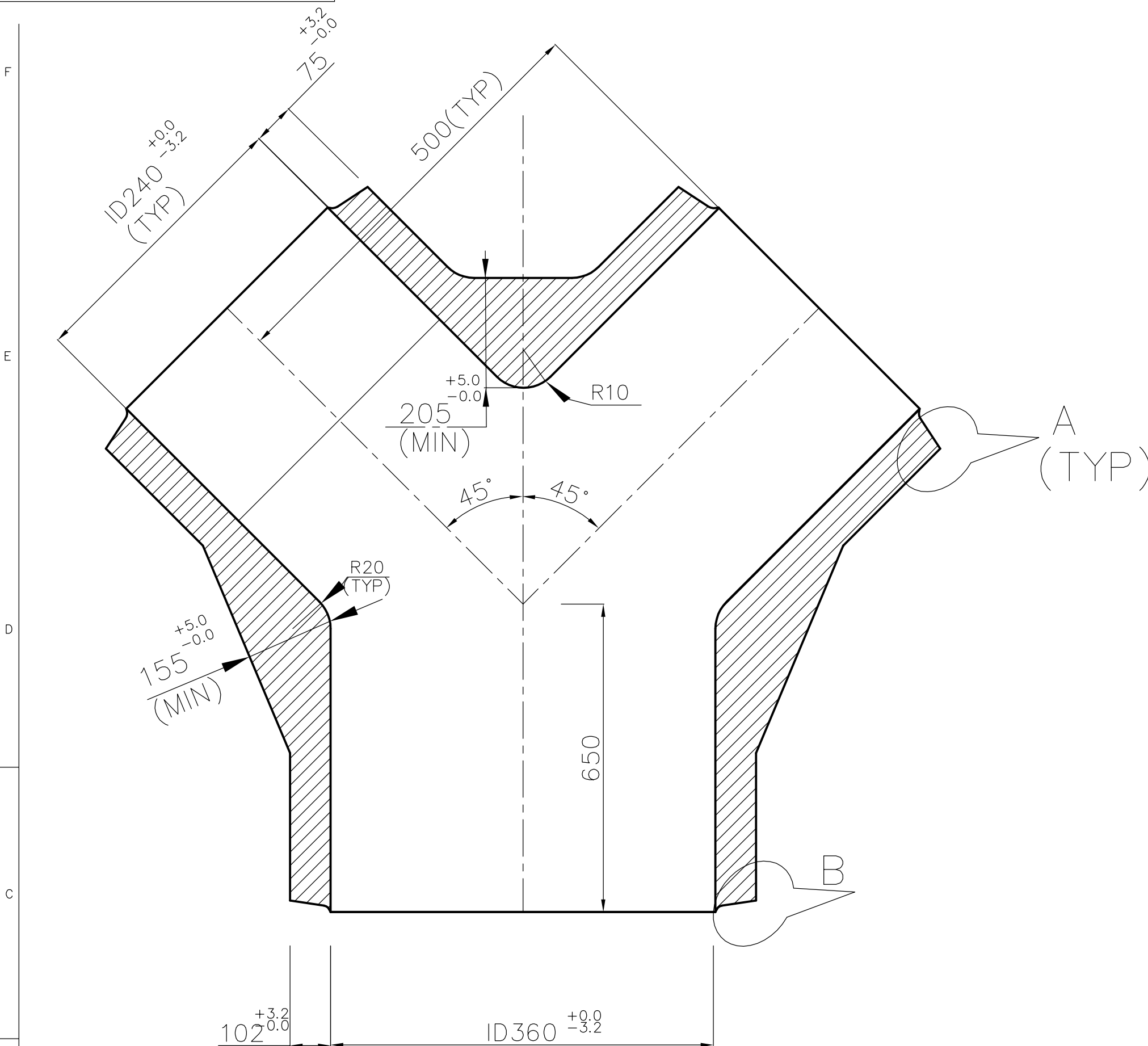


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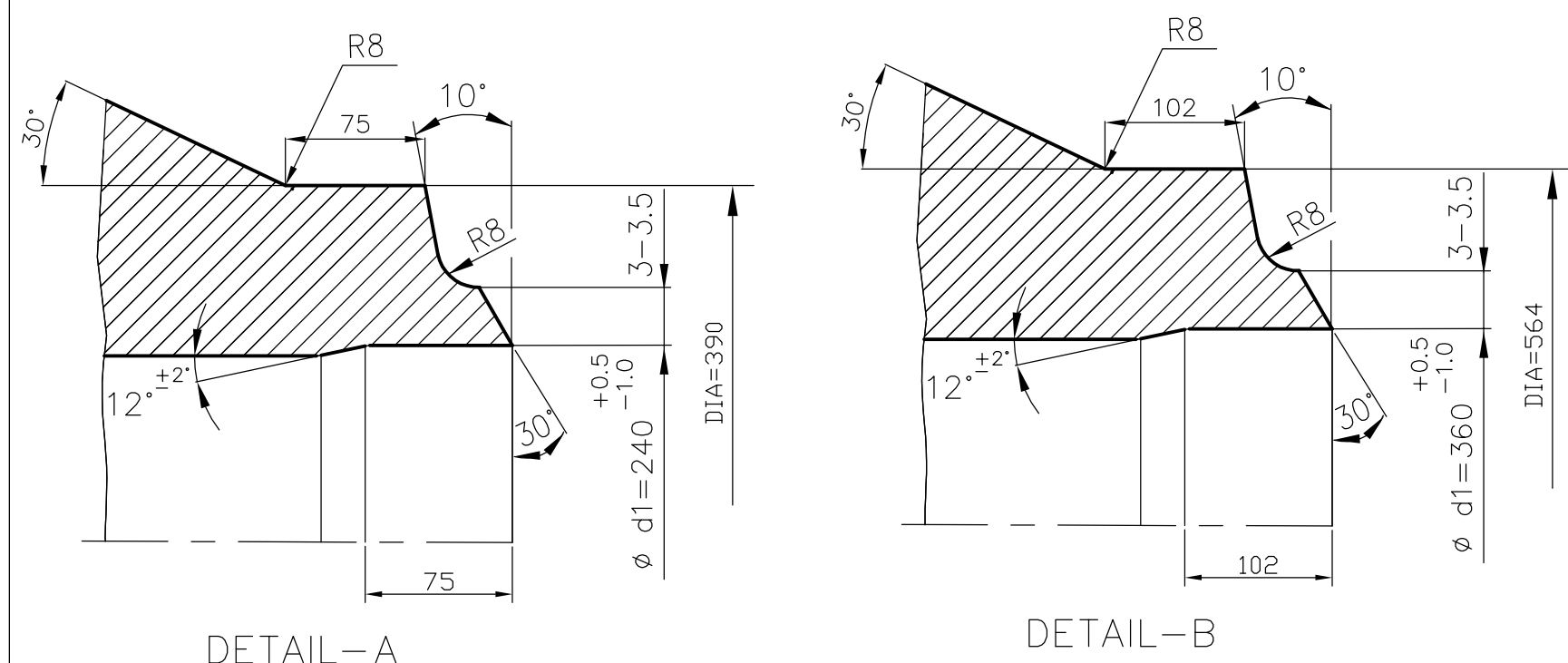
FIRST ANGLE PROJECTION (ALL DIMENSIONS IN MILLIMETRES)

2-80-300-14565
DRAWING No.



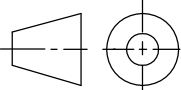
NOTES

1. DESIGN PRESSURE: 297 Kg/cm (g)
2. DESIGN TEMPERATURE : 608 °C
3. FOLLOW TDC: AS APPLICABLE
4. MANUFACTURING, INSPECTION, AND TESTING SHALL BE AS PER IBR & EN-13480-3
5. CONSTRUCTION SHALL BE SEAMLESS / FORGED
6. MATERIAL SPECIFICATION SHALL BE SA182F92
7. CONNECTING PIPE SIZES ID360X102/ID240X75
8. VENDOR DRAWINGS WITH DIMENSIONS AND ACTUAL WEIGHT SHALL BE SUBMITTED FOR APPROVAL BEFORE MANUFACTURING.
9. WEIGHT MENTIONED IN THE BOM IS INDICATIVE ONLY



REV	DATE	ALTERED	ARUNSHARMA
01	05.07.17	APPROVED	KONDAPA NAIDU
NOTE NO:04,08 REVISED			

ALL REVISIONS ARE INDICATED AS

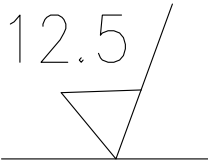
01.	Y-PIECE ID360X102/ID240X75	2-80-300-14565		92 505 163 0000 SA 182 F92	A	2000.000	
ITEM NO.	DESCRIPTION	DRAWING NO.	ITEM NO.	MATERIAL CODE	A	UNIT WT.	
			VAR NO.	MATERIAL SPEC.	C	QTY.	
TYPE OF PRODUCT OR NAME OF CUSTOMER/PROJECT							
BHARAT HEAVY ELECTRICALS LTD., PIPING CENTRE, CHENNAI 600 017							
			DRN	NAME ARUN SHARMA	SIGN	DATE 15.05.17	NO OF ITEMS
			CHD	KONDAPA NAIDU		15.05.17	
			APPD	R SESHAGIRI		15.05.17	
DEPT.	GRADE OF UN TOL. DIM		SCALE	WEIGHT (Kg).	BHEL PO REF. NO.		ITEM No.
CODE	C/M/F		N.T.S.				
TITLE Y-PIECE (ID360X102/ID240X75)				CARD CODE U 01	MSE DRAWING NO. 2-80-300-14565		REV 01

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3-80-300-33476

DRAWING No

12.5



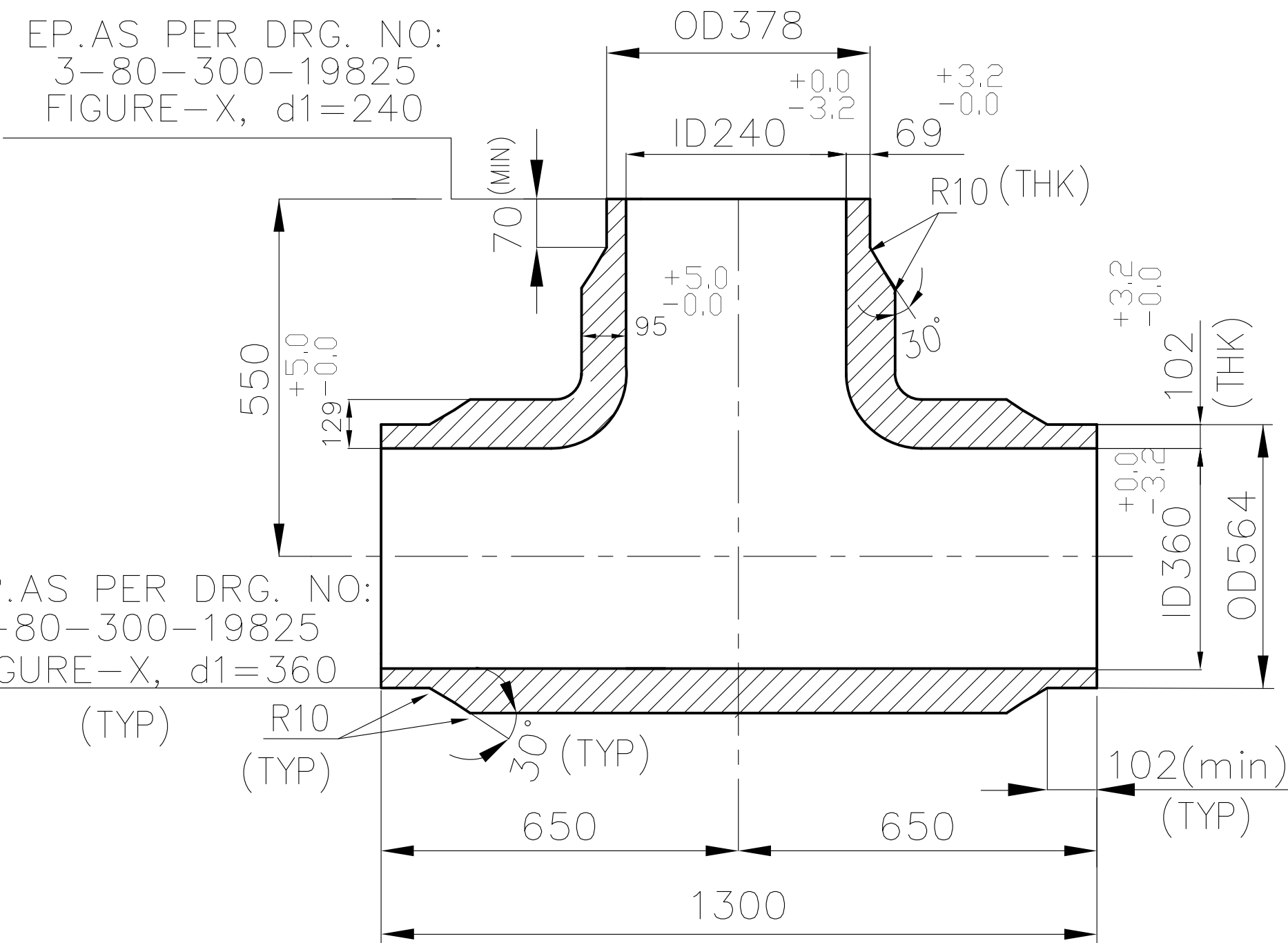
EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=240

EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=360

(TYP)

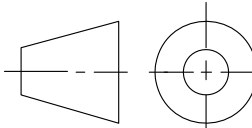
R10
(TYP)

30° (TYP)



NOTES :-

01. DESIGN PRESSURE : 297 kg/sq.cm.(g)
02. DESIGN TEMPERATURE : 608° C
03. ALL DIMENSIONS ARE FINISHED DIMENSIONS.
04. DESIGN,MANUFACTURING, INSPECTION AND TESTING SHALL BE AS PER IBR, ASME B16.9 AND SA182
05. FITTING TO COMPLY WITH ASME B16.9 AND DIMENSIONS ARE AS PER THIS DRAWING.
06. FOLLOW TDG:104 (LATEST VERSION)
07. WEIGHT GIVEN IN TITLE BLOCK IS INDICATIVE ONLY. VENDOR SHALL SUBMIT FINAL DRAWING WITH DIMENSIONS AND ACTUAL WEIGHT FOR APPROVAL BEFORE MANUFACTURING.
08. CONSTRUCTION SHALL BE SEAMLESS

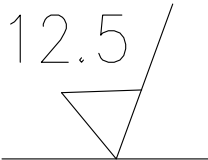
01	BW UNEQUAL TEE ID360X102/ID240X69	3-80-300-33476		92 505 148 0000 SA 182 F92	A	1400,000 1
ITEM NO.	DESCRIPTION	DRAWING NO.	ITEM NO.	MATERIAL CODE	A	UNIT WT.
			VAR NO.	MATERIAL SPEC.	C	QTY.
TYPE OF PRODUCT OR NAME OF CUSTOMER/PROJECT						
 BHARAT HEAVY ELECTRICALS LTD., PIPING CENTRE, CHENNAI 600 017			DRN	NAME ARUN SHARMA	SIGN	DATE 14.03.17
			CHD	KONDAPA NAIDU		14.03.17
			APPD	R.SESHAGIRI		14.03.17
DEPT.	GRADE OF UN TOL. DIM		SCALE	WEIGHT (Kg).	BHEL PO REF.NO:	
CODE	C/M/F		N.T.S.	~1400		
TITLE BW UNEQUAL TEE (ID360X102/ID240X69-SA182F92)				CARD CODE	DRAWING No.	REV
				U 01	3-80-300-33476	00

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3-80-301-33477

DRAWING No

12.5



EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=127.3

EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=360

(TYP)

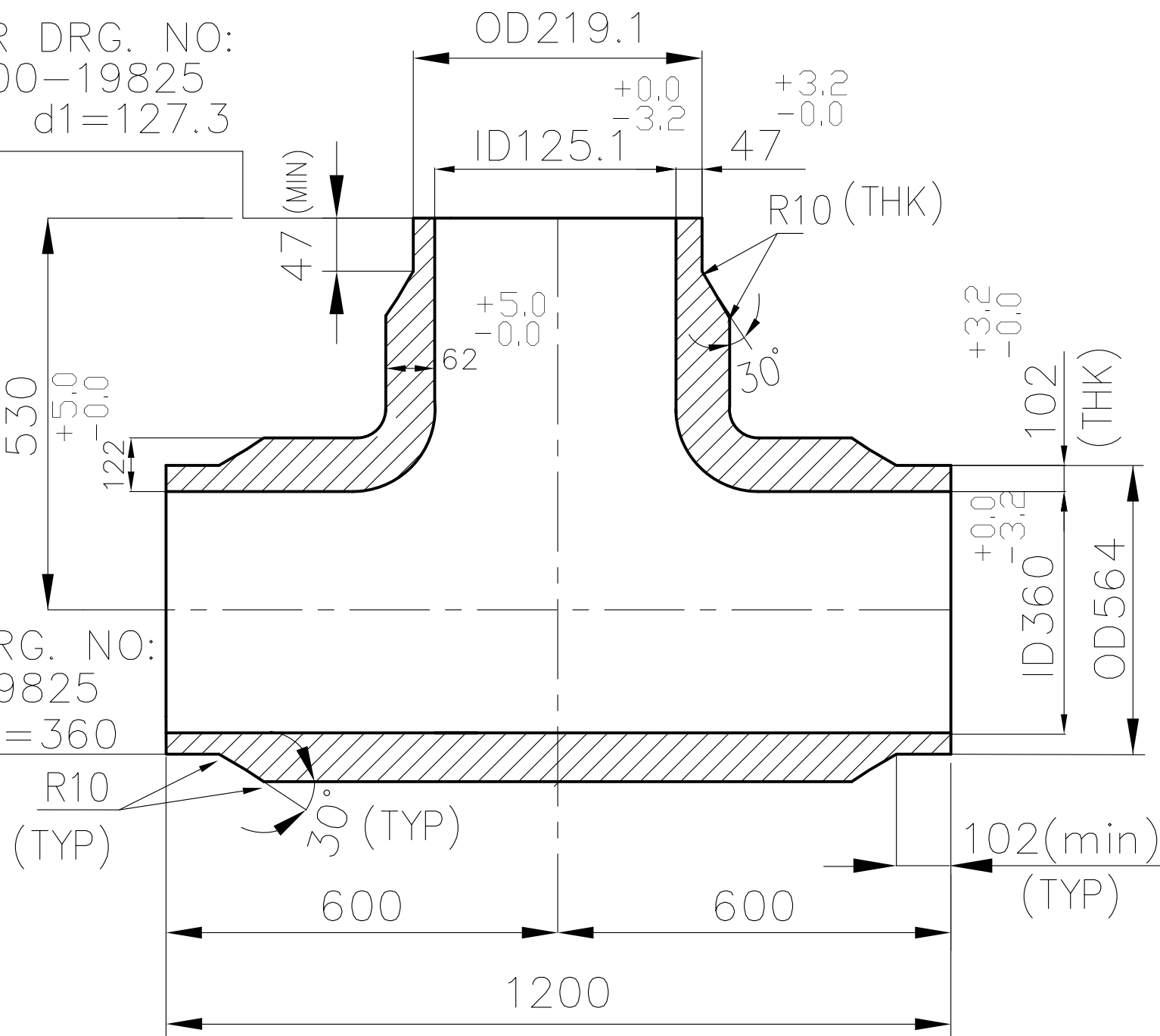
R10
(TYP)

30° (TYP)

600

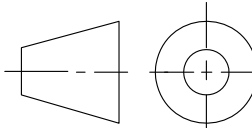
600

1200



NOTES :-

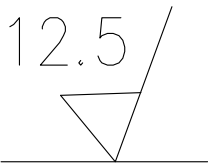
01. DESIGN PRESSURE : 297 kg/sq.cm.(g)
02. DESIGN TEMPERATURE : 608° C
03. ALL DIMENSIONS ARE FINISHED DIMENSIONS.
04. DESIGN,MANUFACTURING, INSPECTION AND TESTING SHALL BE AS PER IBR, ASME B16.9 AND SA182
05. FITTING TO COMPLY WITH ASME B16.9 AND DIMENSIONS ARE AS PER THIS DRAWING.
06. FOLLOW TDG:104 (LATEST VERSION)
07. WEIGHT GIVEN IN TITLE BLOCK IS INDICATIVE ONLY. VENDOR SHALL SUBMIT FINAL DRAWING WITH DIMENSIONS AND ACTUAL WEIGHT FOR APPROVAL BEFORE MANUFACTURING.
08. CONSTRUCTION SHALL BE SEAMLESS

01	BW UNEQUAL TEE ID360X102/OD219.1X47	3-80-301-33477		92 505 151 0000 SA 182 F92	A	1200,000 1	
ITEM NO.	DESCRIPTION	DRAWING NO.	ITEM NO.	MATERIAL CODE	A	UNIT WT.	
			VAR NO.	MATERIAL SPEC.	C	QTY.	
TYPE OF PRODUCT OR NAME OF CUSTOMER/PROJECT							
 BHARAT HEAVY ELECTRICALS LTD., PIPING CENTRE, CHENNAI 600 017			DRN	NAME ARUN SHARMA	SIGN	DATE 14.03.17	NO OF ITEMS
			CHD	KONDAPA NAIDU		14.03.17	
			APPD	R.SESHAGIRI		14.03.17	
DEPT.	GRADE OF UN TOL. DIM		SCALE N.T.S.	WEIGHT (Kg). ~1200	BHEL PO REF.NO:		ITEM No.
CODE	C/M/F						
TITLE BW UNEQUAL TEE (ID360X102/OD219.1X47-SA182F92)				CARD CODE U 01	DRAWING No. 3-80-301-33477		REV 00

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3-80-303-33484

DRAWING No



EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=127.3

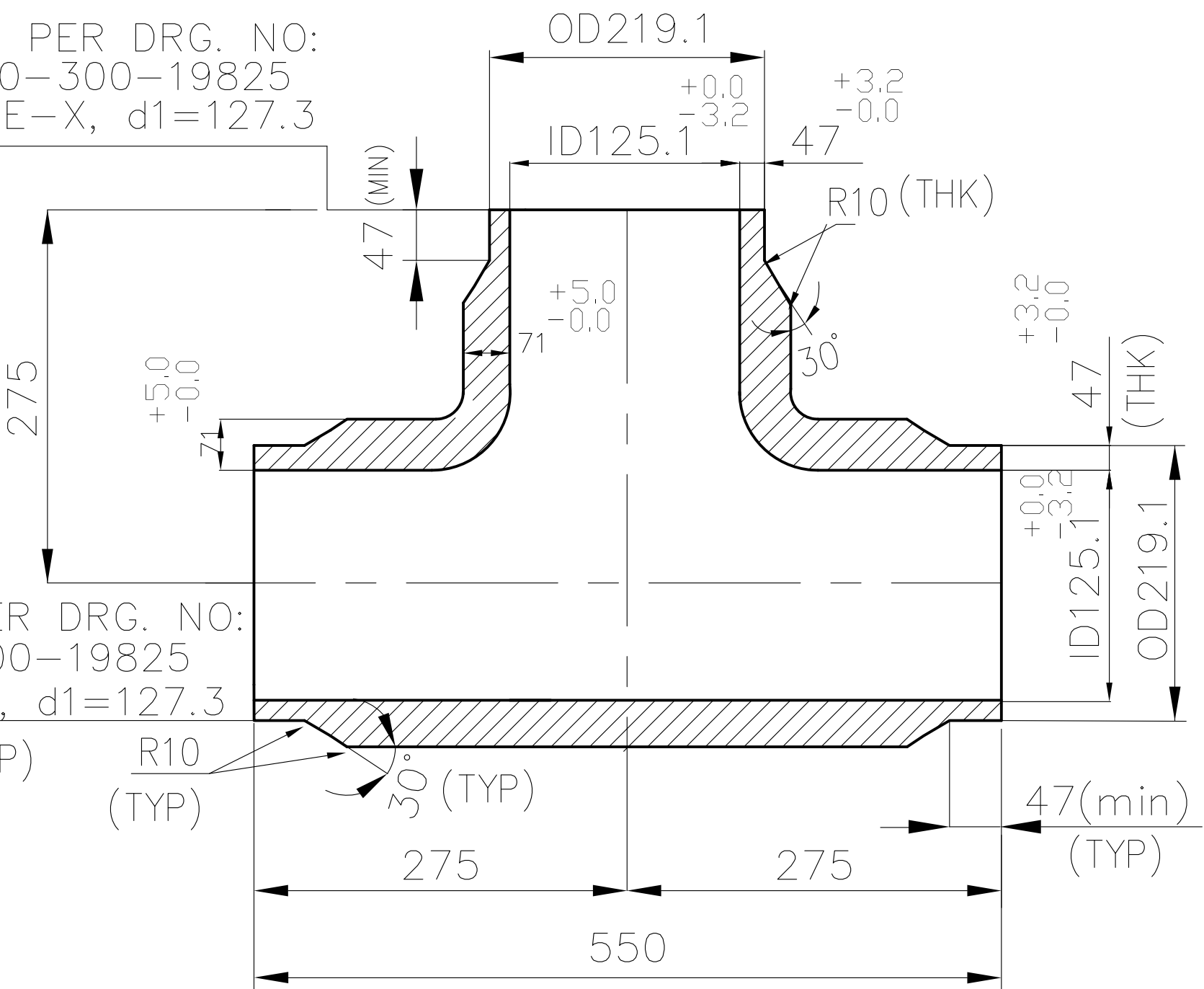
EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=127.3

(TYP)

R10
(TYP)

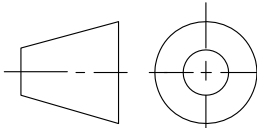
30°
(TYP)

47(min)
(TYP)



NOTES :-

01. DESIGN PRESSURE : 297 kg/sq.cm.(g)
02. DESIGN TEMPERATURE : 608° C
03. ALL DIMENSIONS ARE FINISHED DIMENSIONS.
04. DESIGN,MANUFACTURING, INSPECTION AND TESTING SHALL BE AS PER IBR, ASME B16.9 AND SA182
05. FITTING TO COMPLY WITH ASME B16.9 AND DIMENSIONS ARE AS PER THIS DRAWING.
06. FOLLOW TDG:104 (LATEST VERSION)
07. WEIGHT GIVEN IN TITLE BLOCK IS INDICATIVE ONLY. VENDOR SHALL SUBMIT FINAL DRAWING WITH DIMENSIONS AND ACTUAL WEIGHT FOR APPROVAL BEFORE MANUFACTURING.
08. CONSTRUCTION SHALL BE SEAMLESS

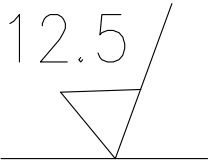
01	BW EQUAL TEE OD219.1X47	3-80-303-33484		92 505 150 0000 SA 182 F92	A	350,000 1
ITEM NO.	DESCRIPTION	DRAWING NO.	ITEM NO.	MATERIAL CODE	A	UNIT WT.
			VAR NO.	MATERIAL SPEC.	C	QTY.
TYPE OF PRODUCT OR NAME OF CUSTOMER/PROJECT						
 BHARAT HEAVY ELECTRICALS LTD., PIPING CENTRE, CHENNAI 600 017			DRN	NAME ARUN SHARMA	SIGN	DATE 14.03.17
			CHD	KONDAPA NAIDU		14.03.17
			APPD	R.SESHAGIRI		14.03.17
DEPT.	GRADE OF UN TOL. DIM		SCALE	WEIGHT (Kg).	BHEL PO REF.NO:	
CODE	C/M/F		N.T.S.	~350		
TITLE				CARD CODE	DRAWING No.	REV
BW EQUAL TEE (OD219.1X47-SA182F92)				U 01	3-80-303-33484	00

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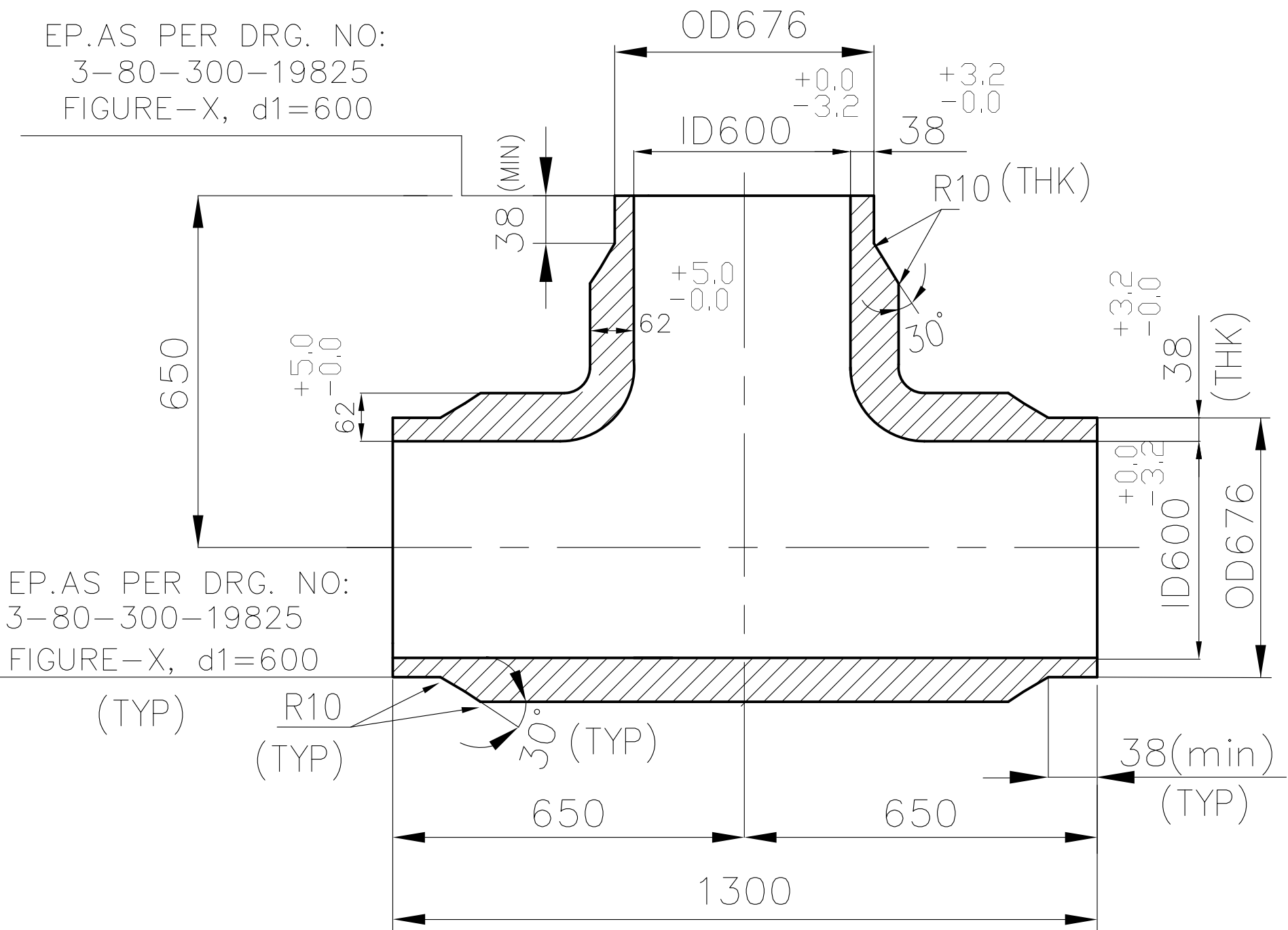
3-80-310-33485

DRAWING No

12.5



EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=600



EP.AS PER DRG. NO:
3-80-300-19825
FIGURE-X, d1=600

(TYP)

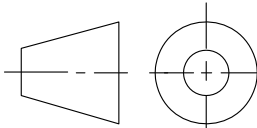
R10
(TYP)

30°
(TYP)

38(min)
(TYP)

NOTES :-

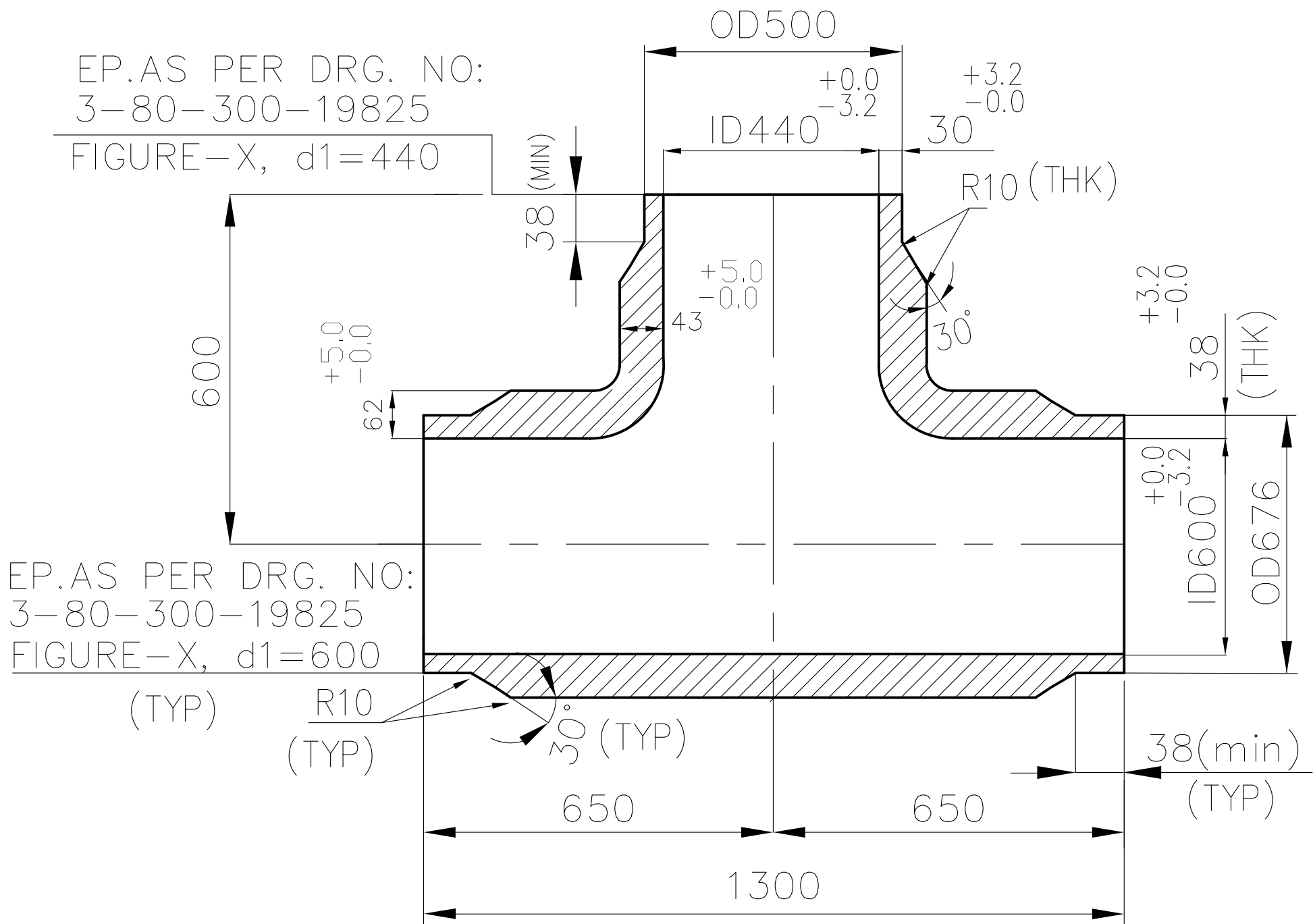
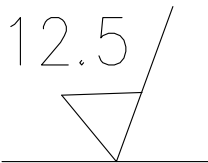
01. DESIGN PRESSURE : 71.2 kg/sq.cm.(g)
02. DESIGN TEMPERATURE : 608° C
03. ALL DIMENSIONS ARE FINISHED DIMENSIONS.
04. DESIGN,MANUFACTURING, INSPECTION AND TESTING SHALL BE AS PER IBR, ASME B16.9 AND SA182
05. FITTING TO COMPLY WITH ASME B16.9 AND DIMENSIONS ARE AS PER THIS DRAWING.
06. FOLLOW TDG:104 (LATEST VERSION)
07. WEIGHT GIVEN IN TITLE BLOCK IS INDICATIVE ONLY. VENDOR SHALL SUBMIT FINAL DRAWING WITH DIMENSIONS AND ACTUAL WEIGHT FOR APPROVAL BEFORE MANUFACTURING.
08. CONSTRUCTION SHALL BE SEAMLESS

01	BW EQUAL TEE ID600X38	3-80-310-33485		92 505 147 0000 SA 182 F92	A	1000,000 1
ITEM NO.	DESCRIPTION	DRAWING NO.	ITEM NO. VAR NO.	MATERIAL CODE MATERIAL SPEC.	A C	UNIT WT. QTY.
TYPE OF PRODUCT OR NAME OF CUSTOMER/PROJECT						
 BHARAT HEAVY ELECTRICALS LTD., PIPING CENTRE, CHENNAI 600 017			DRN CHD APPD	NAME ARUN SHARMA KONDAPA NAIDU R.SESHAGIRI	SIGN	DATE 14.03.17 14.03.17 14.03.17
DEPT.	GRADE OF UN TOL. DIM		SCALE N.T.S.	WEIGHT (Kg). ~1000	BHEL PO REF.NO:	ITEM No.
CODE	C/M/F					
TITLE BW EQUAL TEE (ID600X38-SA182F92)				CARD CODE U 01	DRAWING No. 3-80-310-33485	REV 00

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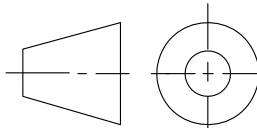
3-80-310-33486

DRAWING No

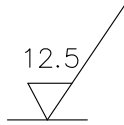


NOTES :-

01. DESIGN PRESSURE : 71.2 kg/sq.cm.(g)
02. DESIGN TEMPERATURE : 608° C
03. ALL DIMENSIONS ARE FINISHED DIMENSIONS.
04. DESIGN,MANUFACTURING, INSPECTION AND TESTING SHALL BE AS PER IBR, ASME B16.9 AND SA182
05. FITTING TO COMPLY WITH ASME B16.9 AND DIMENSIONS ARE AS PER THIS DRAWING.
06. FOLLOW TDG:104 (LATEST VERSION)
07. WEIGHT GIVEN IN TITLE BLOCK IS INDICATIVE ONLY. VENDOR SHALL SUBMIT FINAL DRAWING WITH DIMENSIONS AND ACTUAL WEIGHT FOR APPROVAL BEFORE MANUFACTURING.
08. CONSTRUCTION SHALL BE SEAMLESS

01	BW UNEQUAL TEE ID600X38/ID440X30	3-80-310-33486		92 505 149 0000 SA 182 F92	A	900,000 1
ITEM NO.	DESCRIPTION	DRAWING NO.	ITEM NO.	MATERIAL CODE	A	UNIT WT.
			VAR NO.	MATERIAL SPEC.	C	QTY.
TYPE OF PRODUCT OR NAME OF CUSTOMER/PROJECT						
 BHARAT HEAVY ELECTRICALS LTD., PIPING CENTRE, CHENNAI 600 017			DRN	NAME ARUN SHARMA	SIGN	DATE 14.03.17
			CHD	KONDAPA NAIDU		14.03.17
			APPD	R.SESHAGIRI		14.03.17
DEPT.	GRADE OF UN TOL. DIM		SCALE N.T.S.	WEIGHT (Kg). ~900	BHEL PO REF.NO:	
CODE	C/M/F				ITEM No.	
TITLE BW EQUAL TEE (ID600X38/ID440X30-SA182F92)				CARD CODE U 01	DRAWING No. 3-80-310-33486 00	

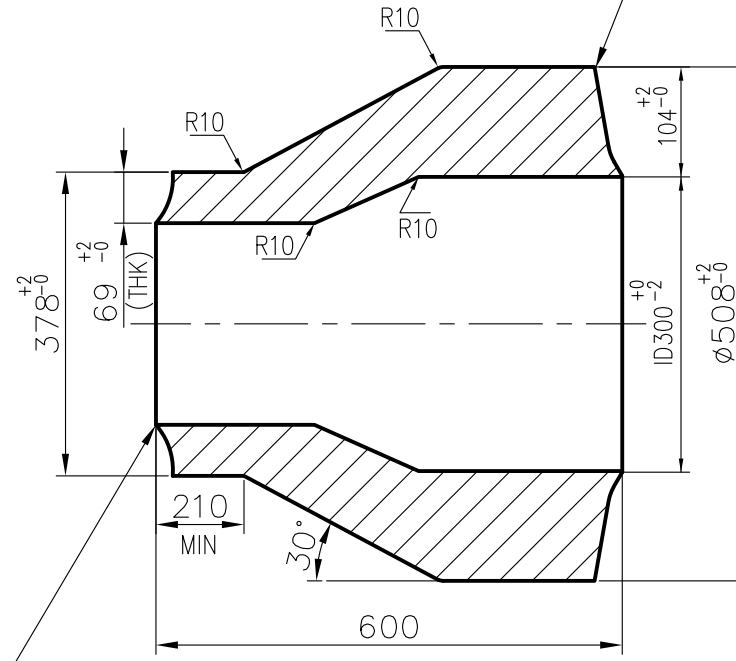
REV	DATE	ALTERED :
01		CHD & APPD :



NOTES:

- 01 DESIGN PRESSURE : 300 kg/sq.cm(g)
- 02 DESIGN TEMPERATURE : 610 °C
- 03 HARD PUNCH "F92" AT PLACE MARKED WITH *
- 04 FOLLOW APPLICABLE TDC

EP AS PER DRG No.
3-80-300-19825
FIGURE-X, d1=300

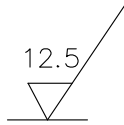


EP AS PER DRG No.
3-80-300-19825
FIGURE-X, d1=240

	MATCHING PIECE ID300X104/ID240X69		92 117 211 0000	A		477.981
			SA 182 F92			
VARIANT NUMBER	DESCRIPTION	STD	MATERIAL CODE	A/C/P	UNIT	UNIT WEIGHT(KG)
			MATERIAL SPECN			QUANTITY

		BHARAT HEAVY ELECTRICALS LIMITED PIPING CENTRE CHENNAI 600 017		DRN	NAME	SIGNATURE	DATE
				CHD	ARUN SHARMA		15.06.17
				APPD	KONDAPANAU DU		15.06.17
DEPT	BM	ALL	PROJECTION	SCALE	WEIGHT (Kg)	REF TO ASSY / OLD DWG	
CODE	121	DIMENSIONS		N.T.S	477.981		
		TITLE		DRAWING NO :			REV
		MATCHING PIECE		4-80-300-80771			00
		ID300X104/ID240X69					

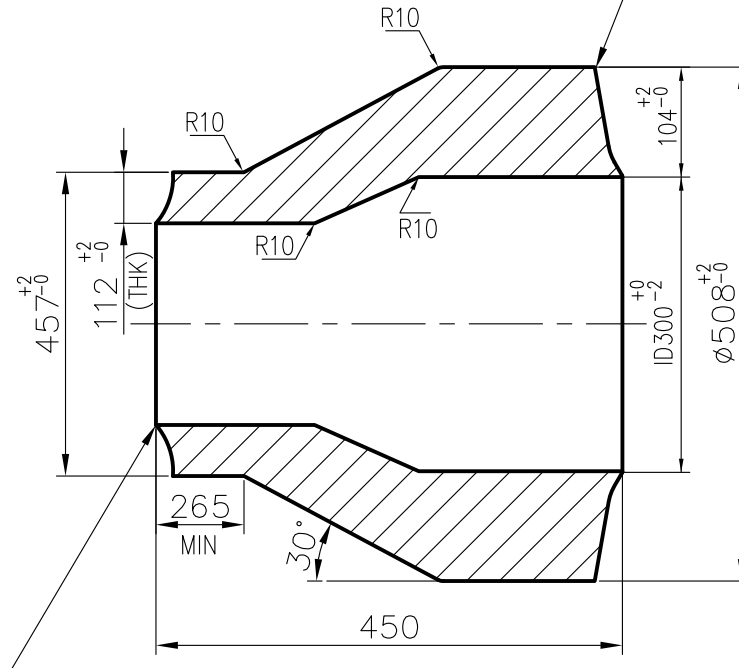
REV 01	DATE	ALTERED :
		CHD & APPD :



NOTES:

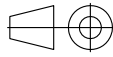
- 01 DESIGN PRESSURE : 300 kg/sq.cm(g)
- 02 DESIGN TEMPERATURE : 610 °C
- 03 HARD PUNCH "F92" AT PLACE MARKED WITH *
- 04 FOLLOW APPLICABLE TDC

EP AS PER DRG No.
3-80-300-19825
FIGURE-X, d1=300

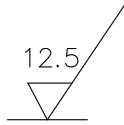


EP AS PER DRG No.
3-80-300-19825
FIGURE-X, d1=261.2

	MATCHING PIECE ID300X104/OD457X112		92 117 224 0000	A		444	053
			SA 182 F92				
VARIANT NUMBER	DESCRIPTION	STD	MATERIAL CODE	A/C/P	UNIT	UNIT WEIGHT(KG)	
			MATERIAL SPECN			QUANTITY	

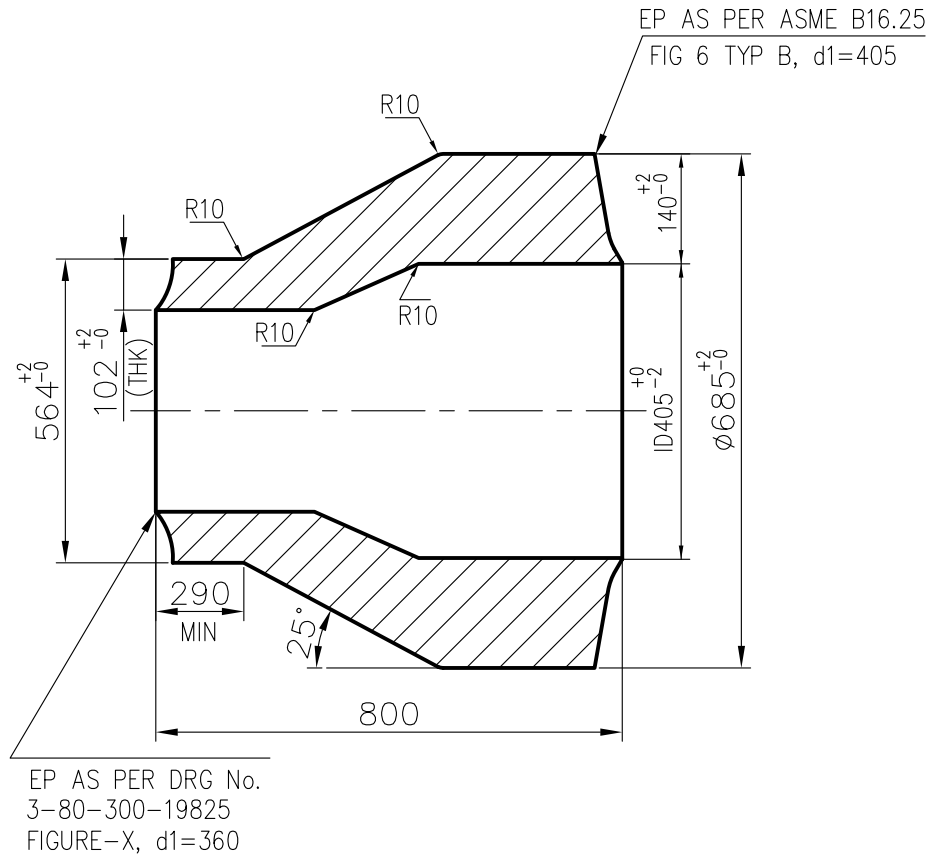
		BHARAT HEAVY ELECTRICALS LIMITED PIPING CENTRE CHENNAI 600 017		DRN	NAME ARUN SHARMA	SIGNATURE	DATE 09.05.17
				CHD	KONDAPANAU DU		09.05.17
				APPD	R.SESHAGIRI		09.05.17
DEPT BM	ALL DIMENSIONS ARE IN MM	PROJECTION 	SCALE N.T.S	WEIGHT (Kg) 444.053	REF TO ASSY / OLD DWG		
CODE 121	TITLE MATCHING PIECE ID300X104/OD457X112				DRAWING NO : 4-80-300-80990		REV 00

REV 01	DATE	ALTERED : CHD & APPD :
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NOTES:

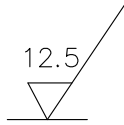
- 01 DESIGN PRESSURE : 300 kg/sq.cm(g)
- 02 DESIGN TEMPERATURE : 610 °C
- 03 HARD PUNCH "F92" AT PLACE MARKED WITH *
- 04 FOLLOW APPLICABLE TDC



	MATCHING PIECE ID405X140/ID360X102 L=800		92 117 193 0000	A		1345	45
			SA 182 F92				
VARIANT NUMBER	DESCRIPTION	STD	MATERIAL CODE	A/C/P	UNIT	UNIT WEIGHT(KG)	
			MATERIAL SPECN			QUANTITY	

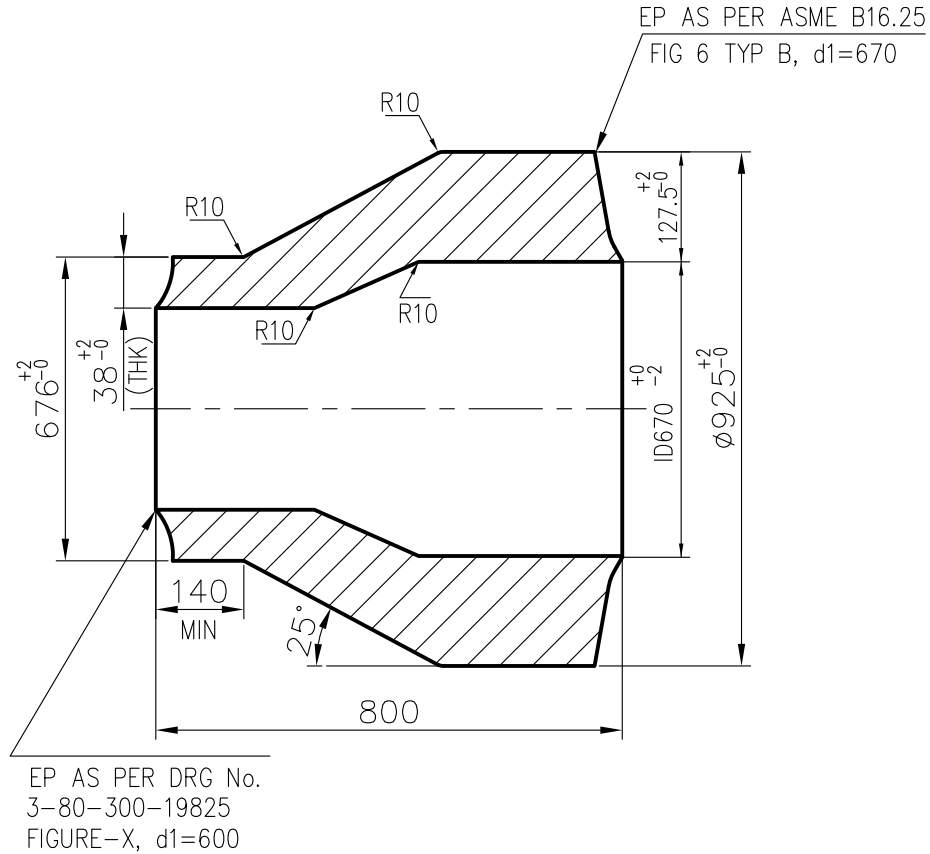
		BHARAT HEAVY ELECTRICALS LIMITED PIPING CENTRE CHENNAI 600 017		DRN	NAME ARUN SHARMA	SIGNATURE	DATE 09.05.17
				CHD	KONDAPANAU		09.05.17
				APPD	R.SESHAGIRI		09.05.17
DEPT BM	ALL DIMENSIONS ARE IN MM	PROJECTION 	SCALE N.T.S	WEIGHT (Kg) 1345.455	REF TO ASSY / OLD DWG		
CODE 121	TITLE MATCHING PIECE ID405X140/ID360X102-SA182F92				DRAWING NO : 4-80-301-80767		REV 00

REV 01	DATE	ALTERED : CHD & APPD :
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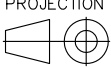


NOTES:

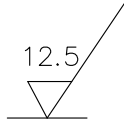
- 01 DESIGN PRESSURE : 72 kg/sq.cm(g)
- 02 DESIGN TEMPERATURE : 610 °C
- 03 HARD PUNCH "F92" AT PLACE MARKED WITH *
- 04 FOLLOW APPLICABLE TDC



VARIANT NUMBER	MATCHING PIECE ID670X127.5/ID600X38 L=800	STD	92 117 194 0000 SA 182 F92	A	UNIT	1414 55
DESCRIPTION			MATERIAL CODE	A/C/P	UNIT	UNIT WEIGHT(KG)
			MATERIAL SPECN			QUANTITY

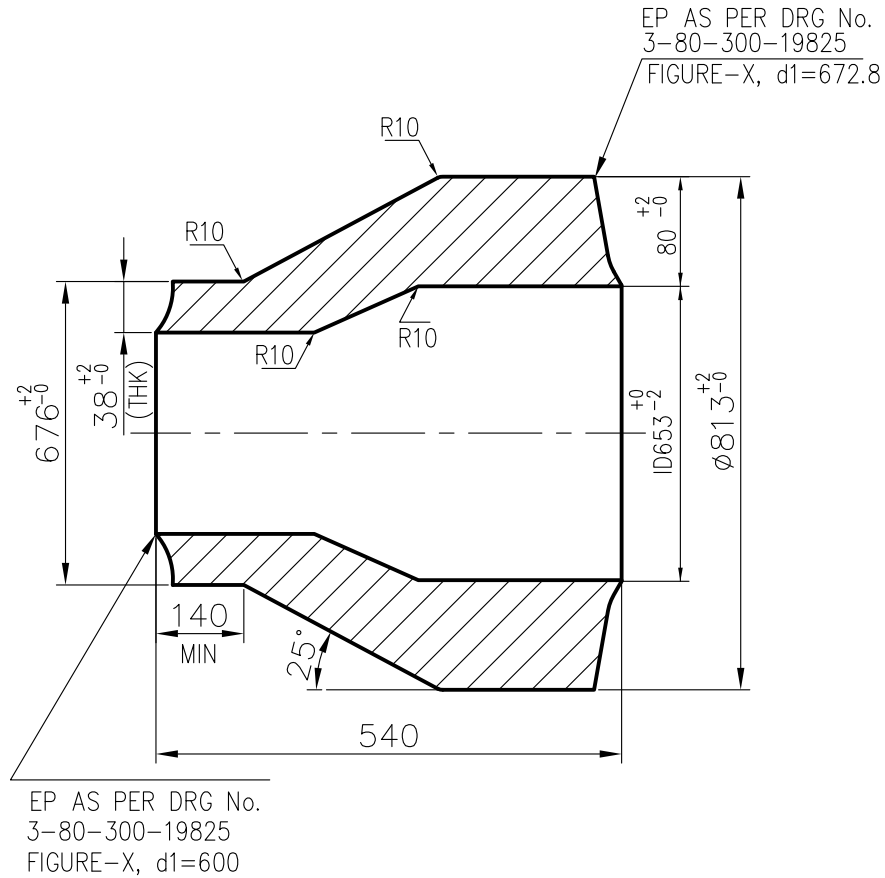
 BHARAT HEAVY ELECTRICALS LIMITED PIPING CENTRE CHENNAI 600 017				DRN	NAME ARUN SHARMA	SIGNATURE	DATE 09.05.17
				CHD	KONDAPANAU		09.05.17
				APPD	R.SESHAGIRI		09.05.17
DEPT BM	ALL DIMENSIONS ARE IN MM	PROJECTION 	SCALE N.T.S	WEIGHT (Kg) 1414.55	REF TO ASSY / OLD DWG		
CODE 121	TITLE MATCHING PIECE ID670X127.5/ID600X38 SA182F92				DRAWING NO :		REV
					4-80-310-80811		00

REV	DATE	ALTERED :
01		CHD & APPD :

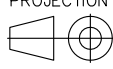


NOTES:

- 01 DESIGN PRESSURE : 72 kg/sq.cm(g)
- 02 DESIGN TEMPERATURE : 610 °C
- 03 HARD PUNCH "F92" AT PLACE MARKED WITH *
- 04 FOLLOW APPLICABLE TDC



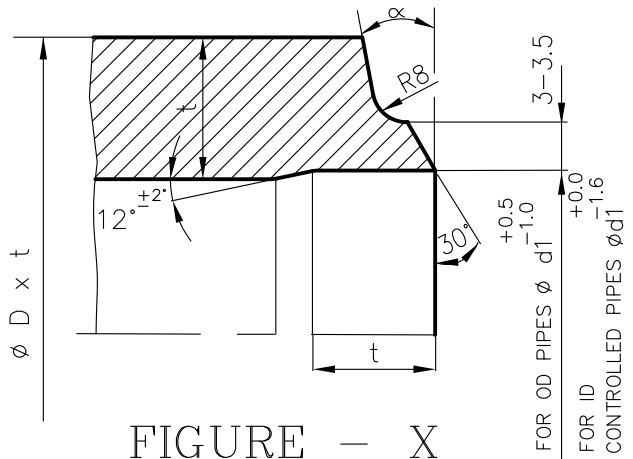
VARIANT NUMBER	DESCRIPTION	STD	MATCHING PIECE OD813X80/ID600X38 L=540		A/C/P	UNIT	92 117 197 0000		A		578	75
			SA 182 F92									
			MATERIAL CODE				UNIT WEIGHT(KG)					
			MATERIAL SPECN				QUANTITY					

		BHARAT HEAVY ELECTRICALS LIMITED PIPING CENTRE CHENNAI 600 017			DRN	NAME ARUN SHARMA	SIGNATURE	DATE 17.05.17
					CHD	KONDAPANAU DU		17.05.17
					APPD	R.SESHAGIRI		17.05.17
DEPT BM	ALL DIMENSIONS ARE IN MM	PROJECTION 	SCALE N.T.S	WEIGHT (Kg) 578.75	REF TO ASSY / OLD DWG			
CODE 121	TITLE MATCHING PIECE OD813X80/ID600X38 SA182F92				DRAWING NO : 4-80-310-80814			REV 00

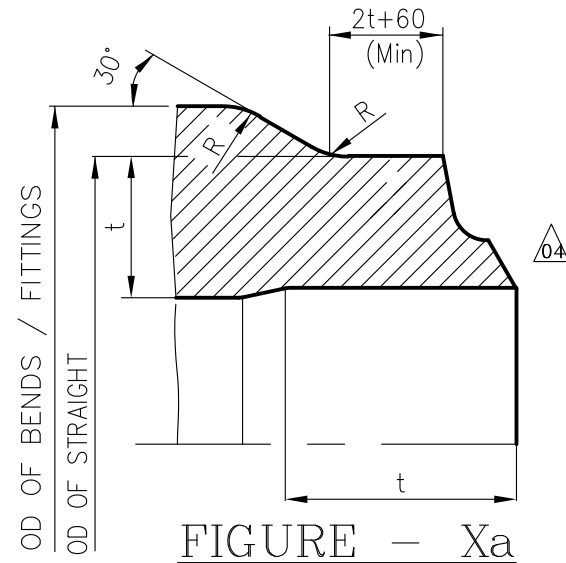
DRAWING No. 3-80-300-19825

NOTES: - 01. APPLICABLE FOR P91/P92
03 i) STRAIGHT WITH STRAIGHT/FITTING
03 ii) BEND WITH BEND/FITTING

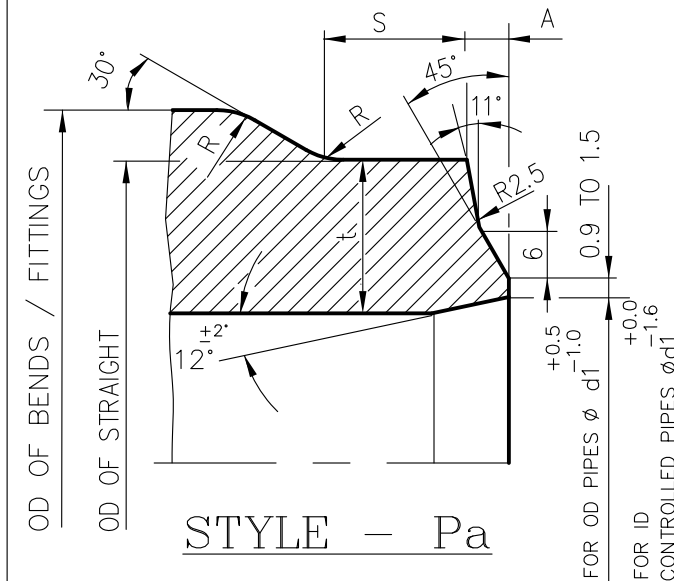
- 04 02. FOR OD MISMATCH, REFER FIGURE-Xa
04 03. REFER STYLE-DL FOR THICKNESS <14.2mm (FOR ALL OD/ID)
04 04. REFER STYLE-PL
i) WHEN THICKNESS IS ≥ 14.2 mm & <20mm (FOR ALL OD/ID)
ii) WHEN THICKNESS ≥ 20 mm & OD <219.1mm.
04 05. $\alpha = 6^\circ$ FOR WALL THICKNESS ≥ 20 mm AND ≤ 30 mm
06. $\alpha = 10^\circ$ FOR WALL THICKNESS > 30 mm



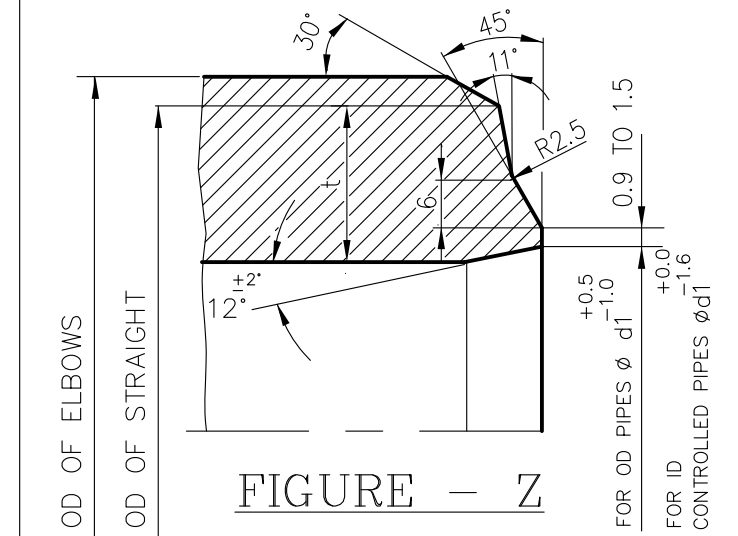
MATCHING EDGE PREPARATION
02 FOR MISMATCH OD APPLICABLE FOR
BENDS/FITTINGS OF P91/P92 MATERIALS 03
NOTES: -
01. OD OF STRAIGHT TO BE PHYSICALLY MEASURED/VERIFIED.
02. t = THK OF CONNECTING PIPE (STRAIGHT)



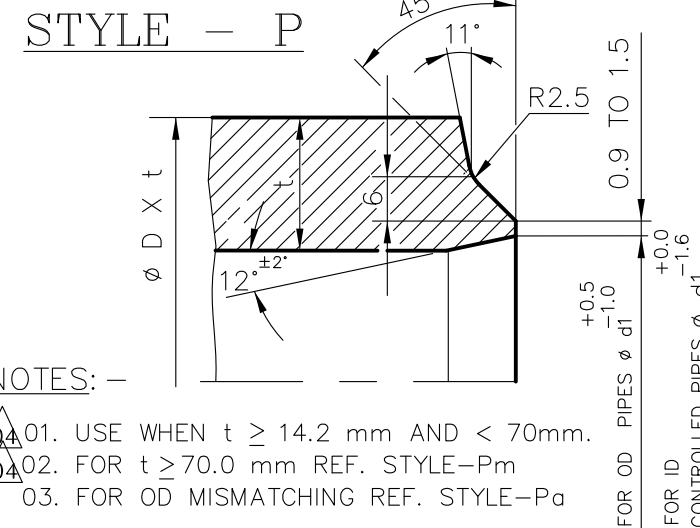
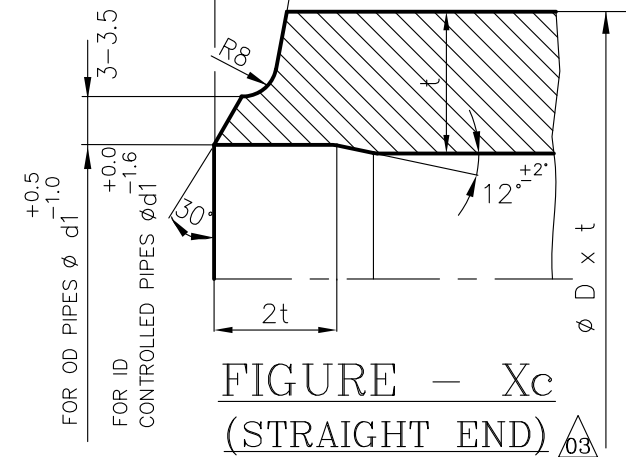
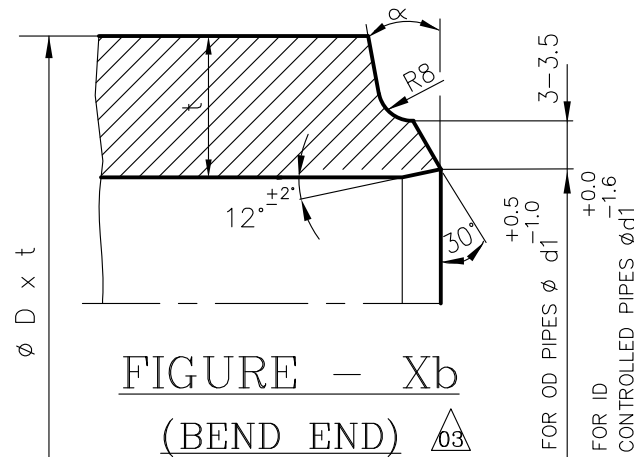
MATCHING EDGE PREPARATION FOR MISMATCH OD
DIAMETRICALLY GREATER THAN 8 mm
(ie OD1 - OD2 > 8mm) APPLICABLE FOR
BENDS/FITTINGS OTHER THAN P91/P92 MATERIALS
NOTES: -
01. OD OF STRAIGHT TO BE PHYSICALLY MEASURED/VERIFIED.
02. WHEN $t < 65$, $S+A = 65$ Min. & $t > 65$, $S=65$ Min.
WHERE t=THK OF CONN.PIPES(STRAIGHT).



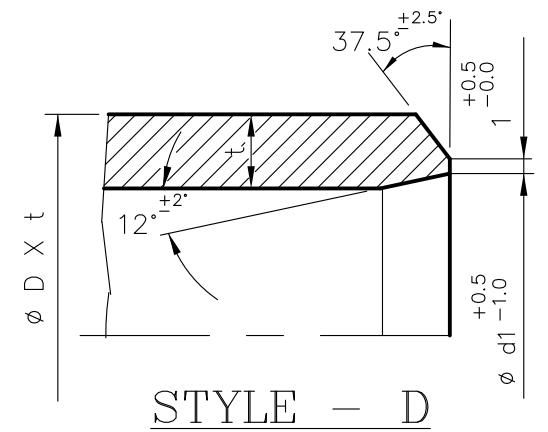
MATCHING EDGE PREPARATION FOR MISMATCH OD
DIAMETRICALLY GREATER THAN 8 mm
(ie OD1 - OD2 > 8mm) APPLICABLE FOR
ELBOWS OTHER THAN P91/P92 MATERIALS
NOTES: -
01. OD = OUTSIDE DIA OF CONN. PIPE (STRAIGHT)
TO BE PHYSICALLY MEASURED/VERIFIED.
02. t = THK OF CONN.PIPES (STRAIGHT)
03. t = THK OF CONN.PIPES (STRAIGHT)



NOTES: - 01. APPLICABLE FOR P91/P92 ZERO ARM PIPEBEND WELDED WITH P91/P92 STRAIGHT PIPE
02. FOR OD MISMATCH, REFER FIGURE-Xa
03. REFER STYLE-DL FOR THICKNESS <14.2mm (FOR ALL OD/ID)
04 04. REFER STYLE-PL
i) WHEN THICKNESS IS ≥ 14.2 mm AND <20 mm FOR ALL OD/ID.
ii) WHEN THICKNESS ≥ 20 mm AND OD < 219.1 mm.
05. $\alpha = 6^\circ$ FOR WALL THICKNESS ≥ 20 mm AND ≤ 30 mm
06. $\alpha = 10^\circ$ FOR WALL THICKNESS > 30 mm



NOTES: -
01. USE WHEN $t < 14.2$ mm.



TYPE OF PRODUCT
OR NAME OF
CUSTOMER/PROJECT

01 STANDARD

GENERAL NOTES :

01. THE MINIMUM THICKNESS AT WELD END SHALL NOT BE LESS THAN
a) 0.875 TIMES t NOM. FOR OD PIPES.
b) t MIN. FOR ID CONTROLLED PIPES.
02. t NOM & t MIN SHALL BE AS PER SPECIFIED PIPE SIZE.
03. SHARP CORNERS SHALL BE ROUNDED OFF WHEREEVER 'R' IS INDICATED. 02

NOTES FOR WELDING:

01. WELD REINFORCEMENT TO BE FLUSH GROUND AND MERGED WITH PARENT METAL WITHOUT ANY UNEVENNESS.

REV 04	DATE 07.12.16	ALTERED: P SURESH APPROVED: R SESHAGIRI
ZONE	SHEET 2 OF 2 IS ADDED. NOTES ADDED, MODIFIED AND DELETED IN FIGURE-X, Xa, Xb, Xc AND STYLE-P	
REV 03	DATE 10.04.13	ALTERED: M.R.K APPROVED: C.K.N
ZONE	FIG Xb AND FIG Xc ADDED. IN FIG.X, NOTE 01 MODIFIED. IN FIG.Xa, STY-Pa, FIG.Z, P92 MATERIAL ADDED	
REV 02	DATE 10.01.13	ALTERED: M.R.K APPROVED: C.K.N
ZONE	IN FIG.Xa, NOTE 04 ADDED. GENERAL NOTES 03 ADDED. IN FIG.Xa, 8MM OD MISMATCH IS REMOVED	
REV 01	DATE 11.05.04	ALTERED: R.SENDHIL APPROVED: A.VELAYUTHAM
ZONE	PROJECT NAME REMOVED AND STANDARD INCORPORATED IN TITLE BLOCK	



BHARAT HEAVY ELECTRICALS LTD.,
PIPING CENTRE, MADRAS

DEPT.

GRADE OF
UN TOL. DIM

CODE

C/M/F

TITLE

EDGE PREPARATION
DETAILS

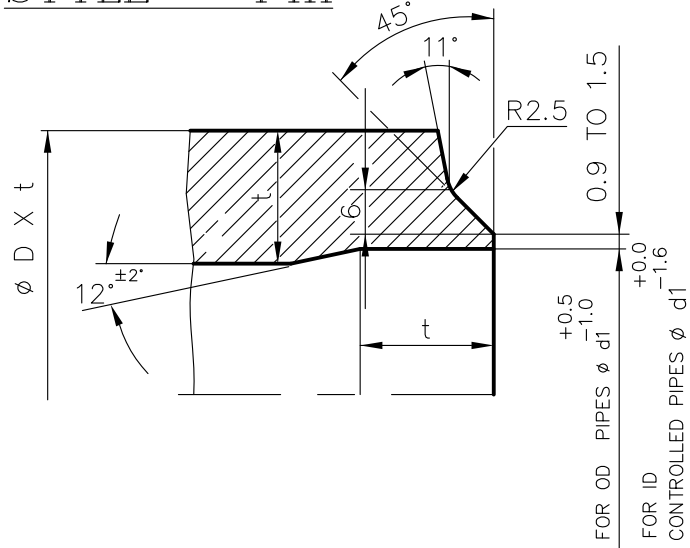
DRN	NAME K.B.RAGUNATH	SIGN	DATE 11.10.01	NO OF ITEMS
CHD	M.C.SEKARAN		11.10.01	
APPD	A.VELAYUTHAM		11.10.01	
DEPT.	GRADE OF UN TOL. DIM	SCALE	WEIGHT (Kg).	NAME OF ORIGINAL ORGANISATION
CODE	C/M/F			
TITLE	EDGE PREPARATION DETAILS	CARD CODE U 01	DRAWING No. 3-80-300-19825	REV 04
			SHEET 1 OF 2	

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3-80-300-19825

DRAWING No.

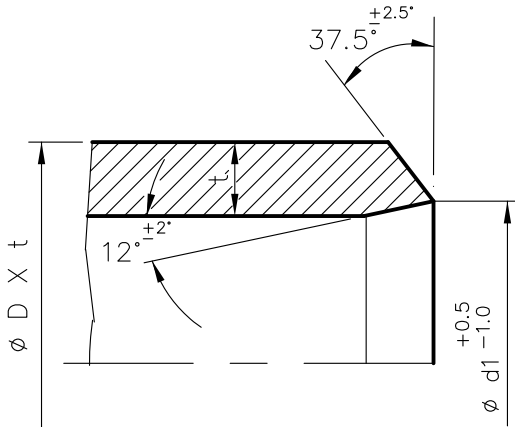
STYLE - P_m



NOTES: -

01. USE FOR SA106GRC PIPES WHEN $t \geq 70.0$ mm.
02. FOR OD MISMATCHING REF. FIGURE-P_a
03. FOR FITTINGS USE STYLE-P.

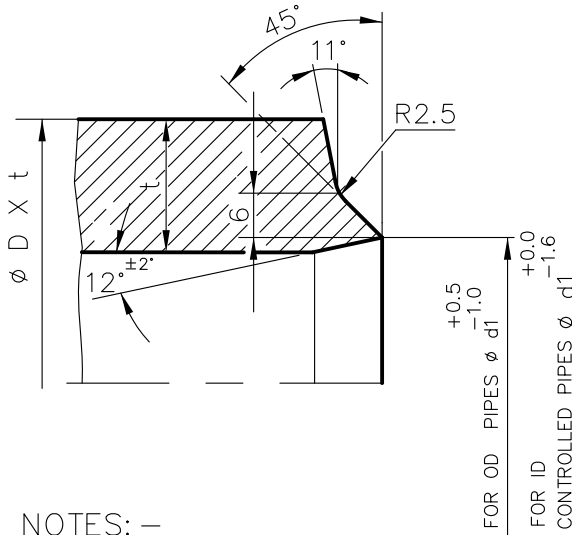
STYLE - D_L



NOTES: -

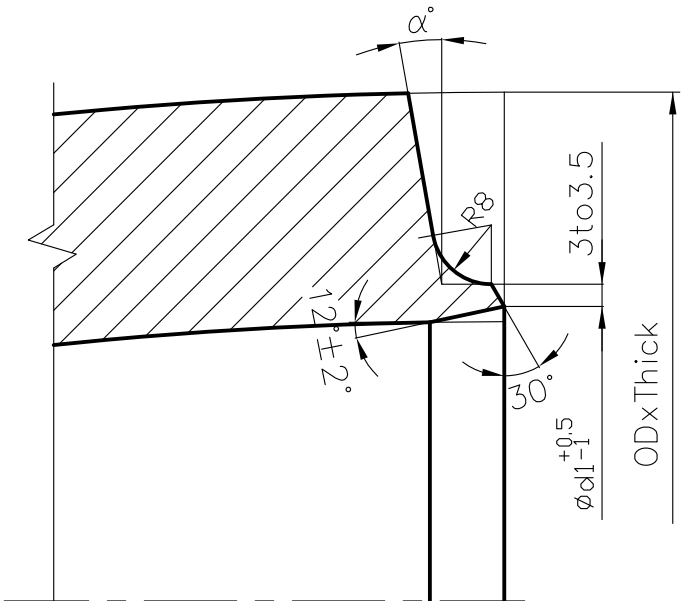
01. USE FOR P91 / P92 PIPES AND FITTINGS WHEN $t < 14.2$ mm (ALL OD/ID).

STYLE - P_L



NOTES: -

01. USE FOR P91 / P92 PIPES AND FITTINGS
i) WHEN THICKNESS IS ≥ 14.2 mm AND < 20 mm FOR ALL OD/ID.
ii) WHEN THICKNESS ≥ 20 mm AND OD < 219.1 mm.
02. FOR OD MISMATCHING REF. FIGURE-P_a



01. USE FOR P91 / P92 FITTINGS
02. REFER STYLE-D_L FOR THICKNESS < 14.2 mm FOR ALL OD/ID.
03. REFER STYLE-P_L
i) WHEN THICKNESS IS ≥ 14.2 mm AND < 20 mm FOR ALL OD/ID.
ii) WHEN THICKNESS ≥ 20 mm AND OD < 219.1 mm.
04. $\alpha = 6^\circ$ FOR WALL THICKNESS ≥ 20 mm AND ≤ 30 mm
05. $\alpha = 10^\circ$ FOR WALL THICKNESS > 30 mm.
06. FIGURE-X_f IS APPLICABLE FOR ALL BUTT WELDED FITTINGS NOT COVERED IN NOTES 02 & 03

FIGURE-X_f

NOTE :

01. FOR GENERAL NOTES AND NOTES FOR WELDING REFER SHEET 1 OF 2.

TYPE OF PRODUCT
OR NAME OF
CUSTOMER/PROJECT

STANDARD



BHARAT HEAVY ELECTRICALS LTD.,
PIPING CENTRE, MADRAS

DRN	NAME	SIGN	DATE	NO OF ITEMS
CHD	P SURESH		07.12.16	
APPD	R SESHAGIRI		07.12.16	
	C KARUNAKARAN		07.12.16	

DEPT.	GRADE OF UN TOL DIM	SCALE	WEIGHT (Kg).	NAME OF ORIGINAL ORGANISATION	ITEM No.
CODE	C/M/F				

TITLE	CARD CODE	DRAWING No.	REV
EDGE PREPARATION DETAILS	U 01	3-80-300-19825 SHEET 2 OF 2	04