

QUANTITY+ SUSTAINABILITY

Hadeed Steel Product Catalog

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OUR VISION AND MISSION

SABIC ranks among the world's top chemical companies. The company is among the world's market leaders in the production of polyethylene, polypropylene and advanced thermoplastics, glycols, methanol, and fertilizers – and one of the largest producers of steel in the Middle East.

Our **VISION** is to be the preferred world leader in chemicals.

Our **MISSION** is to responsibly provide quality products and services through innovation, learning, and operational excellence while sustaining maximum value for our stakeholders.

OUR BRAND

The essence of our brand is about Powering Ambition. We power the ambitions of our customers, the societies in which we operate, our employees, our partners, our businesses and shareholders.

The promise of Powering Ambition is built upon a solid foundation of:

- A commitment to creating long-term success
- A spirit of ingenuity and material sustainability
- Delivery of innovative solutions
- Actions, not just words
- Strong relationships, not transactions

We call this “CHEMISTRY THAT MATTERS™”

OUR VALUES



INSPIRE
Generating excitement &
Commitment



ENGAGE
Connecting with others
to achieve more



CREATE
Finding and embracing new
ways of doing this



DELIVER
Taking responsibility
And making things happen

COMPANY OVERVIEW

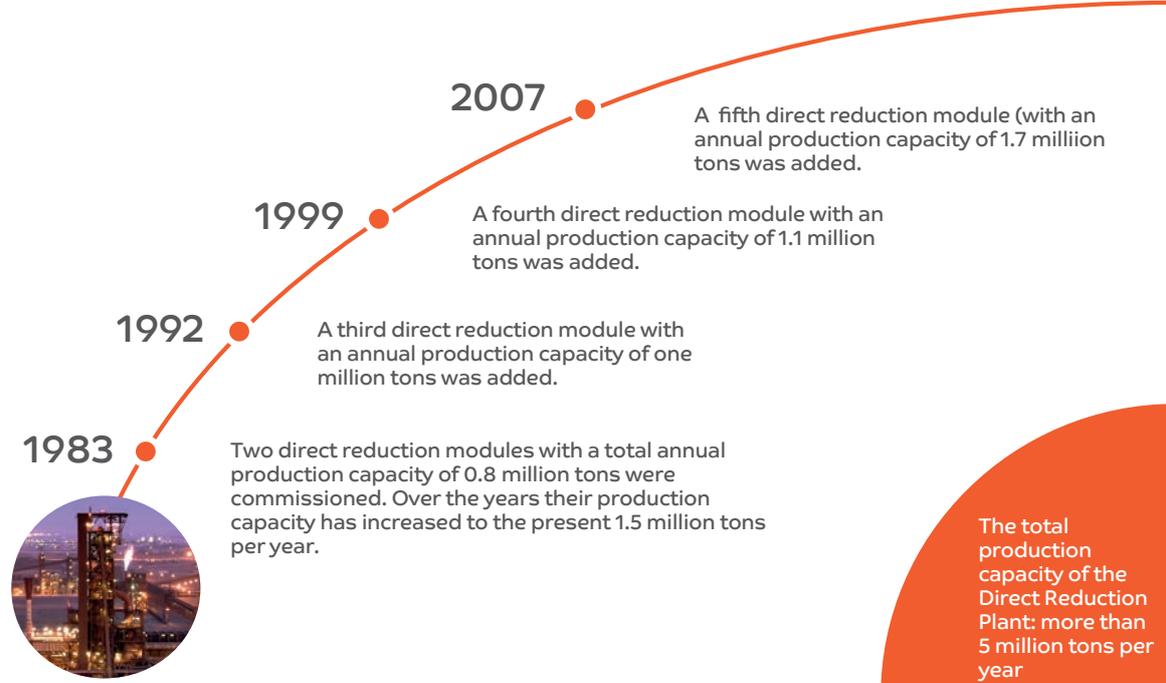
SABIC is a global leader in diversified chemicals headquartered in Riyadh, Saudi Arabia. We manufacture on a global scale in the Americas, Europe, the Middle East, and Asia, making distinctly different kinds of products: chemicals, commodity and high performance plastics, agri-nutrients, and metals. SABIC has more than 32,000 employees worldwide and operates in more than 50 countries. Fostering innovation and a spirit of ingenuity, we have significant research resources with innovation hubs in five key geographies: the USA, Europe, the Middle East, South East Asia, and North East Asia.

SABIC's affiliate focused on metals, Hadeed (Saudi Iron and Steel Co.), is the first fully integrated iron- and steel-making complex in the Kingdom of Saudi Arabia. Hadeed plays a major role in building and developing the Kingdom and leads the Gulf in the production of high-quality long and flat steel products. It plays a vital role in the construction and industrialization of some of the world's fastest-growing economies. Long steel products are mainly used in the construction industry, while flat steel products are ideal for making oil drums, car parts, household appliances, and pipelines.

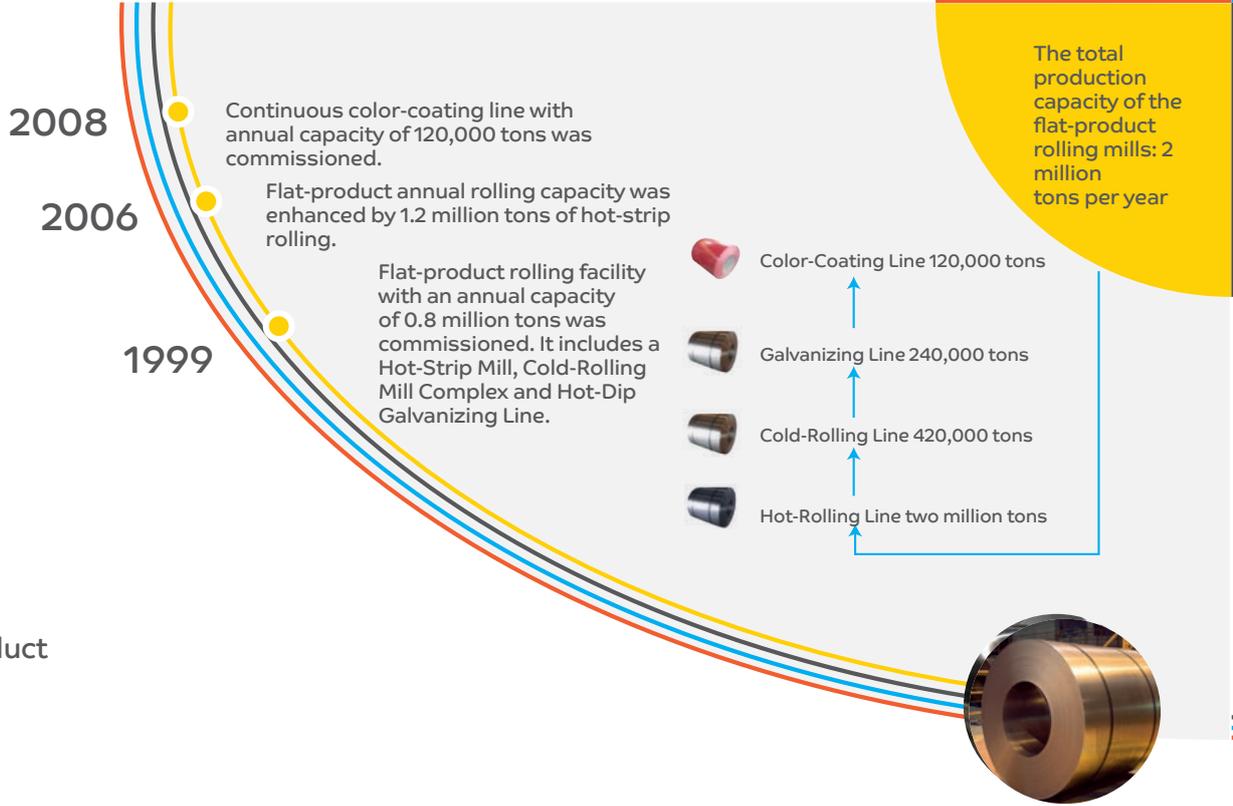


MILESTONES IN SABIC'S JOURNEY AS ONE OF THE LARGEST PRODUCERS OF STEEL IN THE MIDDLE EAST.

1 The Direct Reduction Plant



The total production capacity of the Direct Reduction Plant: more than 5 million tons per year



The total production capacity of the flat-product rolling mills: 2 million tons per year

-  Color-Coating Line 120,000 tons
-  Galvanizing Line 240,000 tons
-  Cold-Rolling Line 420,000 tons
-  Hot-Rolling Line two million tons

4 The Flat Product Rolling Mills

2 The Steel Plant



1983

Three electric arc furnaces and billet casters with a total capacity of 0.8 million tons were commissioned. Over the years their total annual production capacity has increased to the present 3 million tons.

1998

Flat-product steel making and casting facilities with an annual capacity of 1 million tons were commissioned.

2007

Flat-product steel making and casting capacity was enhanced by 1.2 million tons with the addition of an electric arc furnace, slab caster, and vacuum de-gasser.

2013

The long-product steel making and casting production capacity was enhanced by another 1 million tons with the addition of an electric furnace and a billet caster.

The total production capacity of the steel plants: more than 6 million tons per year

The total production capacity of the long-product rolling mills: 4 million MT per year



1983

Long-product rolling facilities including a concrete reinforcement bar (rebar) rolling mill and a wire rod mill with a combined annual production capacity of 0.8 million tons was commissioned.

The production capacity of the Rebar Mill was increased to 1.2 million tons per year; and the Wire Rod Mill to 0.7 million.

1988

A Rebar Mill with an annual production capacity of 0.8 million tons was added.

1993

A combined rebar and wire-rod mill with an annual production capacity of 0.5 million tons was added. The capacity has been increased over the years to the present 0.7 million tons.

2005

Another Wire-Rod Mill with an annual production capacity of 0.5 million tons was added.

2013

Straightening shop with annual production capacity of 0.5M tons.

2014

Cold reduction machines and straightening new lines with annual capacity of 180,000 MT and 240,000 MT respectively.

2016

3 The Long Product Rolling Mills

ENVIRONMENTAL HEALTH IS TOP PRIORITY

SABIC, an environmentally conscious company, is committed to minimizing the ecological impact of its steel-production operations.

The cleanliness of our environment is as important to us as the quality of our steel products. SABIC continuously monitors emissions and implements an effective environmental management program to ensure that we comply with – and exceed – global standards. Through sustainability programs, we contribute to the conservation of our environment and provide a better life for future generations.



LONG PRODUCTS



LONG PRODUCTS



Billet

Billets are the raw materials for producing long-steel products. They are produced in various grades and standards based on customer requirements.



Rebar

Concrete reinforcing bars (rebars) represent the majority of SABIC's steel production. They are made according to international standards.



Rebar in coil

Rebar in coil is further processed by downstream cut and bend operations and straightening lines to produce shapes and straight bars for construction. Plain coils are used for reinforcing concrete pipes by cut and bend facilities.



Wire rod

Drawing grade wire rods are used by downstream industries to produce mesh, nails, hangers, screws, barbed wires, fencing mesh, binding wires, etc. Mesh grade wire rods are used for downstream cold indentation process to make cold deformed bars for construction.

BILLET SPECIFICATIONS

Hadeed manufactures billets... in accordance with international standards to provide steel products that meet specific customer requirements.

Chemical Composition % (max)

Billet Size (mm)	C	Si	Mn	P	S	Cr	Ni	Mo	V	Nb
130x130	0.45	0.6	1.6	0.05	0.05	0.5	0.5	0.1	0.1	0.05
150x150	0.95	0.6	1.6	0.05	0.05	0.5	0.5	0.1	0.1	0.05

Dimension / Appearance

Length	Section Tolerance	Corner Radius	Rhomboidity	Twist	Straightness
12-14 m ± +/- 100 mm	+/- 5 mm	10 mm Max	10 mm max	2 deg/m min	10 mm/m min

Other chemical compositions are possible. Please contact Sales and Marketing for details.



REINFORCING BARS

SABIC's steel strengthens structures and reinforces the foundations of growth in Saudi Arabia and the region.

Mechanical Properties of SABIC Steel Rebars

Standard	Grade	Nominal Diameter mm	Yield Strength MPa (min.)	Tensile Strength MPa (min.)	Tensile to Yield Ratio (min.)	Elongation in 200mm (min.)	Elongation (A5) (min.)	A _{gt} % (min.)
SASO ASTM A615M	280(40)	10	280	420	N/A	11	N/A	N/A
		12 - 18				12		
	420(60)	12 - 20	420	620	N/A	9	N/A	N/A
		25 32 - 40				8 7		
520(75)	10 - 25	520	690	N/A	7	N/A	N/A	
	32 - 40				6			
SASO ASTM A706M	420(60)	10 - 20	420-540	550	1.25	14	N/A	N/A
		25 - 32				12		
		40				10		
BS 4449	B500B	10 - 40	500-650	N/A	1.08	N/A	N/A	5
GCC Standard GS06/ISO 6935-2	B500BR B500BWR	10 - 40	500	N/A	1.08	N/A	14	5
CS2	500B	10 - 40	500	N/A	1.08	N/A	N/A	5
SS560	B500B	10 - 40	500	N/A	1.08	N/A	N/A	5

*Saudi standards adopted from SASO ASTM (A615M and A706M)

Chemical Composition of SABIC Steel Rebars

Standard	Grade	Chemical composition % (maximum)							
		C	Si	Mn	S	P	N	Cu	C.E.V
SASO ASTM A615M	280/420/520 (40/60/75)	...	...	...	...	0.06	...	...	...
SASO ASTM A706M	420(60)	0.3	0.50	1.5	0.045	0.035	...	...	0.55
BS 4449	B500B	0.22	...	...	0.05	0.05	...	0.80	0.50
GCC Standard GS06/ISO 6935-2	B400BR / B500BR	...	...	...	0.06	0.06	...	...	...
	B400BWR / B500BWR	0.22	0.60	1.60	0.05	0.05	0.012	...	0.50
BS 4449	B500B	0.22	0.6	1.6	0.05	0.05	0.012	0.8	0.5
CS2	500B	0.22	0.6	1.6	0.05	0.05	0.012	0.8	0.5
SS560	B500B	0.22	0.6	1.6	0.05	0.05	0.012	0.8	0.5

NOTE:

- Other elements like, Ni, Cr, Mo, V, Nb, Ti ... etc. may be added if required.
- Higher nitrogen contents are permissible if sufficient quantities of nitrogen binding elements are present.
- Product analysis may differ. Standard tolerances will apply.

REINFORCING BARS

Linear Mass and Number of Bars In Bundles

Diameter (mm)	Nominal linear mass Kg/m	Tolerance in linear mass (maximum)			Number of 12 m long bars in a bundle of nominal weight of 2 tons.
		ASTM A615	BS 4449:2005	GCC Standard GS06/ISO 6935-2/2007	
12	0.888	- 6 %	± 4.5 %	± 6 %	188
14	1.208	- 6 %	± 4.5 %	± 5 %	138
16	1.578	- 6 %	± 4.5 %	± 5 %	106
18	1.298	- 6 %	± 4.5 %	± 5 %	84
20	2.466	- 6 %	± 4.5 %	± 5 %	68
22	2.984	- 6 %	± 4.5 %	± 4 %	56
25	3.853	- 6 %	± 4.5 %	± 4 %	44
28	4.834	- 6 %	± 4.5 %	± 4 %	34
32	6.313	- 6 %	± 4.5 %	± 4 %	26
36	7.990	- 6 %	± 4.5 %	± 4 %	21
40	9.865	- 6 %	± 4.5 %	± 4 %	17

Other specifications are possible. Please contact Sales & Marketing for details.



WIRE ROD AND REBAR IN COILS

SABIC produces a range of low, medium and high carbon steel-wire rods according to international standards for various applications. Concrete-reinforcing bars in coil meeting SASO ASTM A615, BS 4449 and GCC standard GSO6 requirements are also available.

1- WIRE ROD

1-1 Drawing-grade wire rods

Wire rods used for drawing wires for various applications.

Chemical Composition and Mechanical Properties of Drawing Grade Wire Rods

Chemical Composition and Mechanical Properties of Drawing Grade Wire Rods

Grade Properties	Chemical Composition %					Mechanical Properties *indicative	
	C	Si	Mn	P	S	Tensile Strength MPa	Elongation % (Min.)
AISI 1006	0.08 max.	0.1 Max	0.45 Max	0.04 max.	0.05 max.	330 - 430	20
AISI 1008	0.1 Max	0.08 - 0.13	0.30-0.50	0.04 max.	0.05 max.	350 - 440	20
AISI 1010	0.08-0.13	0.10 - 0.15	0.30-0.60	0.04 max.	0.05 max.	360 - 450	20
AISI 1012	0.10-0.15	0.10 - 0.15	0.30-0.60	0.04 max.	0.05 max.	370 - 460	20
AISI 1015	0.13-0.18	0.10 - 0.15	0.30-0.60	0.04 max.	0.05 max.	430 - 530	20
AISI 1018	0.15-0.20	0.18 - 0.30	0.60-0.90	0.04 max.	0.05 max.	480 - 540	20
AISI 1020	0.18-0.23	0.18 - 0.30	0.30-0.60	0.04 max.	0.05 max.	480 - 580	20
AISI 1022	0.18-0.23	0.18-0.30	0.70-1.00	0.04 max.	0.05 max.	500-600 **	20

** (YS=340 min)



1-2 Mesh grade wire rods

Wire rods are used for making cold-drawn/cold-indented concrete reinforcement bars and welded mesh.

Grade	Chemical Composition %					Tensile Strength MPa *indicative
	C	Si	Mn	P	S	
Mesh-1	N/A	N/A	N/A	0.05	0.05	360 – 450
Mesh-2	N/A	N/A	N/A	0.05	0.05	440 - 500

1-3 Wire rod for welding electrodes

Welding quality wire rods with restricted Si content of 0.05% Max. are used for making wires for welding electrodes.

Grade	Chemical Composition %					Mechanical Properties		
	C	Si	Mn	P	S	Yield Strength MPa	Tensile Strength MPa	Elongation % RA = 50 Min.
0510	0.04 - 0.07	0.00 – 0.05	0.50 - 0.60	0.025 max.	0.025 max.	240 - 290	370 - 490	25 - 35

1-4 Wire Rod for Cable Armoring:

This steel is used to protect the electric cables from mechanical damage which is buried and used in external or underground projects.

Plain wire rod size range: 5.5mm to 12mm.

Grade	Chemical Composition % (Max)					Mechanical Properties		
	C	Si	Mn	P	S	Yield Strength MPa	Tensile Strength MPa	Elongation % RA = 50 Min.
AISI 1005	0.06	0.05	0.35	0.025	0.025	220 – 280	300 – 380	20 Min

1-5 High-Carbon Plain Wire Rod:

These steel-wire rods are used as an input material in wire drawing process for high-tensile strength application wires for concrete reinforcement, such as pre-stressed concrete, spring wires, wire ropes, fencing wires, concrete nails, high tensile bailing wires, etc.

Plain wire rod size range: 5.5mm to 12mm.

Grade	Chemical Composition %					Mechanical Properties
	C	Si	Mn	P	S	
AISI 1040	0.37 - 0.44	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	As per customers' specific requirements
AISI 1045	0.43 - 0.50	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	
AISI 1050	0.48 - 0.55	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	
AISI 1060	0.55 - 0.65	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	
AISI 1065	0.60 - 0.70	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	
AISI 1070	0.65 - 0.75	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	
AISI 1075	0.70 - 0.80	0.15 - 0.35	0.40 - 0.70	0.04 max.	0.05 max.	
AISI 1080	0.75 - 0.88	0.15 - 0.35	0.60 - 0.90	0.04 max.	0.05 max.	
AISI 1085	0.80 - 0.93	0.15 - 0.35	0.70 - 1.0	0.04 max.	0.05 max.	

Other specifications are possible. Please contact Sales & Marketing for details.

TOLERANCES AND COIL DIMENSIONS

Size Tolerances for Coiled Products

Type	Size Range (mm)	Size Tolerance (mm)	Ovality (mm) max.
Plain Drawing Grades	5.5 and 6.5	±0.25	0.40
	7 - 16	±0.30	0.48
Plain Mesh Grades	5.5 - 6.5	±0.30	0.48
	7 - 16	±0.40	0.64
Deformed	8, 10, 12, 14 and 16	Mass tolerance as per applicable standard.	

Coil Dimensions (indicative)

Outside Diameter	1250 mm
Inside Diameter	800 mm
Compacted Length	1650 mm
Mass (indicative)	1800 kg
Packing	Four equidistant straps with 6 mm diameter binding wire.

Other specifications are possible. Please contact Sales & Marketing for details.

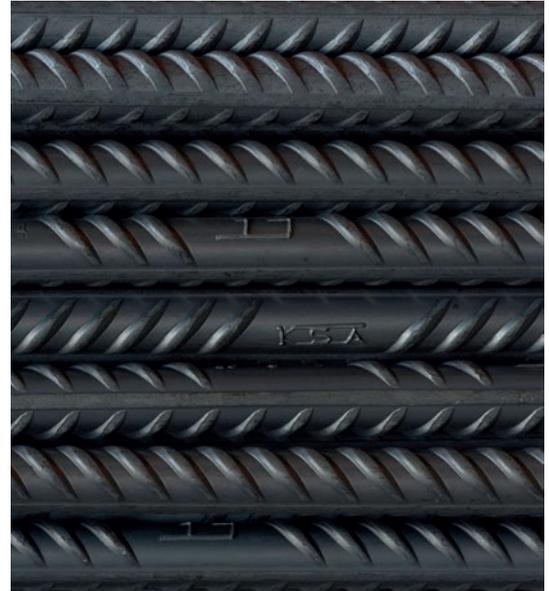


2- REBAR IN COILS

Deformed concrete reinforcement rebar is supplied in coil form (RIC) or as straightened rebar (STR). It is produced as per SASO ASTM A615 Grade 40 and Grade 60, BS 4449:2005 Grade B500B.

Sizes and Tolerances

Diameter (mm)	Nominal linear mass (kg/m)	Tolerance in linear mass (max.)	
		SASO ASTM A615	BS4449
8	0.395	-6%	-/+6
10	0.617	-6%	-/+4.5
12	0.888	-6%	-/+4.5
14	1.210	-6%	-/+4.5
16	1.580	-6%	-/+4.5



Sizes and Tolerances

Diameter (mm)	Nominal linear mass (kg/m)	Tolerance in linear mass (max.)
8	0.395	-/+6%
10	0.617	-/+6%
12	0.888	-/+6%
14	1.210	-/+6%

Weight and Coil Dimension

Weight (Mt)	Internal Diameter (mm)	External Diameter (mm)	Height (mm)
3	630	1200	800
4	630	1200	1000
5	630	1300	1000



REBAR MARKING AND PACKING

Bars can be identified by marks inscribed on to the surface of one side of rebar as per SASO ASTM 615 M and SASO ASTM 706M standards.



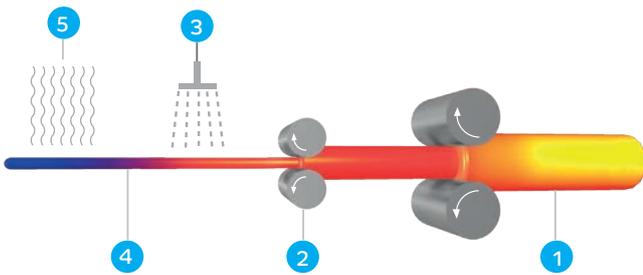
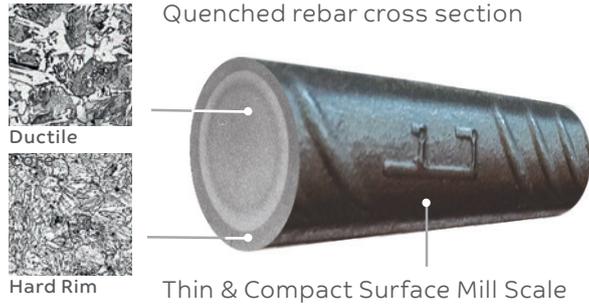
TECHNICAL FACTS



THE QUENCHING PROCESS

SABIC steel rebars are produced through a bar quenching process, where the properties are attained by regulating the microstructure of the steel giving better rebar ductility and good weldability.

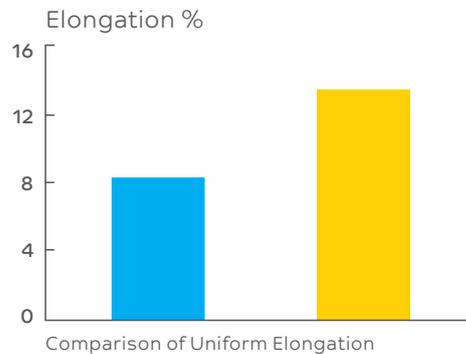
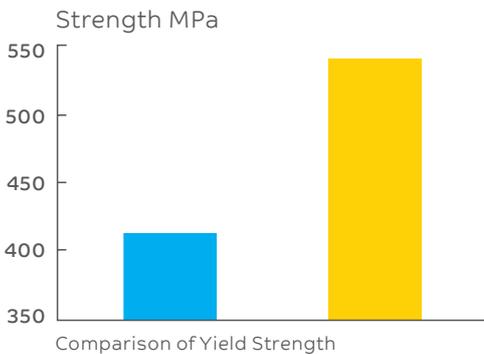
Bar Quenching Process



1. Hot Billet with low C and Mn content
2. Hot Rolling
3. Quenching
4. Self tempering
5. Air-cooling

SABIC steel properties

The precise process control adopted at HADEED results in clean steel with very low content of undesirable residual elements, higher yield strength, good ductility and better bending properties of the steel bar. The lower carbon equivalent values used in SABIC Quenched Steel Rebars also make them readily weldable, particularly for the applications requiring low heat input like tack welding.



- ASTM A615
- SABIC Steel Rebars (typical)

REBAR DISCOLORATION -FACTS AND EFFECTS

The quenched steel rebars inherently change their surface color during open air storage in humid environments. This discoloration is superficial and is associated with the thin mill scale present on the rebar surface and does not extend to the base metal or affect the mechanical properties of the rebars. Rust on the other hand involves the corrosion of the base metal and adversely affects the material properties.



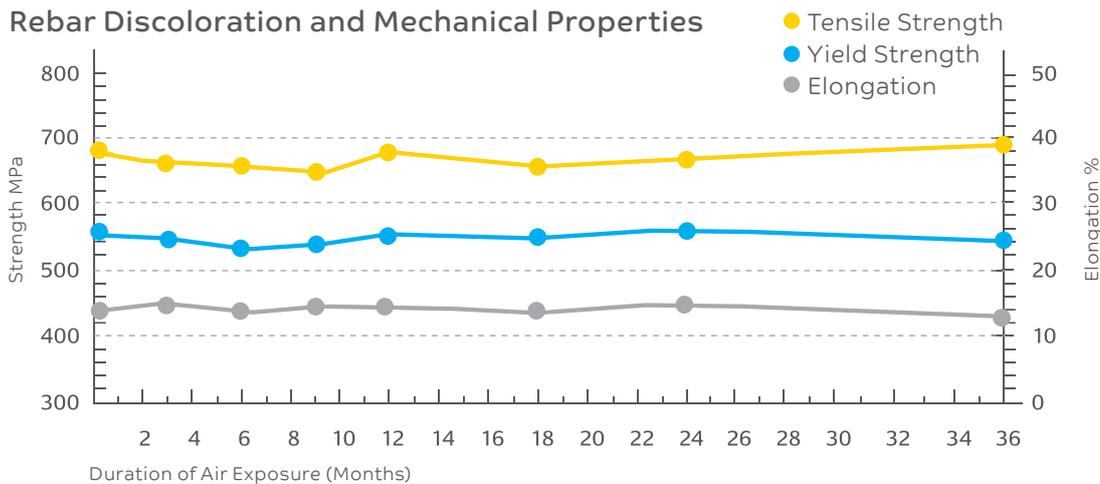
Discoloration



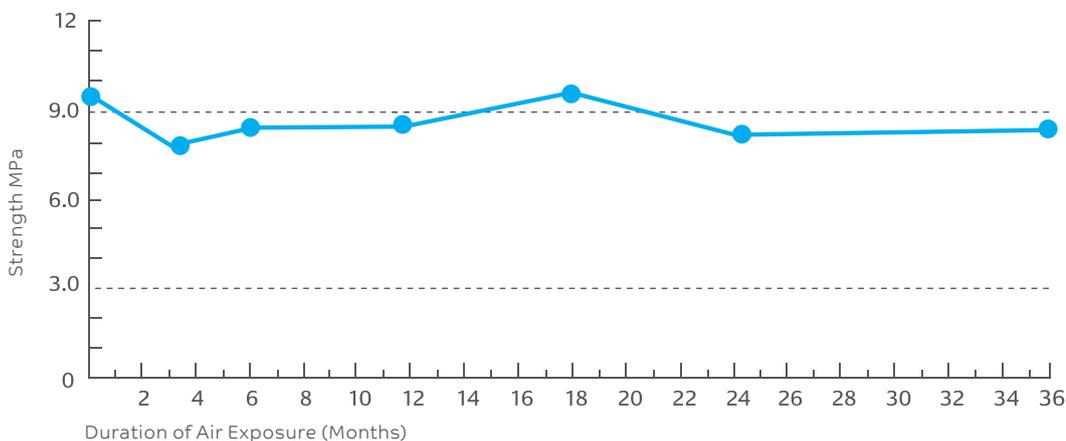
Rust

Long-term studies conducted at SABIC technology centers and other universities have concluded that rebar discoloration is a surface phenomenon and does not affect the rebar strength, ductility, bending, or bond with concrete.

Rebar Discoloration and Mechanical Properties



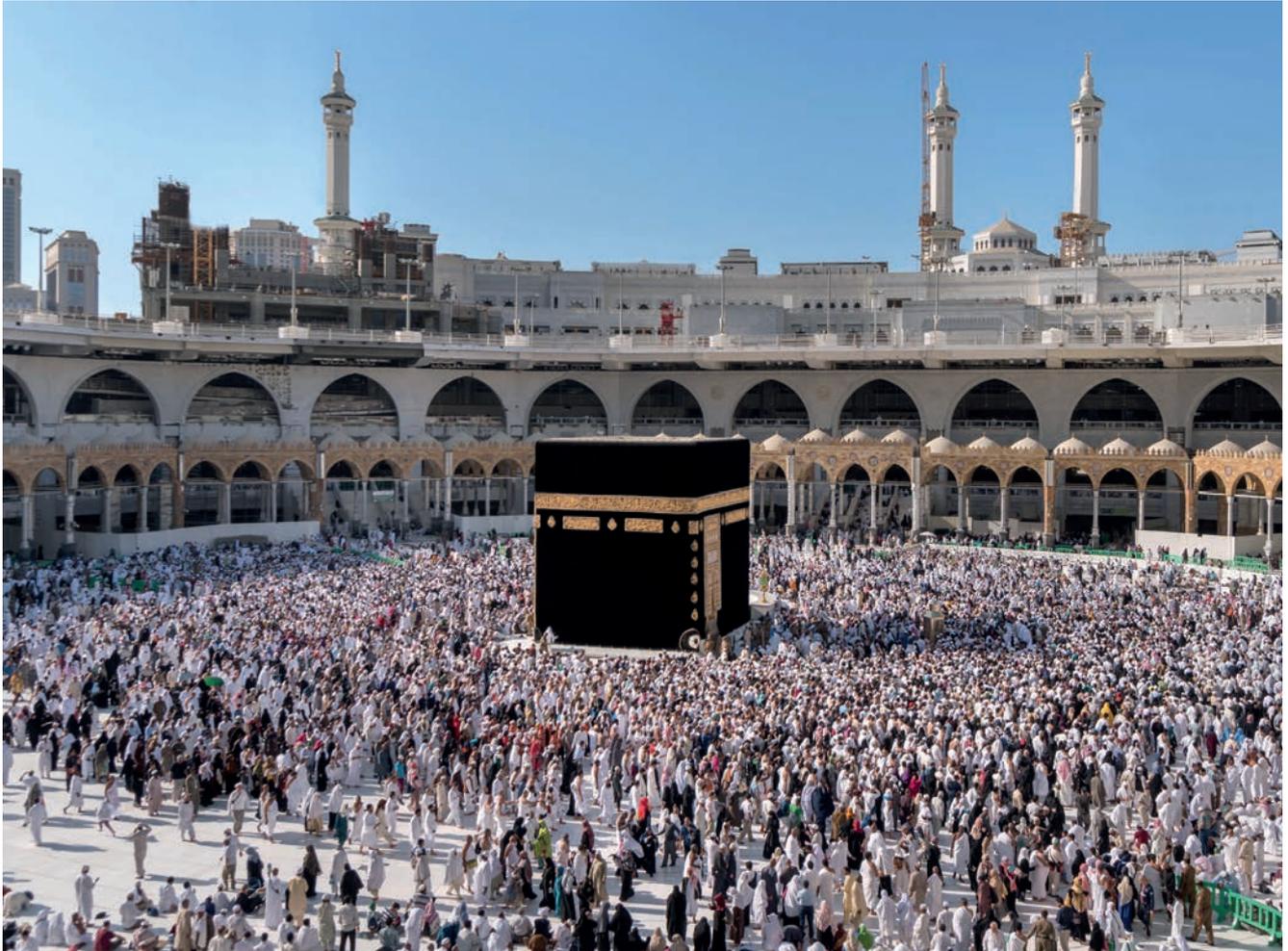
Rebar Discoloration and Concrete Bond Strength





DESIGNS LIFTING OUR PORTFOLIO

SABIC is known for a wide range of products with incredible quality. Many famous projects were constructed with SABIC's trusted steel.



Holy Mosque, Makkah

More than 3.5 million pilgrims journey to the ancient city of Mecca every year. SABIC materials were at the heart of its multi-billion dollar construction and modernization program, which has been the most important expansion of the Holy Mosque in recent times, providing new buildings and facilities for visitors.



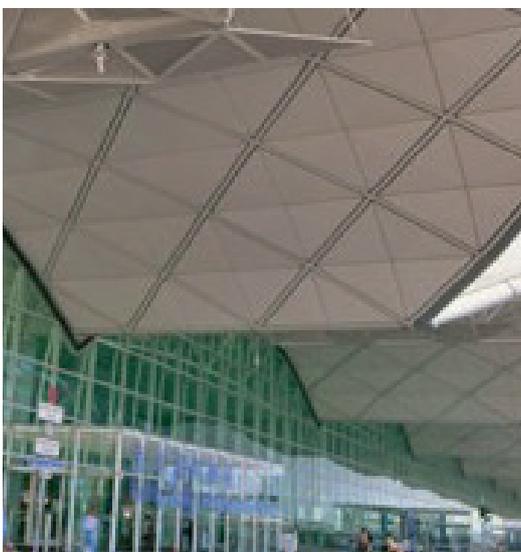
The Kingdom Tower, Riyadh

The Kingdom Tower is one of the best-known landmarks of modern Saudi Arabia. Built with SABIC steel, the tower stands 367 meters high and forms part of a \$510 million complex that includes a five-star hotel, luxury apartments, and a shopping mall.



Burj Al-Arab, Dubai

The Burj Al-Arab, or Arab Tower, is one of the Middle East's most easily-recognized landmarks and a high-profile resort in Dubai. Built on a man-made island a quarter of a kilometer from the shore, its stunning sail-shaped structure soars 321 meters above the Arabian Gulf.



Chek Lap Kok Airport, Hong Kong

SABIC steel was essential to the \$20 billion construction program to build an airport capable of accommodating the dramatic increase in passengers flowing through the gateway to the Far East.

FLAT PRODUCTS



FLAT STEEL PRODUCTS

SABIC offers a broad range of hot-rolled and cold-rolled flat products.

**These products are suitable for a wide range of applications.
The following are the four types of products:**



Hot Rolled Coil

Hot-rolled products are available in different dimensions and grades. They are supplied in mill and trimmed-edge, slit, skin passed, checkered and pickled coils.



Cold Rolled Coil

Cold-rolled products are available in different dimensions and grades. They are supplied as mill and trimmed-edge coils and slit coils with excellent surface quality and mechanical properties such as hardness, tensile strength, and ductility suited for many sophisticated manufacturing applications.



Hot Dip Galvanized Coil

Cold-rolled galvanized products are available in different dimensions and grades. The coils are well protected with uniform zinc coating for long durability, strong corrosion resistance, and a shiny finish. SABIC galvanized steel features excellent forming properties, paintability, weldability; it is suitable for fabrication by forming, pressing, and bending operations.



Pre Painted Coil

Pre Painted Products are available in different dimensions and grades. The coated coils are produced through a sophisticated line at Hadeed. The line is capable to paint in various colors and textures on different substrate that has the advantage of uniform surface/finish, long Durability of product, color stability, chemical resistance, good adhesion of the paint film and corrosion protection

HOT-ROLLED COIL



HOT-ROLLED COIL

Hot-Rolled Steel Grades

- Commercial Quality
- Structural Quality
- Chequered Quality
- API* Line Pipe Quality
- Pressure Vessel Quality
- HSLA Quality
- Corten Quality

* API Line Pipe Steel can be produced to cover both sour and non-sour applications with the following ranges:

API 5L (Non-Sour): Gr. B through X80

API 5L (Sour): Gr. B through X65

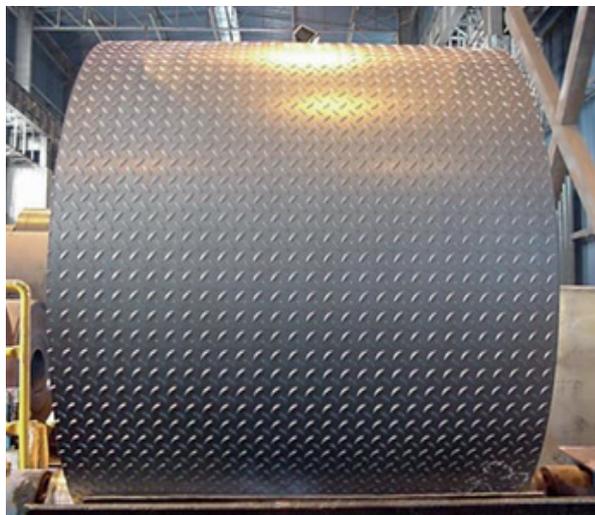
API 5CT (Casing and Tubing): Gr. H40, Gr. J55 and Gr. K55

Dimensions/ Sizes

Hot-Rolled Non-Pickled	Thickness (mm)		Width (mm)		Inner Diameter (mm)
	From	To	From	To	
Hot-Rolled Coil Mill Edge	1.2	17.5	850	1650	762
Hot-Rolled Coil Trim Edge	1.5	10	800	1600	762
Hot-Rolled Slit Coil	1.5	8	75	800	762
Hot-Rolled Chequered Coil	2.3	8	850	1500	762
Hot-Rolled Skin Pass Coil	1.2	5	850	1650	762

Hot-Rolled Pickled	Thickness (mm)		Width (mm)		Inner Diameter (mm)
	From	To	From	To	
Hot-Rolled Coil	1.5	6	850	1650	762
Hot-Rolled Trimmed Coil	1.5	6	850	1600	762

Coil specific weight (Max): 20 kg/mm as max



STEEL CATEGORIES & APPLICATIONS

API Line Pipe Steel

Steel for sour & non-sour applications
Oil & gas pipelines
Water pipelines

Steel for Pressure Vessels

Pressure vessels tanks
Gas cylinders

Commercial Steel

General fabrication
Sheets
Commercial tubes
Corrugated sheets

Chequered steel

Anti-skid applications
industrial Floors

Corten steel

Atmospheric-corrosion applications
Steel containers for Shipping

Structural Steel

Construction applications
Structures
Lighting poles
Electric transmission poles

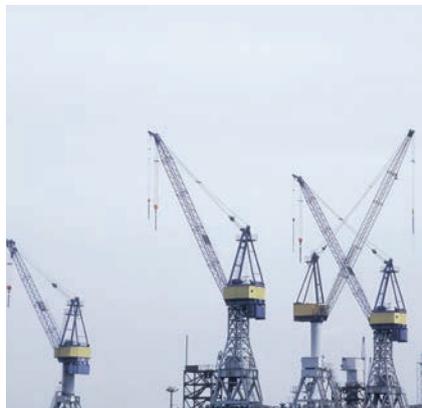
HSLA Steel

High-strength low-Alloy steel
Structural and Automotive Applications

Steel for Cold Rolling Applications



Corten steel



HSLA



Structural Steel



API Steel



Pressure-vessel Steel



Commercial Steel

COLD-ROLLED COIL



COLD-ROLLED COIL

SABIC offers a broad range of cold-rolled products in the form of mill-edge and slit-edge coils with an excellent strip surface, shape, and mechanical properties suitable for manufacturing of commercial and sophisticated applications.

Dimensions/ Sizes

Product	Thickness (mm)	Width (mm)	Inner Diameter (mm)
Cold-Rolled Coils	0.3-3.0	850-1650	610
Cold-Rolled Slit Coils	0.3-3.0	75-800	610



QUALITY AND APPLICATIONS FOR COLD ROLLED COILS

Commercial Quality (CQ)

Exposed or unexposed applications requiring low level of forming and bending operations.

Drawing Quality (DQ)

Applications that need moderate deformation or forming compared to commercial grades.

Structural Quality (SQ)

Applications where the strength, usually in load-bearing structures, of finished parts is important, as well as weldability.

Deep Drawing Quality (DDQ)

Produced with carbon content less than DQ quality which makes it suitable for producing deep-drawn parts. However, It is not as formable as the extra-deep-drawing steel.

Extra-Deep Drawing Quality (EDDQ)

Suitable for the most critical and complex applications. These grades are produced through a vacuum degasser to provide superior internal cleanliness and reduced carbon levels.

APPLICATION OF COLD ROLLED STEEL

Cold-rolled steels can be used in drum, filters, racks, air-conditioning, roll-forming, tubes, shelves, heat-exchanger tubes, furniture, wheel barrows, sign board, etc.



Extra Deep Drawing Quality (EDDQ)



Commercial Quality



Structural Quality (SQ)



Drawing Quality

A large roll of hot dip galvanized coil is shown in a factory setting. The coil is the central focus, with its metallic surface reflecting light. The background shows industrial structures and pipes. The text "HOT DIP GALVANIZED COIL" is overlaid in white, bold, sans-serif font on the left side of the image.

HOT DIP GALVANIZED COIL

HOT-DIP GALVANIZED COIL

SABIC offers a broad range of hot-dip galvanized products in the form of mill-edge and slit-edge coils with an excellent formability, paintability, weldability, etc. Suitable for domestic and building applications.

SABIC galvanized steel coil is well protected with uniform zinc-coating thickness for durability, corrosion resistance, and a shiny or dull finish.

Product	Thickness (mm)	Width (mm)	Inner/Outer Diameter(mm)
Galvanized Coil	0.30 to 2.0	850 to 1480	610/1950
Galvanized Slit Coil	0.30 to 2.0	75 to 720	610/1950
Trimmed Coil	0.30 to 2.0	75 to 720	610/1950

SABIC galvanized steel coil is produced as per the following standards:

Standards	Grade
SASO ASTM A653/A653M	CS,FS,DDS,SS,HSLA
ASTM A653/A653M	CS,FS,DDS,SS,HSLA
JIS G3302	SGCC,SGCH,SGCD,SGCD1,SGCD2,SGCD3,SGCD4,SGC340,SGC400,SGC440,SGC490
EN10346	DX51D,DX52D,DX53D,DX54D,DX55D,S220GD,S250GD,S280GD,S320GD,S350GD

Coating

- G90 (275g/m²)
- G60 (180g/m²)
- G40(120g/m²)
- G30 (90g/m²)

Surface Treatment

- Chemical passivation
- Oiling
- Chemical passivation with oiling

Surface Finish

- Regular spangle surface
- Skin passing with mini-spang surface



QUALITY & APPLICATIONS FOR GALVANIZED COIL

Steel Quality

- Commercial or lock-forming quality
- Drawing quality
- Deep-drawing quality
- Structural quality

Application of Galvanized Steel

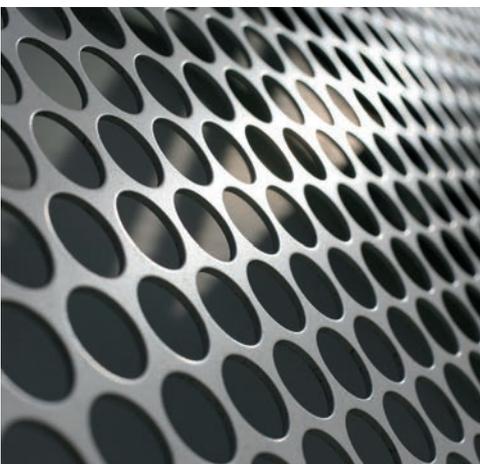
Galvanized coils can be used for air-conditioning panels and ducts, door frames, industrial racks, home appliances, electrical appliances, and ceilings, etc.



Drawing Quality (DQ)



Commercial Quality (CQ)

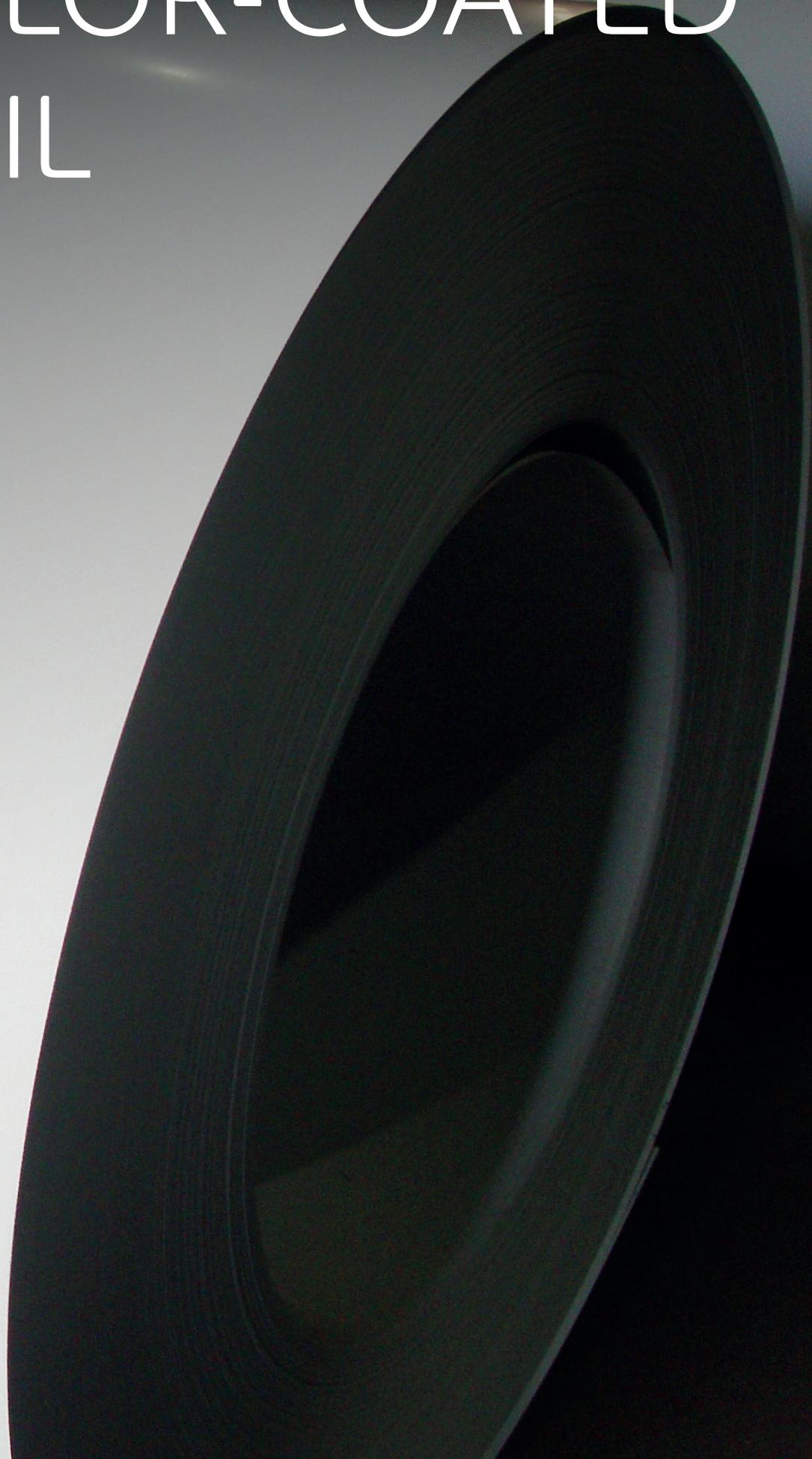


Structural Quality (SQ)



Deep Drawing Quality (DDQ)

COLOR-COATED COIL



COLOR-COATED COIL

SABIC offers color-coated products in various color shades with uniform surface finish and coating textures, aesthetic appearance, color stability and chemical resistance.

Substrate	Thickness Range	
	Min. (mm)	Max. (mm)
GI, CR, Galvalume	0.28	1.6
Aluminum	0.50	1.6

Substrate	Width Range	
	Min. (mm)	Max. (mm)
Coating Line	500	1400
Hot Laminator	500	1250

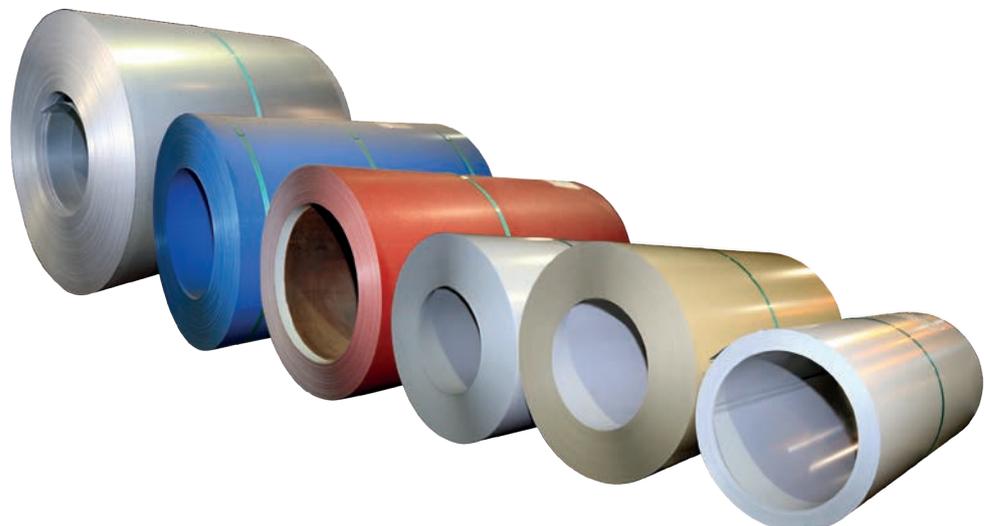
Substrate	Coil Weight Range		
	Min. (Mt)	Max. (Mt)	
		ETW*	ETS*
GI, CR, Galvalume	2	12	7
Aluminum	2	5	4.5

*ETW : Eye to Wall, ETS : Eye to Sky

	Coil Diameter	
	Min. (mm)	Max. (mm)
Inner diameter	508	610
Outer Diameter	700	1600

Type of Sleeves

- Steel
- Cardboard



QUALITY AND APPLICATIONS OF COLOR-COATED COILS

Steel Quality

- Commercial and lock-forming quality
- Drawing quality
- Deep-drawing quality
- Structural quality

Examples of Color-Coated Steel Product Applications

- Building (roofing and cladding, etc.)
- Household goods (fridges, washing machines, microwaves, ovens, etc.)
- Furniture
- Packaging and drums
- Shelves
- Electrical appliances
- Roller shutters, etc.
- Cool chemistry for roofing, wall cladding and sandwich panels.
- Anti-bacterial for interior facing walls and facilities requires hygiene condition such as hospitals and refrigeration units.



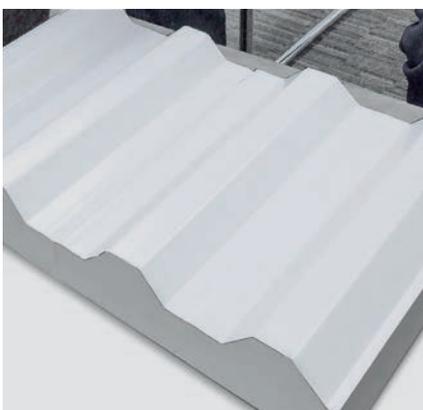
Garage Doors



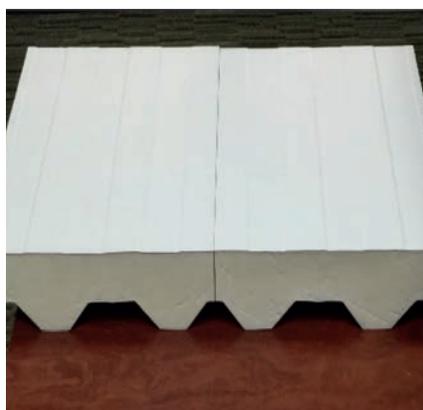
Pre Engineering Buildings



Corrugated Sheets



Sandwich Panels with cool chemistry coating



Interior walls with Anti-bacterial coating

TYPES OF COATING

Type of Paint Coating

- Polyester
- PVDF and SMP
- Plastisol
- Epoxy (suitable for foam adhesion)
- Polyurethane

Lamination

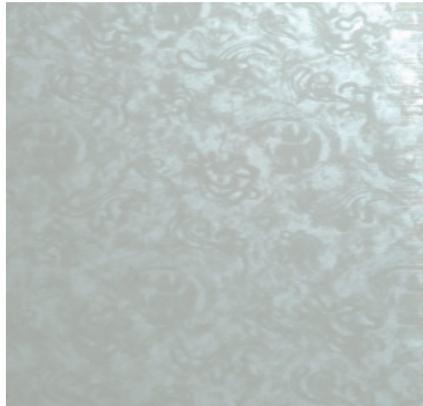
- Hot-Film
- Cold-Film

Special Surface Finish

- Metallic Finish RAL9006
- Wrinkle Finish RAL3003



Hot-Lamination
Wood Glassia GP J881



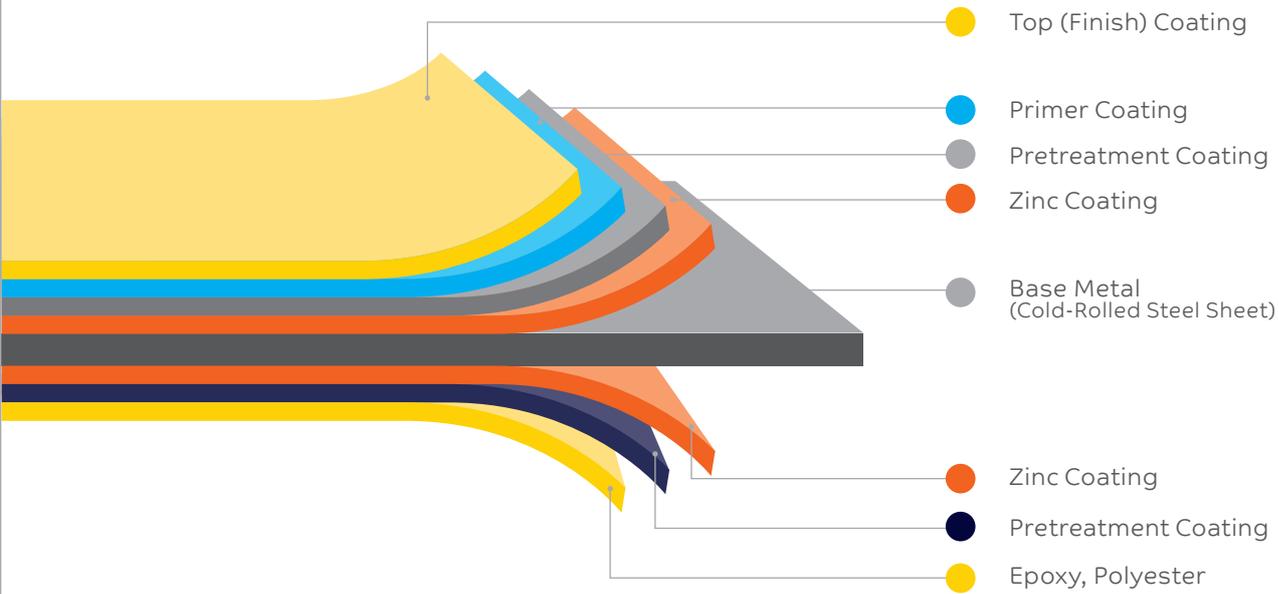
Hot-Lamination Glassia GPJ 4001



Plastisol,
RAL9002

COATING THICKNESS AND PAINT SPECIFICATION

Coating	Dry Coating Film Thickness (µm)		Paint Type
Finish Coat	Top	10 - 25	Polyester, Epoxy, PVDF, SMP, HDP / SDP, Polyurethane, Acrylic Plastisol
		20 - 200	
Service / Reverse Coat	Bottom	5 - 10	Polyester, Epoxy
Primer Coat	Top	5 - 10	Polyester, Epoxy, Polyurethane, High Build Plastisol Primer
		20 - 50	
	Bottom	5 - 10	Polyester, Epoxy



PACKAGING



PACKAGING

Packaging should be selected based on the material type, surface treatment, end use, and steel-coil storage time.

Hot Rolled Coils

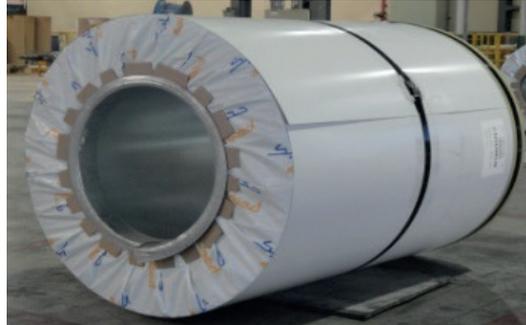
Export and local packaging

- Steel Straps
(3 circumferential & 4 axial)
- Labels on both sides



Color-Coated Steel Coil

- VCI Paper (inner and outer)
- Edge protectors (Kraft hardboard paper, inner and outer)
- Pre-painted metallic cover sheet (inner)
- Metallic-edge protectors (inner and outer)
- Eye blank metal (side cover)



Cold-Rolled and Hot-Dip Galvanized Coils

Export packaging

- Metallic cover sheet (outer and inner)
- Inner-diameter metallic ring
- VCI paper (inner and outer)
- Eye blank metal (side cover)
- Two edge protectors



Local packaging

- Inner and outer metallic cover sheet
- Inner-diameter metallic ring
- Two stickers (inner and outer)
- VCI paper (inner and outer)



TECHNOLOGY & INNOVATION: A MUST TO STAY AHEAD

SABIC maintains a market-leading position by keeping up-to-date with global advances in technology. To keep high standards, we regularly carry out independent studies to inspect and maintain the excellence of our products, evaluate the manufacturing processes, and develop new products according to market requirements.



SABIC Technology Center in Al Jubail has dedicated research facilities for steel product development, process optimization, product quality improvement, energy conservation, sustainability and by-product utilization.

Using the latest physical and computer-based simulation tools, it carries out studies for metallurgical process mapping, developing microstructure-property relationships and process improvement.



WE INVEST IN YOUR TRUST

The Supreme Committee, chaired by his Excellency the Minister of Industry and Commerce, awarded the “King Abdulaziz Quality Award” to Hadeed one of three large-production establishments recognized in Saudi Arabia in 2016.

The King of Saudi Arabia approved this award under decree (# 7/B/18670 on 27-11-1420H) to recognize enterprises with the highest achievement of excellence and quality in their products and services.

In addition, the King Khalid Foundation awarded Hadeed second place in the 2016 King Khalid Award for Responsible Competitiveness. The award honours companies for delivering positive benefits to communities, ecosystems, employees, and stakeholders while strategically achieving a competitive business advantage.





We do what others said can't be done.
We know that our success depends on your success. When you grow, we grow. We know that in the end what matters most is the strength of our relationships, the positive impact that we make, and the science we work with. Our work benefits our stakeholders, and we're here to change the world for good.

We call this...

CHEMISTRY THAT MATTERS™

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[HADEED location map](#)