

METAL PRODUCTS

BRASS PRODUCTS

BRASS ROUND BAR (ทองเหลืองรีดเส้นกลม)



SIZE	3mm	5/32"	4mm	3/16"	5mm	7/32"	15/64"	6mm	1/4"	7mm
	9/32"	5/16"	8mm	11/32"	9mm	3/8"	10mm	13/32"	7/16"	15/32"
	12mm	1/2"	17/32"	14mm	9/16"	15mm	5/8"	17mm	11/16"	3/4"
	20mm	13/16"	7/8"	15/16"	1"	1 1/16"	1 1/8"	30mm	1 1/4"	1 3/8"
	1 1/2"	1 5/8"	1 3/4"	2"	2 1/4"	2 1/2"	2 3/4"	3"	3 1/4"	3 1/2"
	3 3/4"	4"	4 1/2"	5"	5 1/2"	6"	7"	8"		

BRASS HEXAGON BAR (ทองเหลืองรีดเส้นหกเหลี่ยม)



SIZE	3/16"	6mm	1/4"	7mm	9/32"	5/16"	8mm	9mm	3/8"	10mm
	7/16"	15/32"	12mm	1/2"	9/16"	19/32"	5/8"	17mm	11/16"	3/4"
	13/16"	7/8"	15/16"	1"	1 1/16"	1 1/8"	1 1/4"	1 3/8"	1 1/2"	1 3/4"
	2"	2 1/4"	2 1/2"	2 3/4"	3"	3 1/2"				

BRASS SQUARE BAR (ทองเหลืองรีดเส้นสี่เหลี่ยม)



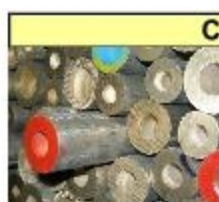
SIZE	3/16", 1/4", 7mm., 9/32", 5/16", 9mm., 3/8", 10mm., 1/2"									
	5/8", 3/4", 7/8", 1", 1 1/4", 1 1/2", 2", 3 1/2", 4"									

BRASS FLAT BAR (ทองเหลืองรีดเส้นแบน)



SIZE	Width Range	3/8" - 6"
	Thickness Range	1/8" - 2"

CAST BRONZE BUSHING (ทองเหลืองบุขลุ่ยลายเสือ)



SOILD	1/2" - 8"	
	HOLLOW	OD. From 7/8" - 10" ID. From 1/2" - 8"

BRASS SHEET (ทองเหลืองแผ่น)



SIZE	กว้าง x ยาว	14" x 48", 16" x 48"
	หนา	0.1 mm - 3 mm

COPPER SHEET (ทองแดงแผ่น)



SIZE	กว้าง x ยาว	14" x 48", 16" x 48"
	หนา	0.1 mm - 3 mm

STAINLESS STEEL 304 PRODUCTS

STAINLESS STEEL ROUND BAR (สแตนเลสรีดเส้นกลม)




SIZE	1/8"	4mm	3/16"	5mm	6mm	1/4"	7mm	5/16"	8mm	3/8"
	10mm	7/16"	12mm	1/2"	15mm	5/8"	3/4"	20mm	7/8"	25mm
	1"	1 1/8"	30mm	1 1/4"	1 3/8"	35mm	1 1/2"	40mm	1 5/8"	1 3/4"
	45mm	2"	2 1/4"	2 1/2"	2 3/4"	3"	3 1/4"	3 1/2"	4"	4 1/2"
	4 3/4"	5"	5 1/2"	6"	6 1/2"	7"	8"			

STAINLESS STEEL FLAT BAR (สแตนเลสรีดเส้นแบน)



SIZE	Width Range	1/2" - 4"
	Thickness Range	1/8" - 1/2"
SIZE	Width Range	40mm., 50mm., 75mm., 100mm.
	Thickness Range	9mm., 12mm., 15mm., 20mm.

STAINLESS STEEL SQUARE BAR (สแตนเลสรีดเส้นสี่เหลี่ยม)



SIZE	1/4", 5/16", 3/8", 1/2", 5/8", 3/4"									
	7/8", 1", 1 1/4", 1 1/2", 2"									

STAINLESS STEEL HEXAGON BAR (สแตนเลสรีดเส้นหกเหลี่ยม)



SIZE	3/8", 1/2", 5/8", 3/4", 7/8", 1"									
	1 1/8", 1 1/4", 1 1/2", 1 3/4", 2"									

COPPER PRODUCTS

COPPER ROUND BAR (ทองแดงรีดเส้นกลม)



SIZE	3/16", 1/4", 5/16", 3/8", 1/2", 5/8", 3/4", 7/8", 1"									
	1 1/8", 30mm., 1 1/4", 1 1/2", 1 5/8", 42mm.,									
	1 3/4", 2", 2 1/4", 2 1/2", 2 3/4", 3", 3 1/2", 4"									

COPPER SQUARE BAR (ทองแดงรีดเส้นสี่เหลี่ยม)



SIZE	1/2", 5/8", 3/4", 7/8", 1"									
	1 1/4", 1 1/2", 2", 2 1/2", 3"									

COPPER FLAT BAR (ทองแดงรีดเส้นแบน)



SIZE	Width Range	1/2" - 8"
	Thickness Range	1/8" - 2"

ALUMINIUM PRODUCTS

ALUMINIUM ROUND BAR (อลูมิเนียมรีดเส้นกลม)



SIZE	3/16", 1/4", 5/16", 3/8", 1/2", 5/8", 3/4", 7/8", 1"									
	1 1/8", 1 1/4", 1 3/8", 1 1/2", 1 5/8", 1 3/4", 2"									
	2 1/4", 2 1/2", 2 3/4", 3", 3 1/4", 3 1/2", 3 3/4"									
	4", 4 1/2", 5", 6", 7", 8", 10"									

ALUMINIUM SQUARE BAR (อลูมิเนียมรีดเส้นสี่เหลี่ยม)




SIZE	1/2", 5/8", 3/4", 1", 1 1/4", 1 1/2"									
	1 3/4", 2", 2 1/2", 3", 4"									

ALUMINIUM FLAT BAR (อลูมิเนียมรีดเส้นแบน)




SIZE	Width Range	3/8" - 8"
	Thickness Range	1/8" - 2"

ALUMINIUM HEXAGON BAR (อลูมิเนียมรีดเส้นหกเหลี่ยม)




SIZE	3/8", 1/2", 5/8", 3/4", 1"									
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ALUMINIUM ROUND PIPE (แป๊ปอลูมิเนียมกลม)



	3/8"	1/2"	5/8"	3/4"	7/8"	1"	1 1/8"	1 1/4"	1 1/2"	1 3/4"	2"
#18	O	O	O	O	O	O	O				O
#16								O	O	O	
	1"	1 1/4"	1 1/2"	1 3/4"	2"	2 1/4"	2 1/2"	2 3/4"	3"	3 1/2"	4"
3.0	O	O	O	O	O	O	O	O	O	O	O
6.0			O		O		O		O	O	O

COPPER ARC EK3 (ทองแดงอาร์ค)



SIZE	1/2", 5/8", 3/4", 7/8", 1"									
	1 1/4", 1 1/2", 2"									

CAST PRODUCTS

BRONZE CAST

Grade JIS	ASTM	DIN	Standard (JIS)											Tensile Strength	Elongation %	Hardness Brinell
			Chemical composition (%)													
			Cu	Sn	Zn	Pb	Fe	Ni	Al	P	Si	Mn	Sb			
BC 2	C90300	CAC402	86.0 - 90.0	7.0 - 9.0	3.0 - 5.0	1.0 (Max)	0.2 (Max)	1.0 (Max)	0.01 (Max)	0.2 (Max)	0.01 (Max)		0.2 (Max)	245 min	20 min	70 min
BC 3	C90500	CAC403	86.5 - 89.5	9.0 - 11.0	1.0 - 3.0	1.0 (Max)	0.2 (Max)	1.0 (Max)	0.01 (Max)	0.2 (Max)	0.01 (Max)		0.2 (Max)	245 min	15 min	70 min
BC 6	C90600	CAC406	83.0 - 87.0	4.0 - 6.0	4.0 - 6.0	4.0 - 6.0	0.3 (Max)	1.0 (Max)	0.01 (Max)	0.2 (Max)	0.01 (Max)		0.2 (Max)	196 min	15 min	60 min
PBC 2	C90700	CuSn12	87.0 - 91.0	9.0 - 12.0	0.3 (Max)	0.3 (Max)	0.2 (Max)	1.0 (Max)	0.01 (Max)	0.05 - 0.2	0.01 (Max)		0.05 (Max)	196 min	5 min	70 min
PBC 3			84.0 - 88.0	12.0 - 15.0	0.3 (Max)	0.3 (Max)	0.2 (Max)	1.0 (Max)	0.01 (Max)	0.15 - 0.5	0.01 (Max)		0.05 (Max)	265 min	5 min	90 min
LBC 2	C93700	CuPb10Sn	82.0 - 86.0	9.0 - 11.0	1.0 (Max)	4.0 - 6.0	0.3 (Max)	1.0 (Max)	0.01 (Max)	0.1 (Max)	0.01 (Max)		0.3 (Max)	196 min	10 min	65 min
LBC 3			77.0 - 81.0	9.0 - 11.0	1.0 (Max)	9.0 - 11.0	0.3 (Max)	1.0 (Max)	0.01 (Max)	0.5 (Max)	0.01 (Max)		0.5 (Max)	177 min	7 min	60 min
LBC 4			74.0 - 78.0	7.0 - 9.0	1.0 (Max)	14.0 - 16.0	0.3 (Max)	1.0 (Max)	0.01 (Max)	0.5 (Max)	0.01 (Max)		0.5 (Max)	167 min	5 min	55 min
LBC 5			70.0 - 76.0	6.0 - 8.0	1.0 (Max)	16.0 - 22.0	0.3 (Max)	1.0 (Max)	0.01 (Max)	0.5 (Max)	0.01 (Max)		0.5 (Max)	147 min	5 min	45 min
ALBC 2	C95400	CuAl9Ni	80.0 - 88.0	0.1 (Max)	0.5 (Max)	0.1 (Max)	2.5 - 5.0	1.0 - 3.0	8.5 - 10.5			0.1 - 1.5		490 min	20 min	120 min
ALBC 3	C95800	CuAl10Ni	78.0 - 85.0	0.1 (Max)	0.5 (Max)	0.1 (Max)	3.0 - 6.0	3.0 - 6.0	8.5 - 10.5			0.1 - 1.5		588 min	15 min	160 min
HBsC 2			55.0 - 60.0	1.0 (Max)	30.0 - 42.0	0.4 (Max)	0.5 - 2.0	1.0 (Max)	0.5 - 2.0		0.1 (Max)	0.1 - 3.5		490 min	18 min	100 min
HBsC 3			60.0 - 65.0	0.5 (Max)	22.0 - 28.0	0.2 (Max)	2.0 - 4.0	0.5 (Max)	3.0 - 5.0		0.1 (Max)	2.5 - 5.0		637 min	15 min	165 min
HBsC 4			60.0 - 65.0	0.2 (Max)	22.0 - 28.0	0.2 (Max)	2.0 - 4.0	0.5 (Max)	5.0 - 7.5		0.1 (Max)	2.5 - 5.0		755 min	12 min	170 min



IRON CAST

Standard JIS	Standard		Chemical composition (%)								Tensile N/mm2	Yield	Elongation %	Hardness HB	
	USA	Germany	C%	Si%	Mn%	P%	S%	Cr%	Cu%	Mg%					
FC200	No30	GG20	3.30-3.60	2.10-2.50	0.30-0.60	0.15 (Max)	0.10 (Max)					170 min			223 max.
FC250	No35	GG25	3.20-3.50	1.80-2.20	0.60-0.80	0.15 (Max)	0.10 (Max)					210 min			240 max.
FCD450	60-42-10		3.40-3.90	2.50-3.00	0.50Max	0.07 (Max)	0.03 (Max)	0.15 (Max)		0.038-0.057		450 min	280 min	10 min.	140 - 210
FCD500	70-50-05	GGG50	3.40-3.90	2.50-3.00	0.50Max	0.07 (Max)	0.03 (Max)	0.15 (Max)	0.31-0.39	0.038-0.057		500 min	320 min	7 min	150 - 230
SC45			0.35 (Max)	-	-	0.04 (Max)	0.04 (Max)	-				450 min		19 min	
SCCrM3			0.3-0.4	0.3-0.6	0.5-0.8	0.04 (Max)	0.04 (Max)	-				690 min		9 min	201 min



STAINLESS CAST

Standard JIS	Chemical composition (%)					
	C %	Si %	Mn %	Ni %	Cr %	Mo %
SUS 304	0.08	1.0	2.0	8.0-10.0	18.0-20.0	-
SUS 316	0.08	1.0	2.0	10.0-14.0	16.0-18.0	2.0-3.0
SUS 316L	0.03	1.0	2.0	10.0-14.0	16.0-18.0	2.0-3.0
SUS 410	0.15	1.0	1.0	-	11.5-13.5	-
SUS 420	0.15 min	1.0	1.0	-	12.0-14.0	-
SUS 431	0.2	1.0	1.0	1.25-2.50	15.0-17.0	-



ALUMINIUM CAST



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