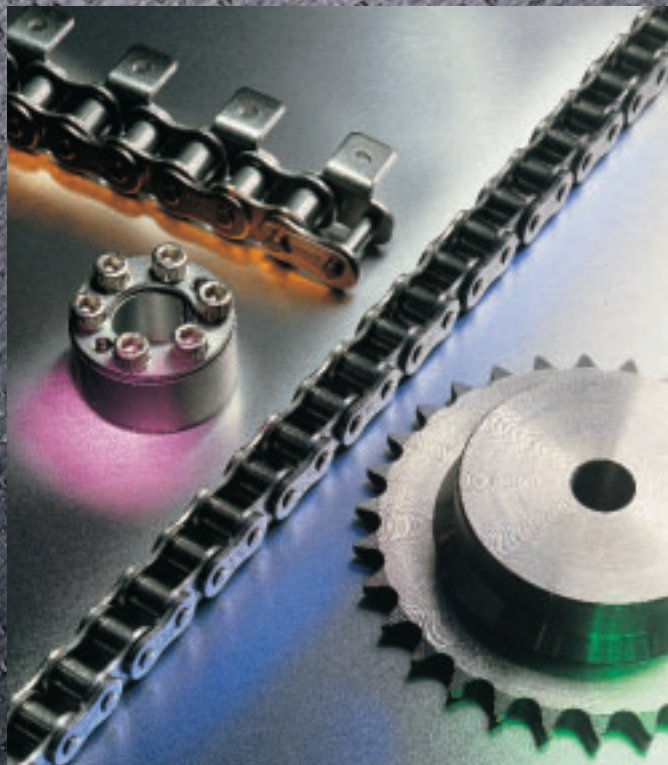




U.S. Tsubaki, Inc.

Roller Chain Division

# Stainless Steel Products



A Complete Corrosion-Resistant System

• R O L L E R   C H A I N S

• A T T A C H M E N T S

• S P R O C K E T S

• P O W E R - L O C K ®



### Superior On-Line Performance

Don't let corrosion eat away at your profits. Downtime is lost money. Put U.S. Tsubaki stainless steel to work in your challenging environment and start reaping major rewards. Our specially developed stainless steel products can outlast the competition and contribute to cost-effective operations and increased profitability.

U.S. Tsubaki stainless steel products—roller chains, attachments, sprockets, and POWER-LOCK<sup>®</sup>—stand up to the most demanding conditions. That means hour after uninterrupted hour of trouble-free performance for your applications.

- Corrosive chemicals
- Acids and alkalis
- Tap water
- Salt water
- High temperatures
- Freezing temperatures
- High levels of moisture

For maximum reliability and outstanding results, choose the name industry leaders turn to for solutions. Choose U.S. Tsubaki stainless steel products, and keep profits where they belong...in your company's pockets.

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## STAINLESS STEEL ROLLER CHAIN

U.S. Tsubaki offers the most complete line of stainless steel roller chain in the industry. In fact, with U.S. Tsubaki stainless steel roller chain, plus our stainless steel attachments, sprockets, and POWER-LOCK<sup>®</sup>, you can create a reliable stainless steel system that withstands extreme temperatures and corrosive conditions.

### **Four Kinds of Stainless Steel to Meet Every Application**

U.S. Tsubaki has four different types of stainless steel roller chains in stock for immediate delivery. You get greater selection and improved performance. Each type has unique characteristics to address your specific needs.

#### **400 CS Series**

Stainless steel with corrosion resistance superior to nickel-plated chain. An economical alternative to other stainless chains, CS Series chains combine nonhardened side plates made of AISI 430 and round parts made of 304 stainless steel. Use in applications that require routine water washdowns.

#### **304 SS Series**

SS Series chains are made completely of 304 stainless steel. They offer excellent resistance to corrosion and extreme temperatures. The 304 SS Series is ideal for environments that require tougher resistance to acids and alkali.

#### **316 NS Series**

The 316 NS Series provides maximum corrosion resistance and temperature resistance, with virtually no magnetic permeability. These are critical factors in many applications involving electronics or the production of steel.

#### **600 AS Series**

AS Series chain was developed for the most demanding applications. With precipitation-hardened round parts, the 600 AS Series combines high load capacity and high corrosion resistance. Of all the stainless steel chains offered by U.S. Tsubaki, AS Series has the highest load capacity. Our standard attachment chains supplied from stock are manufactured to this specification.



# RS ROLLER CHAIN

## RS STAINLESS STEEL ROLLER CHAIN

Specifications				Pitch P	Width Between Roller Plates W	Roller Dia. R	Link Plate			Pin Dia. D	Approx. Weight (lbs/ft)	Pin									Maximum Allowable Load (lbs)	
CS	SS	NS	AS				T	H	h			CS			SS NS			AS			CS•SS•NS	AS
-	RS11SS*	-	-	.148	.072	.090	.015	.138	.138	.062	.04				.089	.124	-				11	
-	RS25SS	RS25NS	-	.250	.125	.130	.030	.230	.199	.091	.09				.150	.189	.208				26	
-	RS35SS	RS35NS	RS35AS*	.375	.188	.200	.050	.354	.307	.141	.22				.238	.281	.579	.238	.281	.579	59	91
RS40CS	RS40SS	RS40NS	RS40AS	.500	.313	.312	.060	.472	.409	.156	.41	.325	.392	.709	.325	.392	.732	.325	.392	.732	100	165
RS50CS	RS50SS	RS50NS	RS50AS	.625	.375	.400	.080	.590	.512	.200	.68	.406	.469	.886	.406	.469	.941	.406	.469	.941	154	231
RS60CS	RS60SS	RS60NS	RS60AS	.750	.500	.469	.094	.712	.614	.234	.94	.506	.600	1.110	.506	.600	1.157	.506	.600	1.157	231	352
RS80CS	RS80SS	RS80NS	RS80AS	1.000	.625	.625	.125	.949	.819	.312	1.65	.638	.768	1.417	.638	.768	1.525	.638	.768	1.535	400	595
-	RS100SS	-	RS100AS	1.250	.750	.750	.156	1.185	1.023	.375	2.70				.791	.909	1.831				575	860
-	RS120SS	-	-	1.500	1.000	.875	.187	1.425	1.228	.437	4.11				1.014	1.173	2.350				858	
-	RS140SS	-	-	1.750	1.000	1.000	.219	1.661	1.433	.500	5.31				1.108	1.297	2.606				1,034	
-	RS160SS	-	-	2.000	1.250	1.125	.250	1.897	1.638	.562	7.28				1.321	1.533	3.043				1,452	
-	RS180SS	-	-	2.250	1.406	1.406	.281	2.059	1.709	.687	9.02				1.419	1.671	3.342				1,918	
-	RS200SS	-	-	2.500	1.500	1.562	.312	2.374	2.047	.781	11.09				1.555	1.783	3.575				2,420	
-	RS240SS	-	-	3.000	1.875	1.875	.375	2.850	2.457	.937	16.43				1.870	2.272	4.433				3,520	

Note:

\*Rollerless

- Clip type connecting links are provided with RS11-RS60; cottered type connecting links with RS80-RS240.  
For NS Series chain, however, cottered type connecting links are provided with RS35-RS80.

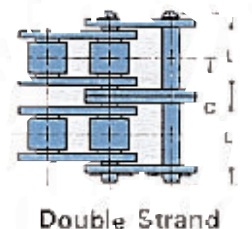
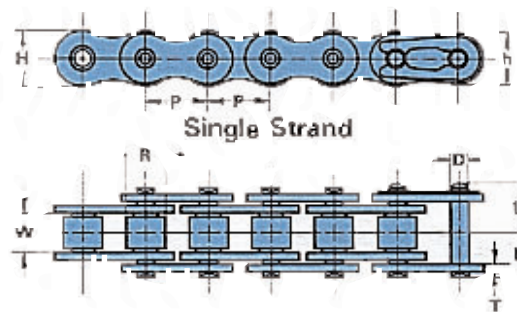
## DOUBLE STRAND STAINLESS STEEL ROLLER CHAIN

Chain No.	Pitch P	Roller Dia. R	Width Between Roller Plates W	Pin			Link Plate			Maximum Allowable Load (lbs)	Approx. Weight (lbs/ft)
				D	L <sub>1</sub>	L <sub>2</sub>	T	H	C		
RS25SS-2*	.250	.130	.125	.0905	.276	.315	.030	.230	.252	48	.18
RS35SS-2*	.375	.200	.188	.141	.429	.469	.050	.354	.399	106	.46
RS40SS-2	.500	.312	.313	.156	.608	.675	.060	.472	.566	218	.85
RS50SS-2	.625	.400	.375	.200	.762	.833	.080	.591	.713	340	1.39
RS60SS-2	.750	.469	.500	.234	.955	1.053	.094	.713	.897	510	2.04
RS80SS-2	1.000	.625	.625	.312	1.217	1.335	.125	.949	1.153	875	3.54
RS100SS-2	1.250	.750	.750	.375	1.484	1.606	.156	1.185	1.408	1,260	5.26

Note:

\*Rollerless

- AlSi316 stainless steel chains are also available.
- When completely nonmagnetic stainless steel (NS Series) is required, please consult U.S. Tsubaki. Double strand stainless steel chains and attachment chains are available.



# CONVEYOR CHAIN

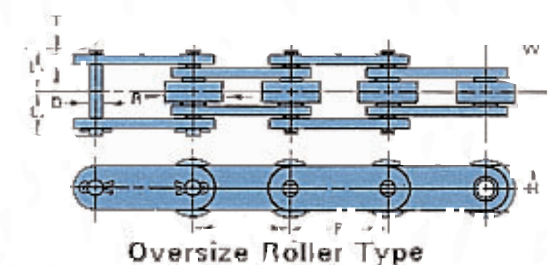
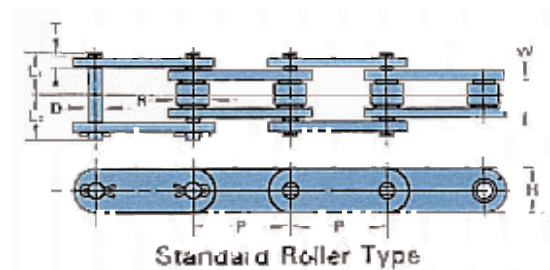
## DOUBLE PITCH STAINLESS STEEL CONVEYOR CHAIN

CS		SS		NS		AS	
Chain No.	Maximum Allowable Load (lbs)	Chain No.	Maximum Allowable Load (lbs)	Chain No.	Maximum Allowable Load (lbs)	Chain No.	Maximum Allowable Load (lbs)
C2040CS	100	C2040SS	100	C2040NS	100	C2040AS	165
C2050CS	155	C2050SS	155	C2050NS	155	C2050AS	231
C2060HCS	230	C2060HSS	230	C2060HNS	230	C2060HAS	352
C2080HCS	400	C2080HSS	400	C2080HNS	400	C2080HAS	595
C2100HCS	575	C2100HSS	575				
		C2120HSS	860				
		C2160HSS	1,430				

1. C2040-C2060H are provided with clip type connecting links, C2080H-C2160H with cottared type. All other links are rivetted.

## BASE CHAIN DIMENSIONS

Chain No.	Pitch P	Width Between Roller Link Plates W	Roller Dia.		Pin			Link Plate		Approximate Weight (lbs/ft)	
			(S) Roller R <sub>1</sub>	(R) Roller R <sub>2</sub>	L <sub>1</sub>	L <sub>2</sub>	Dia. D	Height H	Thickness T		
C2040	1.00	.312	.312	.625	.325	.392	.156	.472	.060	.34	.58
C2050	1.25	.375	.400	.750	.406	.472	.200	.591	.080	.58	.87
C2060H	1.50	.500	.469	.875	.573	.652	.234	.677	.125	1.01	1.47
C2080H	2.00	.625	.625	1.125	.720	.823	.312	.906	.156	1.62	2.37
C2100H	2.50	.750	.750	1.563	.878	.980	.375	1.126	.187	2.45	3.97
C2120H	3.00	1.000	.875	1.750	1.104	1.254	.437	1.354	.219	3.01	5.65
C2160H	4.00	1.250	1.125	2.250	1.405	1.618	.563	1.701	.281	6.60	9.78

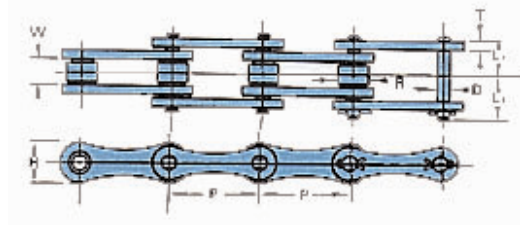




## RS DOUBLE PITCH ROLLER CHAIN

### RS DOUBLE PITCH STAINLESS STEEL ROLLER CHAIN

Chain No.	Pitch P	Roller Dia. R	Width Between Roller Link Plates W	Pin			Link Plate		Maximum Allowable Load (lbs)	Approx. Weight (lbs/ft)	No. of Links per 10 ft
				D	L <sub>1</sub>	L <sub>2</sub>	T	H			
A2040SS	1.00	.313	.312	.312	.325	.380	.060	.472	100	.26	120
A2050SS	1.25	.400	.375	.200	.406	.469	.080	.591	154	.42	96
A2060SS	1.50	.469	.500	.234	.506	.600	.094	.709	231	.63	80
A2080SS	2.00	.625	.625	.312	.640	.758	.125	.906	400	1.03	60



## BS / DIN CHAIN

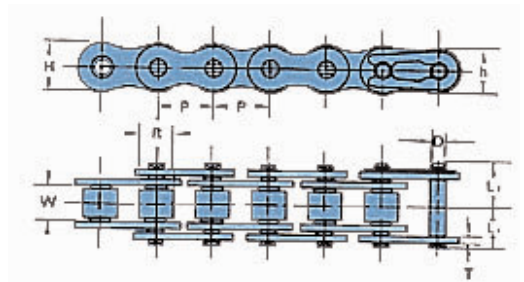
### BS/DIN STAINLESS STEEL CHAIN

Chain No.	ISO BS/DIN No.	Pitch P	Roller Dia. R	Width Between Roller Link Plates W	Pin			Link Plate Height (Max.) H	Maximum Allowable Load (lbs)	Bearing Area (Nominal) Inch <sup>2</sup>	Approx. Weight (lbs/ft)
					D	L <sub>1</sub>	L <sub>2</sub>				
RF06BSS*	06B	.375	.250	.225	.129	.255	.296	.325	57	.040	.26
RS08BSS	08B	.500	.335	.305	.175	.329	.395	.465	111	.078	.47
RS10BSS	10B	.625	.400	.380	.200	.370	.449	.579	148	.104	.64
RS12BSS	12B	.750	.475	.460	.225	.433	.520	.634	196	.138	.84
RS16BSS	16B	1.000	.625	.670	.326	.705	.783	.827	463	.326	1.82

Note:

\*Flat shape link plate

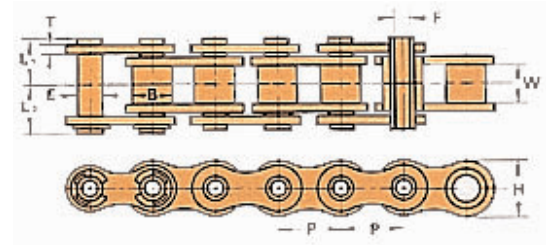
1. Stainless steel roller chains with over 1.00 inch pitch are available upon request.
2. Duplex and triplex are available.



# HOLLOW PIN CHAIN

## HOLLOW PIN STAINLESS STEEL CHAIN

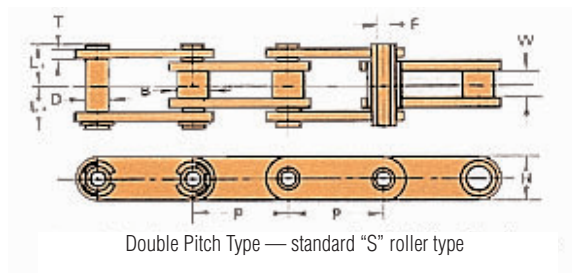
Standard attachments are available for Hollow Pin Chain in both single and double pitch types. Attachments or cross rods may be inserted into any link without disassembling the chain.



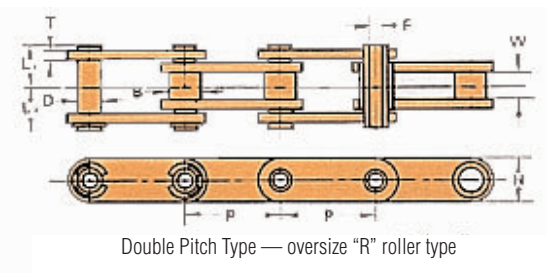
RS Type (single pitch type)

### RS TYPE

Chain No.	Pitch P	Width Between Inner Link Plates W	Bushing Dia. B	Pin				Link Plate		Maximum Allowable Load (lbs)	Approx. Weight (lbs/ft)
				E	F	L <sub>1</sub>	L <sub>2</sub>	T	H		
RS40HP	.500	.312	.312	.224	.157	.315	.374	.060	.472	100	.36
RS50HP	.625	.375	.400	.284	.202	.396	.459	.080	.591	154	.58
RS60HP	.750	.500	.469	.330	.236	.494	.561	.094	.713	231	.85
RS80HP	1.000	.625	.625	.448	.316	.640	.701	.125	.949	400	1.60





Double Pitch Type — standard "S" roller type



Double Pitch Type — oversize "R" roller type

### DOUBLE PITCH TYPE

Chain No.	Pitch P	Width Between Inner Link Plates W	Bushing Dia. B	Roller Dia. R	 Pin				 Link Plate		Maximum Allowable Load (lbs)	Approx. Weight (lbs/ft)
					E	F	L <sub>1</sub>	L <sub>2</sub>	T	H		
STANDARD ROLLER												
C2040HP	1.00	.312	.312	-	.224	.157	.315	.374	.059	.472	100	.31
C2050HP	1.25	.375	.400	-	.284	.202	.396	.459	.079	.591	154	.50
C2060HP	1.50	.500	.469	-	.330	.236	.494	.561	.094	.677	231	.93
C2080HP	2.00	.625	.625	-	.448	.316	.640	.701	.126	.906	400	1.21
OVERSIZED ROLLER												
C2042HP	1.00	.312	-	.625	.224	.157	.315	.374	.059	.472	100	.55
C2052HP	1.25	.375	-	.750	.284	.202	.396	.459	.079	.591	154	.81
C2062HP	1.50	.500	-	.875	.330	.236	.494	.561	.094	.677	231	1.38
C2082HP	2.00	.625	-	1.125	.448	.316	.640	.701	.126	.906	400	1.88



## STAINLESS STEEL ATTACHMENTS

### Engineered for Extended Wear Life

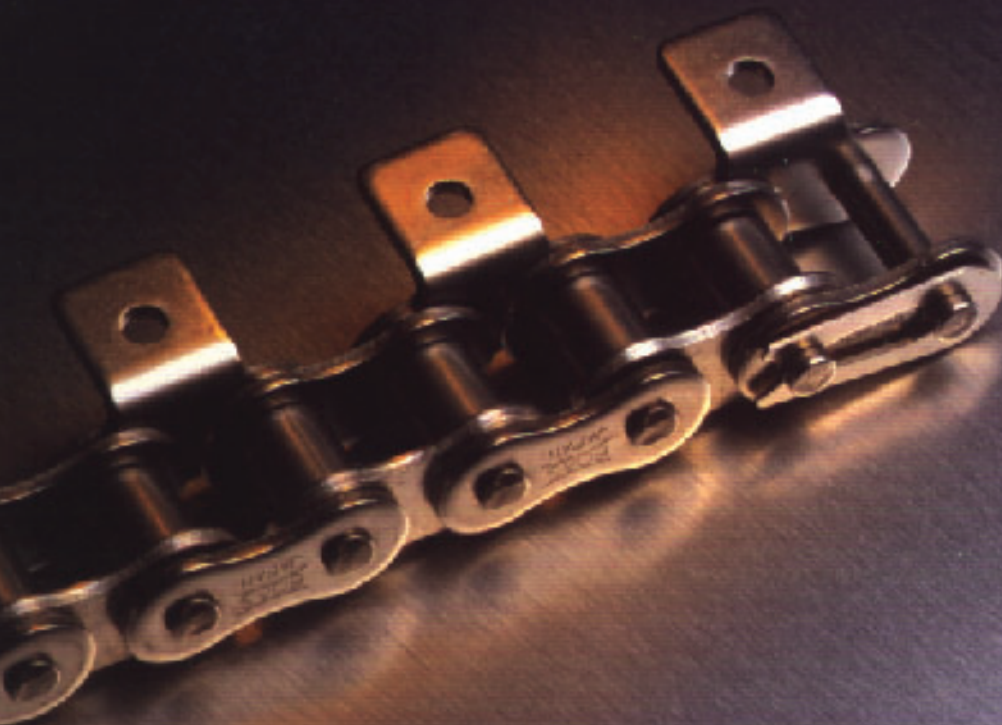
Stainless steel attachment chains from U.S. Tsubaki are made using high-strength AS 600 Series stainless steel with SS 304 attachments to keep your lines moving. AS Series has excellent resistance to corrosion from acid, alkali, and water, and works in temperatures from -40°F to 750°F.

We offer a wide variety of standard attachments, including:

- bent, straight, or lug types
- on one or both sides
- with extended pins
- wide contour

Other configurations are available on a made-to-order basis.

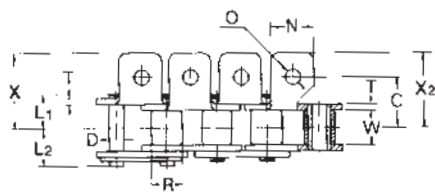
We maintain a large inventory of stainless steel chains and attachments, assembled and ready for quick delivery.



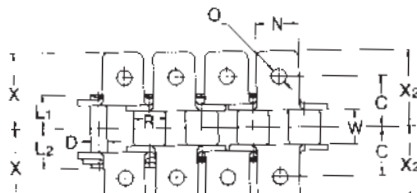
# STAINLESS STEEL ATTACHMENTS

## RS STAINLESS STEEL ATTACHMENT DIMENSIONS

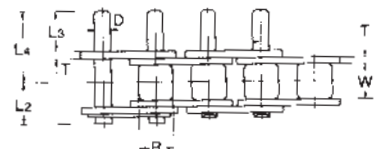
Chain No.	Availability				Attachment										Additional Weight per Attachment (lbs/att)		
	CS	SS	NS	AS	C	C <sub>1</sub>	N	O	S	X	X <sub>2</sub>	X <sub>s</sub>	L <sub>3</sub>	L <sub>4</sub>	A•SA Att	K•SK Att	D-3 Att
RS25		●	●		.281	.313	.220	.134	.187	.421	.421	.459	-	-	.0007	.001	-
RS35		●	●	●	.375	.374	.311	.134	.250	.563	.563	.572	.375	.579	.0018	.003	.002
RS40	●	●	●	●	.500	.500	.374	.142	.315	.701	.701	.685	.375	.661	.0044	.008	.002
RS50	●	●	●	●	.625	.625	.500	.205	.406	.921	.921	.907	.469	.827	.0066	.013	.004
RS60	●	●	●	●	.750	.720	.626	.205	.469	1.111	1.110	1.057	.563	1.018	.0154	.030	.006
RS80	●	●	●	●	1.000	.969	.752	.268	.626	1.441	1.441	1.396	.752	1.335	.0287	.572	.015
RS100		●		●	1.250	1.252	1.000	.343	.780	1.768	1.768	1.732	.937	1.644	.0572	.114	.026
RS120		●			1.500	1.437	1.126	.406	.906	2.197	2.016	2.081	1.126	2.024	.1012	.202	.044
RS140		●			1.750	1.750	1.375	.469	1.126	2.484	2.283	2.500	1.311	2.264	.1672	.334	.066
RS160		●			2.000	2.000	1.500	.563	1.252	2.827	2.598	2.750	1.500	2.653	.2332	.466	.099



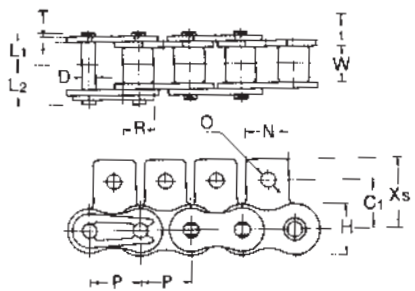
A-1 Attachment



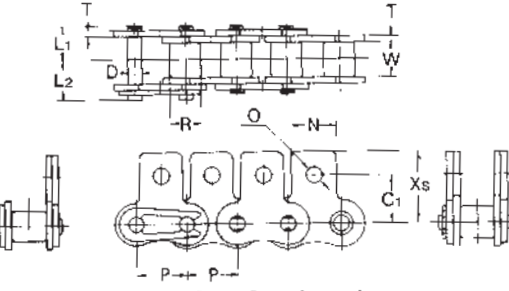
K-1 Attachment



D-3 Attachment



SA-1 Attachment



SK-1 Attachment

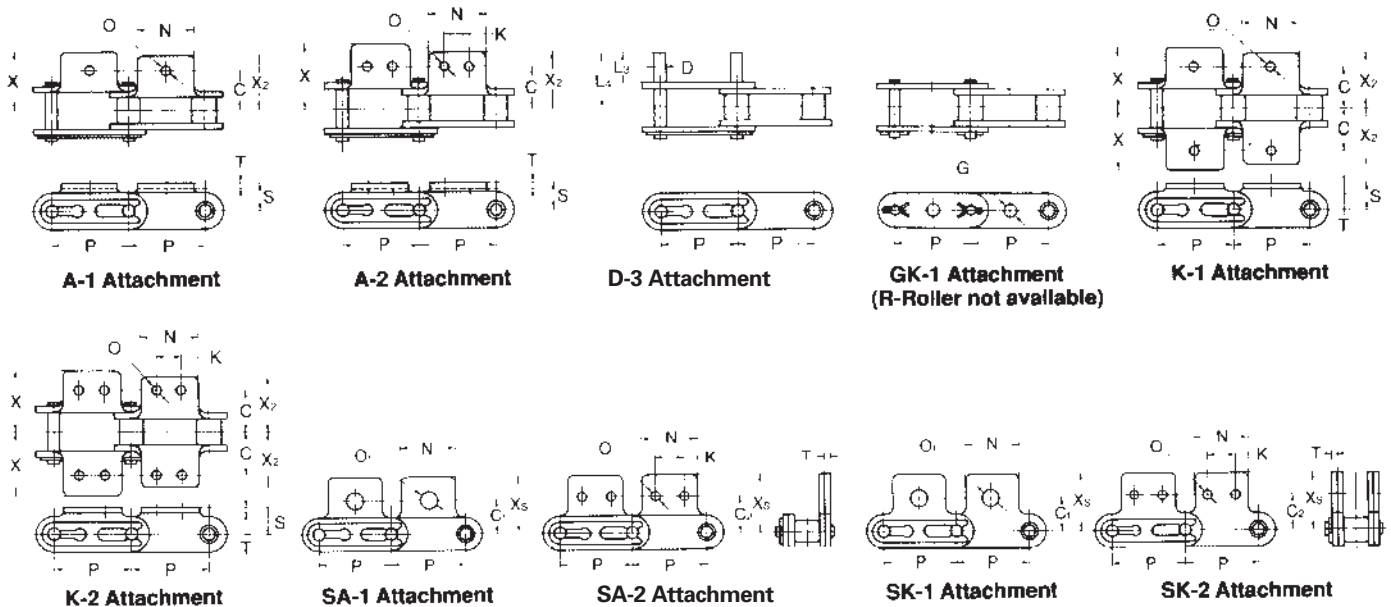
- Connecting Link  
Clip type = RS25 ~ RS60  
Cottered = RS80 ~ RS160
- X and X<sub>2</sub> Dimensions  
For RS25 ~ RS100; X = X<sub>2</sub>  
where X is pin link width and  
X<sub>2</sub> is the roller link attachment width.
- Attachment Drawings Spacing  
Attachment drawings are shown with  
attachments at every link.



## DOUBLE PITCH STAINLESS STEEL ATTACHMENT DIMENSIONS

Chain No.	Availability				Pitch P	Attachment								
	CS	SS	NS	AS		C	C <sub>1</sub>	C <sub>2</sub>	K	N	O	O <sub>1</sub>	S	T
C2040	●	●	●	●	1.00	.500	.437	.535	.374	.752	.142	.205	.358	.060
C2050	●	●	●	●	1.25	.626	.563	.626	.469	.937	.205	.268	.437	.080
C2060H	●	●	●	●	1.50	.844	.689	.752	.563	1.126	.205	.343	.579	.125
C2080H	●	●	●	●	2.00	1.094	.874	1.000	.752	1.500	.268	.406	.752	.156
C2100H	●	●			2.50	1.313	1.126	1.252	.937	1.874	.343	.563	.921	.197
C2120H		●			3.00	1.563	1.311	1.469	1.126	2.252	.386	.579	1.094	.236
C2160H		●			4.00	2.063	1.752	2.000	1.500	3.000	.709	.866	1.437	.315

Chain No.	Availability				Attachment								Additional Weight per Attachment (lbs/att)		
	CS	SS	NS	AS	X	X <sub>2</sub>	X <sub>S</sub>	D	L <sub>3</sub>	L	G		A•SA Att	K•SK Att	D-3 Att
<b>C2040</b>	●	●	●	●	.760	.693	.780	.156	.374	.663	.161		.007	.013	.002
<b>C2050</b>	●	●	●	●	.953	.866	.969	.200	.469	.833	.201		.013	.026	.004
<b>C2060H</b>	●	●	●	●	1.240	1.110	1.205	.234	.563	1.083	.240		.037	.075	.007
<b>C2080H</b>	●	●	●	●	1.602	1.441	1.594	.312	.752	1.401	.319		.070	.141	.015
<b>C2100H</b>	●	●			1.965	1.767	1.984	.375	.937	1.687	.398		.139	.277	.026
<b>C2120H</b>		●			2.425	2.173	2.361	-	-	-	-		.235	.471	-
<b>C2160H</b>		●			3.163	2.820	3.093	-	-	-	-		.499	.999	-



- Chain diagrams are drawn with S-rollers although R-rollers are also available with the same attachment dimensions. Attachments are shown at every link.
- C2040-C2060H connecting links are clip type; C2080H-C2160H are cottered type, GK-1 attachment connecting links are cottered type.
- All links other than connecting links, with or without attachments, are riveted type.

# STAINLESS STEEL COMPATIBILITY

## MATERIAL OF COMPONENT PARTS

Chain Series	Link Plate	Pin	Bushing	Roller
<b>400 (CS)</b>	AISI430	AISI304	AISI304	AISI304
<b>304 (SS)</b>	AISI304	AISI304	AISI304	AISI304
<b>316 (NS)</b>	AISI316	AISI316	AISI316	AISI316
<b>600 (AS)</b>	AISI304	Special 13-7PH* or 17-7PH*	ASTM631-HT 17-7PH*	ASTM631-HT 17-7PH*†

\* PH: Precipitation-Hardened  
 The corrosion resistance of special 13-7 PH is equal to that of 17-7 PH.  
 † On double pitch oversized rollers, the roller material will be AISI304.

## PERFORMANCE OF ANTI-CORROSIVE CHAINS

Chain Series	Corrosion Resistance	Temperature Resistance	Magnetism	Wear Resistance
<b>400 (CS)</b>	Good for general chemicals, but less resistant than SS for acids	-4°F to 750°F	Magnetic	Fair
<b>304 (SS)</b>	Good for general acid, alkali and water	-40°F to 750°F (Never use below -270°F or over 1300°F)	Slightly magnetic due to cold forming of parts	Fair
<b>316 (NS)</b>	Superior to SS and AS	-40°F to 750°F (Never use below -420°F or over 1500°F)	Non-magnetic	Fair
<b>600 (AS)</b>	Slightly less than above	-40°F to 750°F (Never use below -40°F or over 930°F)	Magnetic	Very Good

## STAINLESS STEEL CHAIN SELECTION

General selection is based on bearing pressure between the pin and bushing. Anti-corrosive roller chains are normally intended to be used at slow speeds without lubrication. Chain selection should be made based on the bearing pressure shown below.

Chain Series	Maximum Allowable Bearing Pressure between Pin and Bushing	Maximum Suggested Operating Speed
<b>400 (CS)</b>	1,420 psi	230 ft/min
<b>304 (SS)</b>	1,420 psi	230 ft/min
<b>316 (NS)</b>	1,420 psi	230 ft/min
<b>600 (AS)</b>	2,130 psi	230 ft/min

Chain selection can be made using the following formula:

$$\text{Max. Chain Tension} \times \text{Service Factor} \times \text{Speed Coefficient} \times \text{Temperature Factor} \leq \text{Maximum Allowable Load}$$

Maximum allowable load or maximum bearing pressure as shown above can be doubled only when chain is used in group 1 of the "Corrosion Resistance Guide" and properly lubricated. Vibrations arising from ultrasonic waves, etc., must also be taken into consideration.



## SERVICE FACTOR

Type of Impact	Service Factor
Smooth transmission	1.0
Transmission with some impact	1.3
Transmission with large impact	1.5

## SPEED COEFFICIENT

Chain Speed	Speed Coefficient
0 to 50 ft/min	1.0
50 to 100 ft/min	1.2
100 to 160 ft/min	1.4
160 to 230 ft/min	1.6

## TEMPERATURE FACTOR

Temperature	CS Series	SS Series	NS Series	AS Series
~ -270°F	X	X	X	X
-270°F ~ -40°F	X	1.0	1.0	X
-40°F ~ 750°F	1.0*	1.0	1.0	1.0
750°F ~ 930°F	X	1.2	1.0	1.8
930°F ~ 1,100°F	X	1.5	1.2	X
1,100°F ~ 1,300°F	X	1.8	1.5	X
1,300°F ~ 1,500°F	X	X	2.0	X
1,500°F ~	X	X	X	X

X means not suggested. Consult with U.S. Tsubaki.  
 \*CS Series temperature range -4°F ~ 750°F

## MAXIMUM ALLOWABLE LOAD

Calculate the chain's maximum allowable load with this formula:

Max. allowable bearing pressure	X	Bearing area between pin and bushing	=	Maximum allowable load
---------------------------------	---	--------------------------------------	---	------------------------

Chain No.	CS Series	SS Series	NS Series	AS Series
<b>RS25</b>	-	26	-	-
<b>RS35</b>	59	59	59	91
<b>RS40</b>	100	100	100	155
<b>RS50</b>	154	154	154	230
<b>RS60</b>	231	231	231	350
<b>RS80</b>	395	395	395	590
<b>RS100</b>	-	573	573	855

Note: All units are in pounds.

## STAINLESS STEEL SPROCKETS

### Long-Wearing Sprockets for Special Environments

When ordering stainless steel chains and attachments, consider stainless steel sprockets. Make your entire operation corrosion resistant.

Keep your lines running at peak performance with a complete stainless steel system—roller chains, attachments, sprockets, and POWER-LOCK<sup>®</sup>—from U.S. Tsubaki.

All stainless steel sprockets from U.S. Tsubaki are made using high-quality 304 SS stainless steel. This provides excellent resistance to food and chemicals, including acids and alkali, as well as to extreme temperatures.

Stainless steel sprockets from U.S. Tsubaki are available for food grade and nonfood grade applications.

Our standard stainless steel sprockets are specially constructed for food applications but can be used in any corrosive environment. We start with a thicker plate and weld on the hub. Then we lathe the sprocket, machining all sides to remove pits and marks. The smooth finish means food and bacteria won't gather.

For corrosive environments that do not involve food, we offer made-to-order stainless steel sprockets without the lathing step. That reduces your cost and yet maintains high-quality corrosion resistance for your operation.

Consult with U.S. Tsubaki about your application, and we'll suggest the most cost-effective sprockets to keep your lines running.



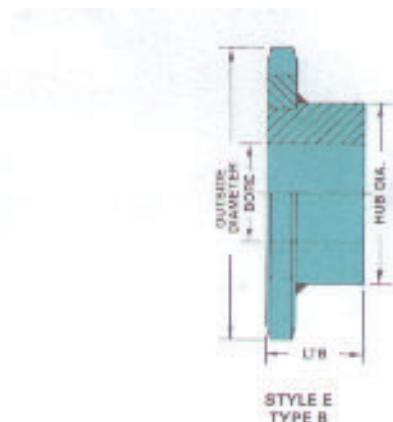
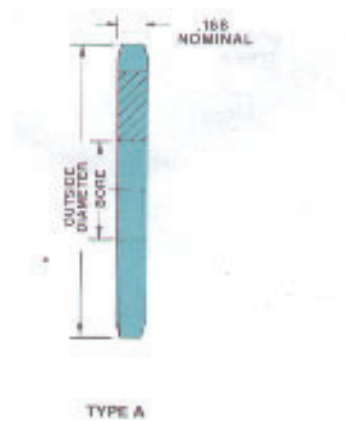
# NO. 35 SPROCKET — 3/8" PITCH



## NO. 35 STAINLESS STEEL SPROCKETS 3/8" PITCH

Single — Type A					Single — Type B						
No. Teeth	Outside Diameter	Catalog Number	Stock Bore	Approx. Weight (lbs)	Catalog Number	Stock Bore	Max. Bore	Hub Dia.	LTB	Sty	Approx. Weight (lbs)
9	1.260				<b>35B9SS</b>	3/8	3/8	27/32*	3/4	S	.10
10	1.380				<b>35B10SS</b>	3/8	9/16	31/32*	3/4	S	.15
11	1.500				<b>35B11SS</b>	3/8	9/16	1 1/18*	3/4	S	.20
12	1.630				<b>35B12SS</b>	1/2	5/8	1 7/32*	3/4	S	.22
13	1.750				<b>35B13SS</b>	1/2	3/4	1 1/4 *	3/4	S	.25
14	1.870				<b>35B14SS</b>	1/2	7/8	1 1/4	3/4	S	.26
15	1.990				<b>35B15SS</b>	1/2	7/8	1 11/32	3/4	S	.30
16	2.110				<b>35B16SS</b>	1/2	15/16	1 15/32	3/4	S	.40
17	2.230				<b>35B17SS</b>	1/2	1 1/16	1 19/32	3/4	S	.43
18	2.350				<b>35B18SS</b>	1/2	1 3/16	1 23/32	3/4	S	.50
19	2.470				<b>35B19SS</b>	1/2	1 1/4	1 27/32	3/4	S	.56
20	2.590				<b>35B20SS</b>	1/2	1 5/16	1 12/16	3/4	S	.68
21	2.710				<b>35B21SS</b>	1/2	1 3/8	2	7/8	S	.80
22	2.830				<b>35B22SS</b>	1/2	1 3/8	2	7/8	S	.82
23	2.950				<b>35B23SS</b>	1/2	1 3/8	2	7/8	S	.87
24	3.070				<b>35B24SS</b>	1/2	1 3/8	2	7/8	S	.89
25	3.190				<b>35B25SS</b>	1/2	1 3/8	2	7/8	S	.91
26	3.310				<b>35B26SS</b>	1/2	1 3/8	2	7/8	S	.93
28	3.550	<b>35A28SS</b>	15/32	.38	<b>35B28SS</b>	1/2	1 1/2	2 1/4	1	D	1.00
30	3.790	<b>35A30SS</b>	15/32	.44	<b>35B30SS</b>	1/2	1 1/2	2 1/4	1	D	1.06
32	4.032	<b>35A32SS</b>	15/32	.50	<b>35B32SS</b>	1/2	1 1/2	2 1/4	1	D	1.13
35	4.390	<b>35A35SS</b>	15/32	.61	<b>35B35SS</b>	1/2	1 1/2	2 1/4	1	D	1.56
40	4.990	<b>35A40SS</b>	15/32	1.0	<b>35B40SS</b>	1/2	1 1/2	2 1/4	1	D	1.70
45	5.590	<b>35A45SS</b>	15/32	1.2	<b>35B45SS</b>	1/2	1 1/2	2 1/4	1	D	2.18
60	7.380	<b>35A60SS</b>	15/32	2.1	<b>35B60SS</b>	1/2	1 1/2	2 1/4	1	D	3.00

\*Has recessed groove in hub for chain clearance.



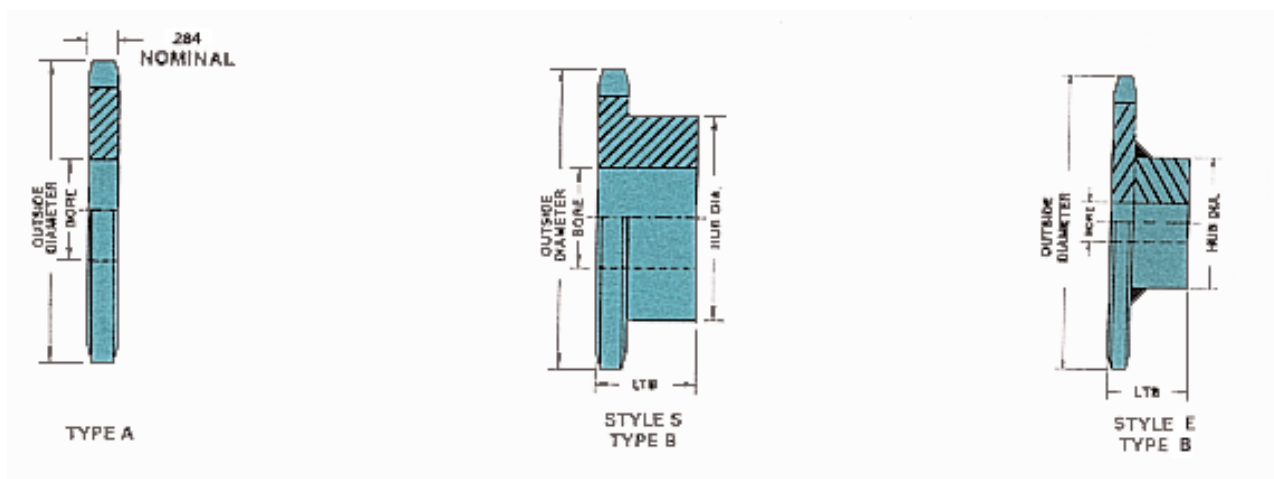
# NO. 40 SPROCKET — 1/2" PITCH



## NO. 40 STAINLESS STEEL SPROCKETS 1/2" PITCH

Single — Type A					Single — Type B						
No. Teeth	Outside Diameter	Catalog Number	Stock Bore	Approx. Weight (lbs)	Catalog Number	Stock Bore	Max. Bore	Hub Dia.	LTB	Sty	Approx. Weight (lbs)
10	1.840				40B10SS	1/2	3/4	1 1/4*	7/8	S	.28
11	2.000				40B11SS	1/2	13/16	1 3/8*	7/8	S	.36
12	2.170				40B12SS	1/2	15/16	1 9/16*	7/8	S	.44
13	2.330				40B13SS	1/2	1 1/16	1 9/16	7/8	S	.50
14	2.490				40B14SS	1/2	1 1/8	1 11/16	7/8	S	.60
15	2.650				40B15SS	1/2	1 1/4	1 13/16	7/8	S	.68
16	2.810				40B16SS	5/8	1 3/8	2	7/8	S	.82
17	2.980				40B17SS	5/8	1 7/16	2 1/8	1	S	1.20
18	3.140				40B18SS	5/8	1 1/2	2 5/16	1	S	1.24
19	3.300				40B19SS	5/8	1 3/4	2 1/2	1	S	1.42
20	3.460				40B20SS	5/8	1 7/8	2 5/8	1	S	1.60
21	3.620				40B21SS	5/8	1 7/8	2 3/4	1	S	1.68
22	3.780				40B22SS	5/8	1 7/8	2 7/8	1	S	1.81
23	3.940				40B23SS	5/8	2	3	1	S	2.18
24	4.100	40A24SS	19/32	.8	40B24SS	5/8	2	3	1	D	2.20
25	4.260	40A25SS	19/32	.9	40B25SS	5/8	2	3	1	D	2.39
26	4.420	40A26SS	19/32	1.3	40B26SS	5/8	2	3	1	D	2.40
28	4.740	40A28SS	19/32	1.3	40B28SS	5/8	2	3	1	D	2.75
30	5.060	40A30SS	19/32	1.3	40B30SS	5/8	2	3	1	D	2.88
35	5.860	40A35SS	19/32	1.9	40B35SS	5/8	2	3	1	D	3.32
40	6.650	40A40SS	19/32	2.3	40B40SS	5/8	2	3	1	D	4.28
45	7.450	40A45SS	19/32	3.1	40B45SS	5/8	2	3	1	D	4.68
60	9.840	40A60SS	19/32	5.5	40B60SS	5/8	2	3	1	D	7.00

\*Has recessed groove in hub for chain clearance.







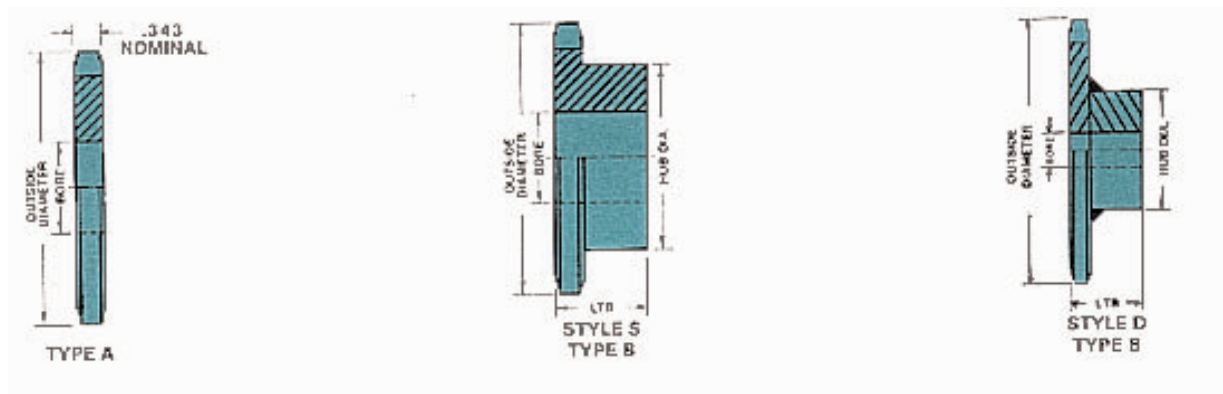
# NO. 50 STAINLESS STEEL SPROCKETS 5/8" PITCH

## Single — Type A

## Single — Type B

No. Teeth	Outside Diameter	Catalog Number	Stock Bore	Approx. Weight (lbs)	Catalog Number	Stock Bore	Max. Bore	Hub Dia.	LTB	Sty	Approx. Weight (lbs)
10	2.300				50B10SS	5/8	7/8	1 5/16*	1	S	.5
11	2.500				50B11SS	5/8	1	1 3/4 *	1	S	.6
12	2.710				50B12SS	5/8	1 1/4	1 63/64*	1	S	.7
13	2.910				50B13SS	5/8	1 5/16	1 7/8	1	S	.8
14	3.110				50B14SS	5/8	1 7/16	2 1/8	1	S	1.0
15	3.320				50B15SS	5/8	1 1/2	2 2/8	1	S	1.3
16	3.520				50B16SS	5/8	1 3/4	2 1/2	1	S	1.5
17	3.720				50B17SS	5/8	1 7/8	2 11/16	1	S	1.8
18	3.920				50B18SS	5/8	1 7/8	2 7/8	1	S	2.0
19	4.120				50B19SS	5/8	1 3/4	2 1/2	1	S	2.3
20	4.320				50B20SS	3/4	1 3/4	2 1/2	1	S	2.5
21	4.520	50A21SS	23/32	1.4	50B21SS	3/4	2	3	1	D	2.7
22	4.720	50A22SS	23/32	1.6	50B22SS	3/4	2	3	1	D	3.3
23	4.920	50A23SS	23/32	1.7	50B23SS	3/4	2	3	1	D	3.8
24	5.120	50A24SS	23/32	1.8	50B24SS	3/4	2	3	1 1/4	D	4.1
25	5.320	50A25SS	23/32	1.9	50B25SS	3/4	2	3	1 1/4	D	4.3
26	5.520	50A26SS	23/32	1.7	50B26SS	3/4	2	3	1 1/4	D	4.6
28	5.920	50A28SS	23/32	2.5	50B28SS	3/4	2	3	1 1/4	D	5.0
30	6.320	50A30SS	23/32	2.7	50B30SS	3/4	2	3	1 1/4	D	5.2
35	7.320	50A35SS	23/32	3.7	50B35SS	3/4	2	3	1 1/4	D	6.5
40	8.320	50A40SS	23/32	4.7	50B40SS	3/4	2	3	1 1/4	D	7.8
45	9.310	50A45SS	23/32	6.0	50B45SS	3/4	2	3	1 1/4	D	8.5
60	12.300	50A60SS	23/32	10.8	50B60SS	3/4	2	3	1 1/4	D	14.0

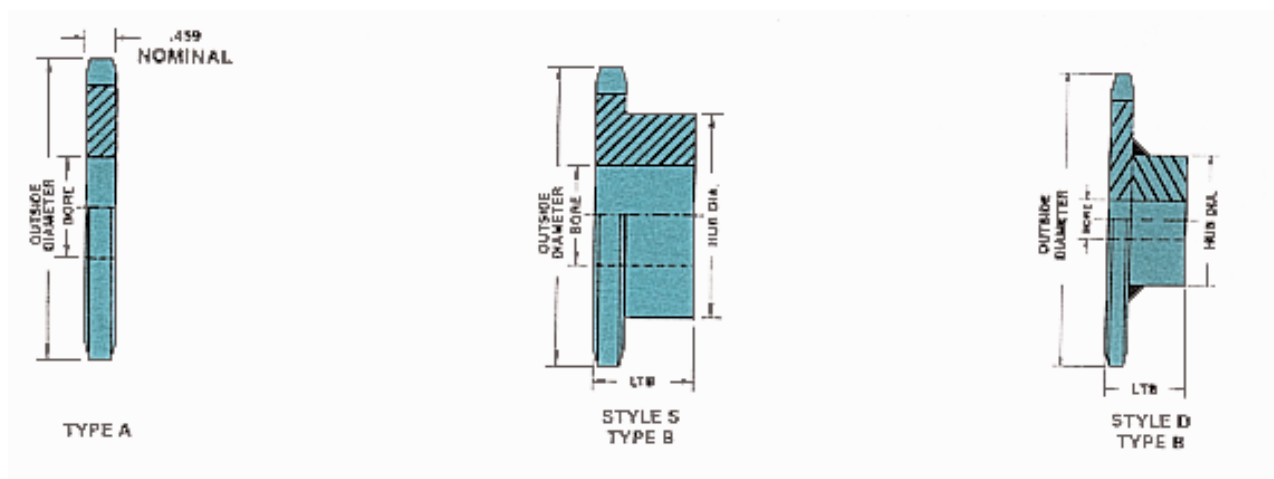
\*Has recessed groove in hub for chain clearance.



**NO. 60 STAINLESS STEEL SPROCKETS**  
**3/4" PITCH**

Single — Type A					Single — Type B						
No. Teeth	Outside Diameter	Catalog Number	Stock Bore	Approx. Weight (lbs)	Catalog Number	Stock Bore	Max. Bore	Hub Dia.	LTB	Sty	Approx. Weight (lbs)
12	3.250				<b>60B12SS</b>	3/4	1 3/8	2 3/8*	1 1/4	S	1.5
13	3.490				<b>60B13SS</b>	3/4	1 3/8	2 11/32	1 1/4	S	1.8
14	3.740				<b>60B14SS</b>	3/4	1 3/8	2 5/16	1 1/4	S	2.0
15	3.980				<b>60B15SS</b>	3/4	1 7/8	2 7/8	1 1/4	S	2.4
16	4.220				<b>60B16SS</b>	3/4	2	3 1/16	1 1/4	S	2.8
17	4.466				<b>60B17SS</b>	3/4	2 1/2	3 1/4	1 1/4	S	3.3
18	4.700	<b>60A18SS</b>	23/32	1.9	<b>60B18SS</b>	3/4	2	3	1 1/4	D	3.6
19	4.950	<b>60A19SS</b>	23/32	2.1	<b>60B19SS</b>	3/4	2	3	1 1/4	D	4.0
20	5.190	<b>60A20SS</b>	23/32	2.4	<b>60B20SS</b>	3/4	2	3	1 1/4	D	4.6
21	5.430	<b>60A21SS</b>	23/32	2.5	<b>60B21SS</b>	3/4	2	3	1 1/4	D	5.0
22	5.670	<b>60A22SS</b>	23/32	2.7	<b>60B22SS</b>	3/4	2	3	1 1/4	D	5.3
23	5.910	<b>60A23SS</b>	23/32	3.0	<b>60B23SS</b>	3/4	2	3	1 1/4	D	5.7
24	6.150	<b>60A24SS</b>	23/32	3.1	<b>60B24SS</b>	3/4	2	3	1 1/4	D	5.9
25	6.390	<b>60A25SS</b>	23/32	3.3	<b>60B25SS</b>	3/4	2	3	1 1/4	D	6.1
26	6.630	<b>60A26SS</b>	23/32	3.8	<b>60B26SS</b>	3/4	2	3	1 1/4	D	6.3
28	7.110	<b>60A28SS</b>	23/32	4.2	<b>60B28SS</b>	3/4	2 3/8	3 1/2	1 1/4	D	6.7
30	7.590	<b>60A30SS</b>	23/32	4.7	<b>60B30SS</b>	3/4	2 3/8	3 1/2	1 1/4	D	7.0
35	8.780	<b>60A35SS</b>	23/32	6.9	<b>60B35SS</b>	3/4	2 3/8	3 1/2	1 1/4	D	9.0
40	9.980	<b>60A40SS</b>	23/32	8.3	<b>60B40SS</b>	3/4	2 3/8	3 1/2	1 1/4	D	11.7
45	11.180	<b>60A45SS</b>	23/32	10.6	<b>60B45SS</b>	3/4	2 3/8	3 1/2	1 1/4	D	14.5
60	14.760	<b>60A60SS</b>	23/32	18.0	<b>60B60SS</b>	3/4	2 3/8	3 1/2	1 1/4	D	25.0

\*Has recessed groove in hub for chain clearance.



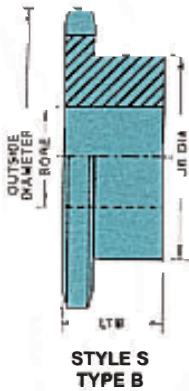


**NO. 80 STAINLESS STEEL SPROCKETS  
1" PITCH**

Single — Type B

No. Teeth	Outside Diameter	Catalog Number	Stock Bore	Approx. Max. Bore	Hub Dia.	LTB	Sty	Approx. Weight (lbs)
10	3.678	<b>80B10SS</b>	1	1 1/2	2 9/16*	1 9/16	S	2.40
11	4.006	<b>80B11SS</b>	1	1 5/8	2 13/16*	1 9/16	S	2.90
12	4.332	<b>80B12SS</b>	1	1 7/8	3 1/8*	1 9/16	S	3.60
13	4.657	<b>80B13SS</b>	1	1 31/32	3 1/32	1 9/16	S	3.80
14	4.981	<b>80B14SS</b>	1	2 1/4	3 1/4	1 9/16	S	4.40
15	5.305	<b>80B15SS</b>	1	2 1/4	3 13/16	1 9/16	S	5.60
16	5.627	<b>80B16SS</b>	1	2 7/16	3 3/4	1 5/8	S	6.10
18	6.271	<b>80B18SS</b>	1	2 7/16	3 3/4	1 5/8	S	6.90
19	6.593	<b>80B19SS</b>	1	2 7/16	3 3/4	1 5/8	S	7.40
20	6.914	<b>80B20SS</b>	1	2 15/16	4 1/2	1 7/8	S	10.40
22	7.555	<b>80B22SS</b>	1	2 15/16	4 1/2	1 7/8	E	11.40
23	7.876	<b>80B23SS</b>	1	2 15/16	4 1/2	1 7/8	E	12.00
24	8.196	<b>80B24SS</b>	1	2 15/16	4 1/2	1 7/8	E	12.50

\*Has recessed groove in hub for chain clearance.





## Enter the “Keyless” Society

Stainless steel POWER-LOCK solves your problems.

- Eliminate backlash damage to keyways from heavy loads. POWER-LOCK fits tightly without backlash around the shaft/hub and is not affected by load reversals.
- End your high machining expenses for long shaft keyways, splined shafts, threads, grooves, and steps. POWER-LOCK provides exact, slip-free location.
- Stop shrink and press fits. POWER-LOCK simplifies installation and removal.

Easy-to-install POWER-LOCK slides into position and offers a keyless, shaft-hub lock that will simultaneously handle both high torque and thrust while increasing shaft strength.

POWER-LOCK requires only one tool for easy assembly. It is ideal for locking in large or small sprockets, gears, pulleys, timing cams, and rollers. Best of all, POWER-LOCK is in stock for immediate shipment.

## Features and Applications

### • Resistance to Corrosion and Extreme Temperature

All component parts are made of high-quality stainless steel. The inner and outer ring are SUS304, all other parts are SUS630. You get outstanding resistance to corrosive chemicals, including acids and alkalis, as well as excellent performance in extreme temperatures.

### • High Durability Against Reversing or Impacting Loads

The POWER-LOCK connection is not affected by torsional load reversal or impact, which damages the key and keyway connection. The U.S. Tsubaki POWER-LOCK fits tightly around the shaft/hub and is free of backlash.

### • Easy and Precise Positioning

POWER-LOCK offers 360° angular adjustment and is excellent for indexing tables, cam mechanisms, gear drives, and double strand conveyor sprockets.

### • Easy Assembly and Disassembly

POWER-LOCK can be assembled and disassembled frequently, so maintenance or replacement of worn parts is simple and easy as compared to other methods (key and keyway, spline, shrink or press fits, and welding).

### • Increased Shaft Strength

By using the POWER-LOCK, no metal needs to be removed from the shaft (such as cutting of a keyway). The strength of the shaft can be kept at its original diameter. This saving is especially applicable on hollow-shaft applications.

### • Eliminates Costly Machining

There is no need for time-consuming machining of keyways. The POWER-LOCK offers substantial savings on long, heavy shafts.



## POWER-LOCK® SPECIFICATIONS

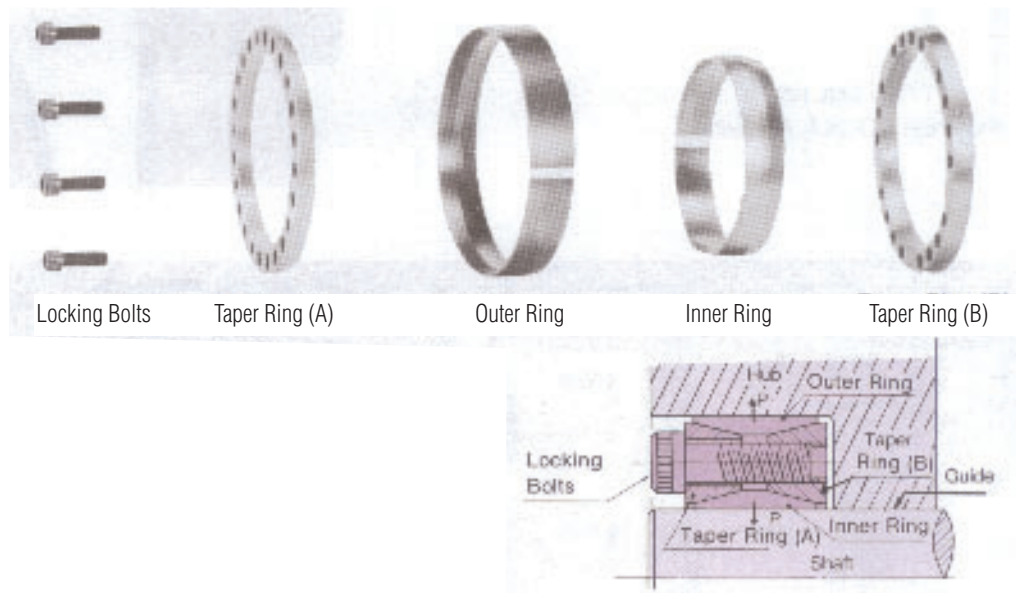
Model Number	Shaft O.D. d	Tolerance $t_1$	Hub Counter I.D. D	Tolerance $t_2$	Dimensions (inch)			Transmissible Torque Mt. (ft-lbs)	Transmissible Thrust Pax (lbs)	Contact Pressure (psi) Shaft P	Hub Bore P <sub>1</sub>	Locking Bolts			Approx. Weight (lbs)
					L	$\ell$	L <sub>1</sub>					Quantity	Size	Tightening Torque (ft-lbs)	
PL 3/4 SS	.7500		1.850		.787	.709	1.024	152	4,870	25,400	10,300	6	M 6 X 18	10.1	.462
PL 7/8 SS	.8750	-0.0013"	1.850	+0.0013"	.787	.709	1.024	178	4,870	21,770	10,300	6	M 6 X 18	10.1	.396
PL1 SS	1.0000	+0	1.969	-0	.787	.709	1.024	271	6,490	25,400	12,900	8	M 6 X 18	10.1	.484
PL1 1/8 SS	1.1250		2.165		.787	.709	1.024	305	6,490	22,580	11,730	8	M 6 X 18	10.1	.550
PL1 3/16 SS	1.1875		2.159		.819	.709	1.055	322	6,490	21,390	11,760	8	M 6 X 18	10.1	.528
PL1 1/4 SS	1.2500		2.362		.787	.709	1.024	423	8,120	25,400	13,440	10	M 6 X 18	10.1	.660
PL1 3/8 SS	1.3750		2.365		.773	.709	1.009	465	8,120	23,090	13,420	10	M 6 X 18	10.1	.594
PL1 7/16 SS	1.4375		2.559		.787	.709	1.024	535	8,930	24,300	13,650	11	M 6 X 18	10.1	.748
PL1 1/2 SS	1.5000	-0.0015"	2.559	+0.0015"	.787	.709	1.024	559	8,930	23,280	13,650	11	M 6 X 18	10.1	.704
PL1 5/8 SS	1.6250	+0	2.953	-0	.945	.827	1.260	901	13,300	27,440	15,100	9	M 8 X 22	24.6	1.232
PL1 3/4 SS	1.7500		2.953		.945	.827	1.260	970	13,300	25,480	15,100	9	M 8 X 22	24.6	1.227
PL1 7/8 SS	1.8750		3.150		.945	.827	1.260	1,040	13,300	23,780	14,150	9	M 8 X 22	24.6	1.298
PL1 15/16 SS	1.9375		3.150		.945	.827	1.260	1,074	13,300	23,010	14,150	9	M 8 X 22	24.6	1.232
PL2 SS	2.0000		3.346		.945	.827	1.260	1,355	16,260	27,250	16,290	11	M 8 X 22	24.6	1.474
PL2 1/8 SS	2.1250		3.346		.945	.827	1.260	1,440	16,260	25,650	16,290	11	M 8 X 22	24.6	1.364
PL2 3/16 SS	2.1875		3.543		.945	.827	1.260	1,482	16,260	24,910	15,380	11	M 8 X 22	24.6	1.584
PL2 1/4 SS	2.2500		3.543		.945	.827	1.260	1,525	16,260	24,200	15,380	11	M 8 X 22	24.6	1.496
PL2 3/8 SS	2.3750		3.531		1.008	.827	1.323	1,610	16,260	22,950	15,430	11	M 8 X 22	24.6	1.408
PL2 7/16 SS	2.4375	-0.0018"	3.740	+0.0018"	.945	.827	1.260	1,802	17,740	24,390	15,890	12	M 8 X 22	24.6	1.650
PL2 1/2 SS	2.5000	+0	3.740	-0	.945	.827	1.260	1,848	17,740	23,780	15,890	12	M 8 X 22	24.6	1.584
PL2 9/16 SS	2.5625		3.737		.962	.827	1.277	1,894	17,740	23,200	15,910	12	M 8 X 22	24.6	1.518
PL2 3/4 SS	2.7500		4.337		1.073	.984	1.467	3,011	26,270	26,910	17,060	11	M 10 X 25	50.0	2.662
PL2 7/8 SS	2.8750		4.528		1.102	.984	1.496	3,147	26,270	25,740	16,340	11	M 10 X 25	50.0	2.926
PL2 15/16 SS	2.9375		4.528		1.102	.984	1.496	3,216	26,270	25,190	16,340	11	M 10 X 25	50.0	2.816
PL3 SS	3.0000		4.724		1.102	.984	1.496	3,284	26,270	24,660	15,660	11	M 10 X 25	50.0	3.190
PL3 3/8 SS	3.3750		4.921		1.102	.984	1.496	4,031	28,660	23,920	16,400	12	M 10 X 25	50.0	3.058
PL3 7/16 SS	3.4375		5.118		1.102	.984	1.496	4,105	28,660	23,480	15,770	12	M 10 X 25	50.0	3.432
PL3 1/2 SS	3.5000	-0.0021"	5.118	+0.0021"	1.102	.984	1.496	4,180	28,660	23,060	15,770	12	M 10 X 25	50.0	3.322
PL3 3/4 SS	3.7500	+0	5.350	-0	1.151	.984	1.544	4,852	31,050	23,320	16,480	13	M 10 X 25	50.0	3.388
PL3 15/16 SS	3.9375		5.708		1.302	1.142	1.774	6,275	38,240	23,570	16,260	11	M 12 X 30	86.9	4.598
PL4 SS	4.0000		5.843		1.299	1.142	1.772	6,375	38,240	23,200	15,880	11	M 12 X 30	86.9	4.796

## CONSTRUCTION

The POWER-LOCK® is composed of five parts: taper ring (A), taper ring (B), outer ring, inner ring, and locking bolts. Locking is achieved by tightening the bolts.

## CONNECTING PRINCIPLE

Taper rings (A) and (B) fit perfectly with the tapered inner and outer rings. By tightening the locking bolts, taper rings (A) and (B) generate clamping pressures (P' and P) against the outer and inner rings to produce the frictional force to join the shaft and hub. A slit is provided on the circumference of the outer and inner rings to prevent reduction of the clamping force.





**1. HIGHLY CORROSION RESISTANT**  
**2. PARTIALLY CORROSION RESISTANT**  
**3. NOT CORROSION RESISTANT**

Substance	Concentration	Temperature °F	CS	AS	SS	NS	TI	PC	PC-SY
Acetic Acid	10%	68	1	1	1	1	1	1	1
Acetone		68	1	1	1	1	1	1	3
Alcohol			1	1	1	1	1	1	1
Aluminum Sulfate	Saturation	68	3	3	1	1	1	—	—
Ammonia Water		68	1	1	1	1	1	1	1
Ammonium Chloride	50%	Boiling	3	3	2	1	1	—	—
Ammonium Nitrate		Boiling	1	1	1	1	1	2	1
Ammonium Sulfate	Saturation	Boiling	2	2	1	1	1	—	—
Beer		68	1	1	1	1	1	1	1
Benzene		68	1	1	1	1	1	1	1
Boric Acid	50%	Boiling	1	1	1	1	1	—	—
Butyric Acid		68	1	1	1	1	1	1	—
Calcium Chloride	Saturation	68	3	3	2	1	1	2	1
Calcium Hydroxide	20%	Boiling	1	1	1	1	1	1	1
Calcium Hypochlorite	11-14%	68	3	3	1	1	1	3	1
Carbolic Acid			1	1	1	1	1	3	1
Carbon Tetrachloride (dry)		68	1	1	1	1	1	1	1
Chlorinated Water			3	3	3	1	1	3	—
Chlorine Gas (dry)		68	3	3	2	2	1	—	1
Chlorine Gas (moist)		68	3	3	3	2	1	—	1
Chromic Acid	5%	68	2	2	1	1	1	3	1
Citric Acid	50%	68	1	1	1	1	1	—	1
Coffee		Boiling	1	1	1	1	1	1	1
Creosote		68	1	1	1	1	1	—	—
Developing Solution		68	2	2	1	1	1	1	1
Ethyl Ether		68	1	1	1	1	1	1	1
Ferric Acid	50%	68	1	1	1	1	1	3	1
Ferric Chloride	5%	68	3	3	2	2	1	—	—
Formalin	40%	68	1	1	1	1	1	—	—
Formic Acid	50%	68	1	1	1	1	1	3	1
Fruit Juice		68	2	2	1	1	1	1	1
Gasoline		68	1	1	1	1	1	1	1
Glycerol		68	1	1	1	1	1	1	1
Honey			1	1	1	1	1	1	1
Hydrochloric Acid	2%	68	3	3	3	3	1	3	1
Hydrogen Peroxide	30%	68	2	2	1	1	1	3	1
Hydrogen Sulfide (dry)			1	1	1	1	1	1	1
Hydrogen Sulfide (wet)			3	3	3	3	1	3	—
Hydroxybenzene		68	1	1	1	1	1	3	—
Kerosene		68	1	1	1	1	1	—	—
Ketchup		68	1	1	1	1	1	1	1
Lactic Acid	10%	68	2	2	1	1	1	1	1
Lard			1	1	1	1	1	—	—
Linseed Oil	100%	68	2	2	1	1	1	1	—
Malic Acid	50%	Boiling	1	1	1	1	1	1	1
Mayonnaise		68	2	2	1	1	1	1	1
Milk		68	1	1	1	1	1	1	1
Nitric Acid	5%	68	2	2	1	1	1	3	1
Nitric Acid	65%	68	3	3	1	1	1	3	1
Nitric Acid	65%	Boiling	3	3	2	2	1	3	3
Oil (Plant, Mineral)		68	1	1	1	1	1	1	1



Substance	Concentration	Temperature °F	CS	AS	SS	NS	TI	PC	PC-SY
Oleic Acid		68	1	1	1	1	1	1	—
Oxalic Acid	10%	68	2	2	1	1	1	—	1
Paraffin		68	1	1	1	1	1	1	—
Petroleum		68	1	1	1	1	1	1	1
Phosphate			1	1	1	1	1	—	—
Phosphoric Acid	5%	68	2	2	1	1	1	3	1
Phosphoric Acid	10%	68	2	2	2	2	1	3	1
Picric Acid	Saturation	68	1	1	1	1	1	—	—
Potassium	Saturation	68	2	2	1	1	1	—	—
Potassium Bichromate	10%	68	1	1	1	1	1	1	—
Potassium Chloride	Saturation	68	2	2	1	1	1	—	—
Potassium Hydroxide	20%	68	1	1	1	1	1	1	1
Potassium Nitrate	25%	68	1	1	1	1	1	1	—
Potassium Nitrate	25%	Boiling	3	3	1	1	1	—	—
Potassium Permanganate	Saturation	68	1	1	1	1	1	—	1
Sal Ammoniac	50%	Boiling	3	3	2	1	1	—	—
Sea-Water		68	3	3	2	1	1	2	1
Soap-and-Water-Solution		68	1	1	1	1	1	1	—
Sodium Carbonate	Saturation	Boiling	1	1	1	1	1	—	—
Sodium Chloride	5%	68	2	2	1	1	1	1	1
Sodium Cyanide		68	—	—	1	1	1	—	—
Sodium Hydrocarbonate		68	1	1	1	1	1	1	1
Sodium Hydroxide	25%	68	1	1	1	1	1	1	—
Sodium Hypochlorite	10%	68	3	3	3	1	1	3	1
Sodium Perchlorate	10%	Boiling	3	3	1	1	1	—	—
Sodium Sulfate	Saturation	68	1	1	1	1	1	—	—
Sodium Thiosulfate	25%	Boiling	1	1	1	1	1	—	—
Soft Drink		68	1	1	1	1	1	1	1
Stearic Acid	100%	Boiling	3	3	3	1	1	3	—
Sugar Solution		68	1	1	1	1	1	1	1
Sulfuric Acid	5%	68	3	3	3	1	1	3	1
Sulfur Dioxide		68	3	3	1	1	1	—	—
Synthetic Detergent			1	1	1	1	1	1	1
Syrup			1	1	1	1	1	1	1
Tartaric Acid	10%	68	1	1	1	1	1	1	1
Turpentine		95	1	1	1	1	1	—	1
Varnish			1	1	1	1	1	—	1
Vegetable Juice		68	1	1	1	1	1	1	1
Vinegar		68	3	3	2	1	1	2	1
Water			1	1	1	1	1	1	1
Whiskey		68	1	1	1	1	1	1	1
Wine		68	1	1	1	1	1	1	1
Zinc Chloride	50%	68	3	3	2	2	1	2	1
Zinc Sulfate	25%	68	1	1	1	1	1	—	1

Key:

CS: 400 CS Series

SS: 304 SS Series

NS: 316 NS Series

AS: 600 AS Series





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