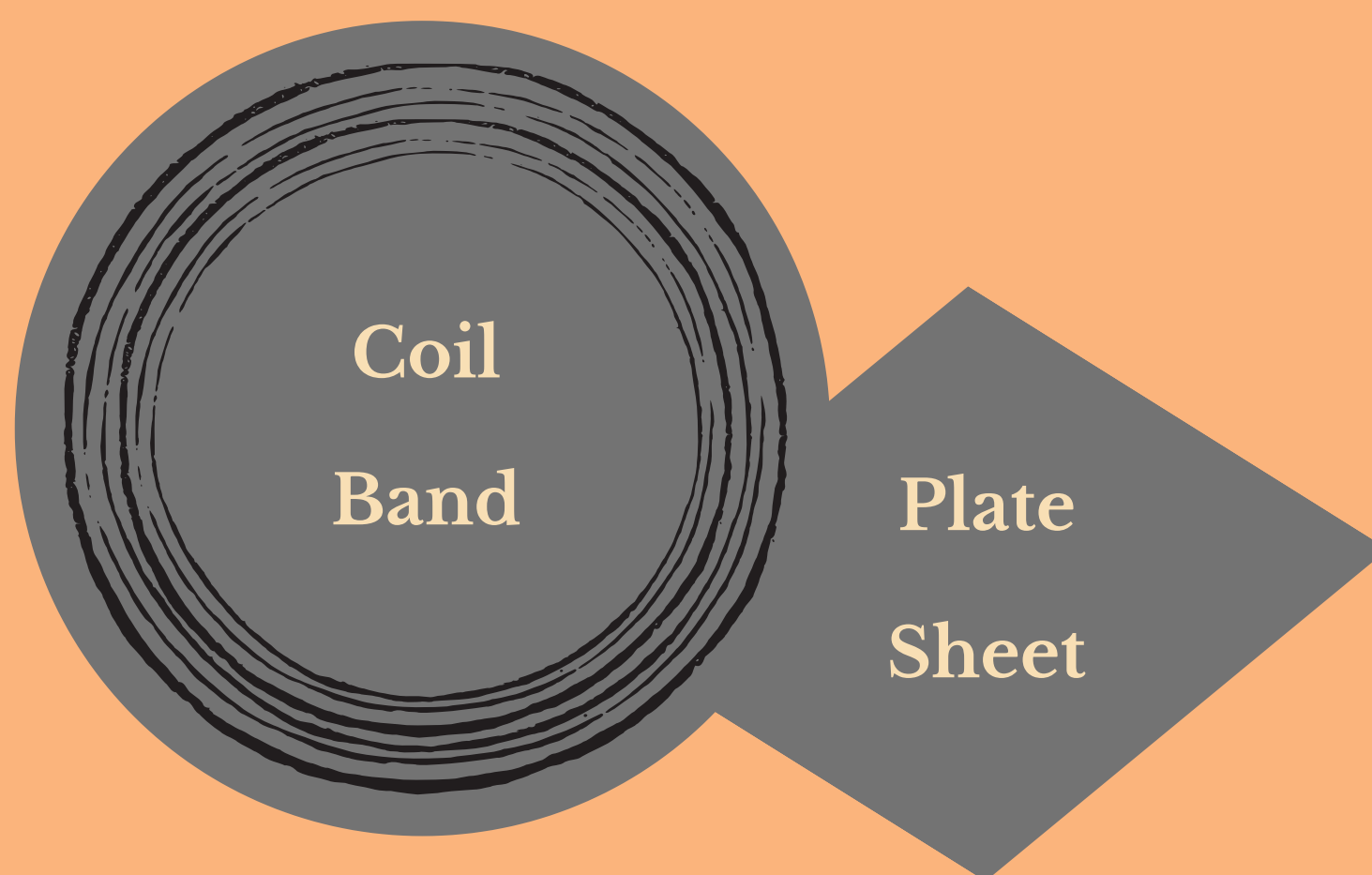




Grace Alloy Corp.

Carbon Steel & Mild Steel Product Catalog



9F. No. 148, Zhongzheng 4th Road,
Qianjin District, Kaohsiung City,
Taiwan (801)

Tel: +886-7-2851-999

Fax: +886-7-2857-666

Office Hours:

Mon - Fri 9:00 - 17:30

Email: grace@gracealloy.com.tw

gracealloycorp@gmail.com

Web: www.gracealloy.com.tw

GA strives for your optimum

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About Us

Grace Alloy Corp. is a trading company. Our team has accumulated more than three decades of extensive experience in stainless steel, carbon steel, aluminum, copper alloy, and other non-ferrous materials. We specialize in supplying and purchasing materials in the forms of but not limited to:

- Coils
- Strips
- Precision strips (CSP)
- Sheets
- Plates
- Checkered Plates
- Thick Plates
- Pipes
- Fittings
- Tubes (round/square/rectangular)
- Wire rods
- Gratings
- Bars (flat/angle/round/square/hexagon)
- Water tanks
- Laser-cutting machines
- Welding machines
- Shearing machines
- Leveling machines

Our sources abide by international specifications. We strive to put every product to its optimal use and provide our valuable customers with a one-stop and personalized purchasing experience. Our supplies are used in various industries, including construction, transportation, public infrastructure, home appliances, interior design, commercial kitchenware, automobiles, electronics, food service, etc.

The earnest teamwork, rigorous profession, respected market reputation, and solid trust have developed firm networks worldwide. Networking with various suppliers allows us to provide favorable pricing, shorter delivery time, more amicable minimum order quantity (MOQ), diverse country of origin, and integrated services for our customers.

The collaborations that encompass both the domestic and international spheres are indicative of our competence, competitiveness, and confidence in rendering genuine services along with prime quality to our clients.

Maintaining a long-term, stable, smooth, and satisfying cooperative relationship with customers and suppliers serves as our topmost priority. The prospective aim of Grace Alloy Corp. is to forge cohesion that facilitates a mutually beneficial platform for each party included.

Hot-Rolled JIS Specification Product Range

Hot-Rolled JIS Specification Product Range

JIS									
G3101: General Structure		G3106: Welded Structure		G3113: Automobile Structure		G3116: Gas Cylinders		G3125: Superior Atmospheric Corrosion Resistant	
Grade	Thickness Max. (mm)	Grade	Thickness Max. (mm)	Grade	Thickness (mm)	Grade	Thickness (mm)	Grade	Thickness Max. (mm)
SS330	16.0	SM400A	16.0	SAPH 310	1.6 - 14.0	SG 255	1.6 - 6.0	SPA-H	16.0
SS400	16.0	SM400B	16.0	SAPH 370	1.6 - 14.0	SG 295	1.6 - 6.0		
SS490	16.0	SM490A	16.0	SAPH 400	1.6 - 14.0				
SS540	16.0	SM490B	16.0	SAPH 440	1.6 - 14.0				
		SM490C	16.0						
		SM490YA	16.0						
		SM520C	16.0						
		SM570	16.0						
G3131: Mild Steel Plate, Sheet, & Strip		G3132: Carbon Steel Strip for Pipes & Tubes		G3134: High Strength Steel Sheets with Improved Formability for Automobile Structural Uses		G3136: Building Structure			
Grade	Thickness (mm)	Grade	Thickness (mm)	Grade	Thickness (mm)	Grade	Thickness (mm)		
SPHC	1.2 - 14.0	SPHT1	1.2 - 13.0	SPFH490	1.6 - 6.0	SN400A	6.0 - 20.0		
SPHD	1.2 - 14.0	SPHT2	1.2 - 13.0	SPFH540	1.6 - 6.0	SN400B	6.0 - 20.0		
SPHE	1.2 - 8.0	SPHT3	1.6 - 13.0	SPFH590	1.6 - 6.0	SN490B	6.0 - 20.0		
SPHF	1.4 - 8.0	SPHT4	1.6 - 13.0	SPFH590Y	2.0 - 4.0				
G4051: Carbon Steels for Machine Structural Use				G4053: Cr-Mo Steel					
Grade				Grade					
S10C				SCM415					
S17C				SCM420					
S35C				SCM435					
S40C				SCM440					
S45C									
S50C									
S53C									
S55C									

*Other specifications may be available upon request such as G3193.

Hot-Rolled ASTM Specification Product Range

Hot-Rolled ASTM Specification Product Range				
ASTM				
Carbon Steel for Structural Use		A1011: Carbon, Structural, High-Strength Low-Alloy Steel and High-Strength Low-Alloy with Improved Formability		A572: High-Strength Low-Alloy Steel
Grade	Thickness Max. (mm)	Grade	Thickness Max. (mm)	Grade
A36	38.1 (1-1/2 inch)	CS Type B	6.0 mm (0.23 inch)	A572 GR.50 Type 1
A288 Grade C		DS Type B	6.0 mm (0.23 inch)	
		SS. Gr. 36 Type 2	6.0 mm (0.23 inch)	
		HSLAS Gr. 45 Class 1	6.0 mm (0.23 inch)	
		HSLAS - F Gr. 50	6.0 mm (0.23 inch)	
		HSLAS - F Gr. 60	6.0 mm (0.23 inch)	
		HSLAS - F Gr. 70	6.0 mm (0.23 inch)	
		HSLAS - F Gr. 80	6.0 mm (0.23 inch)	

*Other specifications may be available upon request such as ASTM A1018, A6, A568, A635, etc.

Hot-Rolled SAE Specification Product Range

Hot-Rolled SAE Specification Product Range							
SAE							
J403: Carbon Steel						J404: Alloy Steel	J1392 High Strength Steel
Grade						Grade	Grade
1005	1016	1022	1038	1060	1541	4130	050XLF
1006	1017	1023	1040	1065	1552		060XLF
1008	1018	1026	1045	1070			080XLF
1010	1019	1030	1049	1086			
1012	1020	1033	1050	1524			
1015	1021	1035	1055	1536			

*Other specifications may be available upon request.

Hot-Rolled EN Specification Product Range

Hot-Rolled EN Specification Product Range						
EN						
EN10111: Continuously Hot Rolled Low Carbon Steel Sheet and Strip for Cold Forming			EN 10149-2: High Yield Strength Steels for Cold Forming		EN 10025-2: Structural Steel	
Grade	Steel No.	Thickness (mm)	Grade	Steel No.	Grade	
DD11	1.0332	1.0 - 11.0	S315MC	1.0972	S235JR	1.0038
DD12	1.0398	1.0 - 11.0	S355MC	1.0976	S235J2	1.0117
DD13	1.0335	1.0 - 11.0	S420MC	1.0980	S275JR	1.0044
			S460MC	1.0982	S355JR	1.0045
			S500MC	1.0984	S355J0	1.0553
			S550MC	1.0986	S355J2	1.0577
			S600MC	1.8969		
			S650MC	1.8976		
			S700MC	1.8974		

*Other specifications may be available upon request.

Hot-Rolled Size Range

Hot-Rolled Size Range				
Hot-Rolled Item	Thickness (mm)	Mill Edge	Slit Edge	Length Range and Coil Inside Diameter (mm)
Sheet	1.20 - 5.99	-	860 - 1545	760 - 6096
Plate	6.0 - 12.7	-	860 - 1524	1500 - 7620
Coil	1.2 - 6.5	720 - 1855	-	Coil ID: 762
	6.51 - 7.99	850 - 1560	-	Coil ID: 762
	8.0 - 9.5	850 - 1250	-	Coil ID: 762
Pickled & Oiled Coil	1.30 - 6.5	760 - 1575	785 - 1575	Coil ID: 610
Band	2.0 - 10.0	740 - 1855	-	Coil ID: 762
	10.01 - 20.0	740 - 1560	-	Coil ID: 762
Pickled & Annealed	2.0 - 6.5	-	785 - 1550	Coil ID: 610
Pickled & Annealed - Spheroidized	2.0 - 6.5	-	785 - 1550	Coil ID: 610

Hot-Rolled Product Application

Hot-Rolled Product Application

Application	Specification	Description
Commercial Quality (CQ)	<ul style="list-style-type: none"> JIS G3131 SPHC SAE 1008 1023 CQ 	The stated material is appropriate for general forming, bending, and welding such as water pipe, electric wire pipe, parts without strength requirement, cover, etc.
Drawing Quality (DQ)	<ul style="list-style-type: none"> JIS G3131 SPHD SAE 1006 1008 DQ 	The stated material is appropriate for drawing or forming operations such as bicycle bead, handle grip, 5-way pipe, etc.
Structure Quality (SQ)	<ul style="list-style-type: none"> SS400、SS490 SM400、SM490 ASTM A36 	The stated material is appropriate for simple bending, welding, and rivet joints with strength requirements, such as ship hull, bridge, scaffold...etc.
Automobile Structure Quality (ASQ)	<ul style="list-style-type: none"> JIS G3113 SAPH310 SAPH370 SAPH400 SAPH440 SPFH590 	The stated material is appropriate for automobile components that require meticulous inner quality and forming demand. It is often used for automobile wheel rims, suspension systems, chassis beams, brake back, panels, etc.
Corrosion Resistance Steel Quality (CRSQ)	<ul style="list-style-type: none"> JIS G3125 SPA-H 	By adding elements such as Cu, Cr, and P, the composition allows the steel to form a protective layer of oxidization to avoid corrosion. The stated material is commonly used for containers, rail cars, bridges, etc.
Pressure Vessel Quality (PVQ)	<ul style="list-style-type: none"> JIS G3116 SG255、SG295 ASTM A516 GR60, GR70 	The stated materials highlight strength, welding, formability, and high-level inner quality. They are commonly used for steel gas cylinders and other pressure vessels.
Line Pipe Steel (LPS)	<ul style="list-style-type: none"> JIS G3132 SPHT1 SPHT2 SPHT3 SPHT4 	The stated materials are suitable for those that demand strength, low temperature, toughness, welding, formability, and inner quality. They are primarily used for gasoline, gas vapor, and liquid transportation.
Mechanical Structure Quality (MSQ)	<ul style="list-style-type: none"> JIS S35C S45C S50C SCM415 SCM435 SAE 4130、1552 	The stated materials are suitable for gardening tools, chain plates, hand-pull devices, etc. During production, heat treatment such as annealing, quenching, and tempering are used to ensure strength and hardness stability
Re-Rolling Quality (RRQ)	<ul style="list-style-type: none"> SAE1006 RRQ SAE1022 RRQ 	Production is based on customers' customization. It can later be used for cold-rolling, galvanizing, and coloring.

Cold-Rolled JIS Specification Product Range

Cold-Rolled JIS Specification Product Range								
JIS								
G3141-2011 - 1D/2D/4D/8D		G3135-2006: High Strength Steel Sheets with Improved Formability for Automobile Structural Uses			G3311-2010: Medium Carbon Steel, High Carbon Steel, Alloy Steel and Special Steel Strip			
Grade	Thickness Max. (mm)	Grade			Grade			
SPCC-1D	SPCCT	SPFC340	SPFC490	SPFC540Y	S35CM	SK50CM	SK95M	SCM415M
SPCC-2D	SPCD	SPFC370	SPFC540	SPFC590Y	S45CM	SK85M	SKS51M	SCM435M
SPCC-4D	SPCE	SPFC390	SPFC590	SPFC780Y				
SPCC-8D	SPCF	SPFC440	SPFC490Y	SPFC980Y				
SPCG-SD MR	SPCG							

*Other specifications may be available upon request.

Cold-Rolled ASTM Specification Product Range

Cold-Rolled ASTM Specification Product Range	
ASTM	
A1008-2012 Grade	A684-2008 (High Carbon Steel) Grade
CS Type	1050
DS Type	1065
DDS	1070
EDDS	

*Other specifications may be available upon request such as A568, A568M, etc.

Cold-Rolled SAE Specification Product Range

Cold-Rolled SAE Specification Product Range				
SAE				
J2340 High Strength Automotive Sheet Steel	J403 / J404 (Medium Carbon Steel, High Carbon Steel and Alloy Steel)			
Grade	Grade			
340X	1050	1060	1070	4130
420X	1055	1065	1552	4135

*Other specifications may be available upon request.

Cold-Rolled EN Specification Product Range

Cold-Rolled EN Specification Product Range	
EN	
EN 10130- 2006	EN 10268-2006 Cold Rolled Steel Flat Products with High Yield Strength for Cold Forming
Grade	Grade
DC01	HC220P
DC03	HC220Y
DC04	HC260Y
DC05	HC260LA
DC06	HC300LA
	HC340LA
	HC380LA
	HC420LA

*Other specifications may be available upon request such as EN 10131..., etc.

Cold-Rolled Size Range

Cold-Rolled Size Range			
Item	Thickness (mm)	Width (mm)	Coil Inside Diameter (mm)
Carbon Steel	0.20 - 0.29	850 - 1000	508 or 610
	0.30 - 0.34	850 - 1100	508 or 610
	0.35 - 0.40	850 - 1219	508 or 610
	0.41 - 0.49	780 - 1250	508 or 610
	0.50 - 0.59	780 - 1410	508 or 610
	0.60 - 0.69	780 - 1630	508 or 610
	0.70 - 0.79	780 - 1776	508 or 610
	0.80 - 1.60	780 - 1830	508 or 610
	1.61 - 2.00	780 - 1676	508 or 610
	2.01 - 3.20	780 - 1250	508 or 610
High Strength Low Alloy Steel	0.40 - 2.00	850 - 1520	508 or 610
Special Steel Strip	0.40 - 2.50	850 - 1000	508 or 610

Cold-Rolled Product Application

Cold-Rolled Product Application

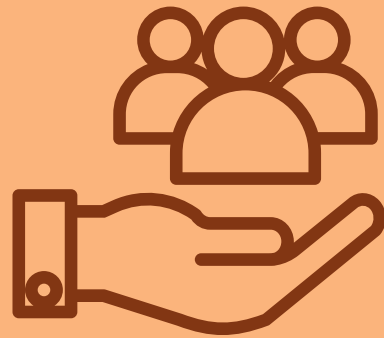
Application	Specification	Description
For Forming Fabrication		
Commercial Quality (CQ)	<ul style="list-style-type: none"> • JIS G3141 SPCC • ASTM A1008 CS • EN10130 DC01 	Commonly used for refrigerator bodies, piping, steel drums, toolboxes, computer structures, cabinet locks, electronic parts, wheel rims and caps, etc.
Drawing Quality (DQ)	<ul style="list-style-type: none"> • JIS G3141 SPCD • ASTM A1008 DS • EN 10130 DC03 	The stated material is appropriate for motor housing, fender, chassis, lamp shell, automobile doors, roaster oven, etc.
Deep Drawing Quality (DDQ)	<ul style="list-style-type: none"> • JIS G3141 SPCE/SPCF • ASTM A1008 DDS • EN 10130 DC04 	The stated material is appropriate for fuel tanks, oil cans, fenders, bumpers, trunks, lids, automobile doors, lamp sets, lighting fixture equipment, etc.
Extra Deep Drawing Quality (EDDQ)	<ul style="list-style-type: none"> • JIS G3141 SPCG • ASTM A1008 EDDS • EN 10130 DC05 	The stated material is appropriate for oil cans, fuel tanks for automobiles, automobile lids and doors, etc.
For Structural Use		
Structural Quality (SS)	<ul style="list-style-type: none"> • ASTM A1008 SS Grade XX 	The stated material is appropriate for frame, automobile structures, roofing decks, etc
High Strength Sheet With Improved Formability for Automobile Quality	<ul style="list-style-type: none"> • JIS G3135 SPFCXXX • EN 10268 HCXXX 	The stated material is appropriate fender, bumper, luggage carrier, automobile frame, and trunk, etc.
For Hardware and Tool Use		
Special Steel Strip	<ul style="list-style-type: none"> • JIS G3311 • ASTM A684 • SAE J404 	The stated materials are suitable for chain plates, hand tools, saw plates, and golf clubs.

Steel Classifications

Steel Classifications					
Application		JIS	EN	ASTM	SAE
Commercial Quality (CQ) and Drawing Quality (DQ)	CQ	G3131 SPHC	10111 DD11	A1011 CS	J2329 HR1
	DQ	G3131 SPHD	10111 DD12	A1011 DS	J2329 HR2
	DDQ	G3131 SPHE	10111 DD13	-	J2329 HR3
	EDDQ	G3131 SPHF	10111 DD14	-	-
Atmospheric Corrosion Resisting Steel		G3125 SPA-H	10155 S355J2WP	A242	-
Steel for Gas Cylinders		G3166 SG295	10120 P265NB	A414 Gr. B	-
Steel for General Structure		G3101 SS400	10025 S235J	A36	-
High Strength Steel for Automobile Structural Uses		G3134 SPFH490 - 590	10149 S420MC - S550MC	-	J2340 420 - 550XF
Carbon Steel		G4051 S22C - S55C	10083 - 1 C22E - C55E	-	J403 1022 - 1050
Cr-Mo Steel		G4053 SCM425 - SCM440	10083 - 1 25CrMo4 - 42CrMo4	-	J404 4130 - 4140

*The above steel grades are for comparison purposes. They do not indicate equivalence.

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