

General information of Sannohashi

Company overview

Drivetrain parts (Engine, Transmission) **Body parts** (Suspension, Chassis) etc.
High-strength bolt • Critical safety components
Development and sales of Fastening systems and measurement technology

HQ

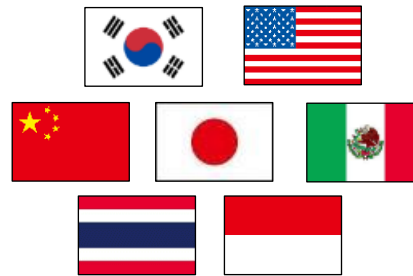
Yashio city, Saitama



Sannohashi since in 1918

Mother plants

In Tohoku



Overseas branch

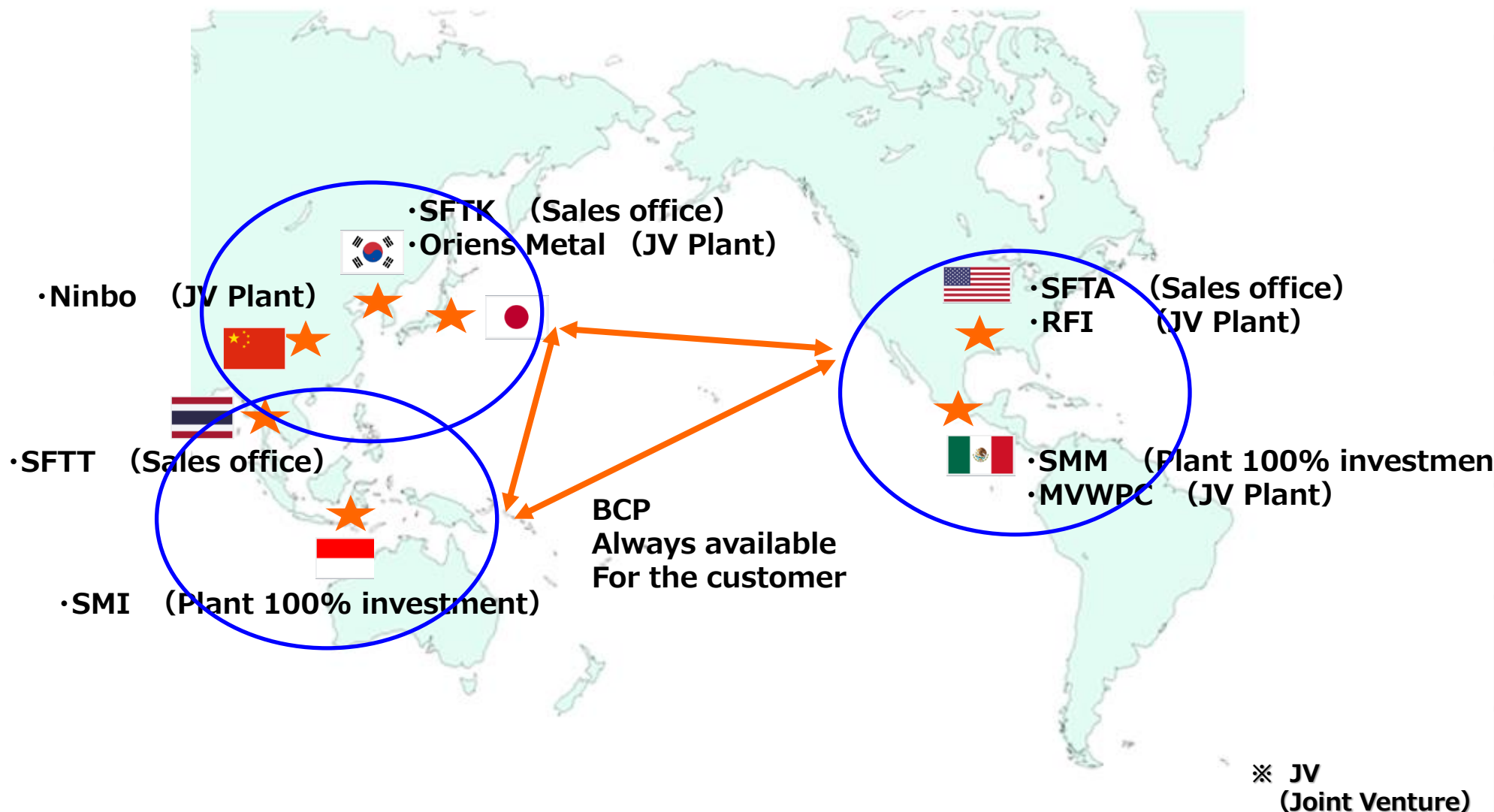
President

Suguru
Nagashima



Sannohashi Team 500 people

Overseas branch



Our customers

- ✓ We supply products to many mobility manufacturers



✓ 100 years experience of Forging

1918 Founded as Sannohashi Seisakusho

1950's Commenced business with Nissan Motor Corporation
Started mass production of cylinder head engine bolts.



1981 Established Mother plant in Tohoku region

2002 Commenced business with Mitsubishi Motors Corporation in USA



2016 Commenced business with Honda Motor Corporation
and Suzuki Motor Corporation in Indonesia

HONDA

SUZUKI

2018 Account opening with Mitsubishi Motors Corporation in Japan and Indonesia
Obtained IATF16949 (Automotive) certification
100th Anniversary of Founding



2022 Obtained JIS-Q-9100 (Aerospace) certification



Heat Treatment Process

● Overview

Mesh Belt Type Non-Oxidizing Continuous Heat Treatment Furnace	
Monthly Production Weight (Actual)	150t/month
Monthly Processing Capacity	400t/month
Processing Weight per Hour	850kg/h
Applicable Processing	・Quenching and tempering (Low decarburization) ・Stress Relieving Annealing (To 650°C)
Applicable Steel Grades	Carbon Steel Cr-Mo Steel Boron Steel etc...
Actual Performance (Product Types)	Bolts Automotive parts others
Actual Performance (Strength)	ISO8.8~ISO12.9

● Advantages of Continuous Furnace

Furnance type		Continuous Furnace	Batch Furnace
Applicable Size		○	◎
Cost		◎	△
Cycle time		◎	△
Quality	Variation	◎	○
	Appearance	○	○
	Dent	△→○	◎
Surface Carbon Control		Low Decarburization Zero Carbon Penetration	Low Decarburization Zero Carbon Penetration Carburization



● High strength engine bolts



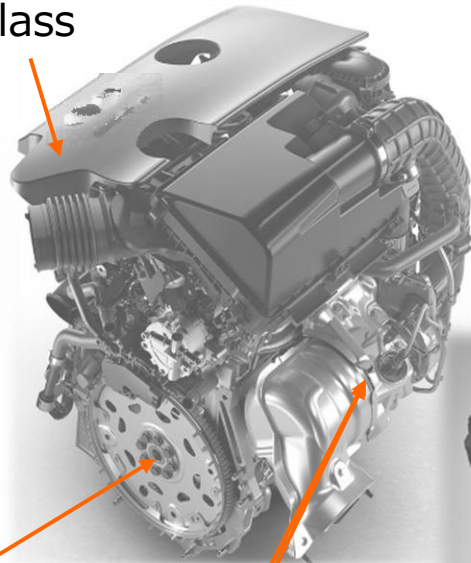
● Automotive parts



Sannohashi's Mono-zukuri BOLT

✓ICE

1) Cylinder head bolt
12.9 class

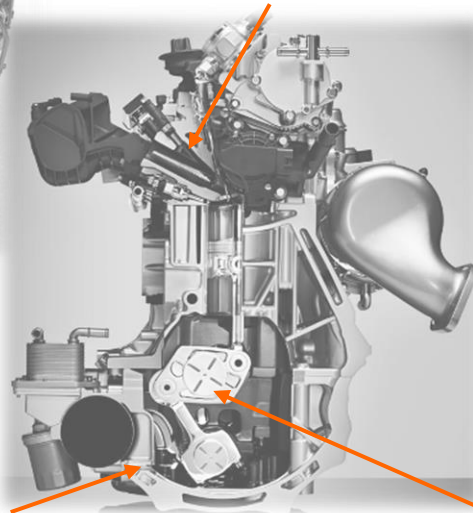


2) Flywheel bolt
12.9 class

3) Crank pulley bolt
12.9 class

4) Bearing cap bolt
12.9 class

5) Camshaft bolt
12.9 class



6) VCR Link bolt
16.9 class



✓EV

• Battery bolt
Strength : 10.9 class
Length : 200~840mm



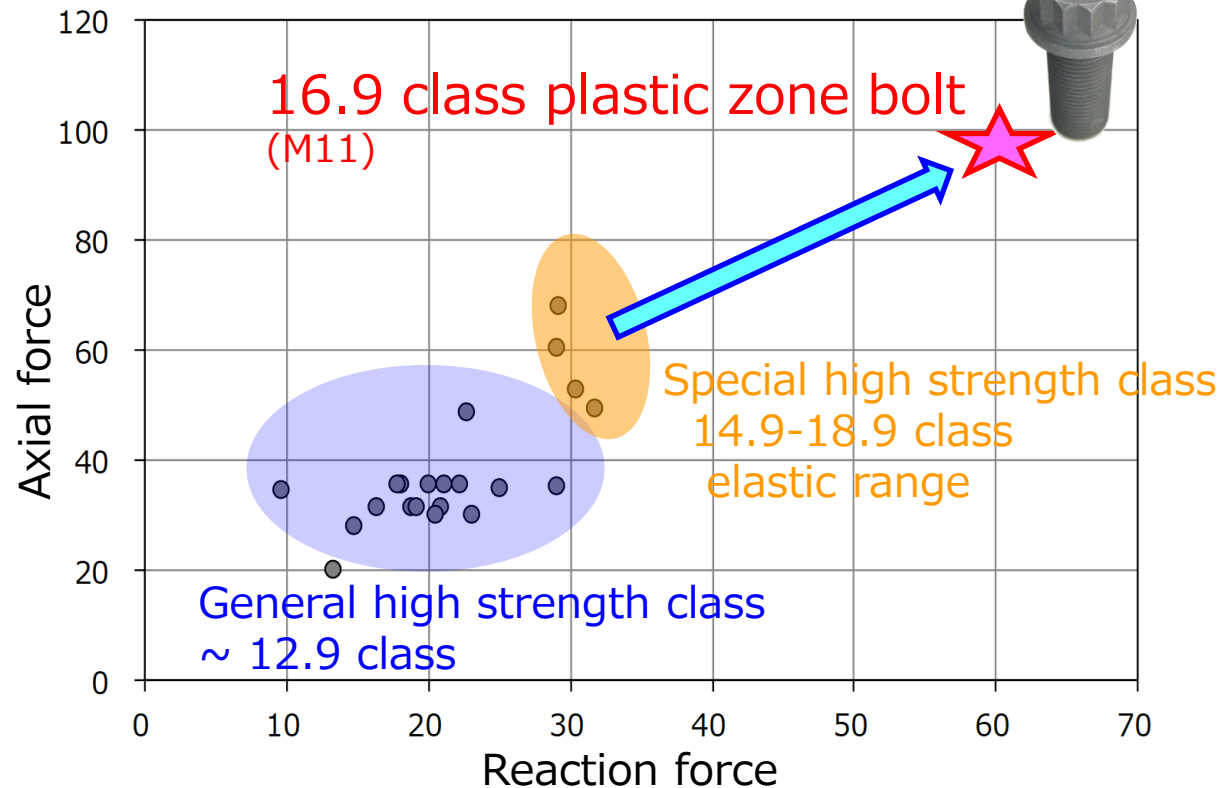
• Torque management bolt
Tamper-proof case closure

Only one Mono-zukuri in the world



Approximately **TWICE** the power of conventional axial force

e bolt



Nissan Global Supplier Award

Global Innovation Award

Sannohashi Corporation
Development of VCR Multi-Link System

This award is presented to you
in appreciation of your excellent performance
in technical innovation.

Thank you for your continuous efforts
and outstanding contribution to NISSAN.

JULY 2018

NISSAN MOTOR CO., LTD.

Hitoshi Sakurai

Hitoshi Sakurai
President
Chief Executive Officer

Sannohashi's Mono-zukuri Precision forging



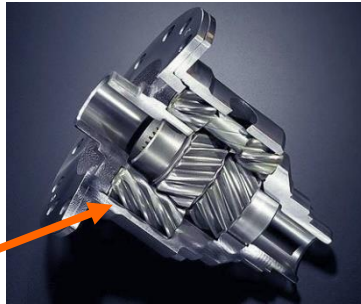
締結技術で一世紀 — since 1918 —
CHALLENGE FOR OUR NEXT 100 YEARS

株式会社 サノハシ

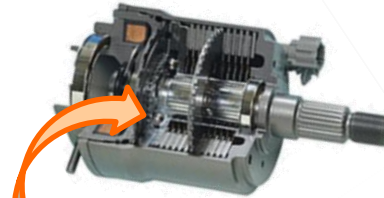


Module 2.5

"Helical gear"
Over 1 million pieces



LSD final drive



Coupling



shaft drive



Spline length: Over 100
Over 100 thousand pieces

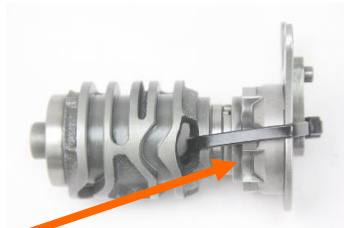


Transfer

Simultaneous Press
both splines

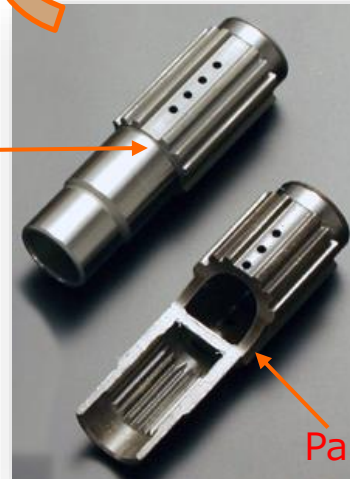


Over 5 million pieces



Motorcycle transmission

Toothless



Partition

"Hollow shaft"
Over 5 million pieces

Centering of both gears

"Shift drum center gear for motorcycles"

We materialize your wish



Near net shape

We will design and
manufacture parts
to fit the space



Urgent and
exceptional action



SMM History

Oct, 2012	Company Founded
Jan, 2013	Starts Sales Operations
Apr, 2013	Plant facility completed
May, 2014	Mass Production starts
Aug, 2014	Assessment Audit approved by NISSAN
Sep, 2014	TIER 1 Business starts
Dec, 2015	Mass Production for NISSAN starts (Fastener Business)
Apr, 2017	ISO:9001 Obtained
Oct, 2022	IATF 16949 Obtained



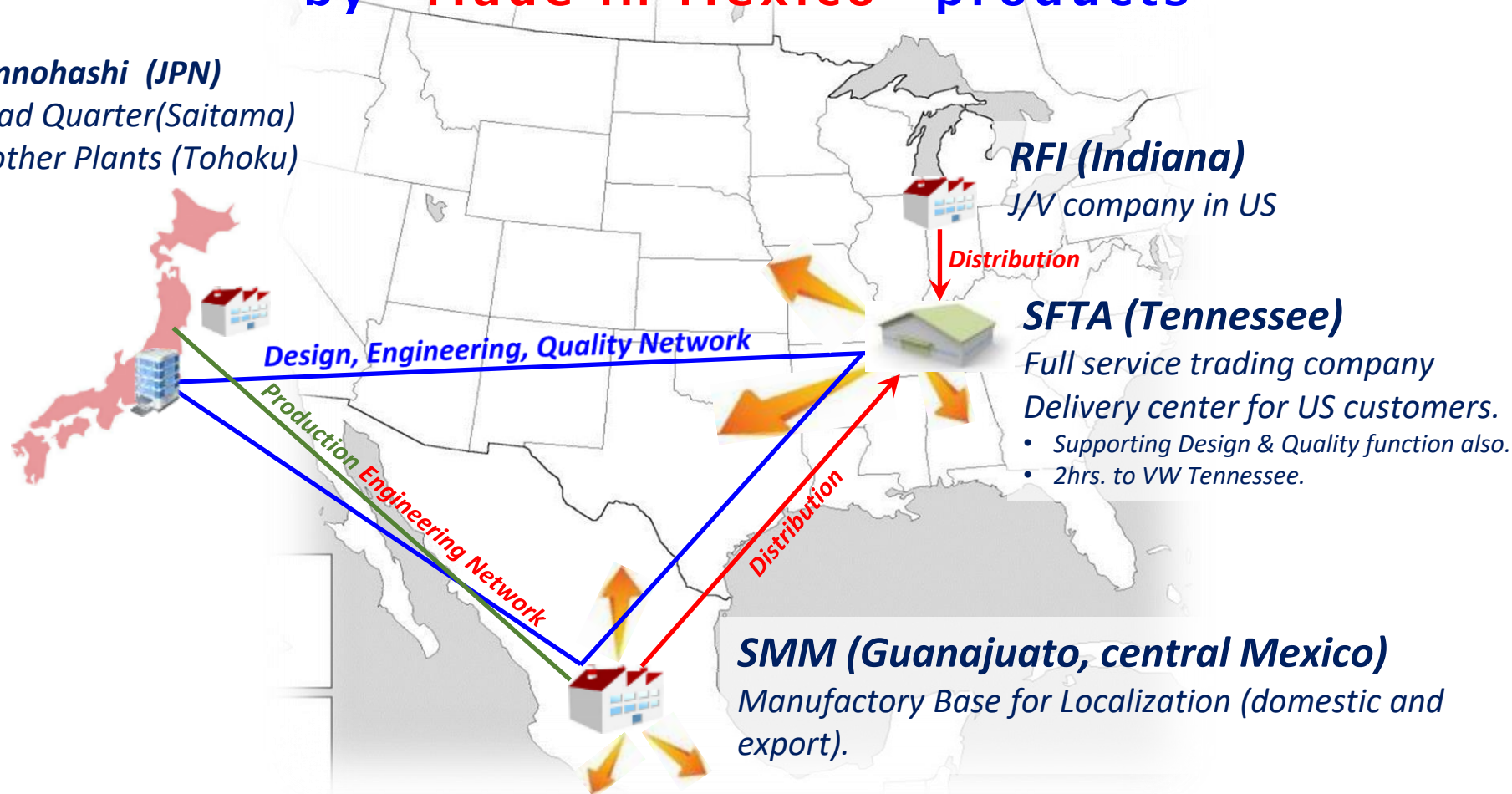
SMM support customers' Localization by "Made in Mexico" products

Sannohashi (JPN)
Head Quarter(Saitama)
Mother Plants (Tohoku)

RFI (Indiana)
J/V company in US

SFTA (Tennessee)
Full service trading company
Delivery center for US customers.
• Supporting Design & Quality function also.
• 2hrs. to VW Tennessee.

SMM (Guanajuato, central Mexico)
Manufactory Base for Localization (domestic and export).



Location (Puerto Interior)

SANNOHASHI



- ✓ Neighboring to Int'l Airport Leon (BJX)
- ✓ 30 min. drive from downtown of León
- ✓ Approx. 50 Japanese companies in the same industrial park

Products

✓ For Steering System



Pinion Gear



Ball stud, Tie Rod, Outer Sockets

✓ For Engine Units



Crank Pulley Bolt, Cam Shaft Bolt, etc.



Cylinder Head Bolt, etc.

✓ For Suspension Syste



Suspension Slant Axial Pins



Body Mounting Pins

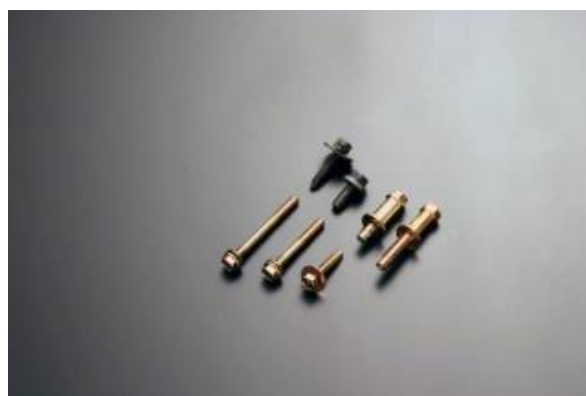


Dog Bone (for fixing Suspension)

✓ For Body System & others



Various Flange Bolts



Flange Bolts with Washer Assembly



Toe Adj. Bolt

Thank you for your attention

Contact info :

Tomoyuki Kubota, SMM General Manager of Sales
t.kubota@smmexico.mx

Carlos Sanchez, SMM Sales Manager
sales.manager@smmexico.mx

Hugo, Frausto, SMM, Sales
rep.ventas@smmexico.mx

