A:	T 46 2 P C 1 H5
EN ISO 17632-B:	T 55 2 T 1-1C(M)A-UH5
AWS A5.20:	E71T-1 MH4 / E71T-1H4

AUTORIZARI / *APPROVALS*

ABS:	3SA-3Y400SAH5	**RINA:**	SG 52 3H5
DNV:	III Y40MS(H5)	**LRS:**	3Y40SH5
TÜV:	T462PC1H5-T462PM1H5	**BV:**	3-3Y 40 M H5
DB:	42. 047. 09	**GL:**	3Y 40 H5 S

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata pentru sudarea intr-un singur strat sau in mai multe a structurilor metalice. Permite realizarea unor depuneri cu viteza mare de depunere, fara stropi, cu un arc stabil, cu un aspect al cordonului estetic chiar si pe table cu calamina. Recomandata in mod deosebit pentru utilizarea in constructii navale, in special in pozitia vertical descendent, permitand realizarea unor cordoane de mici dimensiuni. Se poate suda folosind amestec de gaze Ar/CO_2 (M21 - EN 439) sau CO_2 de mare puritate. Este recomandat pentru sudarea otelurilor carbon de tipul Fe430 - Fe510, cu bune caracteristici de tenacitate pana la -20°C.

MAIN FEATURES

Rutile seamless copper coated cored wire, for welding metal constructions in single or multipass technique. Designed for high deposition rate welding, stable and low spattering arc characteristics. Easy slag removal and good bead appearance, even on oxidized plates. Particularly designed for shipbuilding applications, especially for vertical up welding, even without waving the torch in order to obtain small size beads. Shielding gas: Mix Ar/CO_2 (M21 - EN 439) or CO_2. For welding carbon manganese steels like Fe 430 - Fe 510, with good impact properties down to -20°C.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Agricolture machines;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: Mix (Ar/CO_2) or CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 g. max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.03 - 0.07	1.20 - 1.65	0.35 - 0.70	≤ 0.020	≤ 0.020				
CO_2	0.03 - 0.07	1.00 - 1.50	0.20 - 0.60	≤ 0.020	≤ 0.020				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
Mix	Stare sudată/*As welded*	550 - 680	≥ 460	≥ 23	≥ 80	
CO_2	Stare sudată/*As welded*	530 - 620	≥ 460	≥ 24	≥ 70	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg	W000281664	W000281666		W000281668			
B 200	5 kg		W000281665					
Drum	200 kg		W000281667					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

FLUXOFILCORD 16

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 42 2 P M 1 H5
EN ISO 17632-A:	T 42 0 P C 1 H5
EN ISO 17632-B:	T 49 2 T 1-1C(M)A-UH5
AWS A5.20:	E71T-1MH4 / E 71 T-GH4

AUTORIZARI / *APPROVALS*

ABS:	2YSA H5 (CO_2) - 3Y SA H5 (Mix)
RINA:	SG 42-52 2 H5(CO_2) - SG 42-52 3 H5 (Mix)
LRS:	2S-2YS-H5 (CO2) - 3S-3YS-H5 (Mix)
TÜV:	SG R 1 C M 4243
DB	

CARACTERISTICI PRINCIPALE

Sarma tubulara rutilica, cu un excelent aspect al cordonului de sudura, usoara desprindere a zgurii, arc stabil, practic fara stropire. Recomandata pentru constructii metalice ce lucreaza la temperaturi joase, pana la -20°C, numai in protectie de amestec de gaze Ar/CO_2. Indicata pentru toate otelurile Carbon-Mangan, cu granulatie fina si limita de elasticitate ridicata.

MAIN FEATURES

Rutile tubolar wire, excellent bead appearance, easy slag removal, stable, pratically spatter-free arc. For structures subject to low temperatures: below -20° C, welded under a Ar/CO_2 shielding gas. suitable for all Carbon-Manganese steels, even with fine grains and high yield points.

DOMENII DE APLICATIE

Constructii metalice in general;
Constructii feroviare si de material rulant;
Masini agricole;
Santiere navale;
Constructii de poduri, masini de decopertat;
Constructii de vase de stocare, rezervoare, recipiente sub presiune.

MAIN APPLICATIONS

General structural work;
Rolling stock construction;
Agricolture machines;
Shipbuilding;
Bridge cranes, cranes, earth moving machines;
Tank, vessels, boiler construction.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2)(M21 - EN 439) - CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.02 - 0.06	1.00 - 1.60	0.40 - 0.70	≤ 0.020	≤ 0.020				
CO_2	0.03 - 0.07	0.90 - 1.50	0.20 - 0.60	≤ 0.020	≤ 0.020				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J 0°C	Kv J -20°C
Mix	Stare sudată/*As welded*	510 - 560	≥ 430	≥ 25	≥ 90	≥ 60
CO_2	Stare sudată/*As welded*	500 - 550	≥ 460	≥ 26	≥ 70	≥ 50

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg	W000281653	W000281654	W000281657	W000281659			
Drum	200 kg		W000281655	W000281658	W000281660			
B 200	5 kg							

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 19 HD

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A:	T 46 2 P C 1 H5
EN ISO 17632-B:	T 55 2 T 1-1CA-UH5
AWS A5.20:	E71T-1H4

AUTORIZARI / ***APPROVALS***

ABS:	3Y400SA H5	**RINA:**	3Y40S H5
LRS:	3Y40S H5	**TÜV:**	T46 2 P C 1 H5
DNV:	IIIY40S H5	**DB:**	N° 42.047.08
GL:	3Y40S H5		
BV:	SA3Y40M H5		

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata pentru sudarea intr-un singur strat sau in mai multe straturi. Randamentul de depunere este ridicat, fara stropi si cu un aspect al cordonului regulat chiar si pe table cu calamina. Recomandat in mod deosebit pentru utilizarea in constructii navale, in special in pozitia vertical ascendent, permitand realizarea unor cordoane de mici dimensiuni. Se poate suda folosind CO_2 de mare puritate. Este recomandat pentru sudarea otelurilor carbon de tipul Fe430 - Fe510, cu bune caracteristici de tenacitate pana la -20°C.

MAIN FEATURES

Rutile seamless copper coated cored wire, for welding metal constructions in single or multipass technique. Designed for high deposition rate welding, stable and low spattering arc characteristics. Easy slag removal and good bead appearance, even on oxidized plates. Particularly designed for shipbuilding applications, especially for vertical up welding, even without waving the torch in order to obtain small size beads. Shielding gas: CO_2. For welding carbon manganese steels like Fe 430 - Fe 510, with good impact properties down to -20° C.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Agricolture machines;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** CO_2
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P				
CO_2	0.03 - 0.07	1.20 - 1.60	0.35 - 0.70	≤ 0.020	≤ 0.020				

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	530 - 640	≥ 460	≥ 24	≥ 80	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281671	W000281673	W000281674			
B 200	5 kg	W000281669	W000281670					
Drum	200 kg		W000281672					

SAFDUAL 100

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A:	T 42 3 P C 1 H5
EN ISO 17632-A:	T 42 3 P M 1 H5
EN ISO 17632-B:	T 49 3 T 1-1CA-UH5
EN ISO 17632-B:	T 49 3 T 1-1MA-UH5
AWS A5.20:	E71T-1MJ

AUTORIZARI / ***APPROVALS***

ABS:	3YSA H5 (P)	**DB:**	42.116.12
LRS:	3YS H5 (P)	**RMRS:**	3Y40SHHH (P)
DNV:	IIIY40MS H5 (P)	**BV:**	SA3YM HH (P)
GL:	3Y H5S (P)	**TÜV:**	09598.02

CARACTERISTICI PRINCIPALE

Sarma tubulara cu flux rutilic, pentru sudarea intr-un singur strat sau in mai multe straturi a otelurilor carbon cu caracteristici de tenacitate pana la -20°C. Recomandat pentru sudarea in constructii navale, constructii feroviare si de material rulant, constructii de poduri, etc. Caracterizata printr-o rata mare de depunere, baia de metal topit este usor controlabila si cu remarcabile proprietati de sudabilitate. Recomandata pentru toate pozitiile de sudare. Se sudeaza in protectie de gaz CO_2.

MAIN FEATURES

Rutile cored wire for welding in single or multipass technique of carbon steels with high toughness properties down to -20°C. Recommended for shipbuilding applications, rolling stock construction, and construction of bridges. High deposition rate, the weld pool is easily controllable with outstanding welding properties. Suitable for welding in all positions. To be used with CO_2 shielding gas.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Agricolture machines;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** CO_2
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 g max.

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P				
CO_2	0.05	1.40	0.50	≤ 0.025	≤ 0.020				

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	500 - 640	≥ 420	≥ 20	≥ 80	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281681		W000281681			
S 200	5 kg		W000281680					

SAFDUAL 100 C

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A:	T 46 2 P C 1 H5
EN ISO 17632-B:	T 55 2 T 1-1CA-UH5
AWS A5.20:	E71T-1H8

AUTORIZARI / ***APPROVALS***

ABS:	3YSA H5 (P)	**GL:**	4Y40H5S (P)
LRS:	3YS H5 (P)	**RMRS:**	3Y 40S HHH (P)
DNV:	IIIY40MS H5 (P)	**DB:**	42.116.13
BV:	SA3YM HH (P)		

CARACTERISTICI PRINCIPALE

Sarma tubulara cu flux rutilic, pentru sudarea intr-un singur strat sau in mai multe straturi a otelurilor carbon cu caracteristici de tenacitate pana la -20°C. Recomandat pentru sudarea in constructii navale, constructii feroviare si de material rulant, constructii de poduri etc. Caracterizata printr-o rata mare de depunere (ex. ptr. 245A, 27V, 10 m/min. rata de depunere este de 4,3 Kg/ora). Se poate suda in toate pozitiile. Destinata sudarii in protectie de gaz CO_2.

MAIN FEATURES

Rutile cored wire for welding in single or multipass technique of carbon steels with high toughness properties down to -20°C. Recommended for shipbuilding applications, rolling stock construction, and construction of bridges. High deposition rate (ex. for amperage 245, a current of 27V and a feed rate of 10 m/min., the deposition rate is 4.3 Kg/hour). Suitable for welding in all positions. To be used with CO_2 shielding gas.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Agricolture machines;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** CO_2
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P				
CO_2	0.05	1.20	0.35	≤ 0.025	≤ 0.020				

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	530 - 680	≥ 460	≥ 24	≥ 50	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281686		W000281687			
S 200	5 kg		W000281684					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STARDUAL 100 HP

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A:	T 42 2 P C 1 H5
EN ISO 17632-B:	T 49 2 T 1-1CA-UH5
AWS A5.20:	E71T-1H5

AUTORIZARI / ***APPROVALS***

LRS:	3S-3YH5	**DNV:**	IIIY40 MS H5
GL:	3Y H5S	**BV:**	3Y M H5
ABS:	3Y SA H5		

CARACTERISTICI PRINCIPALE

O noua generatie de sarme tubulare "low fume" cu reducerea emisiilor de fum la sudare cu pana la 30% fata de sarmele standard (sudare in CO_2). Sarma cu insertie de flux rutilic cu o buna rata de depunere datorita usurintei de a controla baia de metal topit, poseda excelente proprietati de sudare. Se poate suda in toate pozitiile de sudare cu numai o setare a parametrilor (24 V, Va_s=9 m/min., dia. 1.2 mm). Cresterea gradului de umplere obtinut prin cresterea curentului, determina o rata de depunere ridicata, ce impune o crestere a vitezei de sudare, deci economii de timp si micsorarea costurilor. Sudare fara stropi, usoara desprindere a zgurei.

MAIN FEATURES

This new low fume flux cored wire generates less fume than similar standard products. It enables fume emission rate reduction of up to 30% (standard shielding gas C1). Rutile tubular cored wire with enhanced filling degree. Due to its easily controllable weld pool, it possesses outstanding welding properties. It can be welded in all positions with only one setting of parameters (24 V, wire feed 9 m/min., dia. 1.2 mm). The enhanced filling degree results in increased current carrying capacity and depositio rate, thus essentially increasing welding speed and leading to a saving of time and costs. Low spatter loss, easy slag rem.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Agricolture machines;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** CO_2
H_2 DIF. / ***DIFF. H_2*:** 5 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % (valori tipice) / ***ALL-WELD METAL CHEMICAL ANALYSIS % (typical values)***

GAZ/*GAS*	C	Mn	Si	S	P				
CO_2	0.03	1.50	0.60	≤ 0.020	≤ 0.020				

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	510 - 610	≥ 420	≥ 24	≥ 50	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
			1.2					
K 300	16 kg		W000263886					
K 200	5 kg		W000263885					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STARDUAL 119 HP

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 46 2 P C 1 H5
EN ISO 17632-B:	T 55 2 T 1-1CA-UH5
AWS A5.20:	E71T-1H4

AUTORIZARI / *APPROVALS*

ABS:	3Y 400SA H5	**LRS:**	3Y 40S H5
RNA:	3Y 40S H5	**DNV:**	IIIY 40MS H5
GL:	3Y 40S H5	**DB**	
BV:	S A3Y40 M H5		

CARACTERISTICI PRINCIPALE

O noua generatie de sarme tubulare cuprate "low fume" cu reducerea emisiilor de fum la sudare cu pana la 30% fata de sarmele standard (sudare in CO_2). Sarma cu insertie de flux rutilic cu o buna rata de depunere datorita usurintei de a controla baia de metal topit, poseda excelente proprietati de sudare. Se poate suda in toate pozitiile de sudare cu numai o setare a parametrilor (24 V, Va_s = 9 m/min., dia. 1.2 mm). Cresterea gradului de umplere obtinut prin cresterea curentului, determina o rata de depunere ridicata, ce impune o crestere a vitezei de sudare, deci economii de timp si micsorarea costurilor. Sudare fara stropi, usoara desprindere a zgurei.

MAIN FEATURES

This new low fume copper flux cored wire generates less fume than similar standard products. It enables fume emission rate reduction of up to 30% (standard shielding gas C1). Rutile tubular cored wire with enhanced filling degree. Due to its easily controllable weld pool, it possesses outstanding welding properties. It can be welded in all positions with only one setting of parameters (24 V, wire feed 9 m/min., dia. 1.2 mm). The enhanced filling degree results in increased current carrying capacity and depositio rate, thus essentially increasing welding speed and leading to a saving of time and costs. Low spatter loss, easy slag rem.

DOMENII DE APLICATIE

Constructii navale;
Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Shipbuilding;
Rolling stock construction;
Agricolture machines;
Bridge cranes, cranes, earth moving machines.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
CO_2	0.03	1.50	0.50	≤ 0.020	≤ 0.020				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
CO_2	Stare sudată/*As welded*	550 - 650	≥ 460	≥ 22	≥ 55	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
			1.2	1.4				
K 300	16 kg		W000263893	W000263896				
K 200	5 kg		W000263894					
D 200	5 Kg		W000263895					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 20 HD

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 46 4 1 Ni P M 1 H5
EN ISO 17632-B:	T 55 4 T 1-1MA-N1-UH5
AWS A5.29:	E81T1-Ni1 MJ H4

AUTORIZARI / *APPROVALS*

RINA:	4Y 46S H5	**DB:**	
GL:	4Y 46 H5S		
ABS:	4Y 46SA H5		
LRS:	4Y 46S H5		
DNV:	IVY 46MS H5		

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata rutilica pentru sudarea in toate pozitiile a otelurilor aliate cu aprox. 1% Ni. Destinata sudarii numai in protectie de amestec de gaze Ar/CO_2 in special pentru sudarea automata circulara a tevilor. Stropire foarte mica, usoara desprindere a zgurii, excelenta estetica a cordonului de sudura lipsit total de pori.

MAIN FEATURES

Rutile copper coated flux cored wire, for welding in all position of carbon and low alloy steels with approximately 1% Ni. Designed for Ar/CO_2 shielding gas especially for circonferential automatic welding of pipes. Low spatters, easy slag removal and good bead aspect.

DOMENII DE APLICATIE

Constructii navale;
Platforme off-shore;
Recipiente sub presiune;
Constructii de poduri.

MAIN APPLICATIONS

Shipbuilding;
Off-shore work;
Pressure vessels;
Bridge construction.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21 - EN 439)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Ni			
Mix	0.04 - 0.07	1.10 - 1.40	0.30 - 0.70	≤ 0.015	≤ 0.015	0.80 - 1.0			

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	
	Stare sudată/*As welded*	550 - 650	≥ 470	≥ 24	≥ 80	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
			1.2					
B 300	16 kg		W000281676					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

FLUXOFILCORD 31

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 42 4 B M 3 H 5
EN ISO 17632-A:	T 42 4 B C 3 H 5
EN ISO 17632-B:	T 49 4 T 1-1C(M)A-UH5
AWS A5.20:	E 70T-5MJH4 - E70T - 5JHA

AUTORIZARI / *APPROVALS*

ABS:	3SA-3YSA H5
RINA:	35-3YS H5
LRS:	3S-3YS H5
TÜV:	SGB1C-M21Y4254
GL:	3Y H5 S

CARACTERISTICI PRINCIPALE

Sarma tubulara bazica, pentru sudarea otelurilor Fe 410 - Fe 510 in unul sau mai multe straturi, recomandat in special pentru constructii metalice ce lucreaza la temperaturi joase, pana la -40°C. Recomandata de asemenea pentru sudarea otelurilor similare cu cele mentionate, cu rezistenta de rupere ridicata si cu tenacitate foarte buna la temperaturi scazute.

MAIN FEATURES

Basic tubolar wire, for welding Fe 410 - Fe 510 steels in one or more passes. Especially suited for structures subject to low temperatures: below -40°C. Suitable for all the above mentioned steels and types with high yield points and good low temperature toughness.

DOMENII DE APLICATIE

Constructii metalice;
Constructii navale;
Constructii feroviare si de material rulant;
Recipienti, boilere etc.

MAIN APPLICATIONS

General structural work;
Tank, vessels, boilers constructions;
Shipbuildings;
Rolling stock construction.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439); CO_2
H_2 DIF. / *DIFF. H_2*: 2 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.04 - 0.08	1.20 - 1.75	0.30 - 0.60	≤ 0.025	≤ 0.025				
CO_2	0.04 - 0.08	1.00 - 1.60	0.15 - 0.45	≤ 0.025	≤ 0.025				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	
Mix	Stare sudată/*As welded*	500 - 560	≥ 420	≥ 26	≥ 70	
CO_2	Stare sudată/*As welded*	500 - 560	≥ 420	≥ 26	≥ 80	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6	2.0	2.4	
B 300	16 kg	W000281705	W000281707	W000281709	W000281710	W000281711	W000281712	
Drum	200 kg		W000281708					
B 200	5 kg		W000281706					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 35

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17634-A:	T Mo L BC 3 H5
EN ISO 17634-A:	T Mo L BM 3 H5
EN ISO 17634-B:	T 55 T 5-1C(M)-2MB-H5
AWS A5.29:	E80T5-G H4
AWS A5.29:	E80T5-GM H4

AUTORIZARI / *APPROVALS*

TÜV
DB

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica special aliata cu Mo, pentru sudarea otelurilor termorezistente pentru tevi, boilere etc; pentru incarcarea pieselor turnate cu compozitie similara. Indicata pentru oteluri de inalta rezistenta, cu granulatie fina, aliate, de tip 15Mo - 16Mo5 sau 1% Mo. Utilizata cu protectie de gaz CO_2 sau amestec de gaze Ar/CO_2.

MAIN FEATURES

Special basic seamless cored wire, Mo alloyed for welding heat resisting steels, specially suitable for piping, boilers or similar; 600D also for facing in castings. Suitable for high yeld point steels, even fine grain or low alloyed, type 15Mo3 - 16Mo5, or 1% Mo content and similar. To be used with CO_2 or Ar/CO_2 shielding gas.

DOMENII DE APLICATIE

Recipiente sub presiune;
Constructii navale;
Constructii industriale de masini;
Fabricare tevi.

MAIN APPLICATIONS

Vessels, boiler fabrication;
Shipbuildings;
Industrial machinery construction;
Pipe fabrication.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439); CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Mo			
Mix/CO_2	0.03 - 0.07	1.10 - 1.60	0.25 - 0.45	≤ 0.015	≤ 0.015	0.30 - 0.60			

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	Kv J -40°C
Mix/CO_2	Stare sudată/*As welded*	570 - 650	≥ 490	≥ 23	≥ 90	≥ 60
	Dupa/*after 620°C x 1h*	550 - 650	≥ 470	≥ 23	≥ 90	≥ 60

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281741	W000281742	W000281743			

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 36

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17634-A:	T Cr Mo 1 B C 3 H5
EN ISO 17634-A:	T Cr Mo 1 B M 3 H5
EN ISO 17634-B:	T 55 T 5-1C(M)-1CM-H5
AWS A5.29:	E80T5-B2 H4

AUTORIZARI / *APPROVALS*

TÜV
DB

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica special aliata cu Cr-Mo , pentru sudarea otelurilor rezistente la 550°C, utilizate in instalatiile termice si petrochimie; pentru incarcari cu duritate pana la 260 HB. Recomandata otelurilor termorezistente de tip 14CrMo3, 13CrMoV42, turnate 17CrMo55, 22CrMo54 si similar. Se utilizeaza cu protectie de gaz CO_2 sau amestec de gaze Ar/CO_2.

MAIN FEATURES

Special basic seamless cored wire, Cr-Mo alloyed, for welding heat resisting up to 550°C, used in thermal or thermic petrolchemical fields; suitable for facing with hardness up to 260 HB. Designed for heat resisting steels, such as 14CrMo3, 13CrMoV42, casting 17CrMo55, 22CrMo54 and similar. To be used with CO_2 or Ar/CO_2 mix shielding gas.

DOMENII DE APLICATIE

Recipiente sub presiune;
Aplicatii in centrale termoelectrice.

MAIN APPLICATIONS

Vessels, boilers fabrication;
Applications in power stations.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439); CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Mo		
Mix/CO_2	0.05 - 0.10	0.70 - 1.25	0.20 - 0.50	≤ 0.015	≤ 0.015	1.0 - 1.50	0.40 - 0.65		

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J +20°C	HRC
Mix/CO_2	Dupa/*after 620°C x 1h*	550 - 650	≥ 470	≥ 21	≥ 150	20 - 22

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281744	W000281745	W000281746			

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 37

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17634-A:	T Cr Mo 2 B C 3 H5
EN ISO 17634-A:	T Cr Mo 2 B M 3 H5
EN ISO 17634-B:	T 55 T 5-1C(M)-2C1M-H5
AWS A5.29:	E90T5-GM H4
AWS A5.29:	E90T5-G H4

AUTORIZARI / *APPROVALS*

TÜV

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica special aliata cu Cr-Mo, pentru oteluri rezistente la temperatura de 600°C utilizate in instalatii termice si petrochimie; indicata incarcarii si repararii pieselor turnate. Recomandata pentru sudarea otelurilor rezistente la temperaturi ridicate de tip 10 CrMo910, 10CrMoSiV7, 12CrSiMo8 sau turnate cu compozitie asemanatoare. Se utilizeaza cu protectie de gaz CO_2 sau amestec de gaze Ar/CO_2.

MAIN FEATURES

Special basic seamless wire, copper coated, Cr-Mo alloyed, for heat resisting steels, up to 600°C, used in thermal or thermic and petrochemical applications: Suitable also for facing on casting, for casting repairs. Suitable for heat resting steels, such as 10 CrMo 910, 10 CrMoSi; V7, 12 CrSiMoB or casting with same composition. Can be used with Ar/CO_2 Mix or CO_2 shielding gas.

DOMENII DE APLICATIE

Recipienti sub presiune;
Industria chimica, petrochimica.

MAIN APPLICATIONS

Vessels, boilers fabrication;
Chemical, petrochemical industry.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439); CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Mo		
Mix/CO_2	0.07 - 0.12	0.7 - 1.25	0.30 - 0.60	≤ 0.020	≤ 0.025	2.0 - 2.5	0.90 - 1.30		

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J +20°C	HRC
Mix/CO_2	Dupa/*after 620°C x 1h*	620 - 720	≥ 540	≥ 19	≥ 150	32 - 34

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281747	W000281748	W000281749			

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 42

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 18276-A:	T 69 6 Mn 2Ni Cr Mo B C 53 H5
EN ISO 18276-A:	T 69 6 Mn 2Ni Cr Mo B M 53 H5
EN ISO 18276-B:	T 78 6 T5-1C(M)-N4 C1 M2-UH5
AWS A5.29:	E110 T5 - K4 H4
AWS A5.29:	E110 T5 - K4 M H4

AUTORIZARI / ***APPROVALS***

TÜV

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica special aliata cu Cr-Ni-Mo, pentru aplicatii cu cerinte de valori inalte ale limitei de curgere si garantarea rezilientei la temperaturi foarte joase. Recomandata pentru oteluri de tip T1-HY80-NA.X.TRA 70 si similare, pentru imbinari cap la cap. Utilizata cu protectie de gaz CO_2 sau amestec de gaze Ar/CO_2.

MAIN FEATURES

Basic seamless cored wire, copper coated, special Cr-Ni-Mo alloyed, for applications requiring very high yeld points and impact values at very low temperatures. Suitable for steels like T1-HY80-NA.X.TRA 70 and similars, for butt joints. To be used with CO_2 or Ar/CO_2 mix shielding gas.

DOMENII DE APLICATIE

Masini de decopertat;
Masini agricole;
Constructii feroviare si de material rulant etc.

MAIN APPLICATIONS

Earth moving machines;
Agricolture machines;
Rolling stock construction.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439) - CO_2
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Ni	Mo	V
Mix	0.04 - 0.08	1.40 - 1.70	0.30 - 0.60	≤ 0.025	≤ 0.025	0.30 - 0.60	2.00 - 2.60	0.30 - 0.60	≤ 0.05

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -60°C	
Mix	Stare sudată/*As welded*	760 - 850	≥ 680	≥ 17	≥ 47	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000281726	W000281727	W000281728			

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED M42

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 18276-A:	T 69 4 Mn 2Ni Cr Mo MM 1 H5
EN ISO 18276-B:	T 78 4 T5-1MA-N4 C1 M2-UH5
AWS A5.29:	E110 C - G M H4

AUTORIZARI / ***APPROVALS***

TÜV

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata, aliata cu Cr-Ni-Mo, umpluta cu pulberi metalice, fara zgura. Pentru sudarea in unul sau mai multe straturi in toate pozitiile cu rata mare de depunere. Destinata pentru sudarea otelurilor cu limita de curgere ridicata ca: T1 - WELDOX 700 - HY 80 - NA.X.TRA 70 si similare. A se utiliza numai cu protectie de Argon/CO_2 (M21-EN439).

MAIN FEATURES

Seamless copper coated cored wire, special type with metal power fillig no slag low alloyed with Cr-Ni-Mo. For single and multipass welding in all positions and high deposition rate. Suitable for welding high yield strength steels such as: WELDOX 700, NA.X.TRA 70 - T1 - HY 80. Very good impact values at low temperatures. To be used with mix Ar/CO_2 shielding gas.

DOMENII DE APLICATIE

Constructii de poduri, masini de decopertat etc.
Dispozitive de ridicat.

MAIN APPLICATIONS

Earth moving equipments;
Bridge cranes, crane constructions;
Lifting devices.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Ni	Mo	V
Mix	0.04 - 0.08	1.30 - 1.80	0.30 - 0.70	≤ 0.015	≤ 0.020	0.20 - 0.60	1.80 - 2.30	0.30 - 0.60	≤ 0.05

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -51°C	
Mix	Stare sudată/*As welded*	760 - 850	≥ 680	≥ 17	≥ 47	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2					
B 300	16 kg	W000281729	W000281730					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 45

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 18276-A: T 89 4 Mn 2 Ni1 Cr Mo B M 3 H5
AWS A5.29: E120T5-G M H4

AUTORIZARI / ***APPROVALS***

TÜV

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica,slab aliata pentru structuri puternic solicitate si reziliente pana la -40°C. Utilizarea amestecului de gaze garanteaza o operativitate excelenta in realizarea imbinarilor de colt. Zgura se desprinde foarte usor iar cordonul are un aspect estetic deosebit.

MAIN FEATURES

Low alloyed, basic seamless cored wire. Designed for structures with high yield point and impact values required at -40° C. Ar/CO_2 shieldiing gas guarantees excellent features in fillet welding. Very easy slag removal; very good bead aspect.

DOMENII DE APLICATIE

Excavatoare;
Masini agricole;
Constructii de masini.

MAIN APPLICATIONS

Earth moving machines;
Agricolture machines;
Industrial machinery construction.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Ni	Mo	
Mix	0.07 - 0.10	1.60 - 2.10	0.30 - 0.50	≤ 0.015	≤ 0.015	0.80 - 1.20	1.50 - 2.0	0.30 - 0.60	

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	
Mix	Stare sudată/*As welded*	950 - 1100	≥ 900	≥ 14	≥ 47	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4				
B 300	16 kg		W000281731	W000281732				

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

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SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 18276-A: T 62 5 Mn1,5 Ni P H5
EN ISO 18276-B: T 69 5 T1-1MA-N4 M1-UH5
AWS A5.29: E101 T1-G M H4

AUTORIZARI / ***APPROVALS***

ABS: UP
LRS: 4Y 62S H5
DNV: IIIY 55 MS H5

CARACTERISTICI PRINCIPALE

Sarma tubulara cu flux rutilic, recomandata pentru sudarea otelurilor carbon cu caracteristici de tenacitate pana la -50°C. Ex.: EN 450: E 460, E 520, E 620. Recomandata pentru sudarea tevilor de presiune, turbinelor, diverselor lucrari publice, aplicatiilor offshore, etc. Recomandata sudarii in toate pozitiile, cu o excelenta sudabilitate si usoara desprindere a zgurei. Buna rezistenta la fisurarea (preincalzirea in functie de grosimea si tipul materialului de sudat).

MAIN FEATURES

Rutile cored wire for welding of carbon steels with high toughness properties down -50° C. Ex.: EN 450: E 460, E 520, E 620. Suitable for welding of pressure water pipes, turbines, public work, offshore works, etc. Suitable for welding in all positions. Excellent operabillity and slag removal. Good resistance to cracking (preheating necessary according to tickness and type of steel to weld).

DOMENII DE APLICATIE

Lucrari off-shore;
Instalatii de ridicat;
Lucrari publice;
Tevi de prsiune pentru transport apa, turbine etc.

MAIN APPLICATIONS

Offshore works;
Lifting equipment;
Public works;
Pressure water pipes, turbines etc.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Ni			
Mix (Ar/CO_2)	0.08	1.35	0.35	0.008	0.008	1.6			

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	Kv J -50°C
Mix (Ar/CO_2)	Stare sudată/*As welded*	730	650	22	95	80

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300 VP	16 kg		W000281734					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

SAFDUAL 170

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 18276-A: T 69 5 Mn2,5 Ni P M H5
AWS A5.29: E111 T1-G M H4

AUTORIZARI / *APPROVALS*

CARACTERISTICI PRINCIPALE

Sarma tubulara cu flux, recomandata pentru sudarea otelurilor cu limita de curgere ridicata (> 700 MPa). aplicabila sudarii in toate pozitiile, usurinta la sudare si la detasarea zgurei. Buna rezistenta la fisurare (preincalzire in functie de tipul si grosimea materialului de sudat). Recomandata pentru sudarea echipamentelor de ridicat, a tevilor de presiune, turbinelor, diverselor lucrari publice, aplicatiilor off-shore, etc.

MAIN FEATURES

Flux cored wire, suitable for welding of wigh strength steels (> 700 MPa). For welding in all positions, excellent handling and slag removal. Good resistance to craching (preheating necessary according to tickness and type of steel of work). Suitable for welding lifting equipment, pressure water pipes, turbines, public works, off-shore works, etc.

DOMENII DE APLICATIE

Lucrari off-shore;
Instalatii de ridicat;
Lucrari publice.

MAIN APPLICATIONS

Off-shore works
Lifting equipment
Public works.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / *DIFF. H_2*: 4 ml / 100 g max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Ni			
Mix (Ar/CO_2)	0.08	1.35	0.35	0.008	0.008	2.5			

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	Kv J -50°C
Mix (Ar/CO_2)	Stare sudată/*As welded*	810	730	19	60	> 47

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2					
B 300 VP	16 kg		W000281736					
S 200 VP	5 kg		W000281735					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 48

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A: T 46 6 Z B C (M) 2 H5
EN ISO 17632-B: T 55 6 T5-1M(C)A-G-UH5
AWS A5.29: E80T5-G H4

AUTORIZARI / *APPROVALS*

TÜV

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica special aliata cu Ni-Cu, pentru oteluri cu limita de curgere ridicata si rezistente la coroziune atmosferica. Recomandata la sudarea panourilor din constructiile de cladiri. Indicata pentru sudarea otelurilor rezistente la coroziune de tip CORTEN, PATINAX - ITACOR - RESISTA - RBH 35 si similar. Se sudeaza in protectie de gaz CO_2 sau amestec de gaze Ar/CO_2.

MAIN FEATURES

Special basic seamless cored wire, Ni-Cu alloyed, for high yeld point and weathering steels. Suitable also for welding panel buildings. Can be used with corrosion resistant steels, type CORTEN, PATINAX, ITACOR, RESISTA, RBH5 and similar. To be used with CO_2 or Ar/CO_2 mix shielding gas.

DOMENII DE APLICATIE

Constructii metalice industriale.

MAIN APPLICATIONS

Metal working industry.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439) - CO_2
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Cu	Ni		
Mix	0.03 - 0.06	1.20 - 1.60	0.30 - 0.60	≤ 0.02	≤ 0.02	0.30 - 0.60	1.10 - 1.50		

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -60°C	
Mix	Stare sudată/*As welded*	550 - 650	≥ 470	≥ 24	≥ 50	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
B 300	16 kg		W000289151		W000289152			

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED M48

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A: T 46 3 Z M M 1H5
EN ISO 17632-B: T 55 3 T15-1MA-NCC1-UH5
AWS A5.29: E81TG-GM

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata semibazica putin aliata cu Cu-Cr-Ni pentru una sau mai multe treceri. Indicata pentru sudarea otelurilor cu limita de curgere ridicata si rezistente la coroziune atmosferica, de tip: ITACOR, CORTEN, RESCO, PATINAX, RESISTA, etc. Se utilizeaza numai in protectie de amestec de gaze Ar/CO_2.

MAIN FEATURES

Seamless semibasic flux cored wire, low Cu-Cr-Ni alloyed, for single or multipass. Suitable for high tensile steels and corrosion resistant steels, such as: ITACOR, CORTEN, RESCO, PATINAX, RESISTA, etc. To be used with mix Ar/CO_2 shielding gas.

DOMENII DE APLICATIE

Constructii metalice industriale

MAIN APPLICATIONS

Metal working industry

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21 - EN 439)
H_2 DIF. / ***DIFF. H_2*:** 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cu	Ni	Cr	
Mix	0.02 - 0.06	0.90 - 1.30	0.50 - 0.80	≤ 0.02	≤ 0.02	0.30 - 0.75	0.40 - 0.70	0.30 - 0.60	

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -30°C	
Mix	Stare sudată/*As welded*	580 - 690	≥ 470	≥ 22	≥ 50	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
			1.2					
B 300	16 kg		W000281720					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

SAFDUAL Zn

SARME TUBULARE PENTRU TABLE ZINCATE /
FLUX CORED WIRE FOR ZINKING PLATES

CLASIFICARE / ***STANDARDS***

EN ISO 17632-A: T 3 T 2 M M 1-H15
EN ISO 17632-B: T 43 T G-1MS-H15
AWS A5.18: E 70 C - GS

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara cu pulbere metalica pentru sudarea manuala sau automatica printr-o singura trecere a tablelor zincate sau prevopsite cu un strat subtire de vopsea (0,8-3 mm).

MAIN FEATURES

Metal cored wire for automatic and manual single run welding of galvanized, zinc plated or prepainted thin sheet (0,8 to 3 mm).

DOMENII DE APLICATIE

Industria de automobile;
Constructii navale;
Echipamente de aer conditionat.

MAIN APPLICATIONS

Car industry;
Shipards;
Air conditioning equipments.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC-
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21 - EN 439)

CONDITII DE UTILIZARE

Curent continuu cu polaritate (-) la sarma (nu functioneaza deloc cu polaritate (+) la sarma)

Diametru mm	Minim		Maxim	
	Tensiune V	Intensitate A	Tensiune V	Intensitate A
1.0	9.5 - 10	50 - 60	20 - 25	250
1.2	9.5 - 10	50 - 60	21 - 25	350
1.6	10 - 12	60 - 80	17 - 26	400

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2					
B 300	18 kg	W000281642	W000281644					
S 200	5 kg	W000281641						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 54

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

DIN 8555-83: MSG5-GF-M21-40-P
MSG5-GF-C1-40-P
EN 14700: T Z Fe 1

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica aliata cu Cr-Mo, utilizata in special cu echipamente automate pentru incarcarea dura a dintilor de excavator, a pieselor de moara, transportoarelor elicoidale, cajelor de laminare, cu valori de duritate pana la 42 HRC. Straturile depuse cu aceasta sarma confera rezistenta la soc si abraziune. Cand incarcarea se executa pe oteluri cu sudabilitate redusa, se recomanda folosirea unui strat tampon cu sarma FLUXOFILCORD 31. Se poate utiliza pentru sudarea multistrat, cu protectie de CO_2 sau de amestec Ar/CO_2.

MAIN FEATURES

Basic seamless flux cored wire, Cr-Mo alloyed, especially used with automatic equipment for hardfacing wheels, tracks, sliping rolls, screw conveyors, roller mills, with hardfacing up to 42 HRC. It provides layer especially resistant to impact and abrasion. When hardfacing performed on low weldable steels, it is necessary to weld a buffer layer with FLUXOFILCORD 31. Suitable for multipass, can be use with CO_2 or Ar/CO_2 mix shielding gas.

DOMENII DE APLICATIE

Incarcare dura.

MAIN APPLICATIONS

Hardfacing.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439); CO_2

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Mo		
CO_2	0.07 - 0.12	1.20 - 1.70	0.20 - 0.50	≤ 0.02	≤ 0.02	5.00 - 7.00	0.80 - 1.20		

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	HRC				
CO_2	Stare sudată/*As welded*	37 - 42				

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.6	2.0	2.4				
B 300	16 kg	W000281798	W000281799	W000281800				

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 58

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

DIN 8555-83: MSG6-GF-M21-60-GP
MSG6-GF-C1-60-GP
EN 14700: T Fe 8

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata bazica, aliata cu Cr-Mo, recomandata pentru sudarea automata si incarcarea dintilor de excavator, a pieselor de moara, snecurilor, cajelor de laminare, supuse unei frecari abrazive puternice. Duritatea metalului depus ajunge la 62 HRC. Cand sunt folosite oteluri cu sudabilitate slaba, se recomanda aplicarea unui strat tampon cu FLUXOFILCORD 31. Se poate utiliza pentru sudarea multistrat, cu protectie de CO_2 sau de amestec Ar/CO_2.

MAIN FEATURES

Seamless basic flux cored wire, Cr-Mo alloyed, especially suitable for automatic welding and hardfacing of wheels, tracks, sliding rolls screw conveyors, crushers, roller mills, parts subjected to wear, such as dinning buckets or excavator theets. It provides hardness up to 62 HRC. When steels with poor weldability are used, it is necessary to weld a buffer layer with FLUXOFILCORD 31. Suitable for multipass, can be used with mix Ar/CO_2 or CO_2 shieling gas.

DOMENII DE APLICATIE

Incarcare dura.

MAIN APPLICATIONS

Hardfacing.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2)(M21 - EN 439) - CO_2

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Mo		
CO_2	0.40 - 0.70	1.20 - 1.80	0.30 - 0.70	≤ 0.03	≤ 0.03	5.0 - 7.0	0.50 - 0.80		

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	HRC				
CO_2	Stare sudată/*As welded*	56 - 62				

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2	1.4	1.6	2.0	2.4		
B 300	16 kg	W000281801	W000281802	W000281803	W000281804	W000281805		

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED M58

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

DIN 8555-83: MSG6-GF-M21-60-GP
EN 14700: T Fe 8

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata, aliata cu Cr-Mo prin adaos de pulbere metalica, recomandata pentru sudarea automata si incarcarea dintilor de excavator, a pieselor de moara, snecurilor, cajelor de laminare, supuse unei frecari abrazive puternice. Duritatea metalului depus ajunge la 62 HRC. Cand sunt folosite oteluri cu sudabilitate slaba, se recomanda aplicarea unui strat tampon cu FLUXOFILCORD 31. Se poate utiliza pentru sudarea multistrat, cu protectie de amestec gaze Ar/CO_2.

MAIN FEATURES

Seamless metal-cored coppered flux cored wire, Cr-Mo alloyed, especially suitable for automatic welding and hardfacing of wheels, tracks, sliding rolls screw conveyors, roller mills, parts subjected to wear, such as dinning buckets or excavator theets. It provides hardness up to 62 HRC. When steels with poor weldability are used, it is necessary to weld a buffer layer with FLUXOFILCORD 31. Suitable for multipass, can be used with mix Ar/CO_2 shieling gas.

DOMENII DE APLICATIE

Incarcare dura.

MAIN APPLICATIONS

Hardfacing.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2)(M21 - EN 439)

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Mo		
Mix	0.45 - 0.85	1.60 - 2.20	0.50 - 1.00	≤ 0.020	≤ 0.020	5.0 - 7.0	0.45 - 0.85		

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	HRC				
Mix	Stare sudată/*As welded*	57 - 62				

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2	1.6					
B 300	16 kg	W000281806	W000281807					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

SAFDUAL 560

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

DIN 8555-83: MSG6-GF-M21-60-GP/ MSG 6-GF-C1-60-GP
EN 14700: T Fe 8

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara bazica pentru incarcarea pieselor de uzura cum ar fi dintii de escavator, snecuri, piese supuse unei frecari abrazive puternice. Metalul depus este dur, fara fisuri si in consecinta rezistent la soc si impact. Prelucrarea este posibila numai prin polizare. Cand sunt folosite oteluri cu sudabilitate slaba, se recomanda aplicarea unui strat tampon cu FLUXOFILCORD 31. Se poate utiliza pentru sudarea multistrat, cu protectie de amestec gaze Ar/CO_2.

MAIN FEATURES

Basic tubular cored electrode for hardfacing of wearing parts, such as excavator parts, scrape blades, dipper teeths worm conveyors, beaters, crusher jaws, crusher cones; subjected to heavy wear. Weld metal is tough, free of cracks and therefore resistant to shock and impact. Machining is only possible by grinding. A tough buffer layer with FLUXOFILCORD 31 is only required with highly weld-susceptible base metals. Ar/CO_2 - shieling gas.

DOMENII DE APLICATIE

Reconditionari.

MAIN APPLICATIONS

Hardfacing.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2)(M21 - EN 439) - CO_2

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	S	P	Cr			
Mix/CO_2	0.45	0.4	2.60	≤ 0.020	≤ 0.020	9.5			

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	HRC				
Mix/CO_2	Stare sudată/*As welded*	52 - 60				

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2	1.6					
B 300	18 kg	W000281808	W000281809					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED 131

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 17632-A:	T 42 4 B M 1 H5
EN ISO 17632-B:	T 49 4 T 5-1MA-UH5
AWS A5.20:	E71T-5MJH4

AUTORIZARI / *APPROVALS*

ABS:	4SA-4YSAH5	**RINA:**	4S-4YSH5
LRS:	3S-4Y40SH5	**TÜV:**	SGB1C-M21Y4255
DNV:	IVY40MS H5	**DB:**	Nº 42.047.07
BV:	SA3-3YM H5	**GL:**	4YSH5

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata, cu flux bazic, recomandata la sudarea din una sau mai multe treceri a constructiilor metalice de calitate. Se poate utiliza pentru sudare in pozitia vertical ascendent. Indicata pentru sudarea otelurilor de tip Fe 430 si Fe 510 numai cu protectie de amestec de gaze Ar/CO_2 , pentru aplicatii pana la -40° C.

MAIN FEATURES

Basic, seamless flux cored wire, for welding single or multipass on structural steel construction.Can be used in vertical position. Suitable for welding steels like Fe 430/Fe 510 with Ar/CO_2 mix shielging gas, for applications down to -40° C.

DOMENII DE APLICATIE

Constructii metalice in general;
Vase de stocare, recipiente sub presiune;
Constructii navale;
Constructii feroviare si material rulant.

MAIN APPLICATIONS

General structural work;
Tank, vessels, boilers constructions;
Shipbuilding;
Rollingstock construction.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC-
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P				
Mix	0.06 - 0.11	1.20 - 1.60	0.30 - 0.60	≤ 0.02	≤ 0.025				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	
Mix	Stare sudată/*As welded*	510 - 560	≥ 420	≥ 24	≥ 80	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2						
B 300	16 kg	W000281713						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

STEELCORED M 141

SARMA TUBULARA / *FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

EN ISO 18276-A:	T 55 5 Z MM1 H5
EN ISO 18276-B:	T 62 5 T 15-IMA-3M2-UH5
AWS A5.29:	E91T1-G
AWS A5.28:	E90C-GH4

AUTORIZARI / *APPROVALS*

CARACTERISTICI PRINCIPALE

Sarma tubulara cuprata, umpluta cu pulberi metalice, fara zgura, aliata cu Ni-Mo. Recomandata pentru sudarea intr-un singur strat sau in mai multe a otelurlor cu limita de curgere ridicata. Valori bune ale rezilientei pana la -60°C. Recomandata pentru sudarea otelurilor de tipul T1, T1A, T1B, T1C, ASA 56-60, ASERA 54-60 sau similare. A se utiliza numai cu protectie de Argon/CO_2 (M21-EN439).

MAIN FEATURES

Seamless copper coated cored wire, with metal powder filling, no slag low alloyed in Ni and Mo. For welding in single and multirun technique of high tensile strength steels such as T1, T1A, T1B, T1C, ASA 56-60, ASERA 54-60 and similar. Good impact values down to -60° C. To be used with mix Ar/CO_2 shielding gas.

DOMENII DE APLICATIE

Constructii feroviare si de material rulant;
Masini agricole;
Constructii de poduri, masini de decopertat etc.

MAIN APPLICATIONS

Earth moving equipments;
Bridge cranes, cranes constructions;
Rolling stock constructions.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439)
H_2 DIF. / *DIFF. H_2*: 3 ml / 100 gr max

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	S	P	Cr	Ni	Mo	
Mix	0.04 - 0.08	1.50 - 1.90	0.50 - 0.75	≤ 0.015	≤ 0.015	≤ 0.5	0.45 - 0.65	0.20 - 0.45	

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -40°C	Kv J -60°C
Mix	Stare sudată/*As welded*	650 - 750	≥ 580	≥ 21	≥ 80	≥ 47

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2	1.4	1.6				
B 300	16 kg	W000281721	W000281723	W000281725				
Drum	200 kg	W000281722	W000281724					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 307

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

AWS A5.22-95: ER 307T0 -1/4
EN ISO 17633-A: T 18 8 Mn R M 3/C3

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara aliata cu Ni-CR-Mn, destinate sudarii FCAW a otelurilor de tip AISI 307, a realizarii imbinarilor intre oteluri carbon si oteluri inox sau a otelurilor austenitice manganoase. Poate fi folosita de asemenea pentru sudarea otelurilor greu sudabile, a otelurilor cu un procent de 13% Mn, si a altor tipuri de oteluri. Este de asemenea recomandata si pentru realizarea primelor straturi in cazul incarcarilor. Metalul depus este pur austenitic, cu o mare rezistenta la abraziune.

MAIN FEATURES

Flux cored wire Ni-Cr-Mn alloyed for FCAW welding of AISI 307, for carbon steels with stainless steels, and austenitic manganese steels. Also suitable for welding hard steels, 13% Mn steels, armour and balistic steels. It can be used for the first layer before the cladding. Pure austenitic bead with very good resistance to abrasion.

DOMENII DE APLICATIE

Recipienti, inclusiv cele din industria petrochimica;
Industria constructoare de masini;
Incarcari/placari;
Sudarea otelurilor placate.

MAIN APPLICATIONS

Vessels,boilers fabrication(including the chemical petrochemical industry);
Industrial machinery construction;
Hardfacing/cladding;
Welding of armour steels.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % (Valori tipice) / ***ALL-WELD METAL CHEMICAL ANALYSIS % (Typical values)***

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo	S	P	
Mix	≤ 0.2	4.5 - 7.5	≤ 1.20	17.0 - 12.0	7.0 - 10.0	≤ 0.50	≤ 0.025	≤ 0.035	

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rp 0.2 N/mm²	E % 5d	Kv J +20°C	
Mix	Stare sudată/*As welded*	≥ 630	≥ 480	≥ 35	≥ 50	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2						
BS 300	15 kg	W000281788						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 308 L

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

AWS A5.22: E 308LT0-1/4
EN ISO 17633-A: T19 9 LR M3/C3
EN ISO 17633-B: TS 308L-FB0

AUTORIZARI / ***APPROVALS***

TÜV
DNV: 308 L
LRS: 304 LS
BV: 308 L
GL: 4550 S
ABS: UP
DB:

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila destinata sudarii FCAW a otelurilor inoxidabile de tip AISI 304 si 304L si similar. Se foloseste cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata printr-o foarte buna sudabilitate, usoara desprindere a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels type AISI 304 - 304L and similar. Shielding gas: mix or Ar/CO_2 or CO_2. Good weldability, easy slag removal, good bead appearance, for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 4G PE | 5G PF | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % (Valori tipice) / ***ALL-WELD METAL CHEMICAL ANALYSIS % (Typical values)***

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo			
Mix	0.03	1.5	0.7	20.0	10.0	0.500			

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -196°C	
Mix	Stare sudată/*As welded*	≥ 560	≥ 390	≥ 35	≥ 32	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2					
BS 300	15 kg	W000281754	W000281756					
S 200	5 kg		W000281755					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 308 LV

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

AWS A5.22-95:	E 308LT1-1/4
EN ISO 17633-A:	T199LPM1/C1
EN ISO 17633-B:	TS 308L-FB1

AUTORIZARI / ***APPROVALS***

TÜV		**DB**	
BV:	308 L	**DNV:**	308 L
LRS:	304 LS		

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila destinata sudarii FCAW a otelurilor inoxidabile de tip AISI 304 si 304L si similar. Se foloseste cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata prin desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels type AISI 304 - 304L and similar. Shielding gas: mix or Ar/CO_2 or CO_2 Easy slag removal, good bead appearance, for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA	2F PB	2G PC	3G PF	3G PG	4G PE	5G PF	5G PG	AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % (Valori tipice) / ***ALL-WELD METAL CHEMICAL ANALYSIS % (Typical values)***

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo			
Mix	0.03	1.5	0.5	20.0	10.0	≤ 0.50			

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rp 0.2 N/mm²	E % 5d	Kv J 0°C	Kv J -196°C
Mix	Stare sudată/*As welded*	550 - 620	≥ 400	≥ 40	≥ 47	≥ 34

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2	1.6					
BS 300	15 kg	W000281752	W000281753					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 309 L

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

AWS A5.22-95:	E 309LT0 - 1/4
EN ISO 17633-A:	T 23 12L R M 3/C3
EN ISO 17633-B:	TS 309L-FB0

AUTORIZARI / ***APPROVALS***

DNV:	309 L
GL:	4332 S
BV:	(UP)
LRS:	(SS/CMn)

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila pentru sudarea FCAW a otelurilor inoxidabile austenitice cu compozitie chimica similara si pentru sudarea imbinarilor eterogene dintre oteluri inoxidabile si oteluri carbon. Se foloseste cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata prin desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels of similar composition and for heterogeneous joints between stainless steel and carbon steels. Shielding gas: mix or Ar/CO_2 or CO_2 Easy slag removal, good bead appearance, for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA	2F PB	2G PC	3G PF	4G PE	5G PF	AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % (Valori tipice) / ***ALL-WELD METAL CHEMICAL ANALYSIS % (Typical values)***

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo			
Mix	≤ 0.04	0.5 - 2.5	≤ 1.0	22.0 - 25.0	12.0 - 14.0	≤ 0.50			

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs 0.2 N/mm²	E % 5d	Kv J RT	Kv J -60°C
Mix	Stare sudată/*As welded*	550 - 620	≥ 420	≥ 35	≥ 47	≥ 32

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.6				
BS 300	15 kg	W000281776	W000281778	W000281779				

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 309 LV

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

AWS A5.22: E 309LT1 -1/4
EN ISO 17633-A: T 23 12 LPM 1/C1
EN ISO 17633-B: TS 309L-FB1

AUTORIZARI / *APPROVALS*

LRS: (SS/CMn)
ABS: (UP)

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila pentru sudarea FCAW a otelurilor inoxidabile austenitice de compozitie chimica similara si a imbinarilor eterogene dintre otelurile inoxidabile si otelurile carbon. Se utilizeaza cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata printr-o foarte buna sudabilitate, desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels of similar composition and for heterogeneous joint between stainless steels and carbon steels. Shielding gas: mix Ar/CO_2or CO_2. Good weldability, easy slag removal, good bead appearance. Suitable for all position vertical down too.

DOMENII DE APLICATIE

ndustria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % (Valori tipice) / *ALL-WELD METAL CHEMICAL ANALYSIS % (Typical values)*

GAZ/*GAS*	C	Mn	Si	Cr	Ni				
Mix	0.03	1.60	0.70	24.00	13.00				

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rp 0.2 N/mm²	E % 5d	Kv J 0°C	
Mix	Stare sudată/*As welded*	≥ 610	≥ 460	≥ 31	≥ 35	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2						
BS 300	15 kg	W000281782						
S 200	5 kg	W000281781						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 309 MoL

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

AWS A5.22-95: E 309LMoT0 - 1/4
EN ISO 17633-A: T 23 122L R M3/C3
EN ISO 17633-B: TS 309 LMo-FB0

AUTORIZARI / *APPROVALS*

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila pentru sudarea FCAW a otelurilor inoxidabile austenitice cu compozitie chimica similara si pentru sudarea imbinarilor eterogene dintre oteluri inoxidabile si oteluri carbon. Se foloseste cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata prin desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels of similar composition and for heterogeneous joints between stainless steel and carbon steels. Shielding gas: mix or Ar/CO_2 or CO_2. Easy slag removal, good bead appearance, for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / *WELDING POSITIONS*

1G PA | 2F PB | 2G PC | 3G PF | 4G PE | 5G PF | AWS EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo			
Mix	≤ 0.04	0.5 - 2.5	≤ 1.0	21.0 - 25.0	12.0 - 16.0	2.0 - 3.0			

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J 0°C	
Mix	Stare sudată/*As welded*	600 - 680	≥ 480	≥ 35	≥ 47	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2						
BS 300	15 kg	W000281785						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 316 L

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

AWS A5.22:	E 316LT0-1/4
EN ISO 17633-A:	T 19 12 3 LR M3/C3
EN ISO 17633-B:	TS 316L-FB0

AUTORIZARI / *APPROVALS*

GL:	4571 S
DNV:	316 L
LRS:	316 LS
BV:	(UP)
LRS:	(316 LS)

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila pentru sudarea FCAW a otelurilor tip AISI 304-304L-316-316L si similare. Se utilizeaza cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata printr-o foarte buna sudabilitate, desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels type AISI 304-304L - 316 - 316L and similar composition. Shielding gas: mix Ar/CO_2 or CO_2. Good weldability, easy slag removal, good bead appearance. Suitable for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	4G	5G	AWS
PA	PB	PC	PF	PE	PF	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % (Valori tipice) / *ALL-WELD METAL CHEMICAL ANALYSIS % (Typical values)*

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo			
Mix	0.03	1.70	0.70	19.00	12.00	2.80			

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J 0°C	
Mix	Stare sudată/*As welded*	≥ 580	≥ 400	≥ 35	≥ 45	

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.4	1.6			
BS 300	15 kg	W000281764	W000281766					
S 200	5 kg		W000281765					

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 316 LV

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / *STANDARDS*

AWS A5.22-95:	E 316LT1 - 1/4
EN ISO 17633-A:	T 19 12 3L R M 1/C1
EN ISO 17633-B:	TS 316L-FB1

AUTORIZARI / *APPROVALS*

TÜV	
DNV:	316 L
LRS:	316 LS
BV:	316 L
DB	

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila pentru sudarea FCAW a otelurilor tip AISI 304-304L-316-316L si similare. Se utilizeaza cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata prin desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels type AISI 304-304L-316-316L and similar composition. Shielding gas: mix Ar/CO_2 or CO_2 Easy slag removal, good bead appearance, for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / *WELDING POSITIONS*

1G	2F	2G	3G	3G	4G	5G	5G	AWS
PA	PB	PC	PF	PG	PE	PF	PG	EN

CURENT / *CURRENT*: DC+
GAZ / *GAS*: MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % / *ALL-WELD METAL CHEMICAL ANALYSIS %*

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Mo			
Mix	0.03	1.7	0.7	19.0	12.0	2.8			

CARACTERISTICI MECANICE / *MECHANICAL PROPERTIES*

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J 0°C	Kv J -110°C
Mix	Stare sudată/*As welded*	560 - 620	≥ 400	≥ 40		≥ 45

AMBALARE STANDARD / *STANDARD PACKING*

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.0	1.2	1.6				
BS 300	15 kg	W000281760	W000281762	W000281763				

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

INOXCORED 347

SARMA TUBULARA INOXIDABILA / *INOX FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

AWS A5.22-95: ER 347T0-1/4
EN ISO 17633-A: T199NbRM3/C3
EN ISO 17633-B: TS 347-FB0

AUTORIZARI / ***APPROVALS***

CARACTERISTICI PRINCIPALE

Sarma tubulara inoxidabila destinata sudarii FCAW a otelurilor inoxidabile cu compozitie analoga (AISI 321 si 347). Se foloseste cu protectie de amestec de gaze Ar/CO_2 sau CO_2. Caracterizata prin desprinderea usoara a zgurii si un bun aspect al cordonului. Recomandata pentru toate pozitiile, inclusiv vertical descendent.

MAIN FEATURES

Inox flux cored wire for welding of stainless steels of similar composition (AISI 321 - 347). Shielding gas: mix or Ar/CO_2 or CO_2 Easy slag removal, good bead appearance, for all position vertical down too.

DOMENII DE APLICATIE

Industria chimica si petrochimica;
Constructii navale.

MAIN APPLICATIONS

Chemical and petrochemical;
Shipbuilding.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 4G PE | 5G PF | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2) (M21-EN439) / CO_2

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

GAZ/*GAS*	C	Mn	Si	Cr	Ni	Nb + Ta	Ferita WRC 92		
Mix	0.03	2.40	0.37	19.0	11.0	8 x C min	≤ 10		
						1.0 max			

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rp 0.2 N/mm²	E % 5d	Kv J 0°C	
Mix	Stare sudată/*As welded*	580 - 640	≥ 420	≥ 35	≥ 47	

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.2						
BS 300	15 kg	W000281759						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*

LEXAL TA 22.9.3 N

SARMA TUBULARA RUTILICA / *RUTILE FLUX CORED WIRE*

CLASIFICARE / ***STANDARDS***

AWS A5.22: E 2209T1 - 1/4
EN ISO 17633-A: T 229 3N LP M1/C1

AUTORIZARI / ***APPROVALS***

DNV: DUPLEX
LRS: S31803S
GL: 4462
BV: UP

CARACTERISTICI PRINCIPALE

Sarma tubulara rutilica destinata sudarii otelurilor inoxidabile Duplex care contin 22% Cr, 9% Ni si 3% Mo. Rezistenta optima la coroziunea intergranulara, continut scazut de carbon. Sudabilitate excelenta; zgura se desprinde foarte usor.

MAIN FEATURES

Rutile flux cored wire suitable for welding of Duplex stainless steels having 22% Cr, 9% Ni and 3% Mo. Good resistence to intergranular corrosion, low carbon content. Excellent weldability with a spatter free arc; self releasing slag combined with a very smooth bead appearance.

DOMENII DE APLICATIE

Constructii navale;
Cazangerie inclusiv industria chimica si petrolifera;
Fabricarea tevilor;
Constructii off-shore.

MAIN APPLICATIONS

Shipbuilding;
Vessels, boilers fabrication (including for chemical and petrochemical industry);
Pipes fabrication;
Off-shore fabrication.

POZITII DE SUDARE / ***WELDING POSITIONS***

1G PA | 2F PB | 2G PC | 3G PF | 3G PG | 4G PE | 5G PF | 5G PG | AWS EN

CURENT / ***CURRENT*:** DC+
GAZ / ***GAS*:** MIX (Ar / CO_2 sau CO_2)

ANALIZA CHIMICA A METALULUI DEPUS % / ***ALL-WELD METAL CHEMICAL ANALYSIS %***

C	Mn	Si	S	P	Ni	Cr	Mo	N	Fe% Vol.
≤ 0.04	≤ 2.50	≤ 1.20	≤ 0.012	≤ 0.025	8.00 ÷ 10.5	22.0 ÷ 23.5	3.00 ÷ 3.70	0.13 ÷ 0.17	30 ÷ 65

CARACTERISTICI MECANICE / ***MECHANICAL PROPERTIES***

GAZ/*GAS*	Tratament termic/*Heat treatment*	Rm N/mm²	Rs N/mm²	E % 5d	Kv J -20°C	
Ar + CO_2	Stare sudată/*As welded*	820	620	30	35	
Pitting Corrosion Test (according to ASTM G48 Method A / condition test: 24h exposure at +20°C)						

AMBALARE STANDARD / ***STANDARD PACKING***

Ambalare / *Packaging*	Greutate / *Weight*	Diametru mm / *Diameter mm*						
		1.20 (T)						
BS 300	12 kg	W000281774						
S 200	5 kg	W000281773						

Datele mentionate pot fi modificate fara o notificare prealabila. / *The above data may change without prior notice.*