



OVERVIEW OF COMPANY'S SERVICES

**Products: Pipes (Seamless / ERW), Plates, Sheets, Coils & Rods**

Sr No.	Fiping Components	Type	Material	Grade	Size Range (Inches) Nominal Bore (ID)	End Connecn	Sch No/ Rating / Wt	Dimension Standard
1	Pipes	Seamless and ERW (Welded)	A 106 A 312 A 335 A 333 A 31 15 SAW	GR. A/B/C 304/304L, 316/ 316L 321, 347, 410 P1, P5, P9, P11, P12, P22, P91 GR. 3. 6 5A, 5AX 5L 5LX X46, X51, X60 1239, 3589 672	1/2" - 24" 1/2" - 48 (ERW)	BW & Plain	All Schedules	B 36.10 B 36.19
2	Plates / Coils / Sheets / Rods	Out To Size / Coils	A 285 A 515 / 516 A 203 A 204 A 240 A 387 IS 2062	C 60 / 70 D A. B 304/304L, 316/ 316L 321, 347, 410 1, 5, 9, 11, 22, 91 CL1 & CL2 A, B, C	Various Sizes	-	Various Thickness	-



Product : Steel & Alloy Steel "SEAMLESS BUTTWELDED" Pipe Fittings (Present Capacity p.a. 7525 MT)  
(End Connections: BW as per ANSI B 16.9, MSS SP-43 & 75 case to case)

Sr No	Piping Component Items	Type	Material (ASTM)	Grade (ASTM)	Size, Range and Process		Sch. / Rating
					Hot Forming Sizes	Cold Forming Sizes	
1	Elbows (45° & 90°)	SR (R=1D) or LR (R=1.5D)	CS / A234	WPB, WPC	1/2" NB - 24" NB	—	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	1/2" NB - 24" NB	—	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	8" NB - 24" NB	1/2" NB - 6" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	1/2" NB - 24" NB	---	All Schedules
2	Return Bend (180°)	LR (R=1.5D)	CS / A234	WPB, WPC	1/2" NB - 12" NB	—	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	1/2" NB - 12" NB	—	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	8" NB - 12" NB	1/2" NB - 6" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	1/2" NB - 12" NB	---	All Schedules
3	Special High Radius Bends  R=3D and above	LR (R=3D & above)	CS / A234	WPB, WPC	—	1/2" NB - 16" NB	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	—	1/2" NB - 16" NB	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	—	1/2" NB - 12" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	1/2" NB - 24" NB	---	All Schedules
4	Tee	Equal & Unequal	CS / A234	WPB, WPC	12" NB - 24" NB	2" NB - 10" NB	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	12" NB - 24" NB	2" NB - 10" NB	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	12" NB - 24" NB	2" NB - 10" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	12" NB - 24" NB	2" NB - 10" NB	All Schedules
5	Cross	Equal	CS / A234	WPB, WPC	—	2" NB - 16" NB	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	—	2" NB - 16" NB	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	—	2" NB - 16" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	---	2" NB - 16" NB	All Schedules
6	Reducer	Eccentric & Concentric	CS / A234	WPB, WPC	20" NB - 24" NB	2" NB - 18" NB	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	20" NB - 24" NB	2" NB - 18" NB	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	20" NB - 24" NB	2" NB - 18" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	20" NB - 24" NB	2" NB - 18" NB	All Schedules
7	Caps		CS / A234	WPB, WPC	—	2" NB - 24" NB	All Schedules
			AS / A234	WP1, WP5, WP7, WP9, WP11, WP22, WP91	—	2" NB - 24" NB	All Schedules
			SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327 / 347 / 410	—	2" NB - 24" NB	All Schedules
			LTCS / A420	WPL6 & WPL3	---	2" NB - 24" NB	All Schedules
8	Stub Ends	Long & Short pattern Necks	SS / A403	WP 304 / 304L, 316 / 316L, 321 / 327, 410	—	2" NB - 24" NB	All Schedules

- Notes: (a). Materials & Grade are ASTM std. equivalent to DIN, BS, JIS, UNI & AFNOR to respective produce can be supplied.  
 (b). End connection to suit respective dimension standards product wise ANSI B 16.5, 16.9, 16.11, 16.28, 36.10, 36.19, MSS SP-43 & 75 with equivalent to API, DIN, BS JIS, UNI & AFNOR can be supplied.  
 (c). Technical requirement including mandatory shall be as per respective applicable stds. & codes supplementary requirement can also be supplied as per client's needs.  
 (d). Chemical cum Physical test: As per requirement of applicable codes & standards.  
 (e). Heat treatment / Stress relieving: As per requirement of applicable codes & standards.  
 (f). IGC test on SS & Impact test on LTCS: As per client's requirement.  
 (g). Certain times, due to quantities limitations (piece mill qty) cold forming process are adopted considering optimising of cost benefits plus product quality.
- Legend: CS: Carbon Steel SS: Stainless Steel AS: Alloy Steel LTCS: Low Temperature Carbon Steel

# Tube Products Incorporate



Product : Steel & Alloy Steel "WELDED TWO HALVES BUTTWELDED" Pipe Fittings (Present Capacity p.a. 5425 MT)  
(End Connections: BW as per ANSI B 16.9, MSS SP-43 case to case)

Sr No	Piping Component Items	Type	Material	Grade	Process		Sch. / Rating
					Hot Forming Sizes	Cold Forming Sizes	
1	Elbows (45° & 90°)	SR (R=1D) or LR (R=1.5D)	CS / A234	WPBW, WPCW	—	2" NB - 72" NB	All Schedules
			AS / A234	WP1W, WP5W, WP7W, SP9W, WP11W, WP22W, WP91W	—	2" NB - 72" NB	All Schedules
			SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W / 347W / 410W	—	2" NB - 72" NB	All Schedules
			LTCS / A420	WPL6W & WPL3W	---	2" NB - 72" NB	All Schedules
2	Return Bend (180°)	LR (R=1.5D)	CS / A234	WPBW, WPCW	—	2" NB - 32" NB	All Schedules
			AS / A234	WP1W, WP5W, WP7W, SP9W, WP11W, WP22W, WP91W	—	2" NB - 32" NB	All Schedules
			SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W / 347W / 410W	—	2" NB - 32" NB	All Schedules
			LTCS / A420	WPL6W & WPL3W	---	2" NB - 32" NB	All Schedules
3	Special High Radius Bends R=3D and above	LR (R=3D & above)	CS / A234	WPBW, WPCW	—	1/2" NB - 30" NB	All Schedules
			AS / A234	WP1W, WP5W, WP7W, SP9W, WP11W, WP22W, WP91W	—	1/2" NB - 30" NB	All Schedules
			SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W / 347W / 410W	—	1/2" NB - 30" NB	All Schedules
			LTCS / A420	WPL6W & WPL3W	1/2" NB - 24" NB	1/2" NB - 30" NB	All Schedules
4	Tee	Equal & Unequal	CS / A234	WPBW, WPCW	—	2" NB - 48" NB	All Schedules
			AS / A234	WP1W, WP5W, WP7W, SP9W, WP11W, WP22W, WP91W	—	2" NB - 48" NB	All Schedules
			SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W / 347W / 410W	—	2" NB - 48" NB	All Schedules
			LTCS / A420	WPL6W & WPL3W	---	2" NB - 48" NB	All Schedules
5	Cross	Equal	CS / A234	WPBW, WPCW	—	8" NB - 30" NB	All Schedules
			AS / A234	WP1W, WP5W, WP7W, SP9W, WP11W, WP22W, WP91W	—	8" NB - 30" NB	All Schedules
			SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W / 347W / 410W	—	8" NB - 30" NB	All Schedules
			LTCS / A420	WPL6W & WPL3W	---	8" NB - 30" NB	All Schedules
6	Reducer	Eccentric & Concentric	CS / A234	WPBW, WPCW	—	8" NB - 72" NB	All Schedules
			AS / A234	WP1W, WP5W, WP7W, SP9W, WP11W, WP22W, WP91W	—	8" NB - 72" NB	All Schedules
			SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W / 347W / 410W	—	8" NB - 72" NB	All Schedules
			LTCS / A420	WPL6W & WPL3W	---	8" NB - 72" NB	All Schedules
8	Stub Ends	Long & Short pattern Necks	SS / A403	WP 304W / 304LW, 316W / 316LW, 321W / 327W, 410W	—	4" NB - 24" NB	All Schedules

- Notes: (a). Materials & Grade are ASTM std. equivalent to DIN, BS, JIS, UNI & AFNOR to respective produce can be supplied.  
 (b). End connection to suit respective dimension standards product wise ANSI B 16.5, 16.9, 16.11, 16.28, 36.10, 36.19, MSS SP-43 & 75 with equivalent to API, DIN, BS, JIS, UNI & AFNOR can be supplied.  
 (c). Technical requirement including mandatory shall be as per respective applicable stds. & codes supplementary requirement can also be supplied as per client's needs.  
 (d). Chemical cum Physical test: As per requirement of applicable codes & standards.  
 (e). Heat treatment / Stress relieving: As per requirement of applicable codes & standards.  
 (f). IGC test on SS & Impact test on LTCS: As per client's requirement.  
 (g). All longitudinal welds joints shall be 100% X-rayed. The construction of fittings shall be two halves for all piping components except special high long radius bends i.e. R=3D and above reducers & stubends.  
 (h). Welding Process: CS/AS/LTCS - SMAW, SS - GTAW  
 (i). Certain times, due to quantities limitations (piece mill qty) cold forming process are adopted considering optimising of cost benefits plus product quality.

Legend: CS: Carbon Steel SS: Stainless Steel AS: Alloy Steel LTCS: Low Temperature Carbon Steel



**Product : Steel & Alloy Steel "FORGED" Pipe Fittings & Nipples (Present Capacity p.a. 900 MT)**  
(End Connections: Socket Weld, Screwed as per ANSI B 16.11)

Sr No	Piping	Type	Material	Grade	Sizes Range	Schedule / Raing	Process
1	Elbow		CS A105	F304, F304L, F316, F316L, F321 F 1, F 5, F 9, F 11, F 22, F91 LF 1, LF 2, LF 3	1/2" NB - 4" NB	3000 lbs, 6000 lbs, 9000 lbs	Forge (Hot)
			SS A182		1/2" NB - 4" NB		Forge (Hot)
			AS A182		1/2" NB - 4" NB		Forge (Hot)
			LTCS A350		1/2" NB - 4" NB		Forge (Hot)
2	Tee	Equal / Unequal	Do	Do	Do	Do	Do
3	Cross	Equal	Do	Do	Do	Do	Do
4	Reducer	Concentric / Eccentric	Do	Do	Do	Do	Do
5	Cap		Do	Do	Do	Do	Do
6	O'let	Elbolet, Thredolet, Socolet, Weldolet, Nippolet	Do	Do	Do	Do	Do
7	Nipples		CS A105	Gr. B TP304, TP304L, TP316, TP316L, TP321 P 1, P 5, P 9, P 11, P 22, P 91 Gr. 6, Gr. 3	1/2" NB - 4" NB	All Schedules	Cold
			SS A182				
			AS A182				
			LTCS A333				
8	Swage Nipples		Do	Do	Do	Do	Do
9	Stub Ends		SS A182	WP 304 / 304L, 316 / 316L, 321	1/2" NB - 2" NB	3000 lbs, 6000 lbs, 9000 lbs	Forge (Hot)

- Notes: (a). Materials & Grade are ASTM std. equivalent to DIN, BS, JIS, UNI & AFNOR to respective produce can be supplied.  
 (b). End connection to suit respective dimension standards product wise ANSI B 16.5, 16.9, 16.11, 16.28, 36.10, 36.19, MSS SP-43 & 75 with equivalent to API, DIN, BS JIS, UNI & AFNOR can be supplied.  
 (c). Technical requirement including mandatory shall be as per respective applicable stds. & codes supplementary requirement can also be supplied as per client's needs.  
 (d). Chemical cum Physical test: As per requirement of applicable codes & standards.  
 (e). Heat treatment / Stress relieving: As per requirement of applicable codes & standards.  
 (f). IGC test on SS & Impact test on LTCS: As per client's requirement.  
 (g). Certain times, due to quantities limitations (piece mill qty) cold forming process are adopted considering optimising of cost benefits plus product quality.

Legend: CS: Carbon Steel SS: Stainless Steel AS: Alloy Steel LTCS: Low Temperature Carbon Steel

**Product : Steel & Alloy Steel FLANGES (Forged & Plate - Present Capacity p.a. 1800 MT)**  
(End Connections: Socket Weld, Screwed as per ANSI B 16.11)

Type of Flanges Construction of Flanges Size of Flanges Rating	Slip on, Weldneck, Blind, Lap joing, Ring threaded joint, Spectacle, Orfic, Socket Weld	
	FORGE (F)	PLATE (P)
	1/2" NB to 48" NB Note: Socket Weld Flanges shall be of 1/2" NB to 4" NB	1/2" NB to 64" NB
	150 lbs to 2500 lbs	150 lbs to 2500 lbs
Material of Construction (ASTM)	CS (F): A105 AS (F): A182, Gr. F 1, F 5, F 9, F 11, F 12, F 22 SS (F): A182, Gr. F 304, F 304L, F 316, F 316L, F 321, F 347 LTCS (F): A350 Gr. LF 1, LF 2, LF 3	CS (P): A516, Gr. 60 / 70 AS (P): A387 Gr. P 1, P 5, P 9, P 11, P 22 SS (P): A240, TP 304 / 304L, 316 / 316L, 321 LTCS (P): A203-D & A516 Gr. 60
Facing / Finishing	Raised face / Flat face	
End Connections / Dimensions	ANSI B 16.5, BS 1560, BS 10, IS 6392, B-2.1, NPT, API, DIN, MSS SP-44, UNI, AFNOR	
Additional requirements / Options	IBR, NACE, IGC, CE, BEND test etc.	

- Notes: (a). Chemical cum Physical Test: AS per requirement of applicable codes & standards.  
 (b). Heat treatment / Stress relieving: As per requirement of applicable codes & standards.  
 (c). IGC test on SS & Impact test on LTCS: As per client's requirement.  
 (d). Plate flanges shall be profile cut on CNC Plasma Profile Cuttings Machine whose profile cutting capacity is 100mm thick CS / AS / LTCS & 75mm thick SS.  
 (e). Manufacturing Process: Hot

Legend: CS: Carbon Steel SS: Stainless Steel AS: Alloy Steel LTCS: Low Temperature Carbon Steel