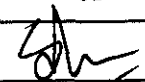
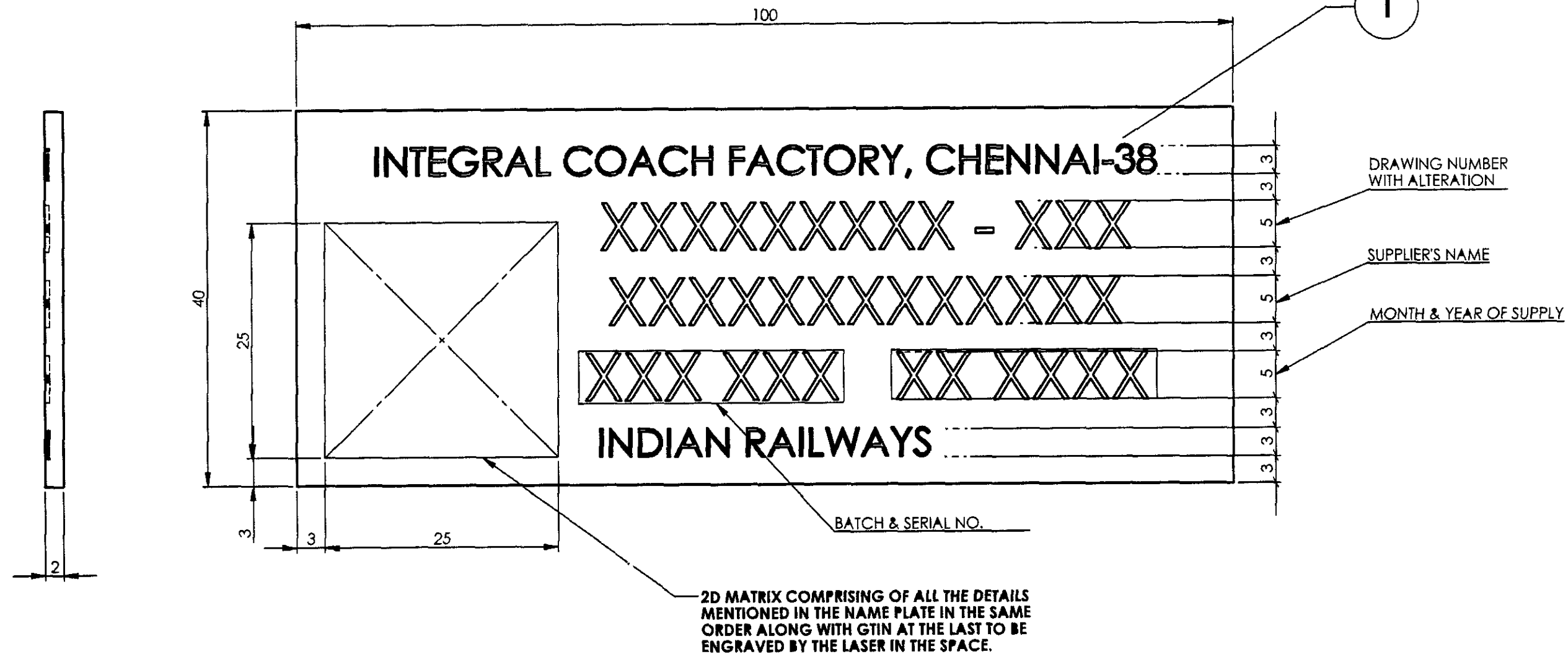


AAA51072

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①① BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①①① CHAMFERED

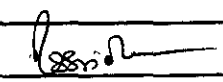
REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		NAME PLATE REVISED.	-sd-
b		DESIGN REVISED.	-sd-
c		BATCH & SERIAL NO. ADDED	-sd-
d		NOTE-2 ADDED.	




NOTE:

1. LETTERS TO BE PUNCHED OR ENGRAVED.

2. ALTERNATIVELY AISI-304/SS-304 (X02Cr19Ni10)/IS:6911(X04Cr19Ni9) ALSO ACCEPTABLE.

1	NAME PLATE FOR SUPPLIER IDENTIFICATION	2x40x100	1		RDSO/SPEC C-K201 X2 Cr Ni 12	0.063	\$
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 5-1 Body Side Doors				SURFACE AREA IN Sq.m.:0.009		WT/ASSY IN Kgs:	
NAME PLATE FOR SUPPLIER IDENTIFICATION					SCALE 2:1	SSE/D CHD	
					ALT. d	ALTD DRN	KUNTI THAKUR
							G. NAGESWARAN
INDIAN RAILWAY STANDARDS					SHEET 1 OF 1		
INTEGRAL COACH FACTORY, CHENNAI - 600038					AAA51072		
					A3		

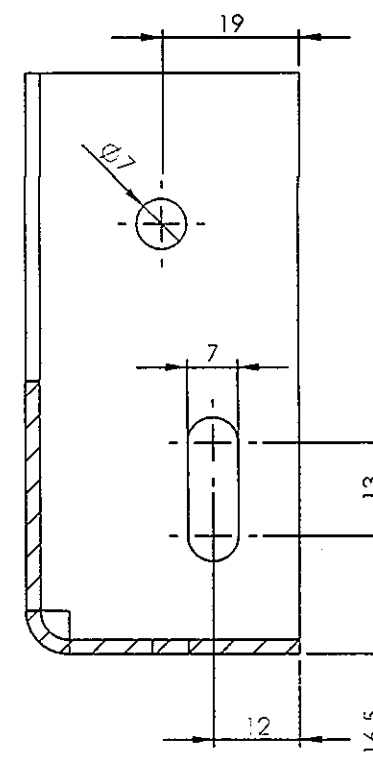
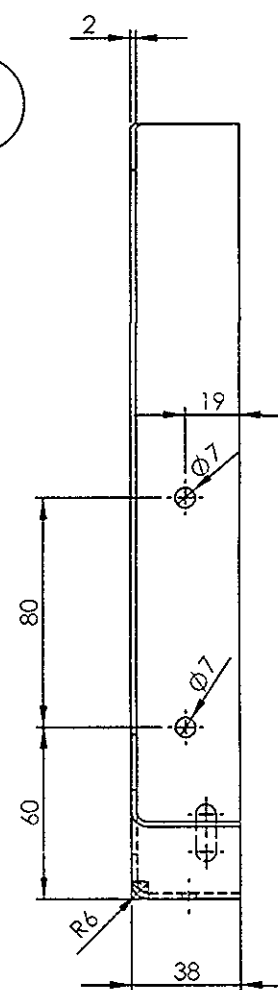
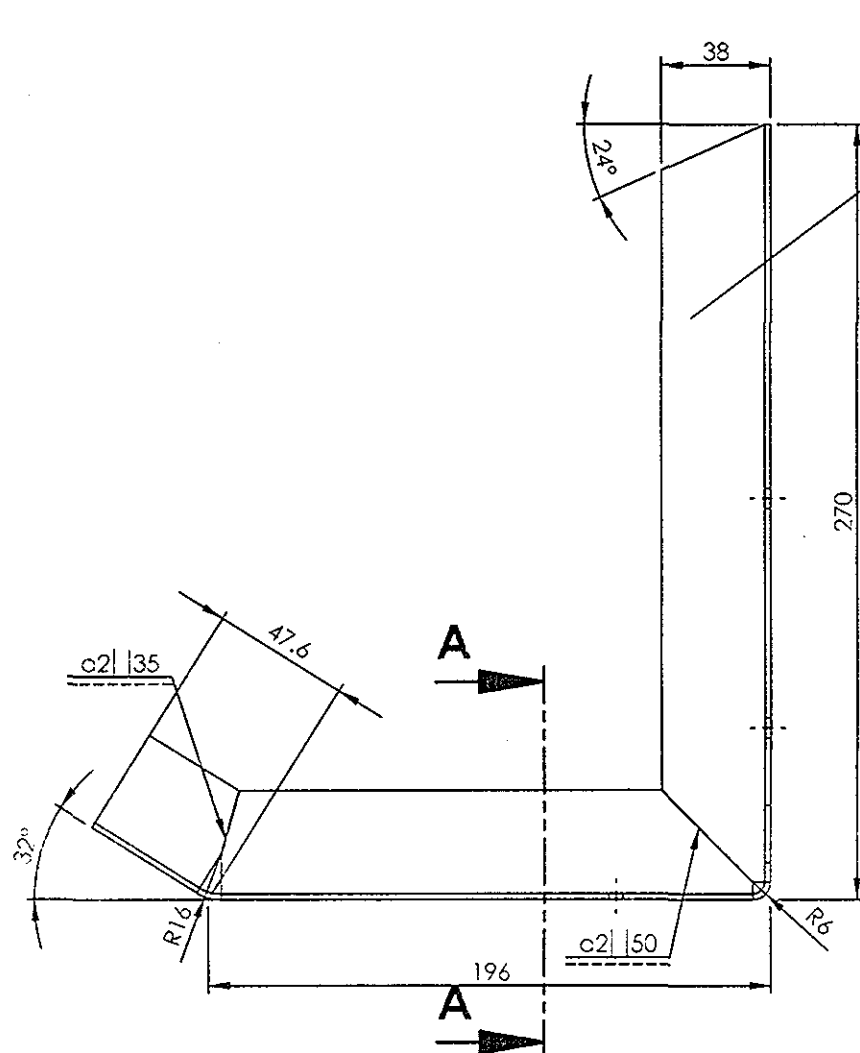
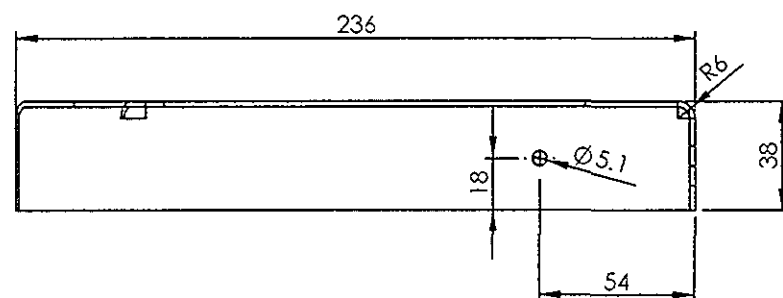
06-07-2024	02.06.2010	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME


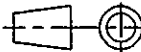
REF.DRG.NO.

AAB10005

▽ ROUGH MACHINED	① ROUGH CLEANED
▽ FINISH MACHINED	② BURRS REMOVED
▽ FINISH VACUUM	③ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE

SECTION A-A
SCALE 1 : 1

1	BRACKET	2x72x508	1		RDSO/SPEC C-K201 X2CrNi12	0.547	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-0		SURFACE AREA IN Sq.m.:0.071			WT/ASSY IN Kgs:0.547		
BRACKET					SCALE	SSE/D	
					1:2.5	CHD	
					ALT.	ALTD	
						DRN	L.PANDURANGA RAO
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1			
					AAB10005		A3

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND FINISHNESS VALUES, REFER DRAWING NO IC1/STD 9 0 001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813: 1986.

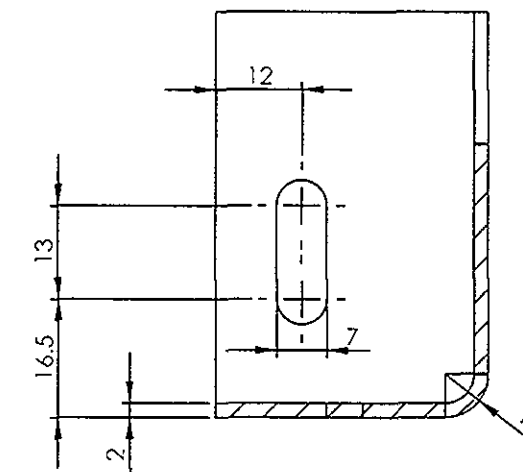
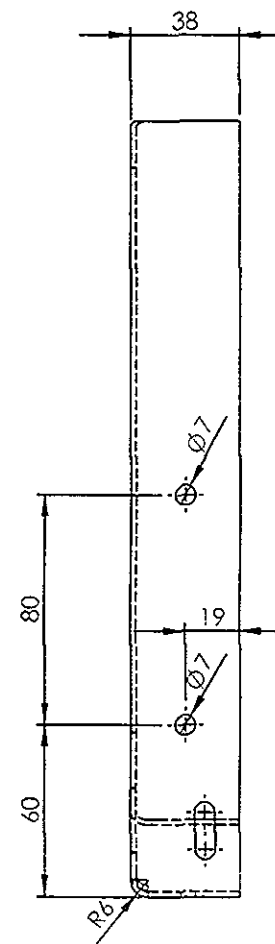
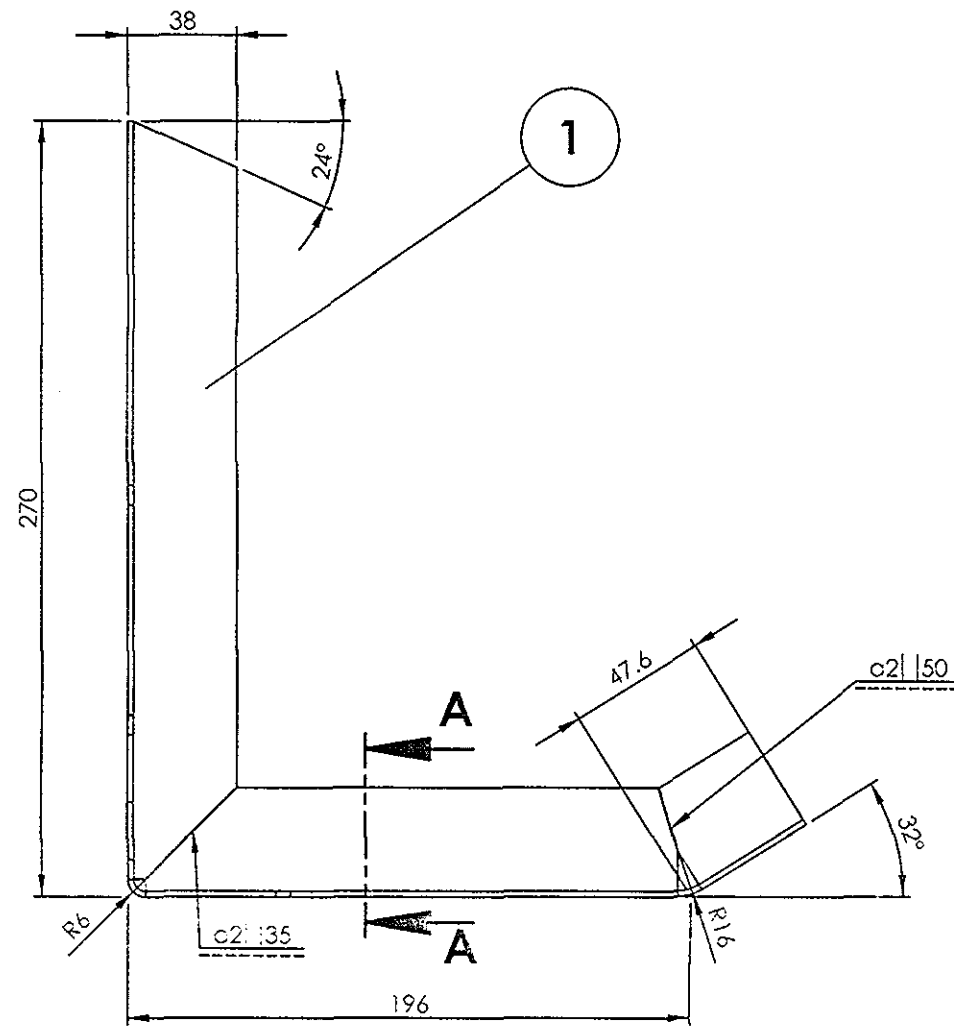
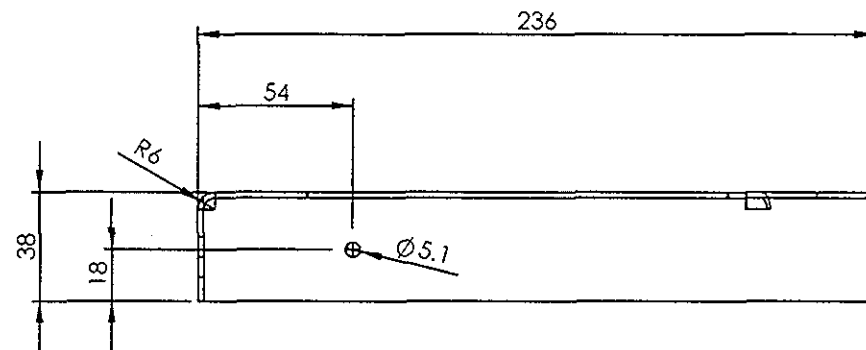
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	10-04-2013	10/13/19
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

AAB10006

▽ ROUGH MACHINED	⊖ ROUGH CLEANED
▽▽ FINISH MACHINED	⊖⊖ BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	⊖⊖⊖ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE

SECTION A-A
SCALE 1 : 1

1	BRACKET	2x72x508	1		RDSO/SPEC C-K201 X2CrNi12	0.547	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-0		SURFACE AREA IN Sq.m.:0.071			WT/ASSY IN Kgs:0.547		
BRACKET					SCALE	SSE/D	<i>L. Panduranga Rao</i>
					1:2	CHD	
					ALT.	ALTD	
					DRN	L.PANDURANGA RAO	
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1	AAB10006		A3
INTEGRAL COACH FACTORY, CHENNAI - 600038							

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICY/STD 9 0 001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813 1986.

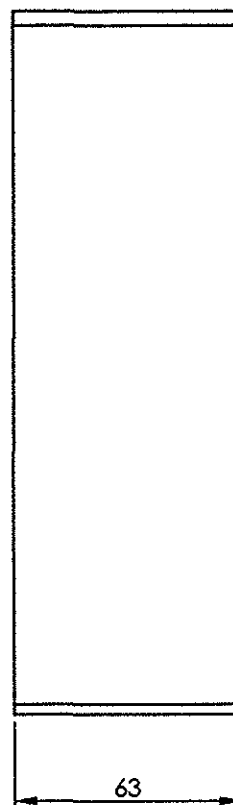
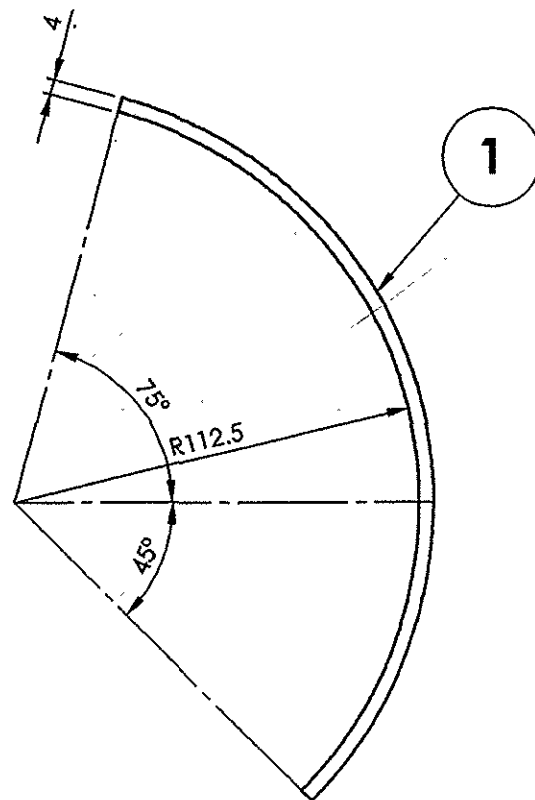
REF.DRG.NO.3 10113.0.20.095.113

	10-04-2013	<i>10/4/13</i>
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

AAB10008

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	⑱ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



1	RING	4 x 63 x 240	1		RDSO/SPEC C- K201 X2CrNi12	0.483	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.033			WT/ASSY IN Kgs:0.483		
RING					SCALE	SSE/D	<i>W. S. Prasad</i>
					1:2	CHD	
					ALT.	ALTD	
					DRN	K.Sriram	
					INDIAN RAILWAY STANDARDS		
INTEGRAL COACH FACTORY, CHENNAI - 600038			AAB10008				
						A3	

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS, VALUES, REFER DRAWING NO IC/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.-

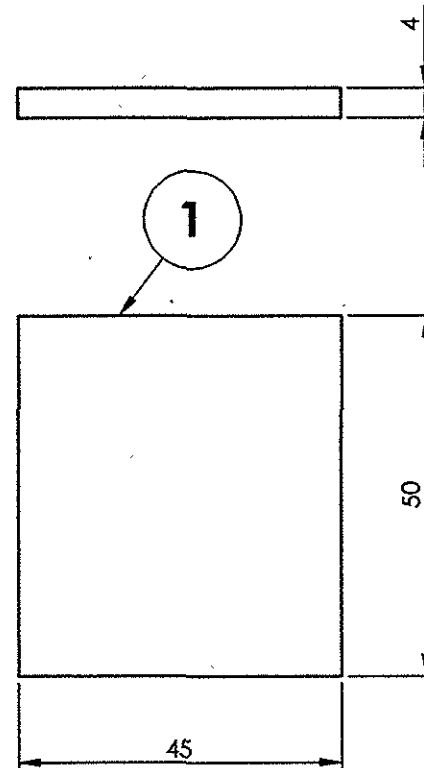
	12-06-2013	10/10
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

AAB10010

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	⑱ CHAMFERED

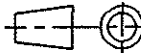
REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
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ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF:DRG.NO.-

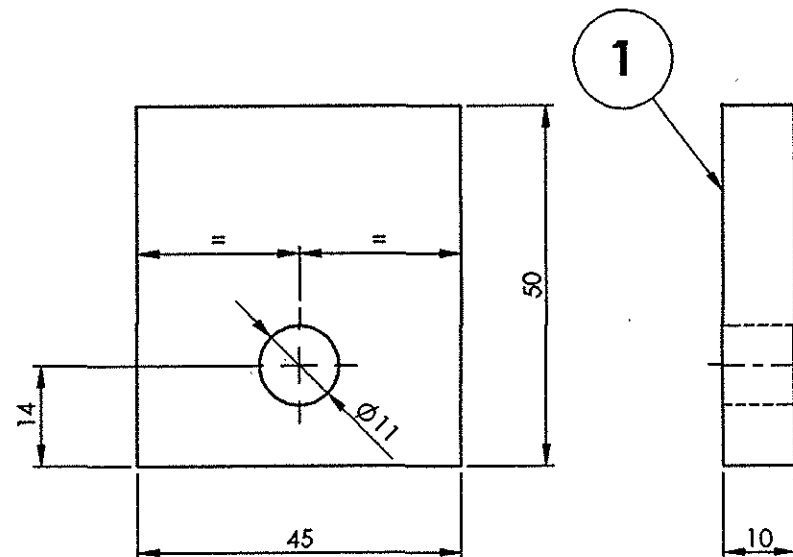
1	PLATE	4 x 45 x 50	1		RDSO/SPEC C-K201 X2CrNi12	0.072	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.005			WT/ASSY IN Kgs:0.072		
PLATE					SCALE	SSE/D	K.Sriram
					1:1	CHD	
					ALT.	ALTD	
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							
					SHEET 1 OF 1	AAB10010	A3

AAB10073

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
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ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

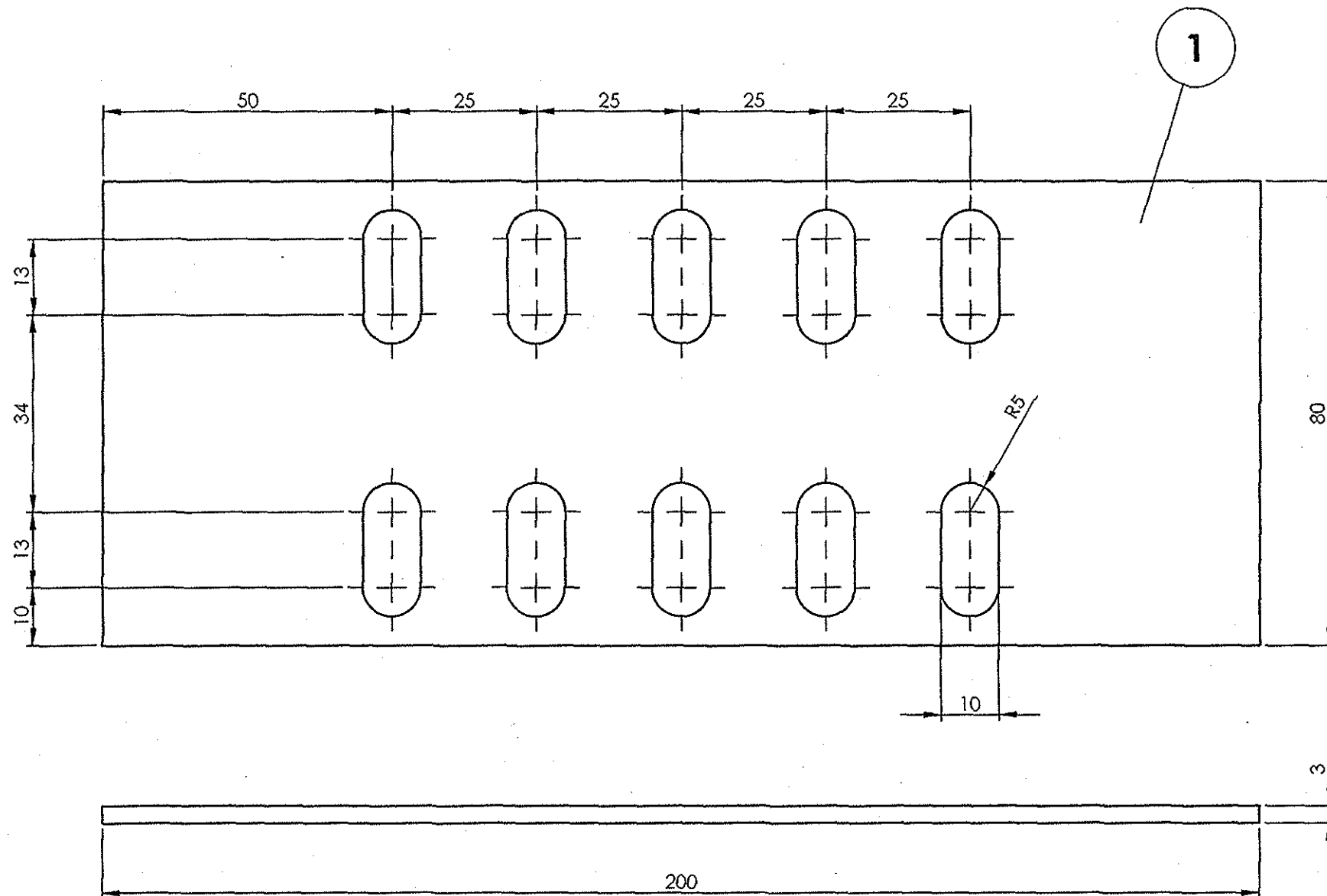
REF.DRG.NO.

1	PLATE	10 x 45 x 50	1		RDSO/SPEC C-K201 X2CrNi12	0.172	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.007			WT/ASSY IN Kgs:0.172		
PLATE					SCALE	SSE/D	<i>K.Sriram</i>
					1:1	CHD	
					ALT.	ALTD	
					DRN	K.Sriram	
INDIAN RAILWAY STANDARDS				SHEET			
INTEGRAL COACH FACTORY, CHENNAI - 600038				1 OF 1			
AAB10073						A3	

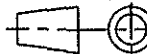
AAB16550

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	⑱ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



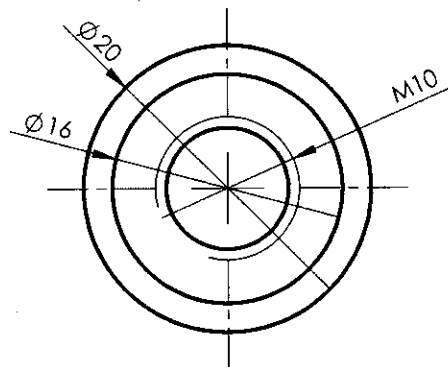
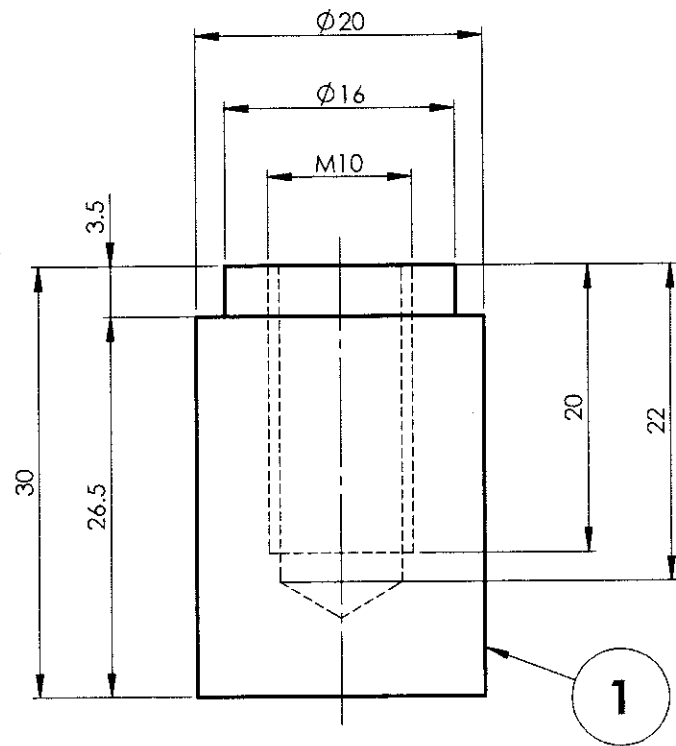
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.
WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

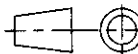
1	FLAT	3x80x200	1		RDSO/SPEC C- K201 X2CrNi12	0.33	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6		SURFACE AREA IN Sq.m.:			WT/ASSY IN Kgs:		
FLAT					SCALE	SSE/D	<i>P. Sango</i>
					1:1	CHD	
					ALT.	ALTD	
						DRN	P.MURUGAN
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1			
					AAB16550		
					A3		

REF.DRG.NO.-

1		2		3		4		5		6		7		8																																																										
<div style="border: 1px solid black; padding: 5px; display: inline-block;"> AAD16884 </div>						<div style="display: flex; justify-content: space-between;"> <div> ▽ ROUGH MACHINED ▽▽ FINISH MACHINED ▽▽▽ FINE F.N.SH MACHINED </div> <div> (01) ROUGH CLEANED (012) BURRS REMOVED (18) CHAMFERED </div> </div>		<div style="display: flex; justify-content: space-between;"> <div> ALT. ZONE DESCRIPTION APPROVED & DATE </div> </div>																																																																
<div style="display: flex; justify-content: space-around; align-items: center;"> <div style="text-align: center;"> </div> <div style="text-align: center;"> </div> </div>																																																																								
<div style="display: flex; justify-content: space-between;"> <div style="width: 45%;"> <p>ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY</p> </div> <div style="width: 50%;"> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td>1</td> <td>SCREWING PIECE</td> <td>Ø 20 X 30</td> <td>1</td> <td></td> <td>AISI 304</td> <td>0.06</td> <td></td> </tr> <tr> <th>QTY</th> <th>DESCRIPTION</th> <th>DIMENSIONS</th> <th>ITEM NO.</th> <th>REF. DRGS</th> <th>MATL.SPEC.</th> <th>WT/UNIT IN KGS</th> <th>REMARKS</th> </tr> <tr> <td colspan="4">GROUP: 1-6 Roof Construction</td> <td colspan="2">SURFACE AREA IN Sq.m.:</td> <td colspan="2">WT/ASSY IN Kgs:</td> </tr> <tr> <td colspan="6" rowspan="4" style="text-align: center; vertical-align: middle;"> <div style="font-size: 1.2em; font-weight: bold;">SCREWING PIECE</div> </td> <td>SCALE</td> <td>SSE/D</td> <td rowspan="2" style="text-align: center; vertical-align: middle;"> </td> </tr> <tr> <td>2:1</td> <td>CHD</td> </tr> <tr> <td>ALT.</td> <td>ALTD</td> <td rowspan="2" style="text-align: center; vertical-align: middle;">S K MUTHUKUMAR</td> </tr> <tr> <td>-</td> <td>DRN</td> </tr> <tr> <td colspan="6" style="text-align: center;"> <div style="font-weight: bold;">INDIAN RAILWAY STANDARDS</div> <div style="font-size: 0.8em;">INTEGRAL COACH FACTORY, CHENNAI - 600038</div> </td> <td colspan="2" style="text-align: center;"> <div style="font-size: 0.8em;">SHEET 1 OF 1</div> </td> </tr> <tr> <td colspan="2" style="text-align: center;"> <div style="border: 1px solid black; padding: 2px;"> REF.DRG.NO. </div> </td> <td style="text-align: center;"> <div style="border: 1px solid black; padding: 2px;"> 06-03-21 </div> </td> <td style="text-align: center;"> <div style="border: 1px solid black; padding: 2px;"> 16/12/21 </div> </td> <td colspan="4" style="text-align: center;"> <div style="border: 1px solid black; padding: 5px; display: inline-block;"> AAD16884 </div> </td> <td style="text-align: center;"> <div style="border: 1px solid black; padding: 5px; display: inline-block;"> A3 </div> </td> </tr> </table> </div> </div>																1	SCREWING PIECE	Ø 20 X 30	1		AISI 304	0.06		QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.:		WT/ASSY IN Kgs:		<div style="font-size: 1.2em; font-weight: bold;">SCREWING PIECE</div>						SCALE	SSE/D		2:1	CHD	ALT.	ALTD	S K MUTHUKUMAR	-	DRN	<div style="font-weight: bold;">INDIAN RAILWAY STANDARDS</div> <div style="font-size: 0.8em;">INTEGRAL COACH FACTORY, CHENNAI - 600038</div>						<div style="font-size: 0.8em;">SHEET 1 OF 1</div>		<div style="border: 1px solid black; padding: 2px;"> REF.DRG.NO. </div>		<div style="border: 1px solid black; padding: 2px;"> 06-03-21 </div>	<div style="border: 1px solid black; padding: 2px;"> 16/12/21 </div>	<div style="border: 1px solid black; padding: 5px; display: inline-block;"> AAD16884 </div>				<div style="border: 1px solid black; padding: 5px; display: inline-block;"> A3 </div>
1	SCREWING PIECE	Ø 20 X 30	1		AISI 304	0.06																																																																		
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS																																																																	
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.:		WT/ASSY IN Kgs:																																																																		
<div style="font-size: 1.2em; font-weight: bold;">SCREWING PIECE</div>						SCALE	SSE/D																																																																	
						2:1	CHD																																																																	
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<div style="font-weight: bold;">INDIAN RAILWAY STANDARDS</div> <div style="font-size: 0.8em;">INTEGRAL COACH FACTORY, CHENNAI - 600038</div>						<div style="font-size: 0.8em;">SHEET 1 OF 1</div>																																																																		
<div style="border: 1px solid black; padding: 2px;"> REF.DRG.NO. </div>		<div style="border: 1px solid black; padding: 2px;"> 06-03-21 </div>	<div style="border: 1px solid black; padding: 2px;"> 16/12/21 </div>	<div style="border: 1px solid black; padding: 5px; display: inline-block;"> AAD16884 </div>				<div style="border: 1px solid black; padding: 5px; display: inline-block;"> A3 </div>																																																																

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE

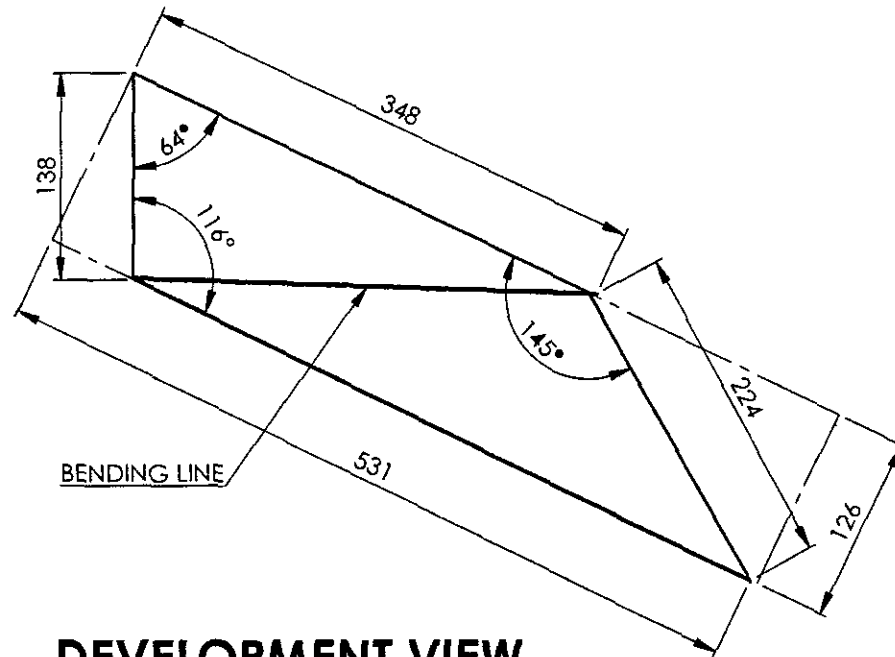
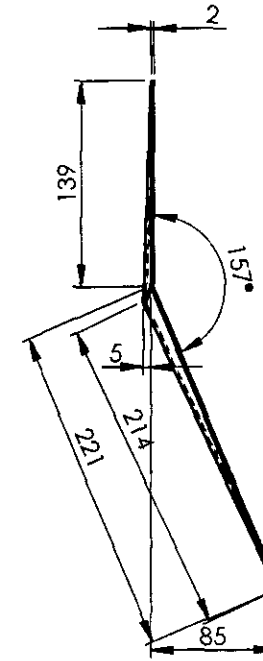
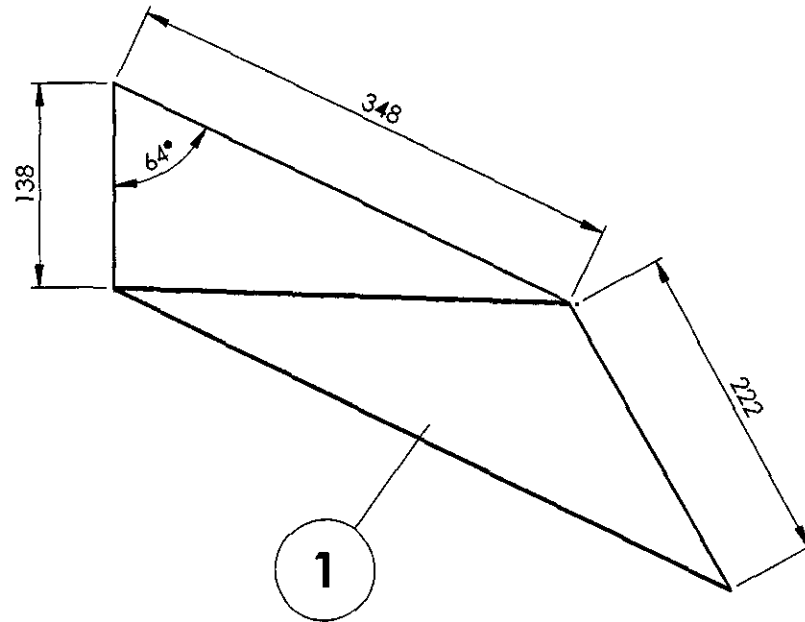


I	SCREWING PIECE	Ø 20 X 30	1		AIISI 304	0.06	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.:			WT/ASSY IN Kgs:		
SCREWING PIECE					SCALE	SSE/D	S. Panduranga Rao
					2:1	CHD	
					ALT.	ALTD	
						DRN	S K MUTHUKUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1			
					AAD16884		A3

AAE16690

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①8 CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		DIMENSION REVISED. VIEWS UPDATED.	V. 12/1



DEVELOPMENT VIEW


1	SIDE SHEET	2 x 126 x 531	1		RDSO SPEC C-K201 X2 Cr Ni 12	865.21	
Default	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.:		WT/ASSY IN Kgs:865.21	
SIDE SHEET					SCALE 1:5	SSE/D CHD	V. 15/12/24
					ALT. a	ALTD DRN	E.SATHISH KUMAR
							E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS					SHEET 1 OF 1		
INTEGRAL COACH FACTORY, CHENNAI - 600038					AAE16690		A3
15-03-24	07-06-23						
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME					

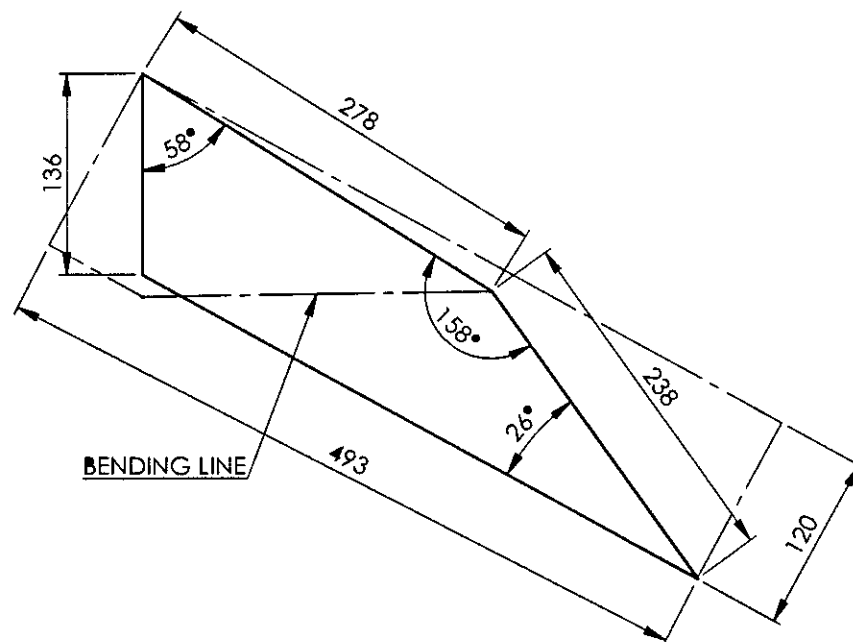
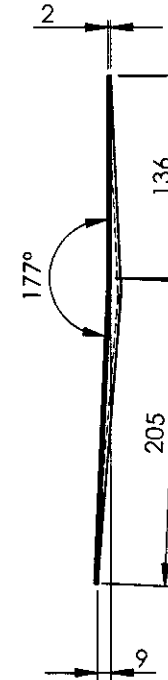
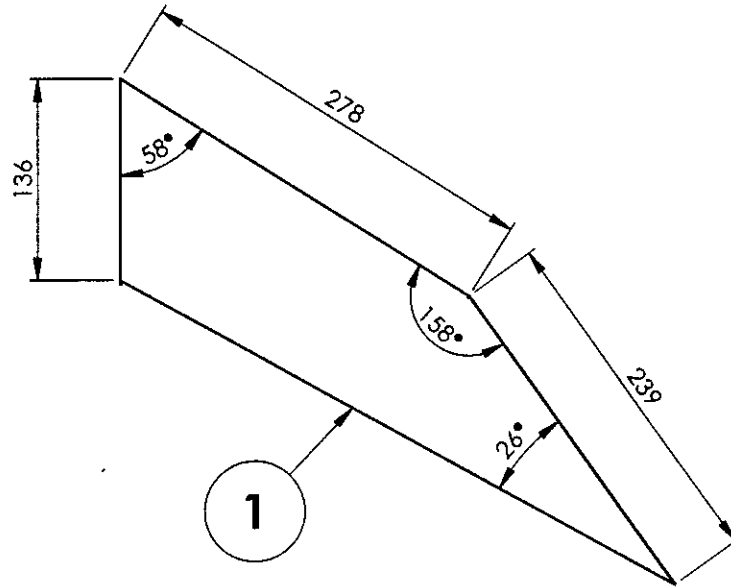
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.-

AAE16691

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①c CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		DIMENSION REVISED. VIEWS UPDATED.	



DEVELOPMENT VIEW

1	SIDE SHEET	2 x 119 x 493	1		RDSO SPEC C-K201 X2 Cr Ni 12	612.89	
Default	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.:		WT/ASSY IN Kgs: 612.89	
SIDE SHEET					SCALE 1:5	SSE/D CHD	V. Sathish Kumar
					ALT. a	ALTD DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038					SHEET 1 OF 1		
					AAE16691		A3

15-03-24	07-06-23	V. Sathish Kumar
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

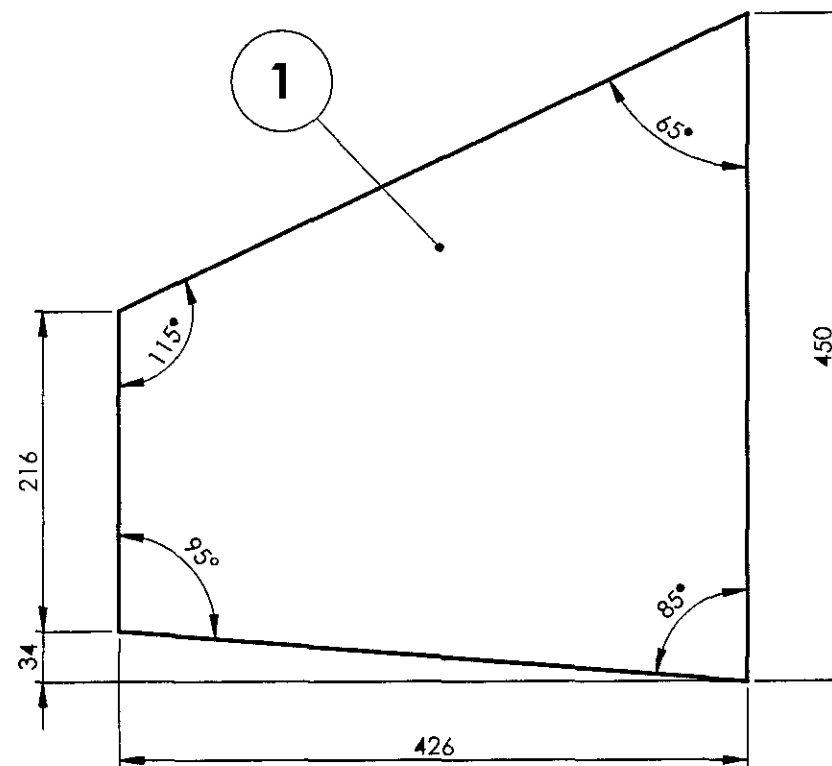
REF.DRG.NO.-

AAE16692

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①8 CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
		DIMENSION REVISED. VIEWS UPDATED.	<i>V. 19/3/24</i>



ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553.
WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY


REF.DRG.NO.-

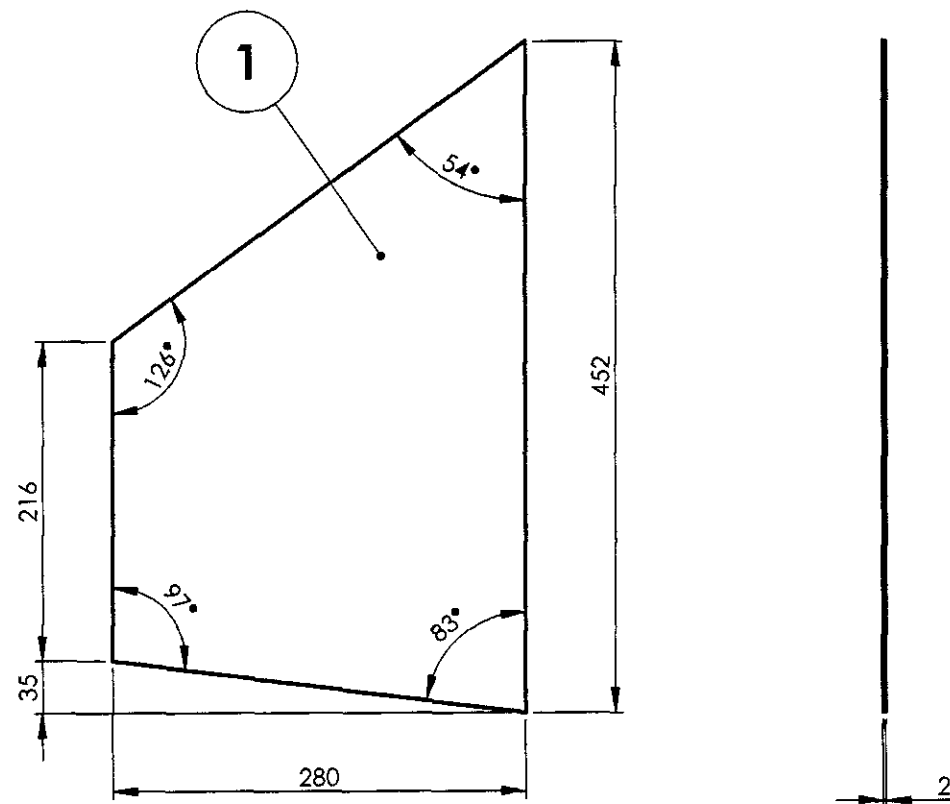
15-03-24	07-06-23	<i>V. 19/3/24</i>
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

1	BOTTOM SHEET	2 x 426 x 450	1		RDSO SPEC C-K201 X2 Cr NI 12	2.27	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.:		WT/ASSY IN Kgs:	
BOTTOM SHEET					SCALE 1:5	SSE/D CHD	<i>L. Panduranga Rao</i>
					ALT. 2	ALTD	E.SATHISH KUMAR
						DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS					SHEET 1 OF 1		
INTEGRAL COACH FACTORY, CHENNAI - 600038					AAE16692		A3

AAE16693

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①⑥ BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①⑧ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		DIMENSION REVISED. VIEWS UPDATED.	 1/2/24



1	TOP SHEET	3 x 280 x 452	1		RDSO SPEC C-K201 X2 Cr Ni 12	1.49	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.:		WT/ASSY IN Kgs:	
TOP SHEET					SCALE 1:5	SSE/D CHD	19/3/24
					ALT. a	ALTD	E.SATHISH KUMAR
						DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS					SHEET 1 OF 1		
INTEGRAL COACH FACTORY, CHENNAI - 600038					AAE16693		A3

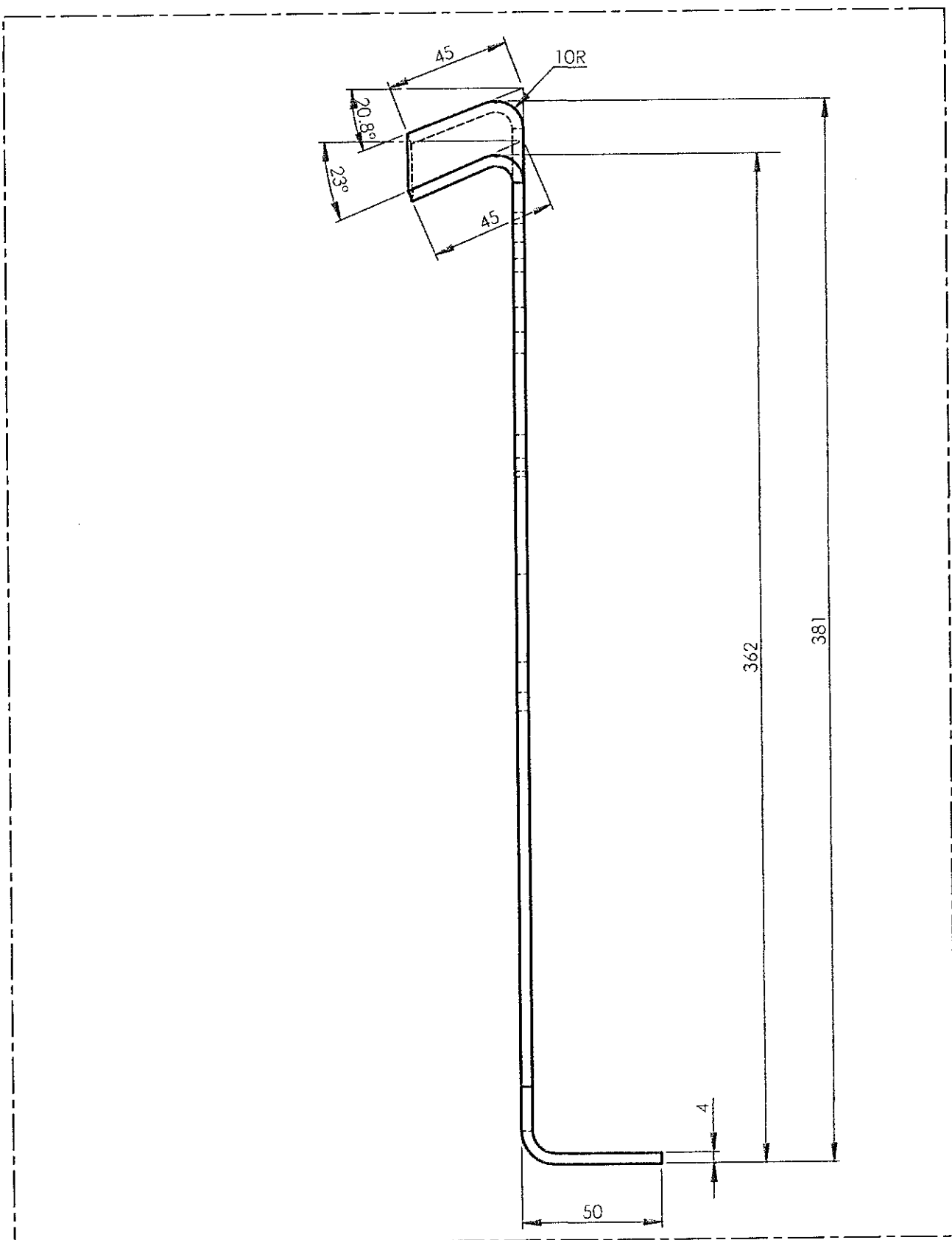
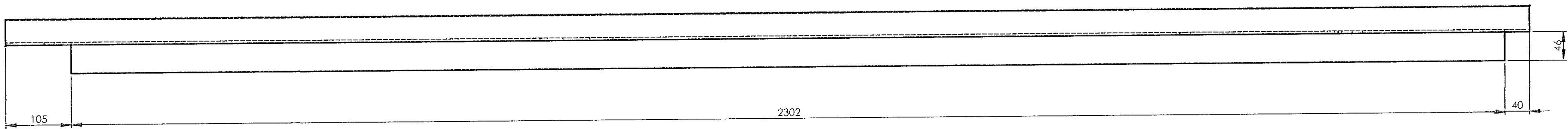
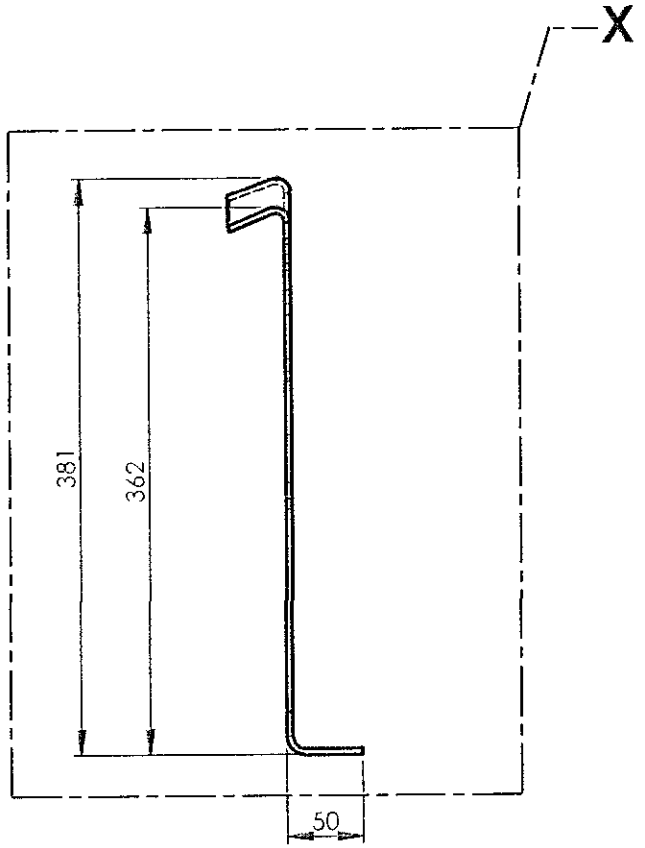
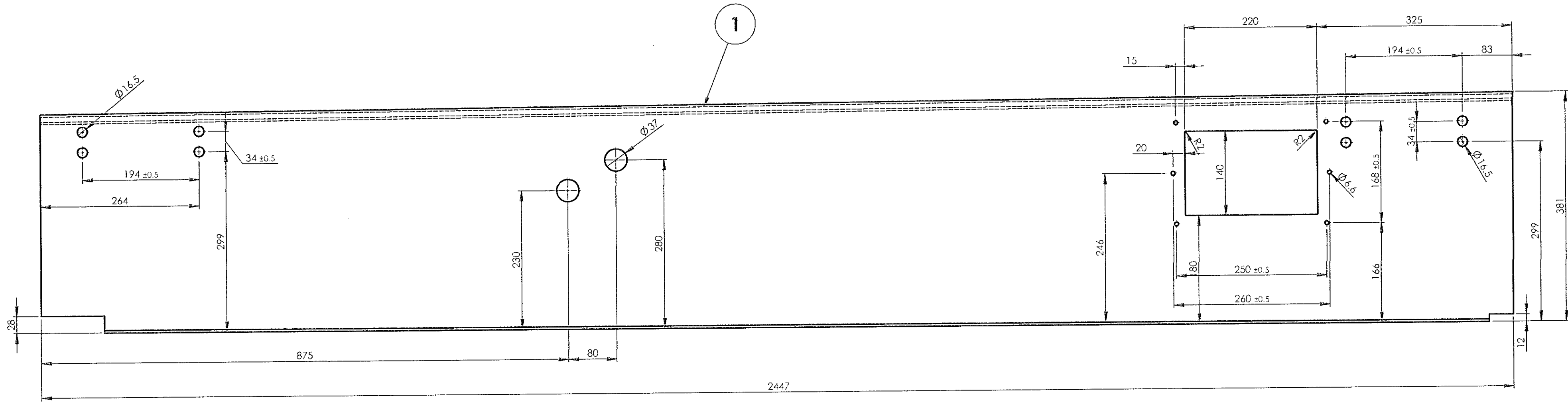
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553.
WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

REF.DRG.NO.-

15-03-24	07-06-23	19/3/24
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

AAF16121

12		13		14		15		16	
▽ ROUGH MACHINED		① ROUGH CLEANED		REVISIONS		APPROVED & DATE			
▽▽ FINISH MACHINED		② BURRS REMOVED		ALT.	ZONE	DESCRIPTION			
▽▽▽ FINE FINISH MACHINED		③ CHAMFERED		a		CUTAWAY ADDED AND VIEWS UPDATED.			



DETAIL X
SCALE 1 : 2

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS 813:1986. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY.

REF.DRG.NO.

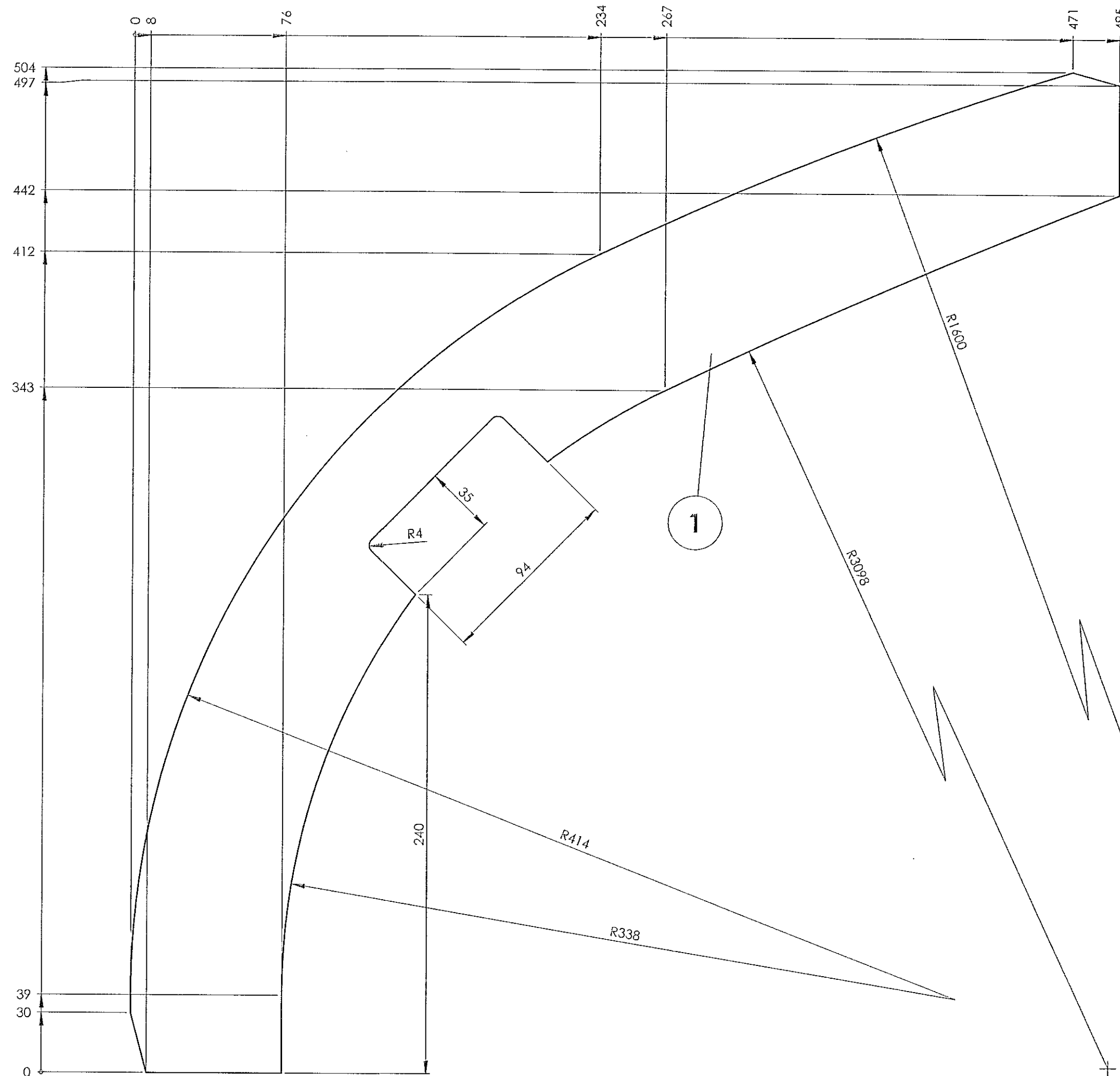
01/01/20	01/09/20	AME/SME
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	

1	MEMBER	4 x 459 x 2447	1		RDSO/SPEC C- K201 X2 GY NI 12	33.764	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 2.139		WT/ASSY IN Kgs:			
MEMBER		SCALE 1:5	SSE/D	CHD	E.SATHISH KUMAR S K MUTHUKUMAR/RAVI		
		ALT. a	ALTD	DRN			
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1	AAF16121 A1		

AAF16158

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①⑤ BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①⑧ CHAMFERED

REVISIONS				APPROVED & DATE	
ALT.	ZONE	DESCRIPTION			



ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:813-1986.

1	ROOF ARCH	4 x 495 x 505	1		RDSO/SPEC C-K201 X2CrNi12	1.623	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.: 0.108		WT/ASSY IN Kgs: 1.623	
ROOF ARCH					SCALE 1:2	SSE/D CHD	E.SATHISH KUMAR
					ALT	ALTD	
						DRN	
INDIAN RAILWAY STANDARDS					SHEET 1 OF 1		
INTEGRAL COACH FACTORY, CHENNAI - 600038					AAF16158		
					A2		

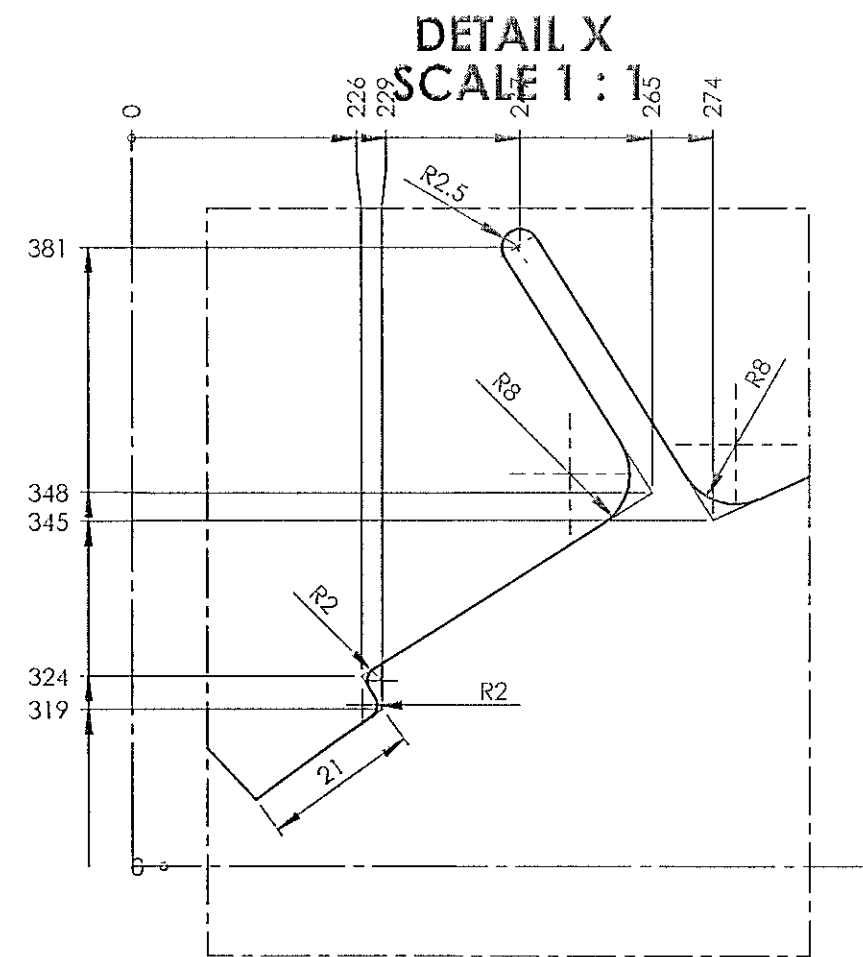
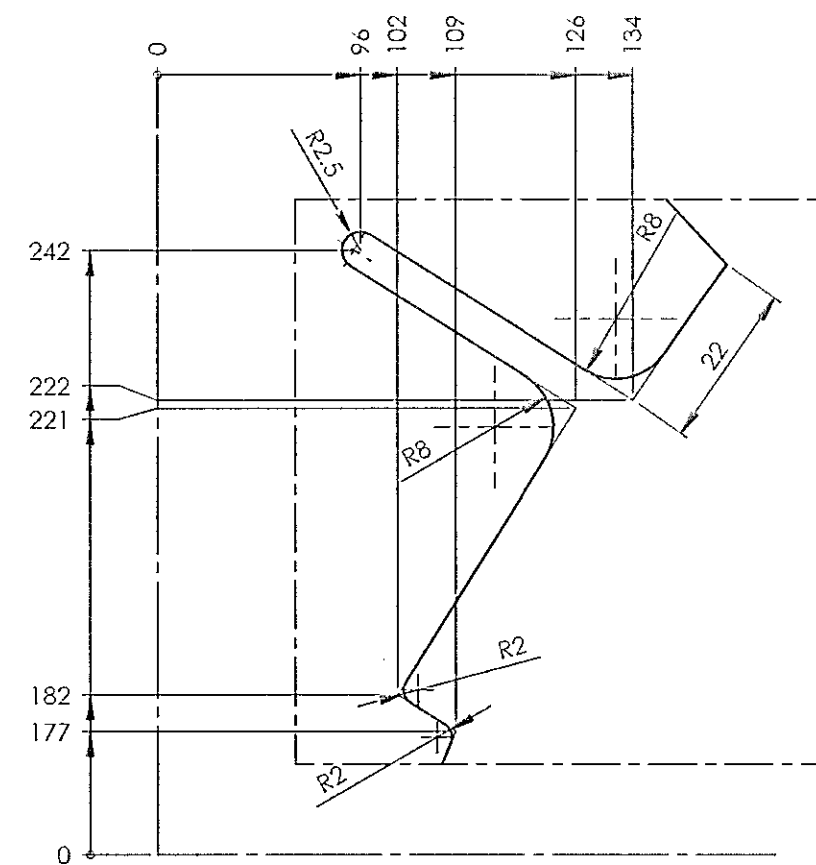
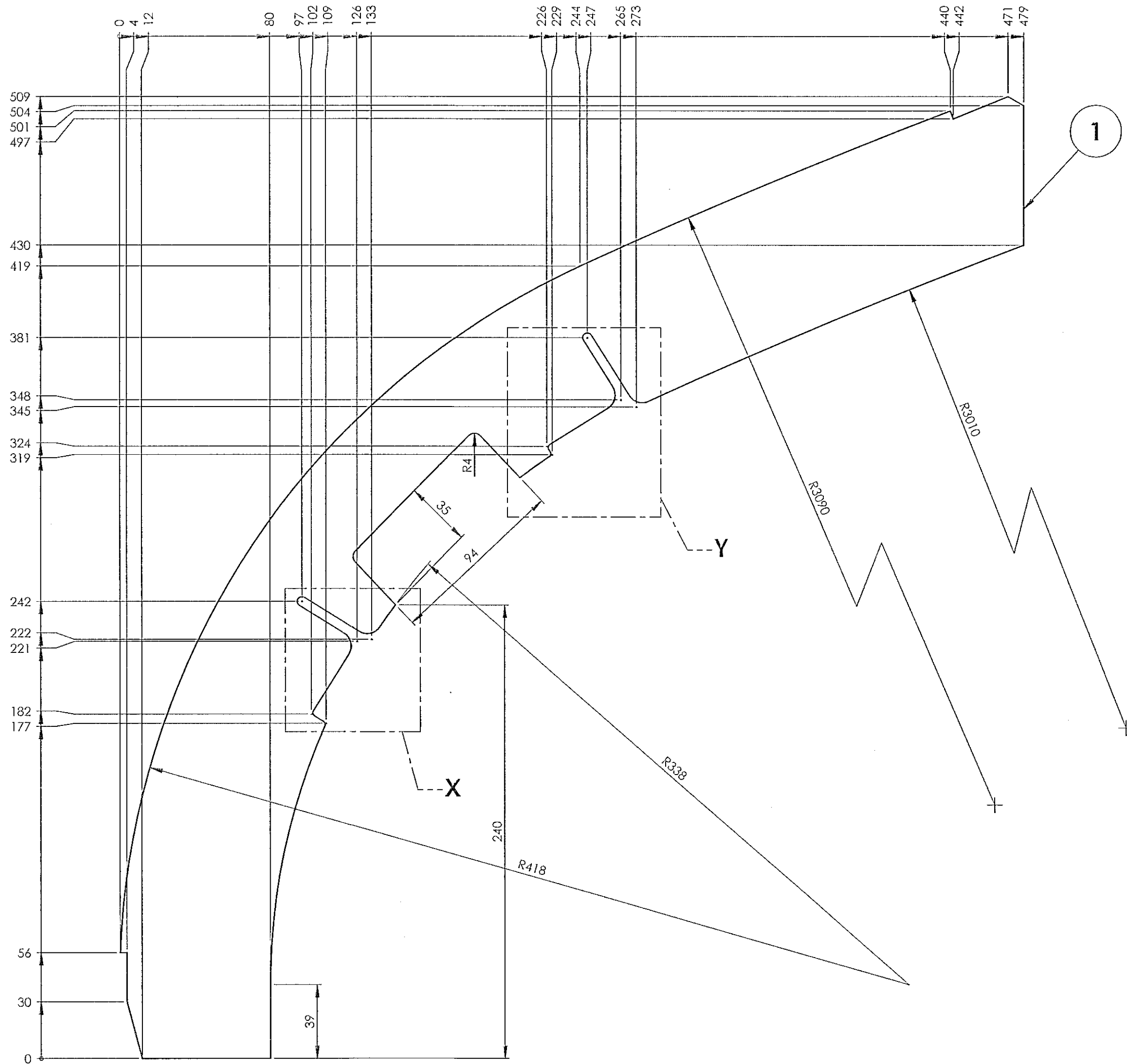
REF.DRG.NO.2 10113.0.20.210.103

DATE OF LATEST ALT.	04/09/25	AME/SME
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AAF16159

▽ ROUGH MACHINED	01 ROUGH CLEANED
▽▽ FINISH MACHINED	01a BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	01b CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



DETAIL Y
SCALE 1 : 1

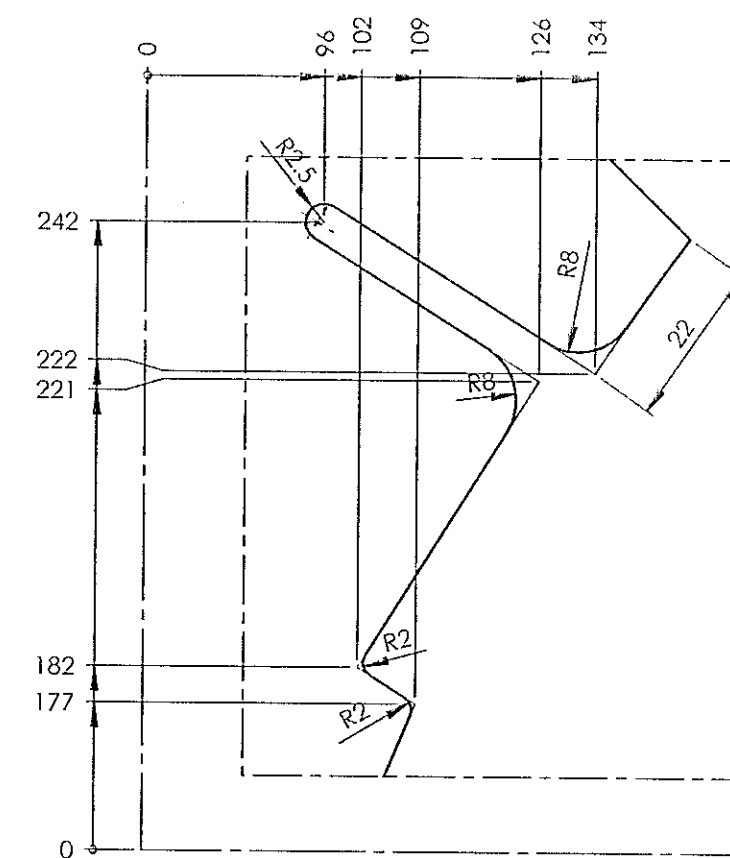
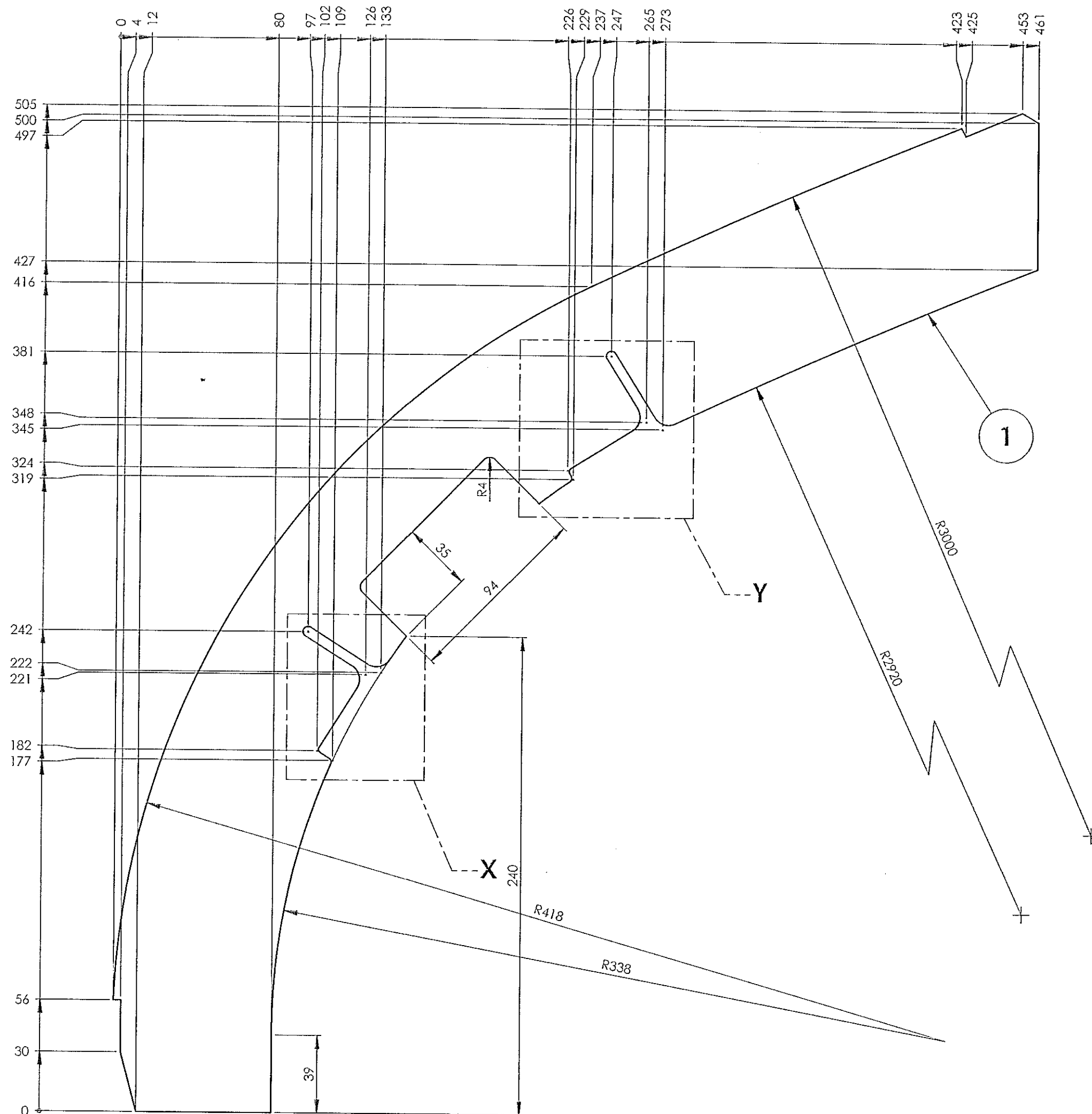
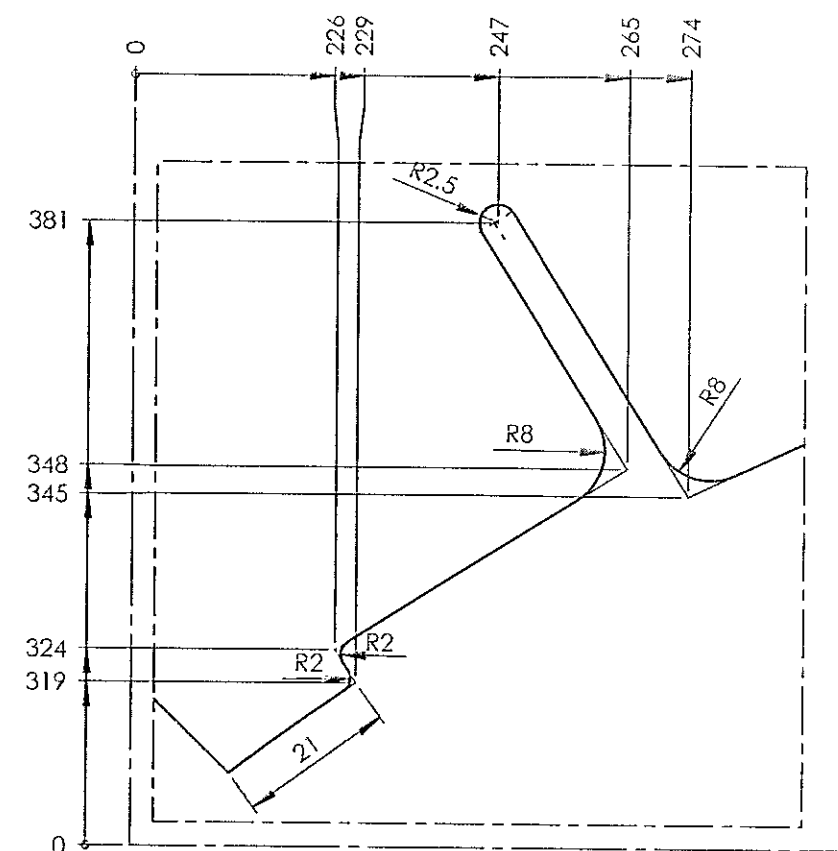
1	ROOF ARCH	4 x 479 x 508.5	1		RDSO/SPEC C-K201 X2CrNi12	1.660		
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	
GROUP: I-6 Roof Construction		SURFACE AREA IN Sq.m.: 0.111			WT/ASSY IN Kgs:			
ROOF ARCH					SCALE 1:2	SSE/D	H. Sathish Kumar	
						CHD		
					ALT	ALTD		
						DRN		E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038					E.SATHISH KUMAR			
					SHEET 1 OF 1			
					AAF16159			A2

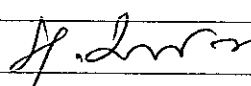
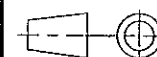
REF.DRG.NO.2 10113.0.20.210.112

AAFI16160

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS				APPROVED & DATE
ALT.	ZONE	DESCRIPTION		

DETAIL X
SCALE 1 : 1DETAIL Y
SCALE 1 : 1

1	ROOF ARCH	4 x 462 x 505	1		RDSO/SPEC C-K201 X2CrNi12	1.614		
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 0.108			WT/ASSY IN Kgs:			
ROOF ARCH					SCALE 1:2	SSE/D		
						CHD		
					ALT	ALTD		
						DRN		E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038								
					SHEET 1 OF 1			
					AAF16160		A2	

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

REF.DRG.NO.

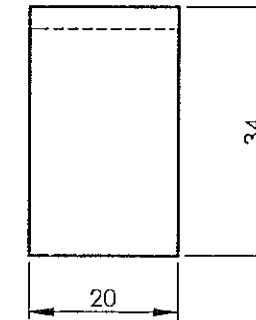
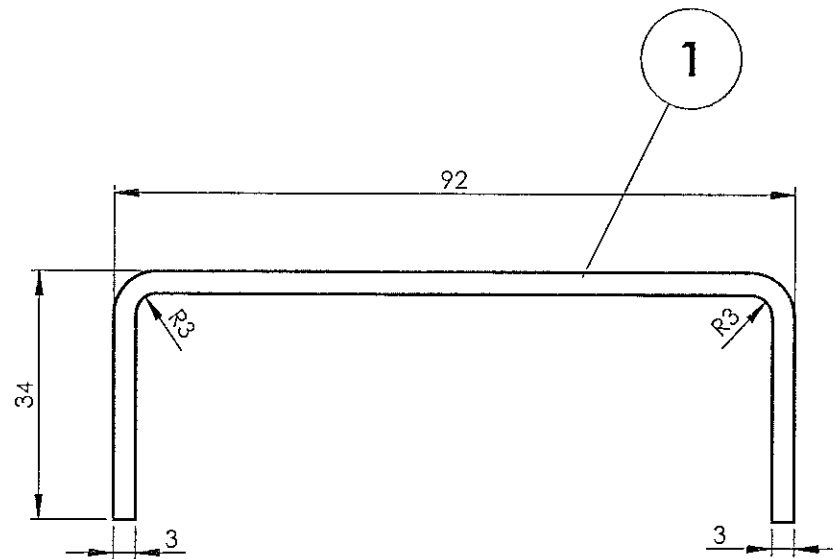
DATE OF LATEST ALT.	04/09/25	AME/SME
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AAF16161

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①8 CHAMFERED

REVISIONS

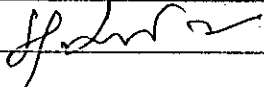
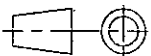
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
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ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO IC/STD-9-0-001.
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WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

REF.DRG.NO.-

-	04/09/25	<i>[Signature]</i>
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

1	BACK PIECE	3x20x148	1		RDSO SPEC C-K201 X2 Cr NI 12	0.07	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.:			WT/ASSY IN Kgs:		
BACK PIECE					SCALE 1:1	SSE/D	
						CHD	
					ALT.	ALTD	
						DRN	VIJAYAKUMAR R
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1			
					AAF16161		A3

AAf16201		▽ ROUGH MACHINED		⊖ ROUGH CLEANED		REVISIONS			
		▽▽ FINISH MACHINED		⊖⊖ BURRS REMOVED		ALT.		ZONE	
		▽▽▽ FINE FINISH MACHINED		⊖⊖⊖ CHAMFERED		DESCRIPTION		APPROVED & DATE	

Technical drawing of a plate with dimensions and a side view. The main view shows a plate with a circular feature on the left and a rectangular feature on the right. Dimensions include 136, 73, 190, 70, 166, 113, 110, 235, 348, 82, 31, 60, 7.5, 30, 30, 45°, 7.5, 116.5, 128, 50, 101, 4, 136, 73, 190, 70, 166, 113, 110, 235, 348, 82, 31, 60, 7.5, 30, 30, 45°, 7.5, 116.5, 128, 50, 101, 4. A side view shows a plate with a thickness of 4 mm.

1	PLATE	4 x 136 x 348	1		RDSO/SPEC C-K201 X2CrNi12	0.610	
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 0.043		WT/ASSY IN Kgs:			
PLATE				SCALE 1:2	SSE/D	H. Duran	
					CHD		
				ALT	ALTD		
				DRN	E.SATHISH KUMAR		
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		AAf16201	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A2	

DATE OF LATEST ALT. 04/09/25

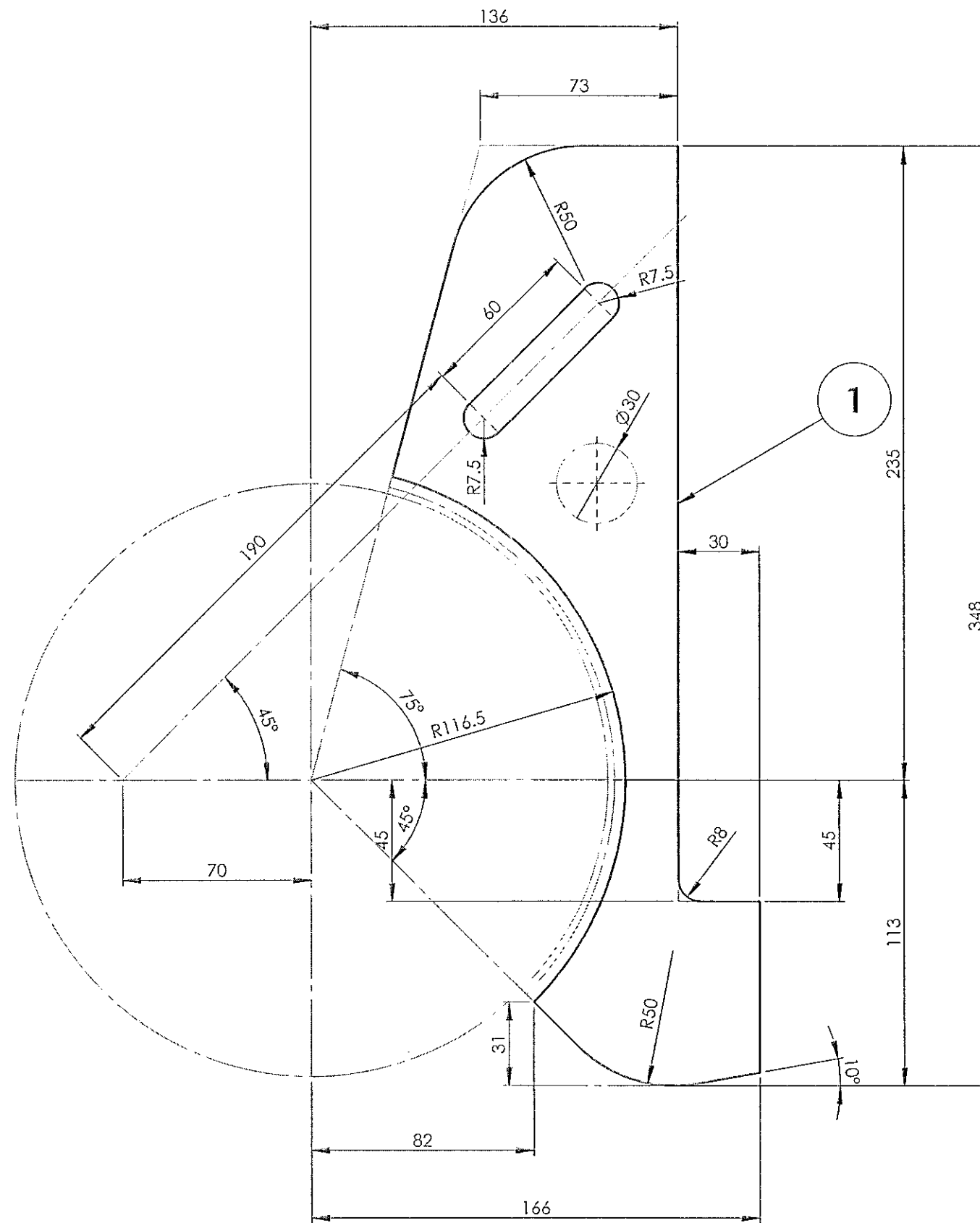
DATE OF FIRST ISSUE 1/11/2024

AME/SME

1	PLATE	4 x 136 x 348	1		RDSO/SPEC C- K201 X2CrNi12	0.610		
QTY	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 0.043			WT/ASSY IN Kgs:			
PLATE					SCALE 1:2	SSE/D CHD	<i>H. Duran</i>	
					ALT	ALTD		
						DRN	ESATHISH KUMAR	
					INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038			
				SHEET 1 OF 1	AAF16201		A2	


H	G	F	E	D
<p>ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001.</p> <p>ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER BS/13-1786.</p>				

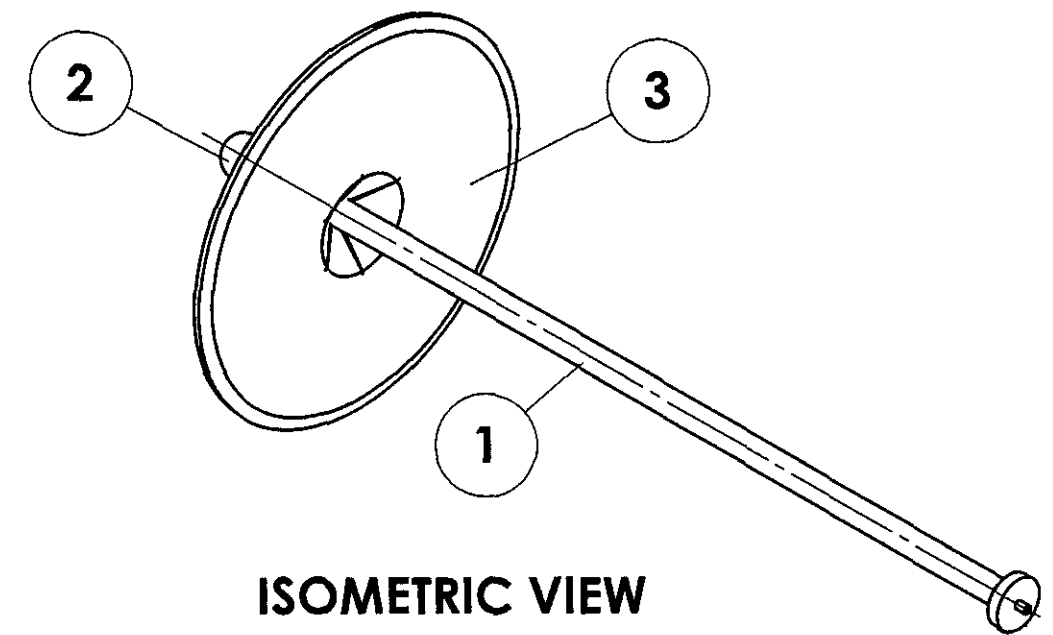
	04/09/25	<i>[Signature]</i>
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

REF.DRG.NO.-

49516008

▽ ROUGH MACHINED	01 ROUGH CLEANED
▽▽ FINISH MACHINED	01b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	18 CHAMFERED

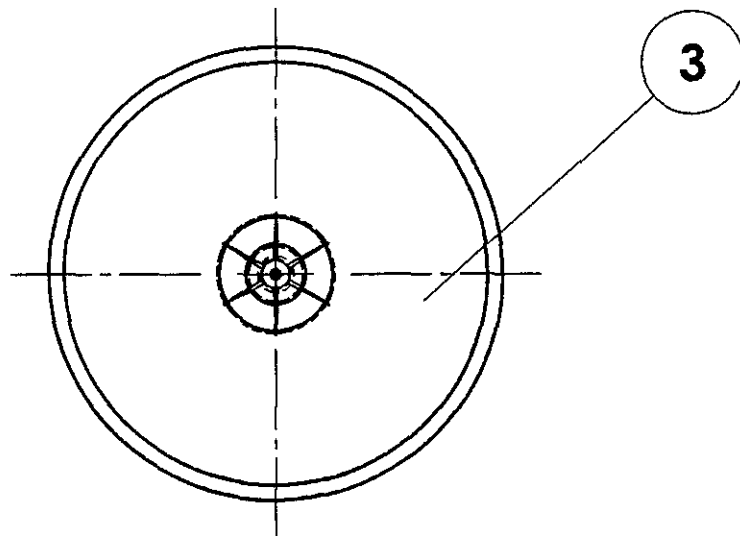
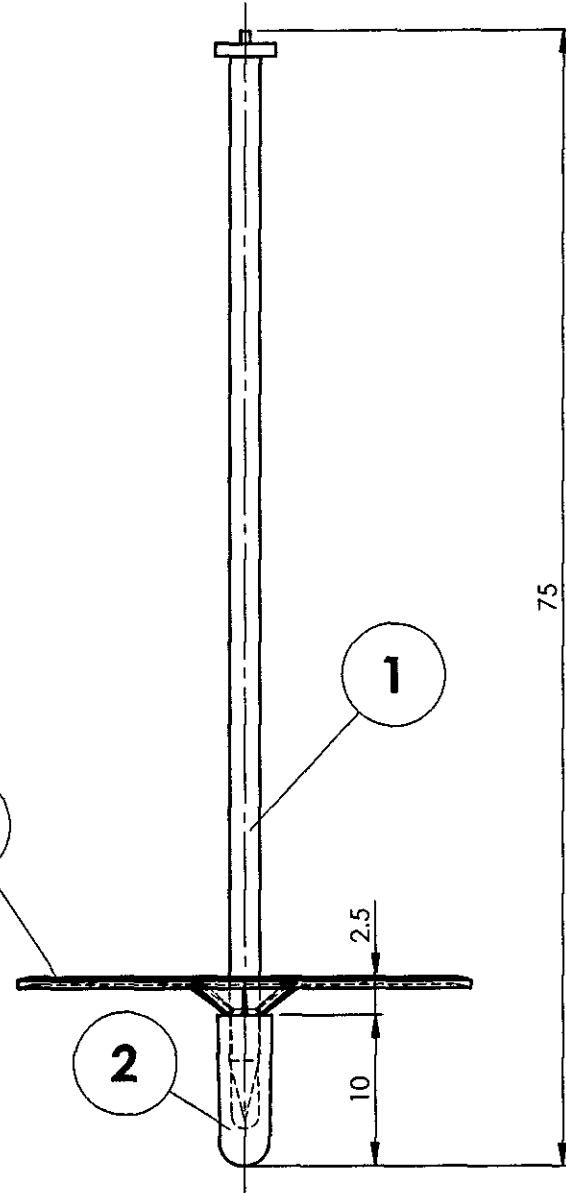
REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		NOTE REVISED. VIEWS UPDATED AS PER DETAIL.	



ISOMETRIC VIEW

NOTE:

- ITEM-1 TO BE RESISTANCE WELDED AS SHOWN IN THE RESPECTIVE DRAWING AND ITEMS-2&3 TO BE SUPPLIED IN LOOSE (TO BE ASSEMBLED IN FURNISHING AFTER INSERTING THERMAL INSULATION).
- 5% EXCESS QTY OF ITEMS-2&3 TO BE SUPPLIED AGAINST THE QTY CALLED FOR IN THE RESPECTIVE ASSEMBLY DRAWINGS.



1	SERRATED SPRING WASHER		3	AAA16495		0.003	
1	CAP		2	AAA16494		0.000	
1	WELDING PIN		1	AAA16493		0.002	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS

GROUP: 1-6 ROOF CONSTRUCTION

SURFACE AREA IN Sq.m.:0.002

WT/ASSY IN Kgs:

WELDING PIN ASSEMBLY

SCALE 1:1	SSE/D CHD	
ALT. a	ALTD DRN	A.Palanichamy 3D:A.Palanichamy 2D:P.Murugan

INDIAN RAILWAY STANDARDS

INTEGRAL COACH FACTORY, CHENNAI - 600038

SHEET 1 OF 1

LWGSCWAC2

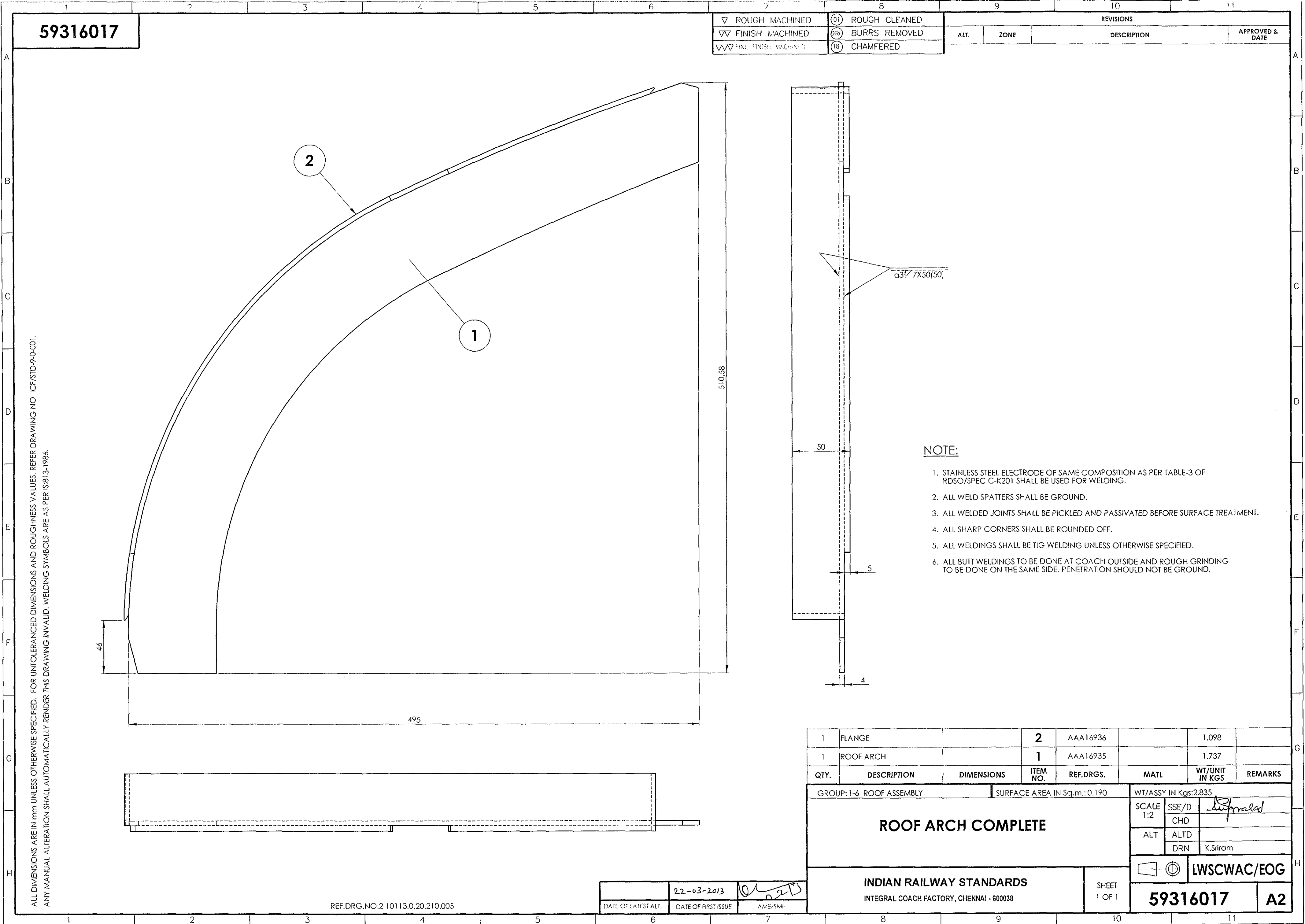
49516008

A3

06-02-2024	19-07-2013	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

REF.DRG.NO.mi005176

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59316017

▽ ROUGH MACHINED	(01) ROUGH CLEANED
▽▽ FINISH MACHINED	(01b) BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	(18) CHAMFERED

REVISIONS				APPROVED & DATE	
ALT.	ZONE	DESCRIPTION			

NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. ALL BUTT WELDINGS TO BE DONE AT COACH OUTSIDE AND ROUGH GRINDING TO BE DONE ON THE SAME SIDE. PENETRATION SHOULD NOT BE GROUND.

1	FLANGE		2	AAA16936		1.098	
1	ROOF ARCH		1	AAA16935		1.737	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY				SURFACE AREA IN Sq.m.: 0.190		WT/ASSY IN Kgs: 2.835	
ROOF ARCH COMPLETE					SCALE 1:2	SSE/D	<i>Supraled</i>
					CHD		
					ALT	ALTD	
					DRN		K.Sriram
INDIAN RAILWAY STANDARDS					LWSCWAC/EOG		
INTEGRAL COACH FACTORY, CHENNAI - 600038					SHEET 1 OF 1		
					59316017		A2

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS 813-1986.

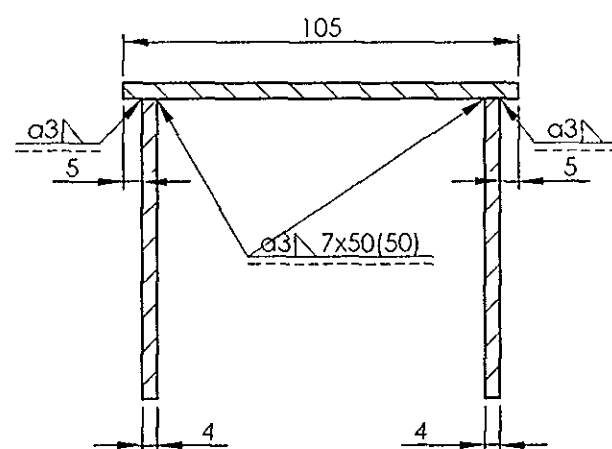
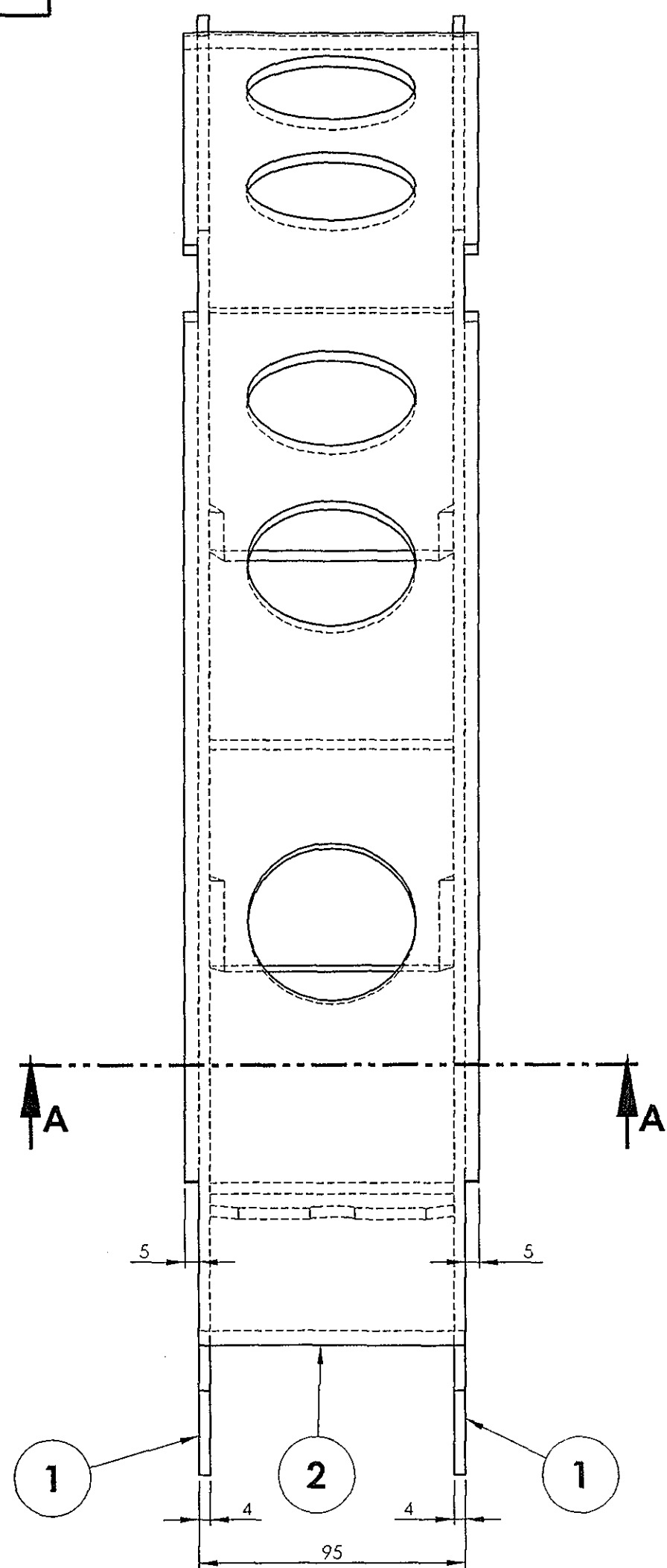
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22-03-2013	22-03-2013	AME/SAM
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SAM

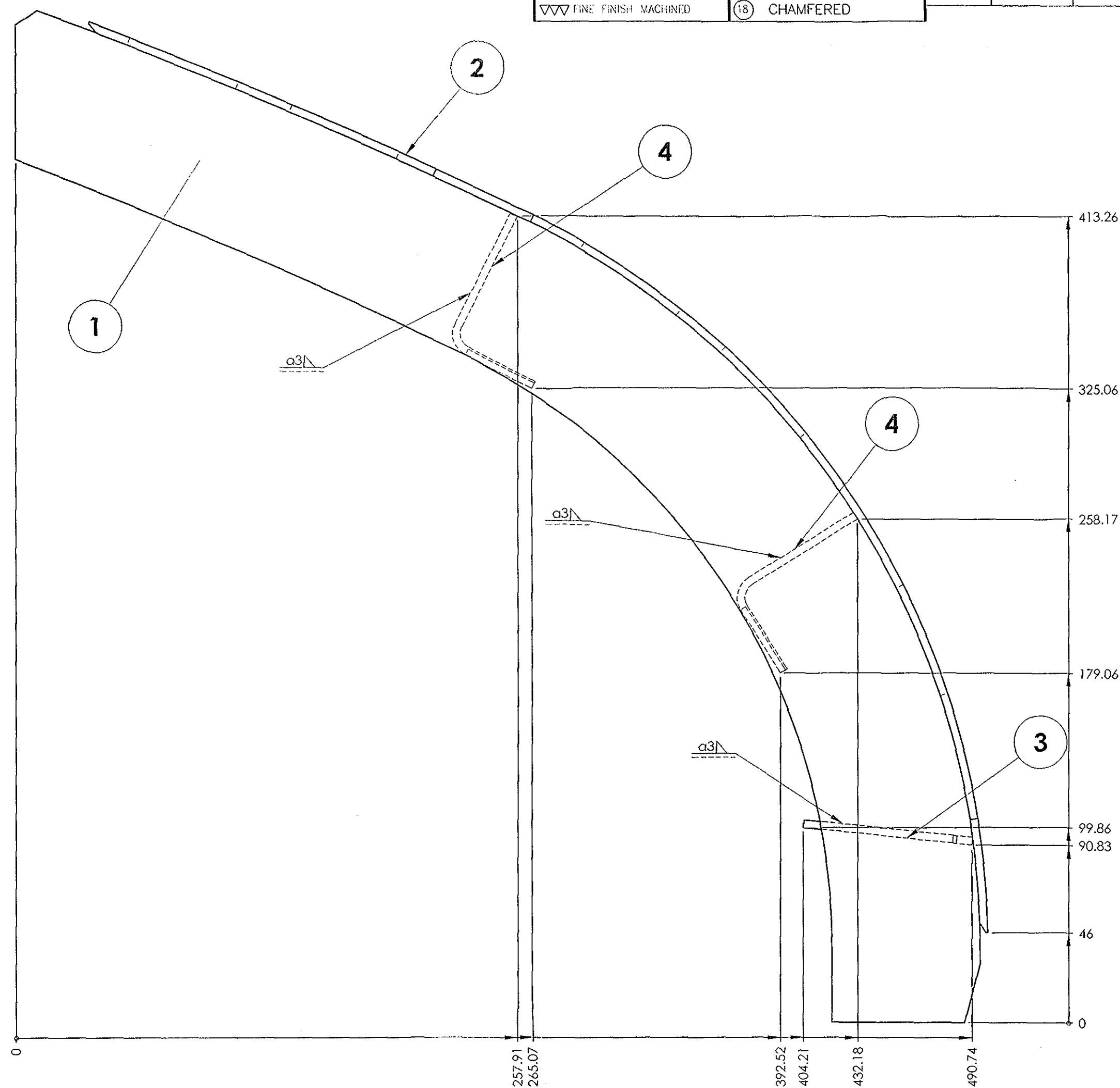
59316018

▽ ROUGH MACHINED	01 ROUGH CLEANED
▽▽ FINISH MACHINED	01b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	18 CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



SECTION A-A
SCALE 1:2



NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. ALL BUTT WELDINGS TO BE DONE AT COACH OUTSIDE AND ROUGH GRINDING TO BE DONE ON THE SAME SIDE. PENETRATION SHOULD NOT BE GROUND.

2	STIFFENING ANGLE		4	AAA16940		0.322	
1	WEB		3	AAA16939		0.236	
1	FLANGE		2	AAA16938		1.864	
2	ROOF ARCH		1	AAA16937		1.758	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS

GROUP: 1-6 ROOF ASSEMBLY				SURFACE AREA IN Sq.m.: 0.420		WT/ASSY IN Kgs: 6.260	
ROOF ARCH COMPLETE				SCALE 1:5	SSE/D CHD		
				ALT	ALTD		
				DRN	DRN		

INDIAN RAILWAY STANDARDS
INTEGRAL COACH FACTORY, CHENNAI - 600038

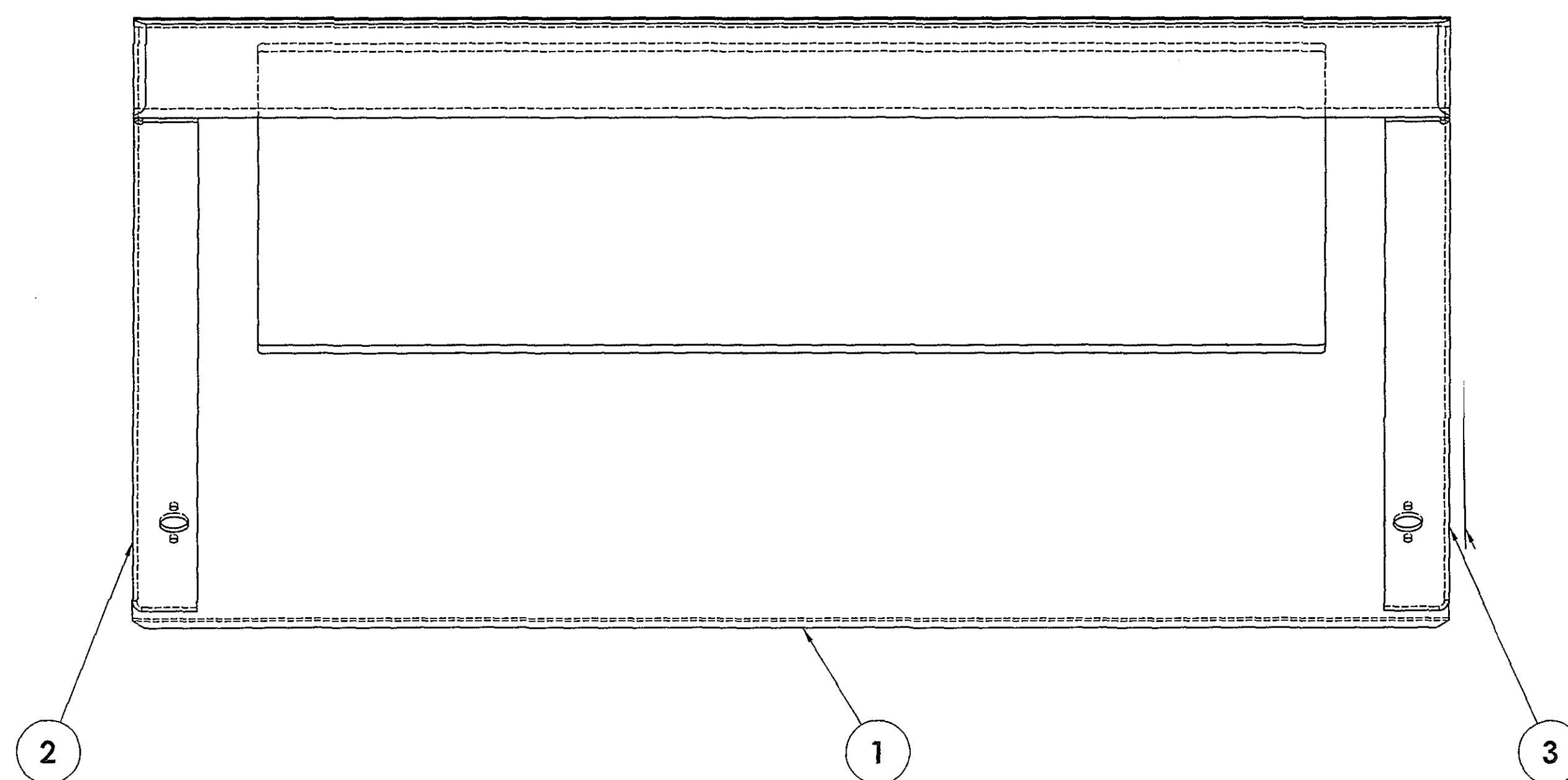
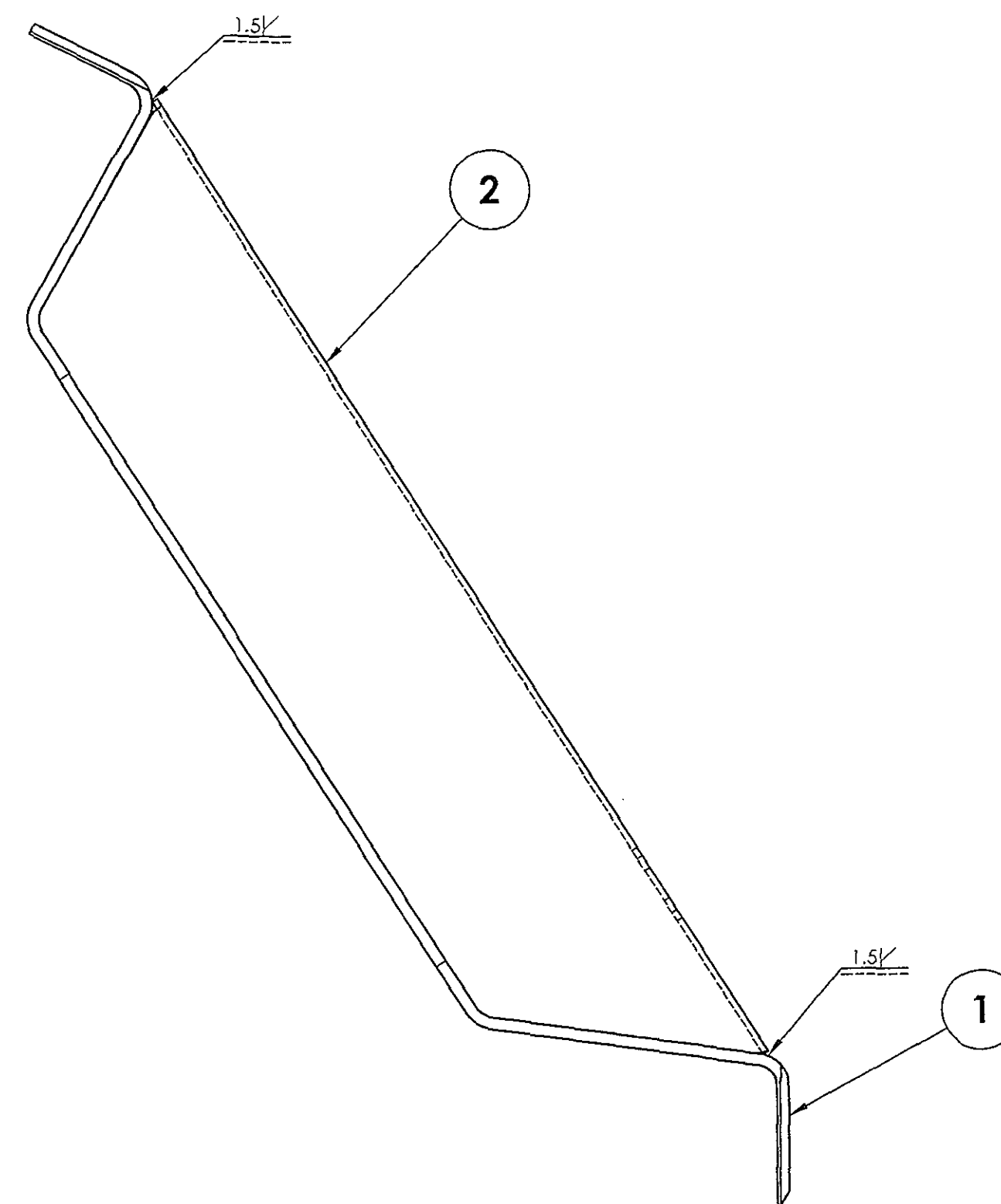
SHEET
1 OF 1

LWSCWAC/EOG	
59316018	A2

DATE OF LATEST ALT.	22-03-2013	DATE OF FIRST ISSUE	16-02-13	AME/SME
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REF.DRG. NO. 2 10113.0.20.210.006

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:813-1986.



1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. ALL BUTT WELDINGS TO BE DONE AT COACH OUTSIDE AND ROUGH GRINDING TO BE DONE ON THE SAME SIDE, PENETRATION SHOULD NOT BE GROUND.

1			3	AAA16943		0.069	
1	CLOSING ANGLE		2	AAA16942		0.056	
1	TERMINAL FRAME		1	AAA16941		6.658	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY			SURFACE AREA IN Sq.m.: 0.575		WT/ASSEMBLY IN Kgs: 7.769		
LOCATION FRAME COMPLETE					SCALE	SSE/D	<i>Signature</i>
					1:2	CHD	
					ALT.	ALTD	
					DRN	K.Sriram	
					INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038		

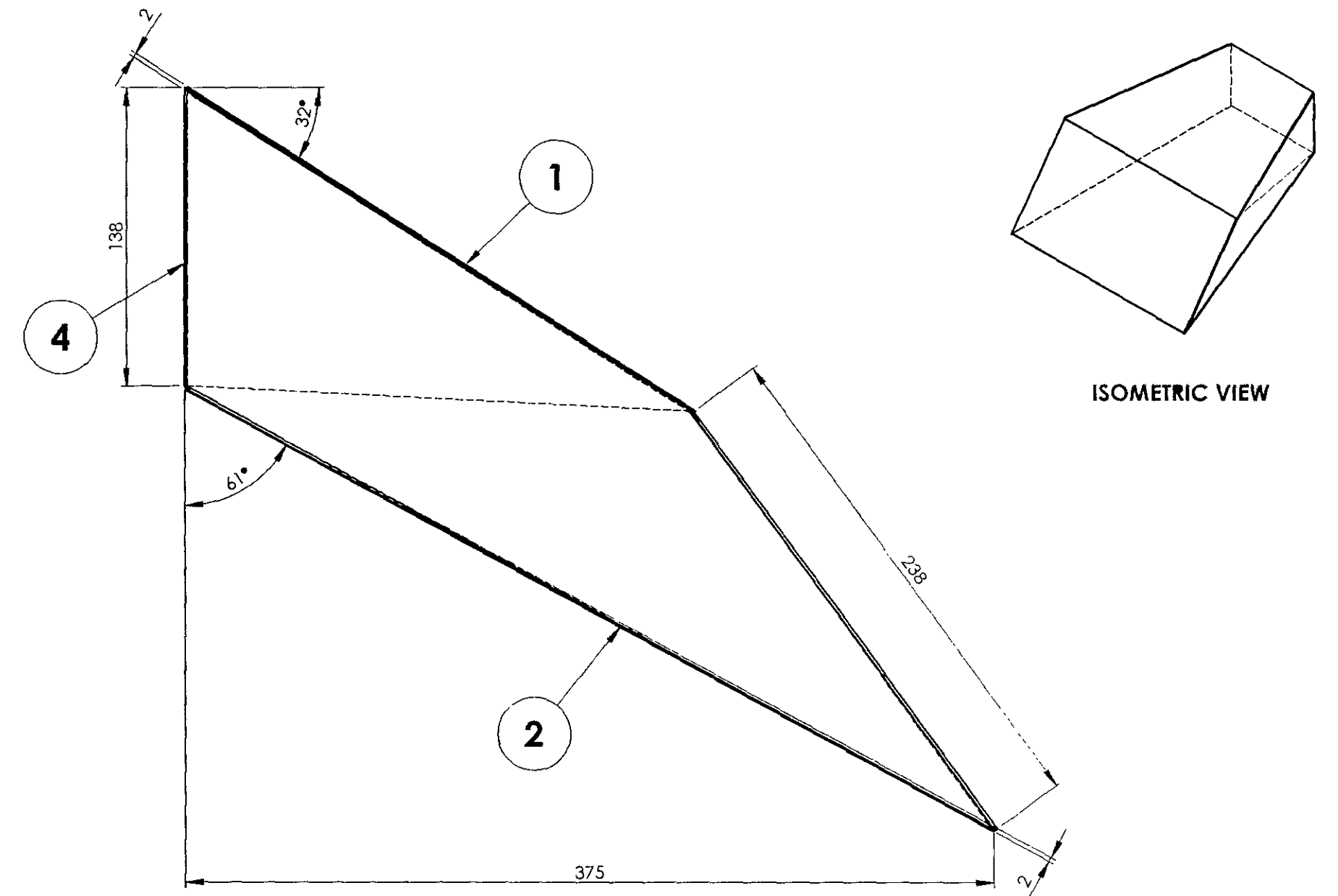
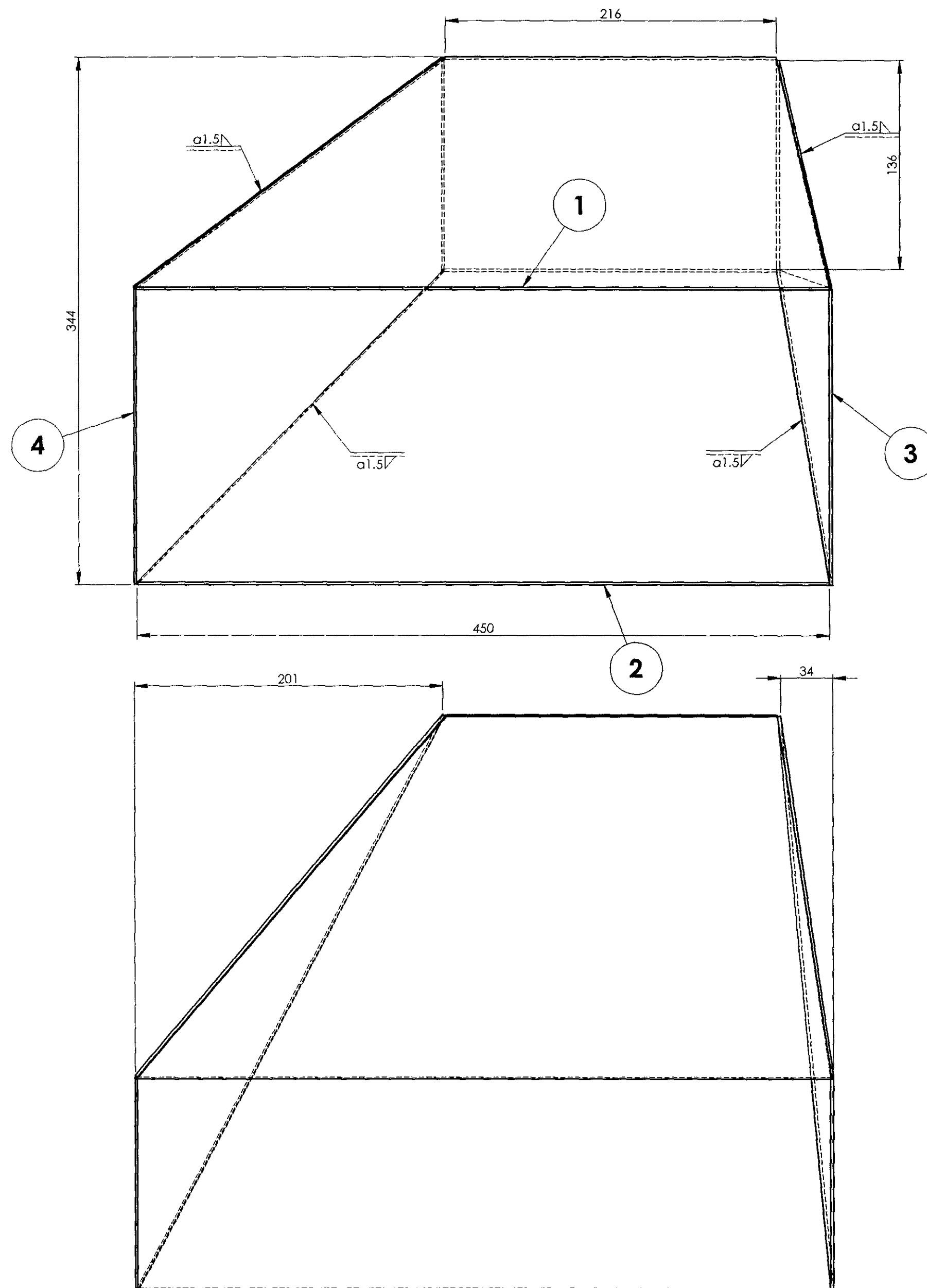
59316056

▽ ROUGH MACHINED
▽▽ FINISH MACHINED
▽▽▽ FINE FINISH MACHINED

① ROUGH CLEANED
② BURRS REMOVED
③ CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		SUCTION PIPE MODIFIED AND VIEWS UPDATED.	V. 14/6/24



ISOMETRIC VIEW

NOTE:-

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC. CK-201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
4. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
5. ALL WELDING SHALL BE OF TIG UNLESS OTHERWISE SPECIFIED.
6. ALL WELD PERFORMANCE CLASS SHALL BE CP C2 UNLESS OTHERWISE SPECIFIED.
7. FOR WELD TESTING PREFERENCES REFER DRG. No. ICF/STD-9-0-998.
8. FOR WELD PROCEDURE SPECIFICATION REFER DRG. No. ICF/STD-9-0-999.

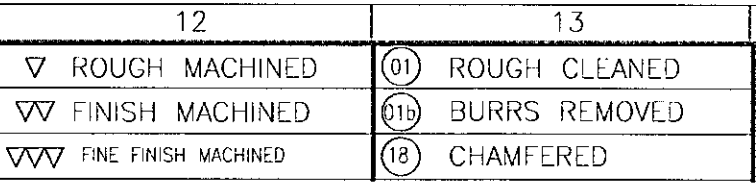
1	SIDE SHEET		4	AAE16686		0.845	
1	SIDE SHEET		3	AAE16687		0.613	
1	BOTTOM SHEET		2	AAE16688		2.269	
1	TOP SHEET		1	AAE16689		1.492	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: I-6 Roof Construction				SURFACE AREA IN Sq.m.: 0.665		WT/ASSY IN Kgs: 5.239	
SUCTION PIPE COMPLETE				SCALE 1:2.5	SSE/D CHD	A. Pankaj Singh	
				ALT a	ALTD DRN	E.SATHISH KUMAR	
						E.SATHISH KUMAR	
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		59316056	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A2	

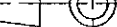
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REF.DRG.NO.2 10113.0.20.200.007

15-03-24	07-06-23	V. 14/6/24
DATE OF LATEST ALT	DATE OF FIRST ISSUE	AME/SME

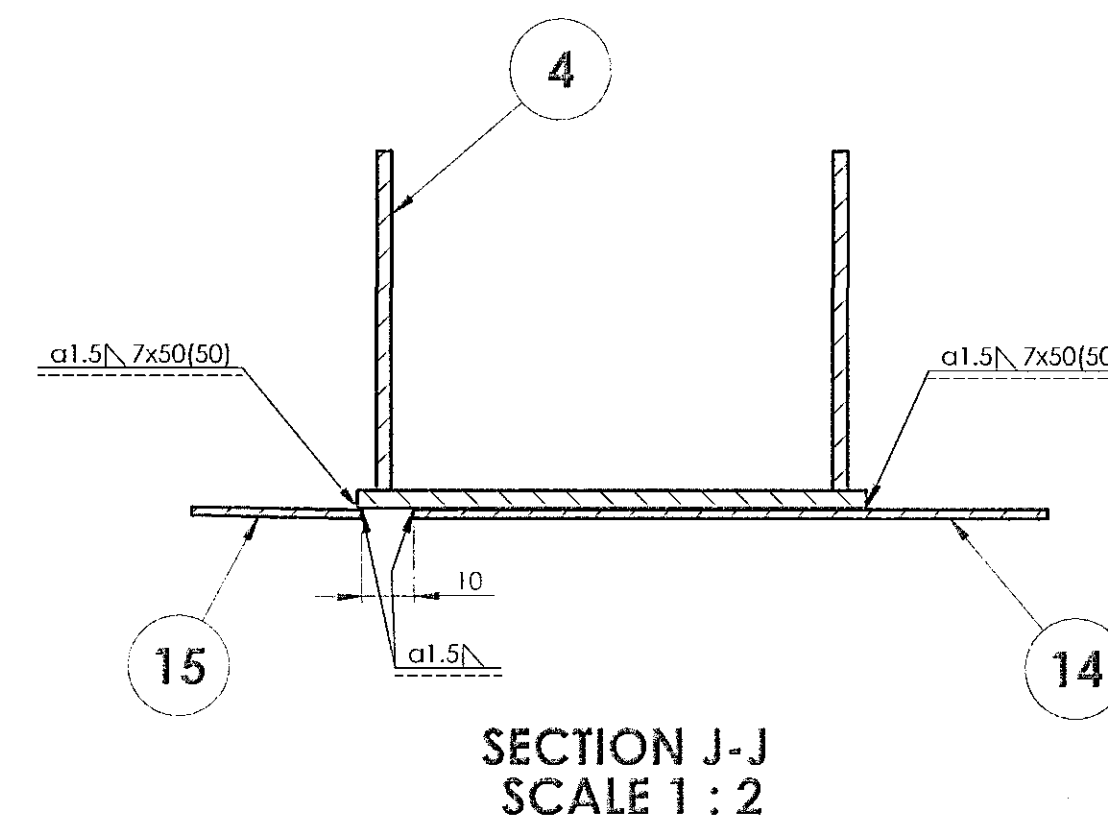
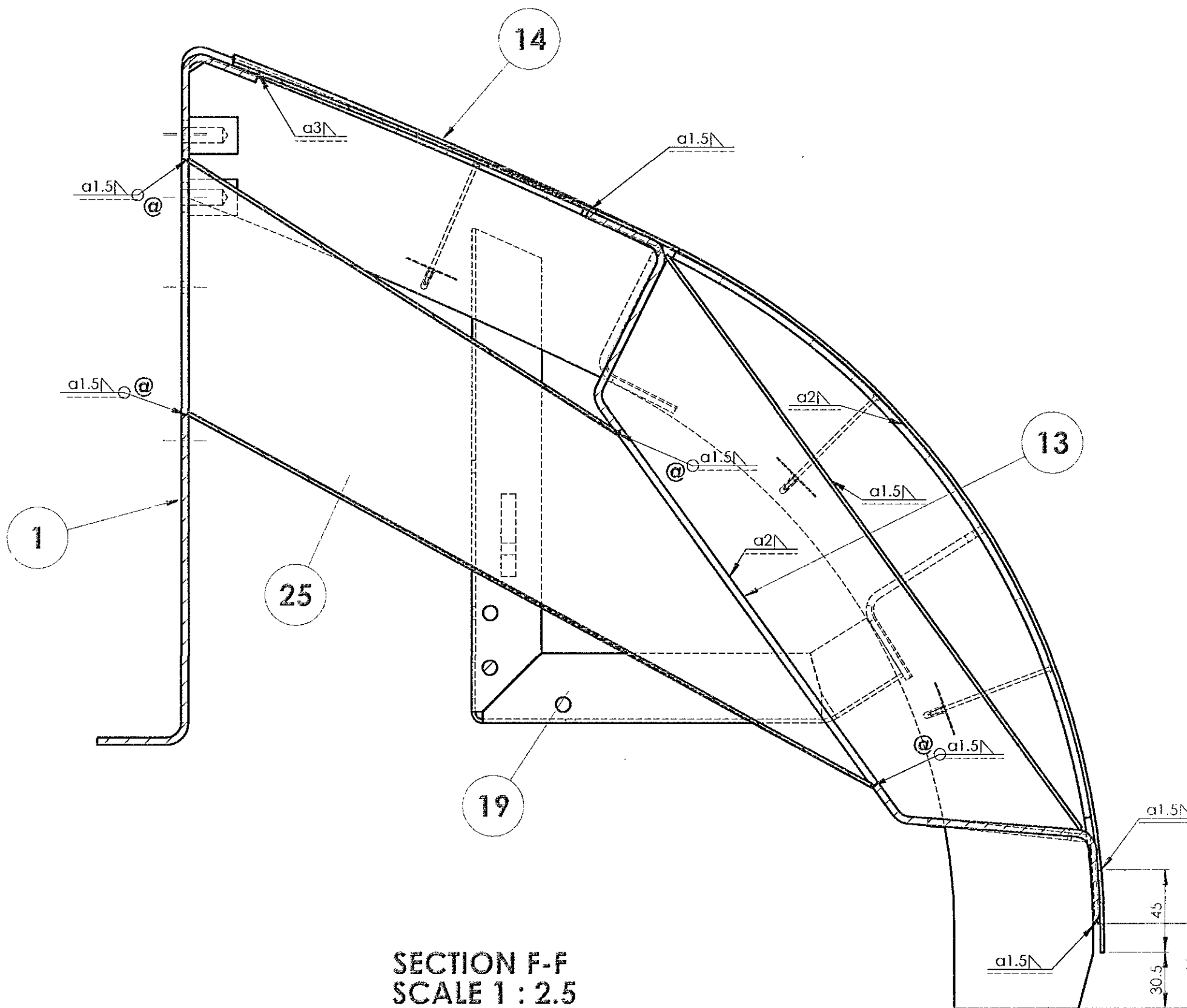
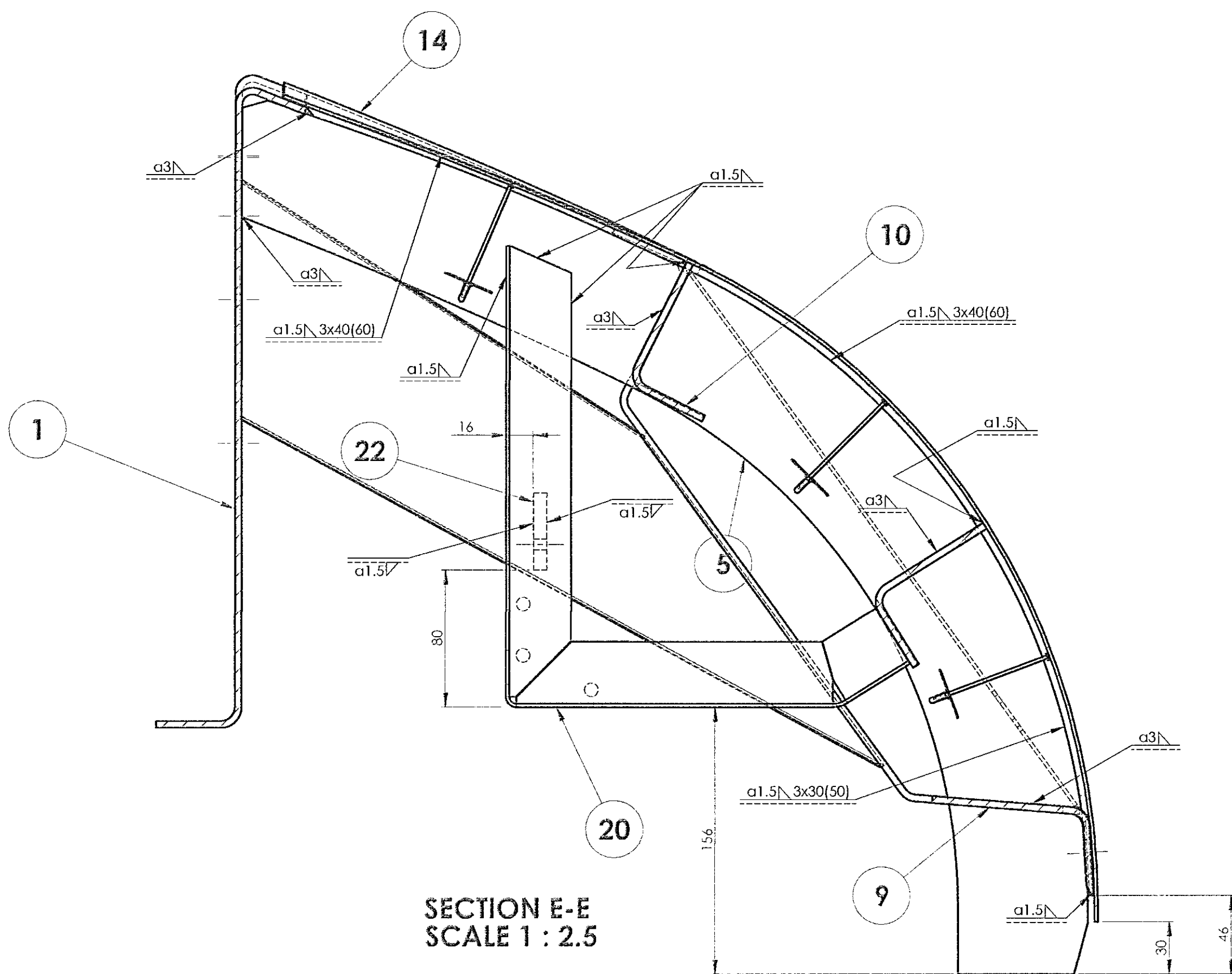
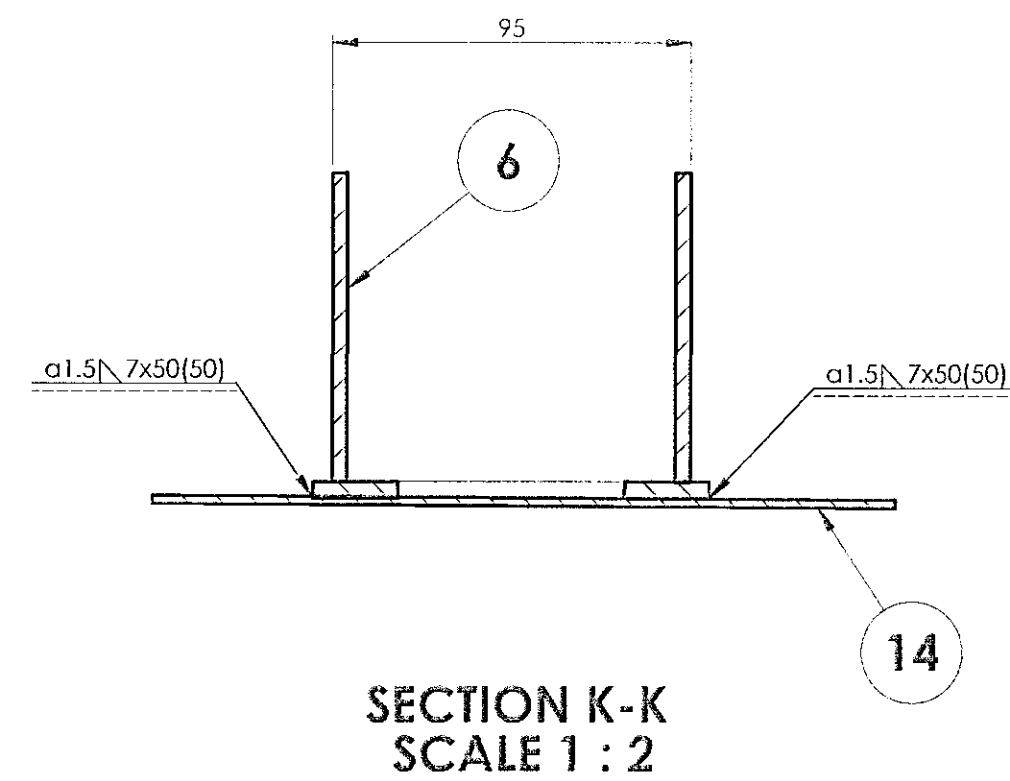
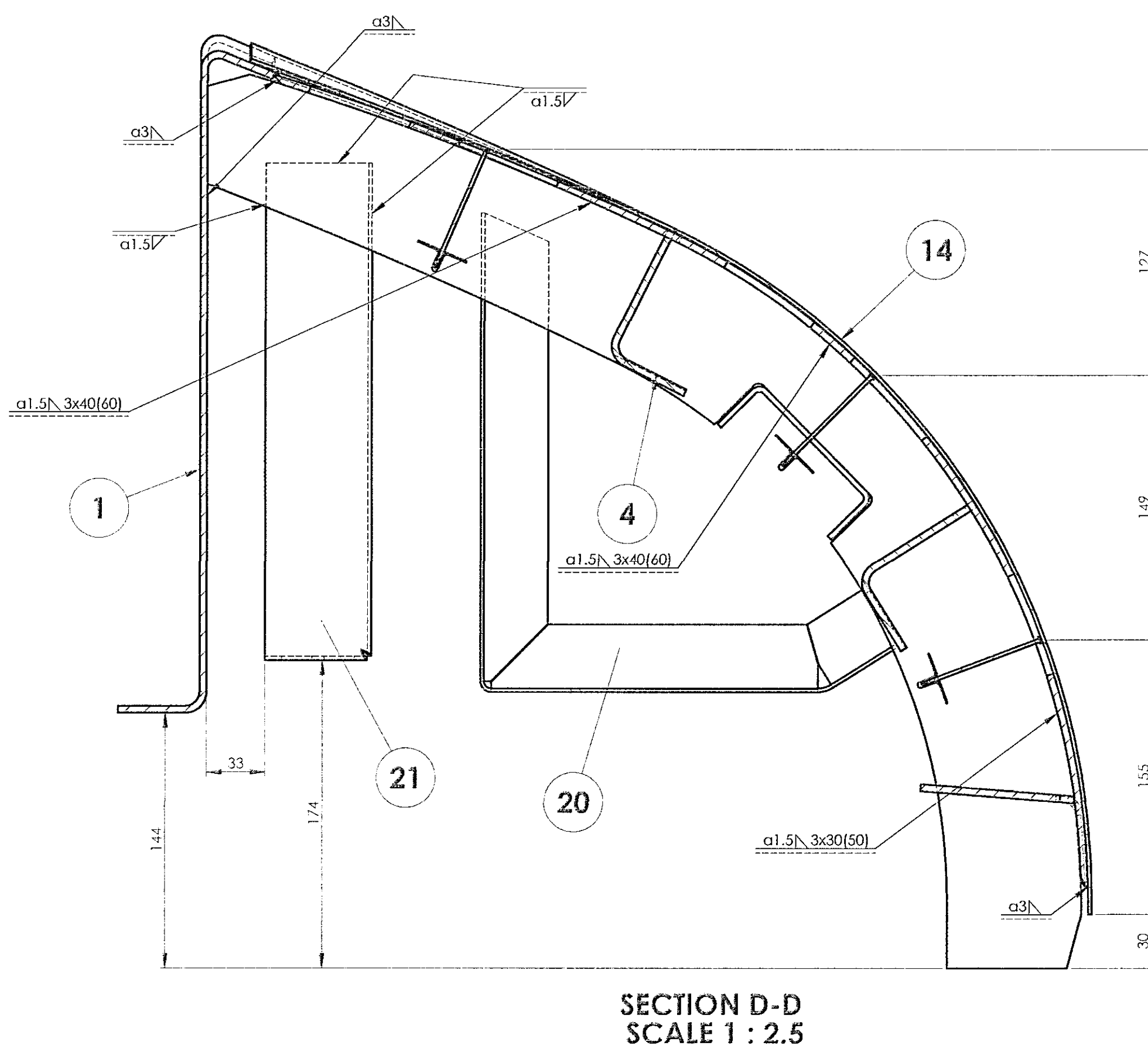
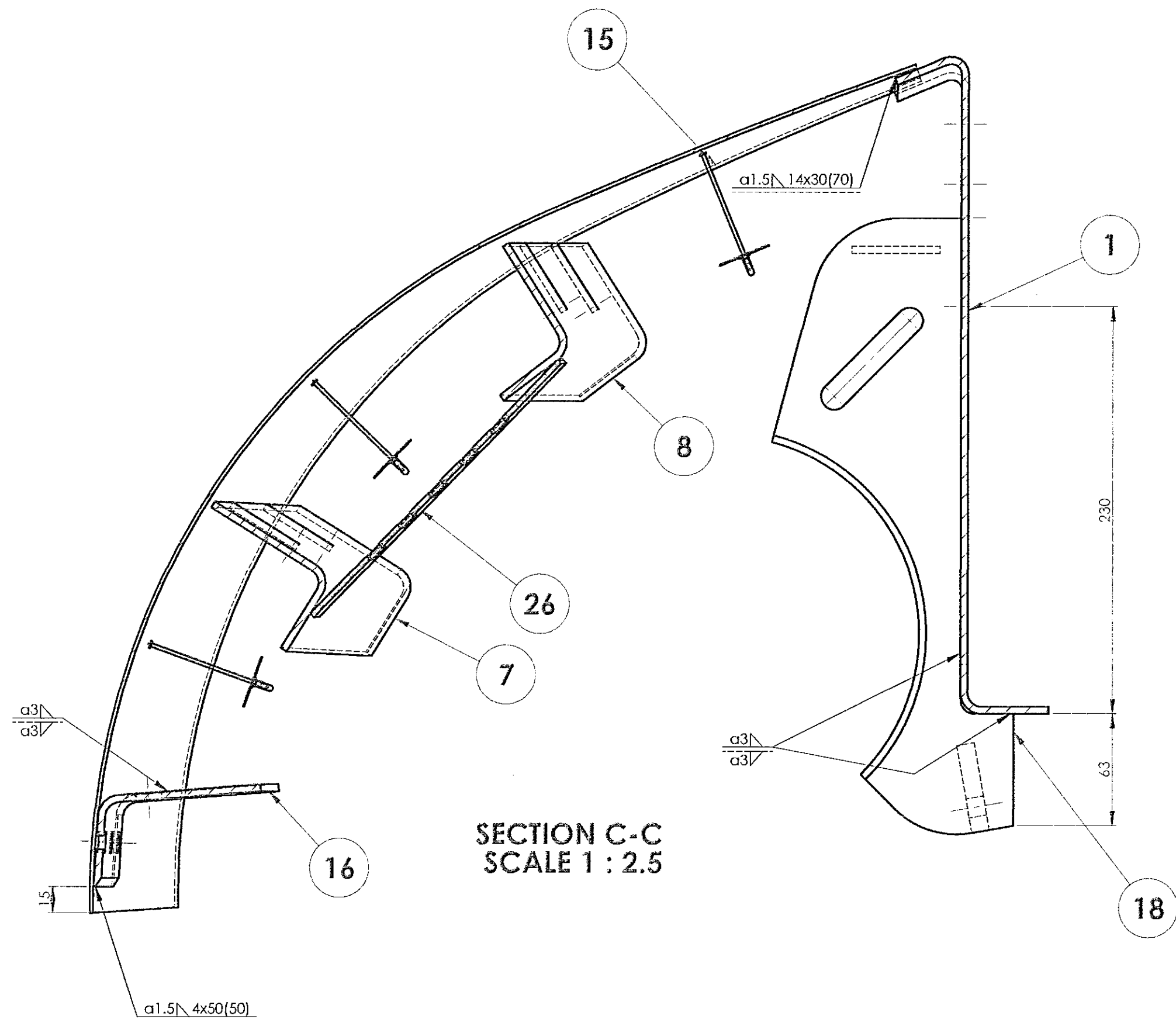
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO TCF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:913-1986.



GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 9.517		WT/ASSY IN Kgs: 101.8/2	
FINAL ROOF ELEMENT COMPLETE		SCALL		SSE/D	
		1:5		CHD	
		AL1		ALTD	
		b		E.SATHISH KUMAR	
				DRN	
				E.SATHISH KUMAR	
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038		SHEET 1 OF 3		LWFAC/PP2	
					
				82716011	
				A1	

82716011

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED



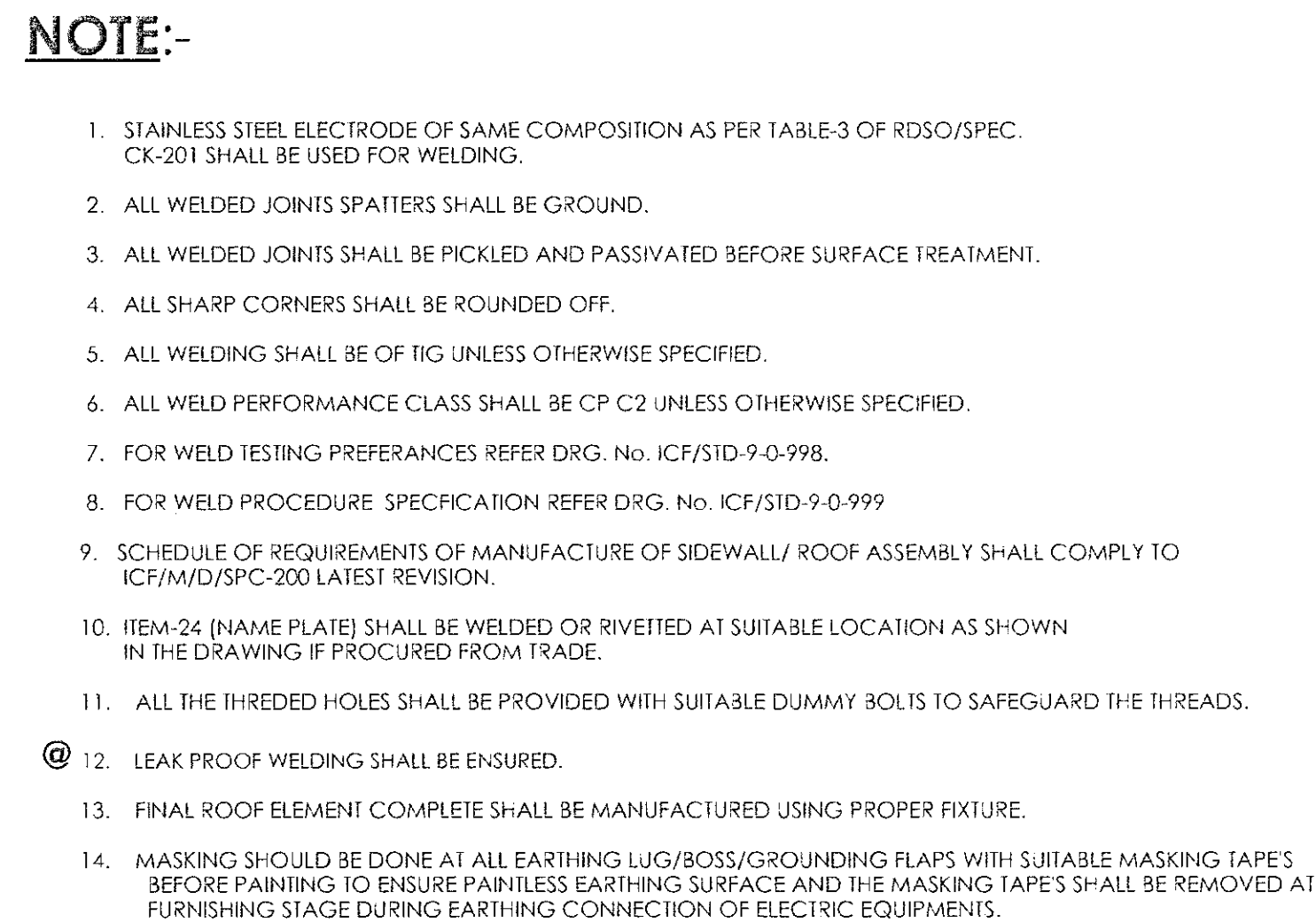
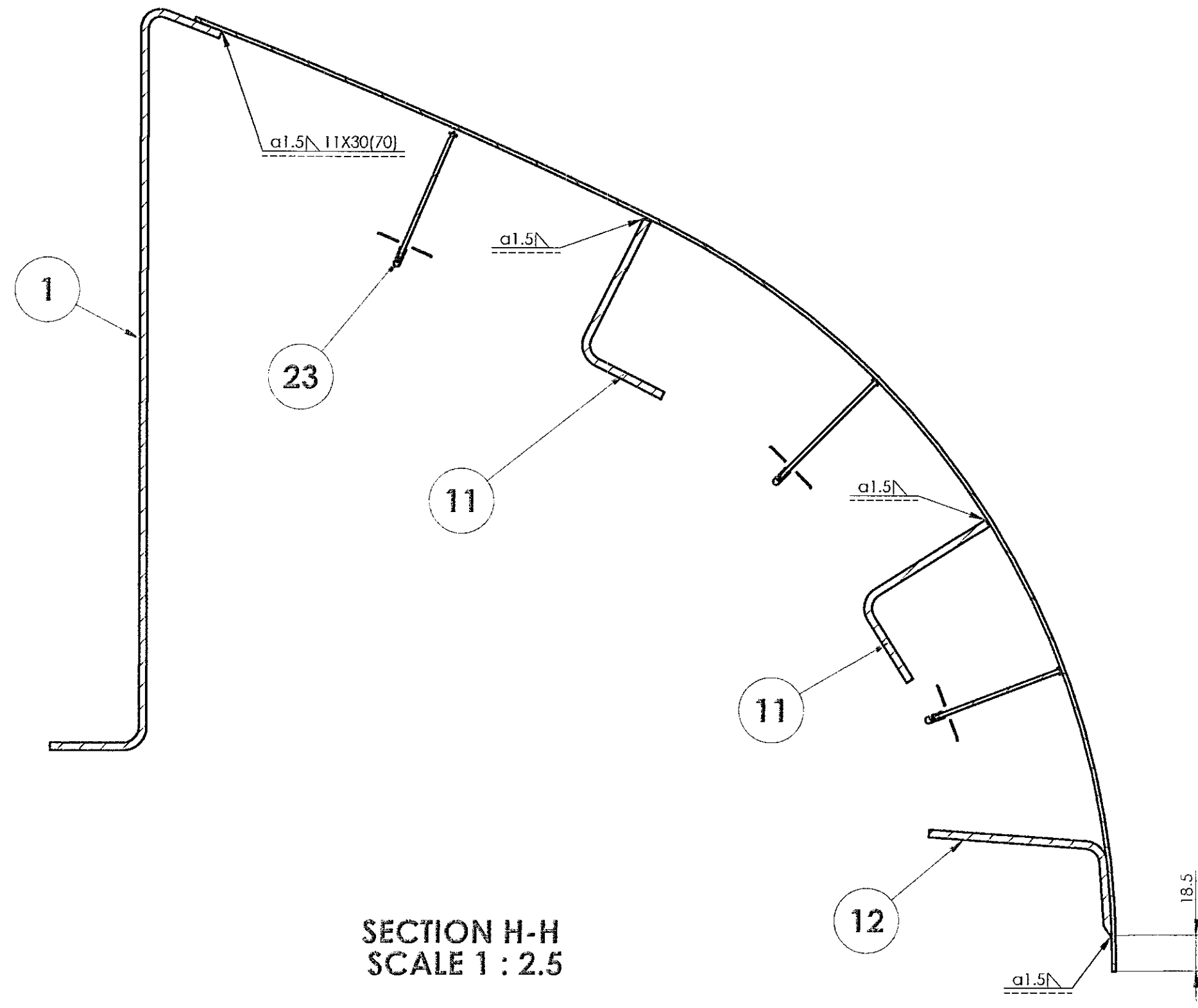
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO CF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:13-1986.

REF.DRG.NO.

12-2-26	DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME
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GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 9.517		WT/ASSY IN Kgs: 101.872	
FINAL ROOF ELEMENT COMPLETE		SCALE	SSE/D	CHD	①
		1:5	ALT	DRN	E.SATHISH KUMAR
		2 OF 3	DRN	DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS		SHEET		LWFAC/PP2	
INTEGRAL COACH FACTORY, CHENNAI - 600088		2 OF 3		82716011	
				A1	

ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:813-1986. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY.

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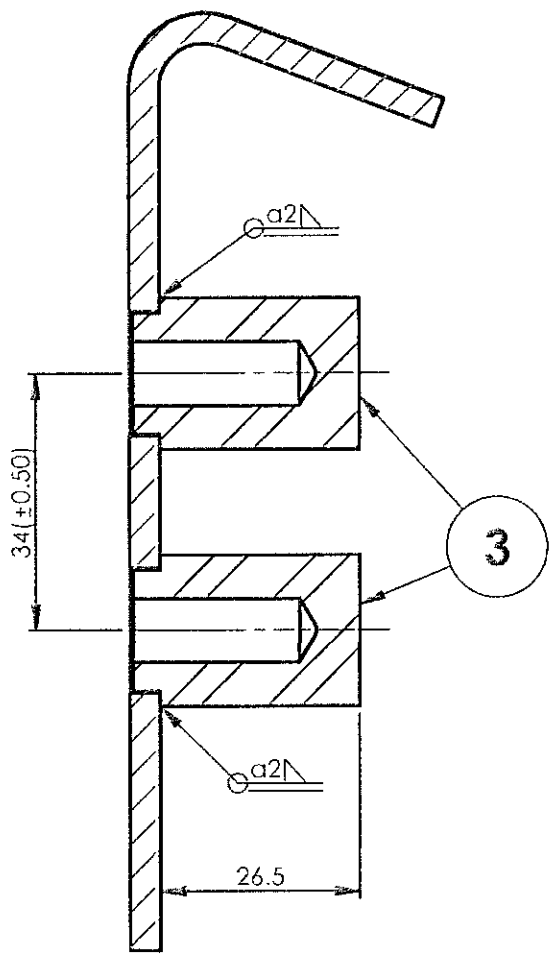
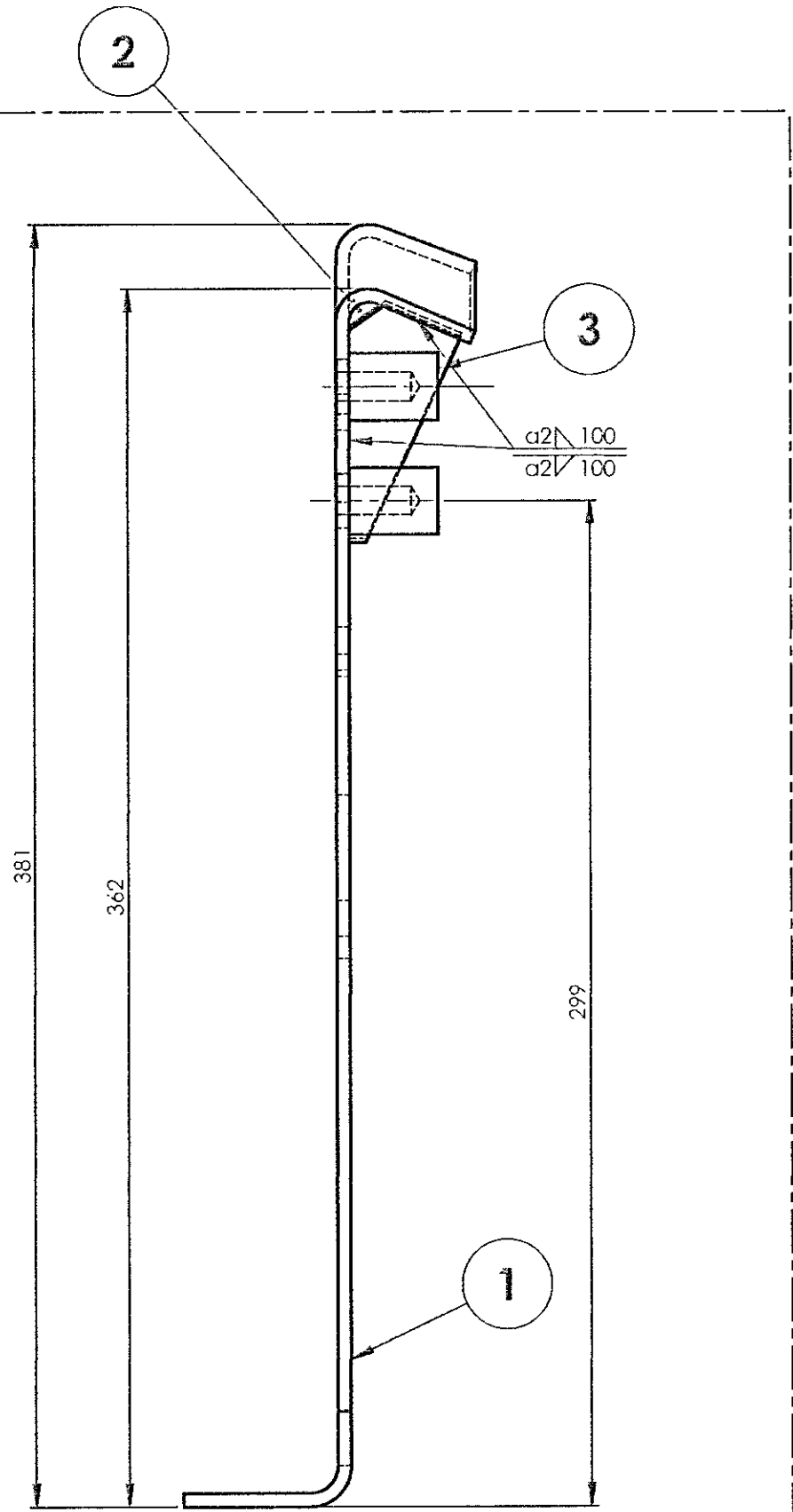
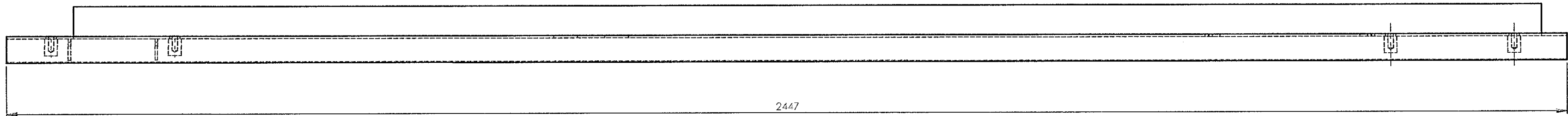
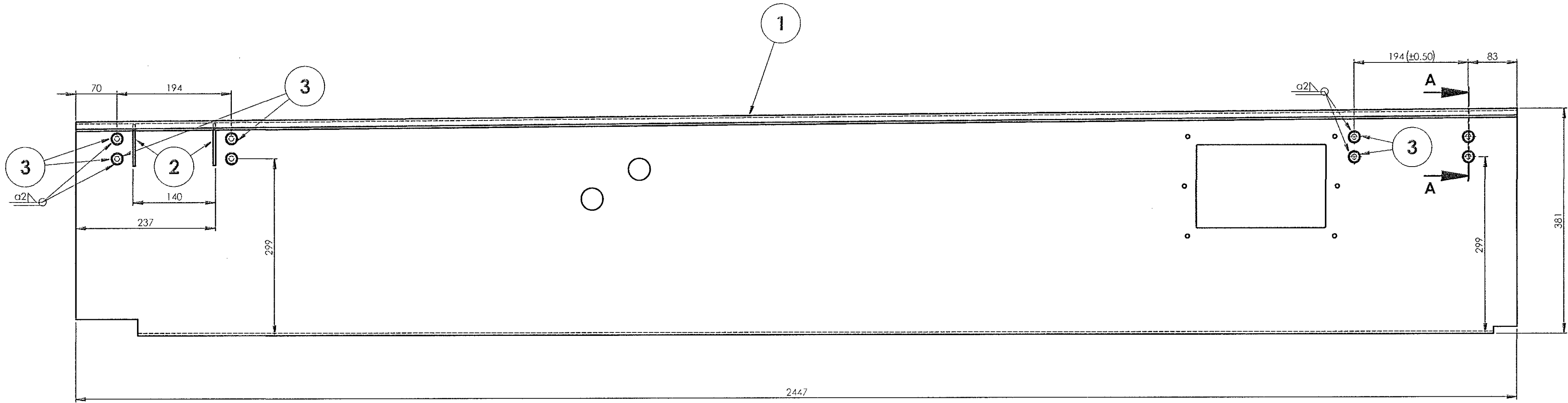
3	TIE ROD	Ø8 x 657	27		SS-304	0.26	
3	FLAT		26	AAB16550		0.33	
1	SUCTION PIPE COMPLETE		25	59316056		5.239	
1	NAME PLATE FOR SUPPLIER IDENTIFICATION		24	AAA51072		0.063	
30	WELDING PIN ASSEMBLY		23	49516008		0.005	
2	GROUNDING FLAP		22	AAA16900		0.084	
1	BRACKET		21	AAA10942		0.615	
1	BRACKET		20	AAB10006		0.547	
1	BRACKET		19	AAB10005		0.547	
1	AUX. WATER TANK FIXING BRACKET		18	82716017		2.003	
1	AUX. WATER TANK FIXING BRACKET		17	82716016		1.948	
1	STIFFENING ANGLE		16	AAA16920		1.838	
1	ROOF SHEET		15	AAA16918		15.180	
1	ROOF SHEET		14	AAA16917		8.879	
1	LOCATION FRAME COMPLETE		13	59316019		7.283	
1	STIFFENING ANGLE		12	AAA16927		0.573	
2	STIFFENING ANGLE		11	AAA16926		0.544	
2	STIFFENING ANGLE		10	AAA16924		0.644	
1	STIFFENING ANGLE		9	AAA16923		0.631	
1	STIFFENING ANGLE		8	AAA16922		4.841	
1	STIFFENING ANGLE		7	AAA16921		5.224	
1	ROOF ARCH COMPLETE		6	59316018		6.260	
1	ROOF ARCH COMPLETE		5	59316017		2.835	
1	ROOF ARCH COMPLETE		4	82716015		6.945	
1	ROOF ARCH COMPLETE		3	82716019		1.73	
1	ROOF ARCH COMPLETE		2	82716020		1.69	
1	MEMBER COMPLETE		1	82716013		34.324	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: I-6 Roof Construction		SURFACE AREA IN Sq.m.: 9.517		WT/ASSY IN Kgs:			
FINAL ROOF ELEMENT COMPLETE				SCALE 1:5		SSE/D CHD	
				ALT. b		AL/D DRN	
				E.SATHISH KUMAR		E.SATHISH KUMAR	
				LWFAC/PP2			
INDIAN RAILWAY STANDARDS				SHEET			
INTEGRAL COACH FACTORY, CHENNAI - 600038				3 OF 3		82716011	
						A1	

82716013

▽ ROUGH MACHINED
▽▽ FINISH MACHINED
▽▽▽ FINE FINISH MACHINED

① ROUGH CLEANED
⑥ BURRS REMOVED
⑧ CHAMFERED

ALT.		ZONE	REVISIONS	DESCRIPTION	APPROVED & DATE
a			ITEM-1 REVISED VIEWS UPDATED.		

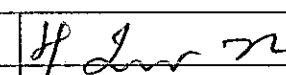



SECTION A-A
SCALE 1 : 1

DETAIL X
SCALE 1 : 2

NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. FOR WELD TESTING PREFERANCES REFER DRG. No. ICF/STD-9-0-998.
7. FOR WELD PROCEDURE SPECIFICATION REFER DRG. No. ICF/STD-9-0-999.
8. ITEM - 3 SHOULD BE WELDED WITH ITEM - 1 USING SUITABLE FIXTURE

8	SCREWING PIECE		3	AAD16884		0.06	
2	RIB		2	AAA16929		0.043	
1	MEMBER		1	AAF16122		33.743	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction			SURFACE AREA IN Sq.m.: 2.170		WT/ASSY IN Kgs:		
MEMBER COMPLETE					SCALE	SSE/D	
					1:5	CHD	
					AL I.	ALTD	E.SATHISH KUMAR
					a	DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038					 SHEET 1 OF 1	LWFAC/PP2	
						82716013	

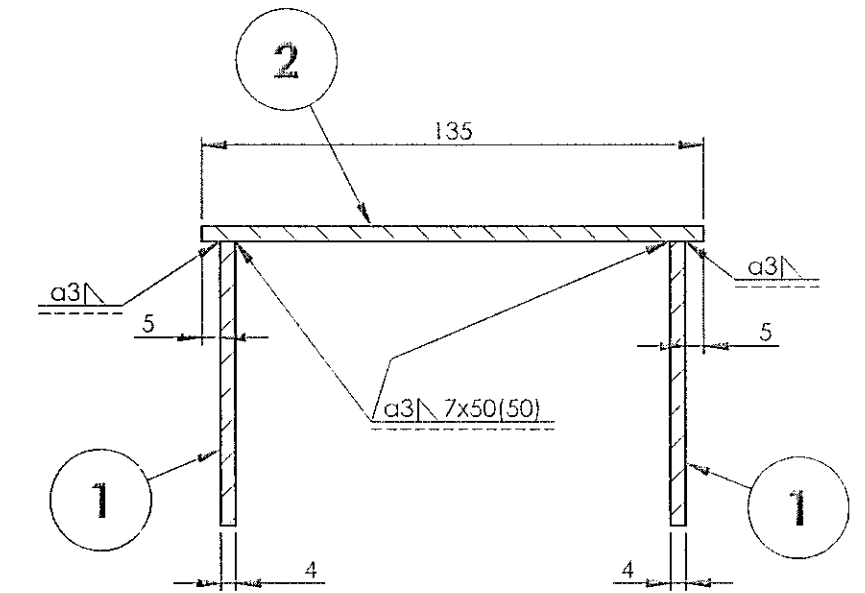
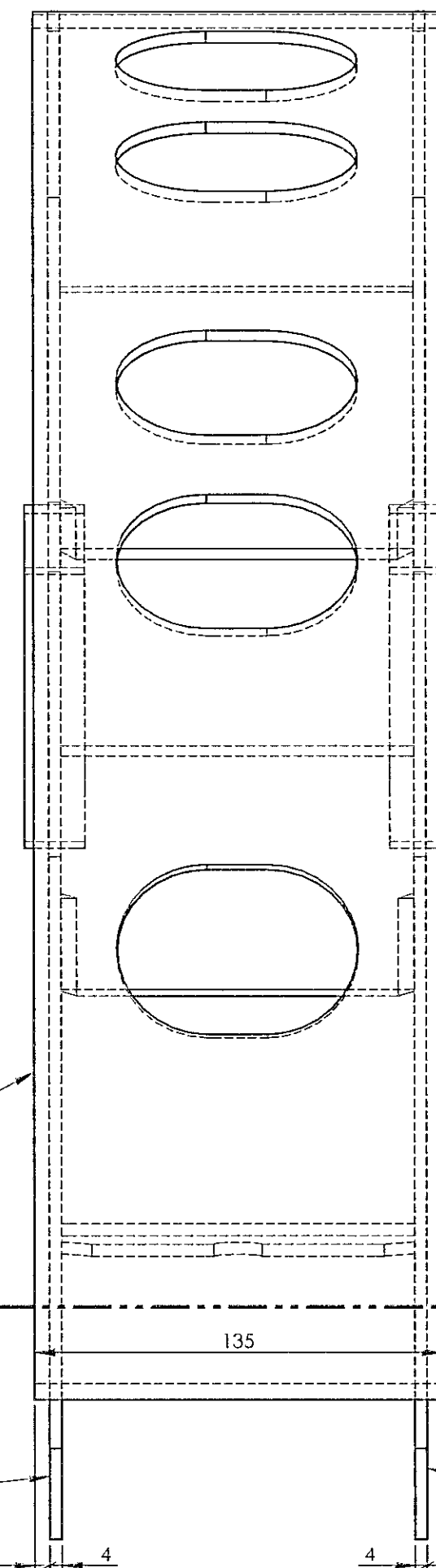
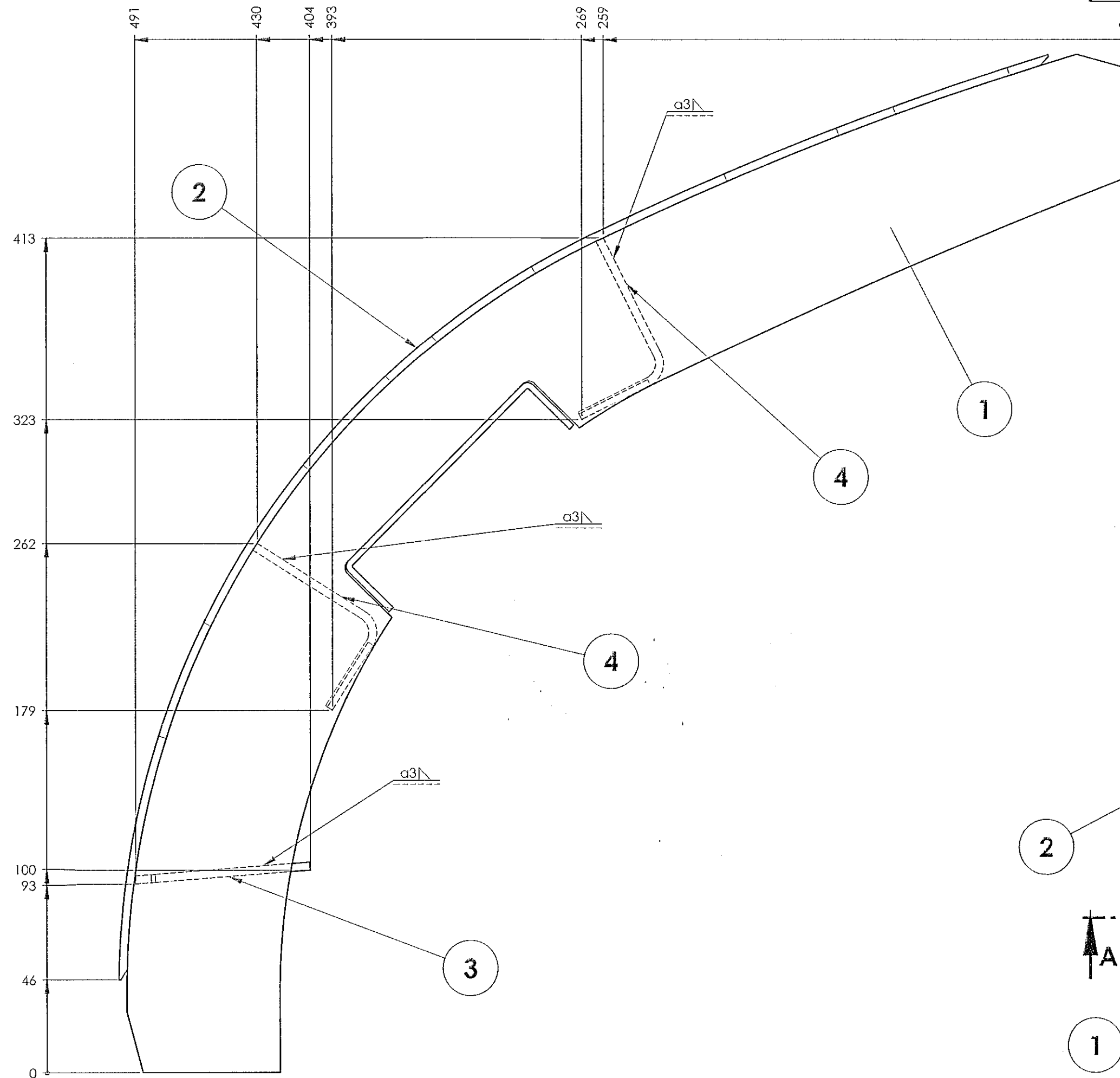
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11/01/26	04/09/25	11/01/26
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

82716015

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①8 CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE

SECTION A-A
SCALE 1 : 2

NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. ALL BUTT WELDINGS TO BE DONE AT COACH OUTSIDE AND ROUGH GRINDING TO BE DONE ON THE SAME SIDE. PENETRATION SHOULD NOT BE GROUND.

2	STIFFENING ANGLE		4	AAA16934		0.434	
1	WEB		3	AAA16933		0.319	
1	FLANGE		2	AAA16932		2.367	
2	ROOF ARCH COMPLETE		1	82716018		1681.75	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGs.	MATL	WT/UNIT IN KGS	REMARKS

GROUP: 1-6 Roof Construction

SURFACE AREA IN Sq.m.: 0.469

WT/ASSY IN Kgs: 6.918

ROOF ARCH COMPLETE

SCALE
1:5SSE/D
CHDALT
DRN

ALTD

E.SATHISH KUMAR

LWFAC/PP2

INDIAN RAILWAY STANDARDS

INTEGRAL COACH FACTORY, CHENNAI - 600038

SHEET
1 OF 1

82716015

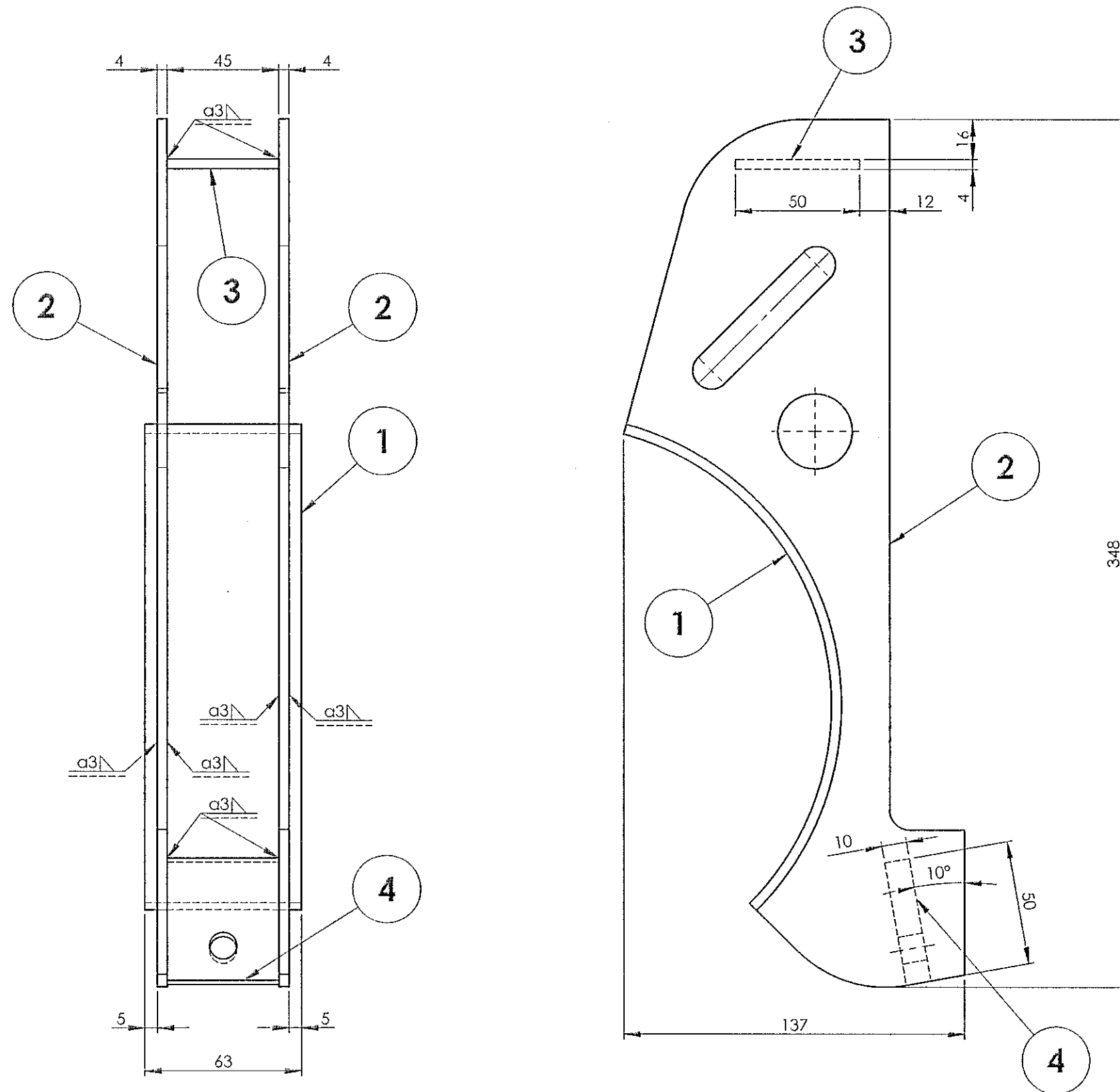
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REF.DRG.NO.

DATE OF LATEST ALT.	04/09/25	AME/SME
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82716016

▽ ROUGH MACHINED	① ROUGH CLEANED	REVISIONS			
▽▽ FINISH MACHINED	①a BURRS REMOVED	ALT.	ZONE	DESCRIPTION	APPROVED & DATE
▽▽▽ FINE FINISH MACHINED	①b CHAMFERED				



NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. FOR WELD TESTING PREFERENCES REFER DRG.NO.ICF/STD-9-0-998.
7. FOR WELD PROCEDURE SPECIFICATION REFER DRG.NO.ICF/STD-9-0-999.

1	PLATE		4	AAB10073		0.172	
1	PLATE		3	AAB10010		0.072	
2	PLATE		2	AAF16201		0.610	
1	RING		1	AAB10008		0.483	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGs.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.: 0.130		WT/ASSY IN Kgs:	
AUX. WATER TANK FIXING BRACKET					SCALE 1:2	SSE/D	
					ALT	CHD	
					DRN	ALTD	
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038					ALT	DRN	E.SATHISH KUMAR
					ALT	DRN	E.SATHISH KUMAR
					ALT	DRN	E.SATHISH KUMAR
SHEET 1 OF 1					LWFAC/PP2		
					82716016		A2

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS813:1986. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY.

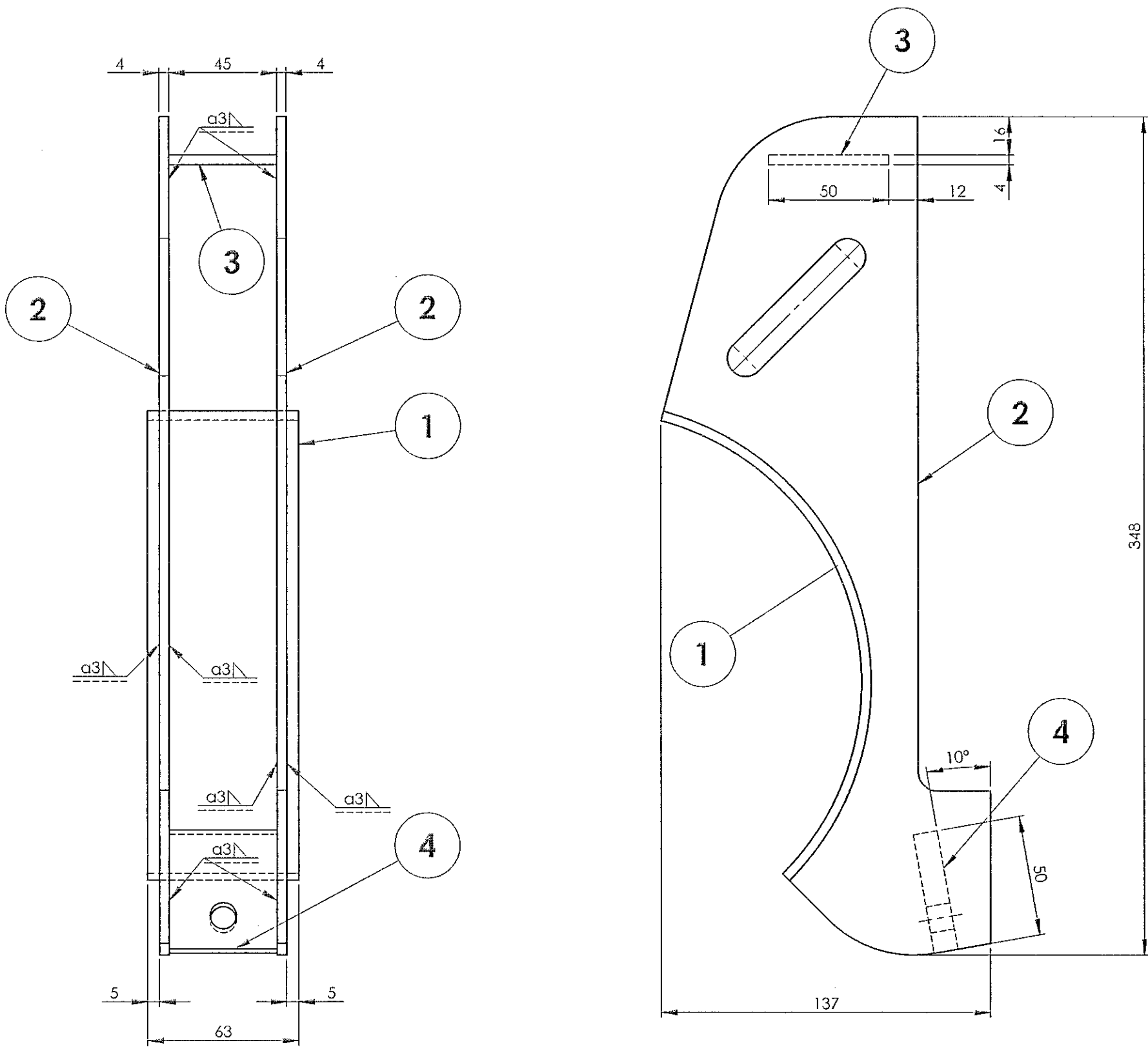
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DATE OF LATEST ALT.	04/09/25	AME/SME
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82716017

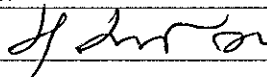
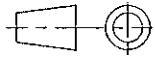
▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



NOTE:

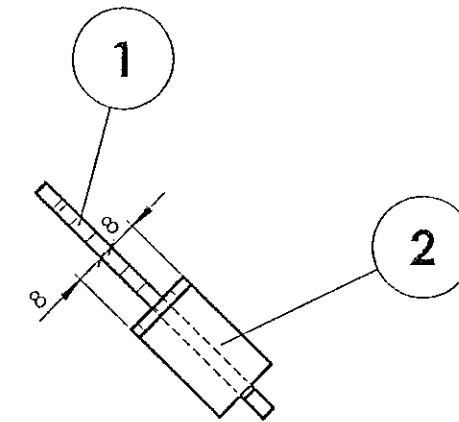
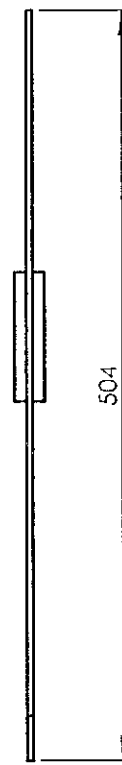
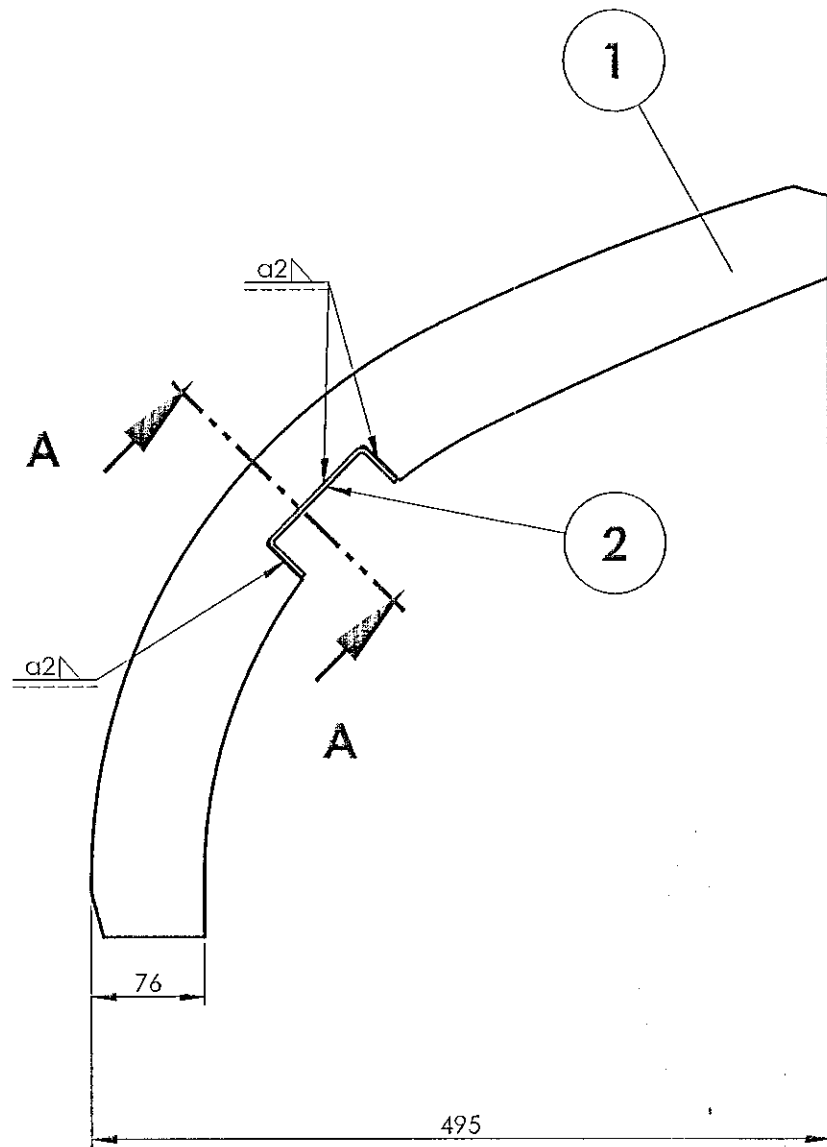
1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. FOR WELD TESTING PREFERANCES REFER DRG.NO.ICF/STD-9-0-998.
7. FOR WELD PROCEDURE SPECIFICATION REFER DRG.NO.ICF/STD-9-0-999.

1	PLATE		4	AAB10073		0.172	
1	PLATE		3	AAB10010		0.072	
2	PLATE		2	AAF16202		0.637	
1	RING		1	AAB10008		0.483	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction			SURFACE AREA IN Sq.m.:0.133		WT/ASSY IN Kgs:2.159		
AUX. WATER TANK FIXING BRACKET					SCALE 1:2	SSE/D	
						CHD	
					ALT	ALTD	
						DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1		LWFAC/PP2	
					82716017		A2

82716018

▽ ROUGH MACHINED	01 ROUGH CLEANED
▽▽ FINISH MACHINED	01b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	018 CHAMFERED

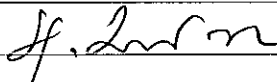
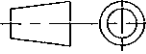
REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



SECTION A-A
SCALE 1 : 2

NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. FOR WELD TESTING PREFERENCES REFER DRG.NO.ICF/STD-9-0-998.
7. FOR WELD PROCEDURE SPECIFICATION REFER DRG.NO.ICF/STD-9-0-999.

1	BACK PIECE		2	AAF16161		0.07	
1	ROOF ARCH		1	AAF16158		1.623	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: -		SURFACE AREA IN Sq.m.: 114996.21			WT/ASSY IN Kgs:		
ROOF ARCH COMPLETE					SCALE 1:5	SSE/D	
						CHD	
					ALT'	ALTD	
						DRN	SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							LWFAC/PP2
							82716018
					SHEET 1 OF 1		

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY.

REF.DRG.NO.-

DATE OF LATEST ALT.	04/09/25	AME/SME
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82716019		▽ ROUGH MACHINED		① ROUGH CLEANED		REVISIONS							
		▽▽ FINISH MACHINED		①b BURRS REMOVED		ALT.		ZONE		DESCRIPTION		APPROVED & DATE	
		▽▽▽ FINE FINISH MACHINED		①c CHAMFERED									

1

2

A

SECTION A-A
SCALE 1 : 2

NOTE:

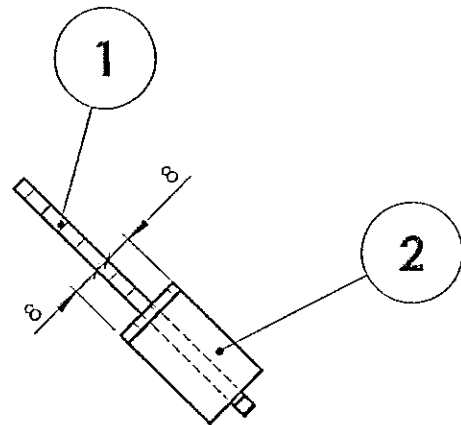
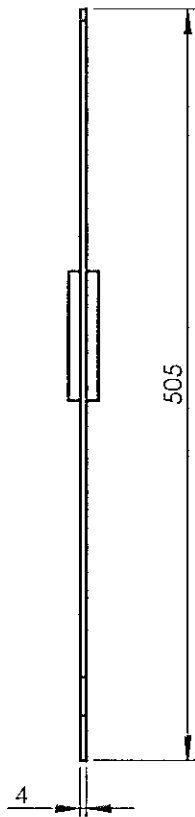
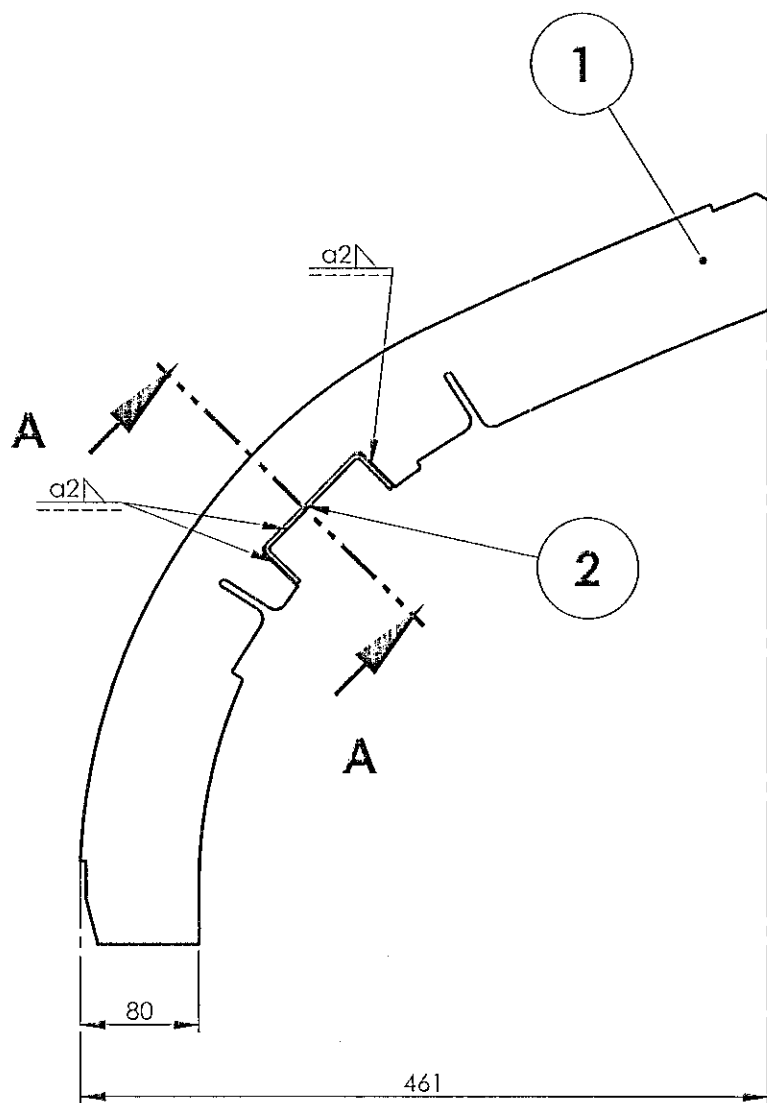
1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
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5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. FOR WELD TESTING PREFERANCES REFER DRG.NO.ICF/STD-9-0-998.
7. FOR WELD PROCEDURE SPECIFICATION REFER DRG.NO.ICF/STD-9-0-999.

1	BACK PIECE		2	AAF16161		0.09		
1	ROOF ARCH		1	AAF16159		1.629		
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGs.	MATL	WT/UNIT IN KGS	REMARKS	
GROUP: 1-6 Roof Construction				SURFACE AREA IN Sq.m.: 117664.52		WT/ASSY IN Kgs:		
ROOF ARCH COMPLETE						SCALE 1:5	SSE/D	E.SATHISH KUMAR
						CHD		
						ALT	ALTD	
						DRN		
INDIAN RAILWAY STANDARDS					SHEET 1 OF 1	LWFAC/PP2		
INTEGRAL COACH FACTORY, CHENNAI - 600038						82716019	A2	

82716020

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①b CHAMFERED

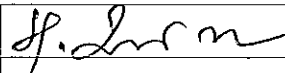
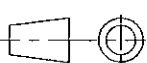
REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



SECTION A-A
SCALE 1 : 2

NOTE:

1. STAINLESS STEEL ELECTRODE OF SAME COMPOSITION AS PER TABLE-3 OF RDSO/SPEC C-K201 SHALL BE USED FOR WELDING.
2. ALL WELD SPATTERS SHALL BE GROUND.
3. ALL WELDED JOINTS SHALL BE PICKLED AND PASSIVATED BEFORE SURFACE TREATMENT.
4. ALL SHARP CORNERS SHALL BE ROUNDED OFF.
5. ALL WELDINGS SHALL BE TIG WELDING UNLESS OTHERWISE SPECIFIED.
6. FOR WELD TESTING PREFERANCES REFER DRG.NO.ICF/STD-9-0-998.
7. FOR WELD PROCEDURE SPECIFICATION REFER DRG.NO.ICF/STD-9-0-999.

1	BACK PIECE		2	AAF16161		0.07	
1	ROOF ARCH		1	AAF16160		1.614	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF.DRGS.	MATL	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 Roof Construction		SURFACE AREA IN Sq.m.: 114918.25			WT/ASSY IN Kgs:		
ROOF ARCH COMPLETE					SCALE 1:5	SSE/D	
						CHD	
					ALT	ALTD	
						DRN	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038					LWFAC/PP2		
					82716020		
				SHEET 1 OF 1	A2		

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY.

REF.DRG.NO.-

	04/09/25	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

AAA10962

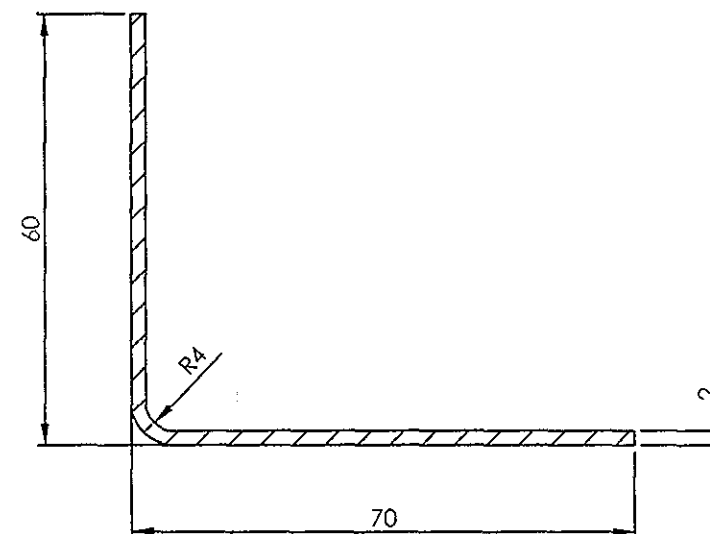
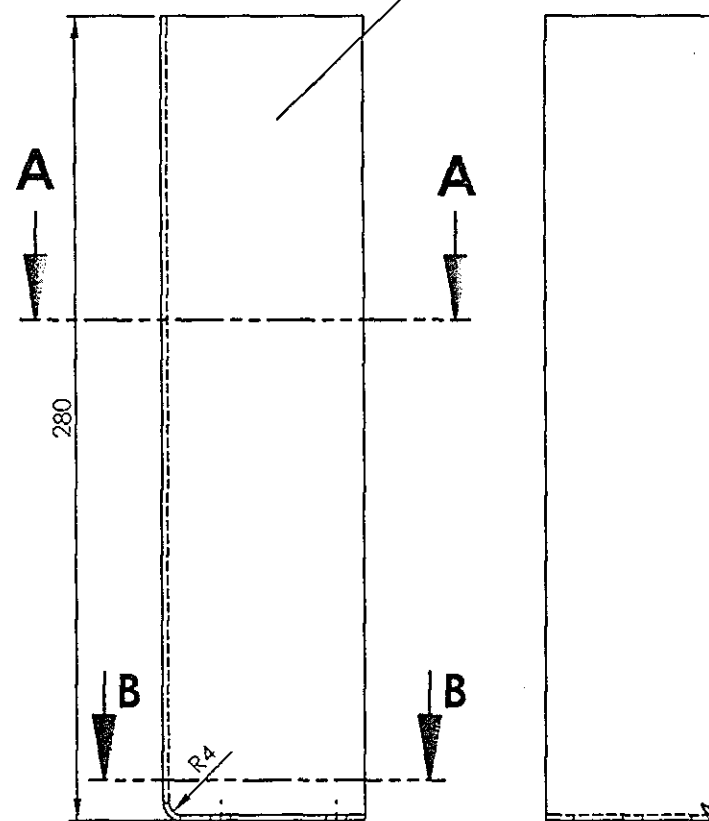
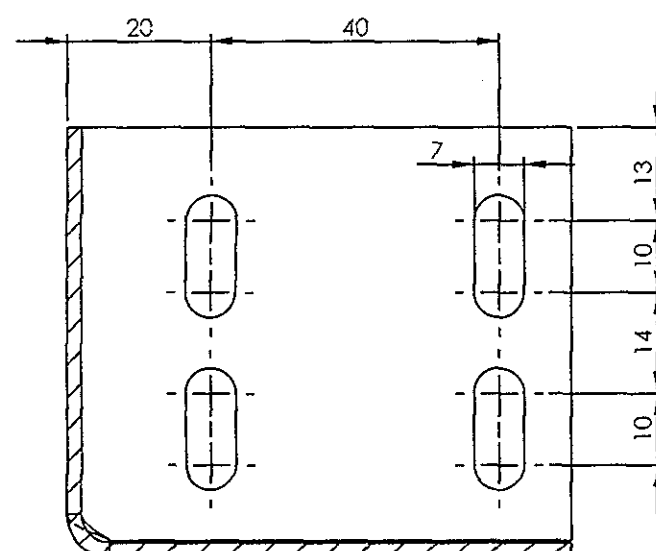
▽ ROUGH MACHINED	⊙ ROUGH CLEANED
▽▽ FINISH MACHINED	⊙⊙ BURRS REMOVED
▽▽▽ NE FINISH MACHINED	⊙⊙ CHAMFERED

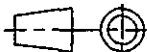
REVISIONS

ALT.

ZONE

DESCRIPTION

APPROVED &
DATESECTION A-A
SCALE 1 : 1SECTION B-B
SCALE 1 : 1

1	BRACKET	2x126x346	1		RDSO/SPEC C-K201 X2CrNi12	0.615		
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	
GROUP: 1-0		SURFACE AREA IN Sq.m.:0.079			WT/ASSY IN Kgs:0.615			
BRACKET					SCALE	SSE/D	L. Panduranga Rao	
					1:2.5	CHD		
					ALT.	ALTD	L.PANDURANGA RAO	
						DRN		
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1			AAA10962	A3

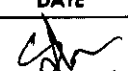
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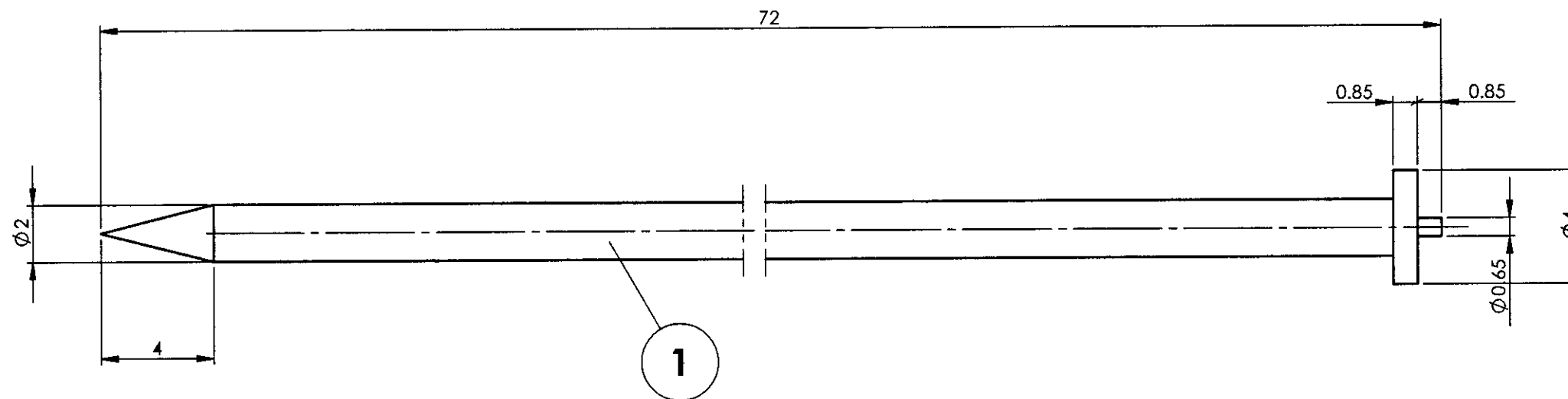
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO IC/STD 9 0 001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813 1986.

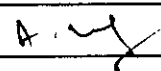
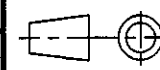
AAA16493

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		DRAWING REVISED.	



1	WELDING PIN	Ø 4 x 72	1		IS:6528 X04Cr18Ni10	0.002	
Default	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF CONSTRUCTION				SURFACE AREA IN Sq.m.: 0.000		WT/ASSY IN Kgs:	
WELDING PIN					SCALE 5:1	SSE/D CHD	
					ALT. a	ALTD	A.Palanichamy
						DRN	3D: A.Palanichamy 2D: P.Murugan
							
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		AAA16493	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A3	


06-02-2024	19-07-2013	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

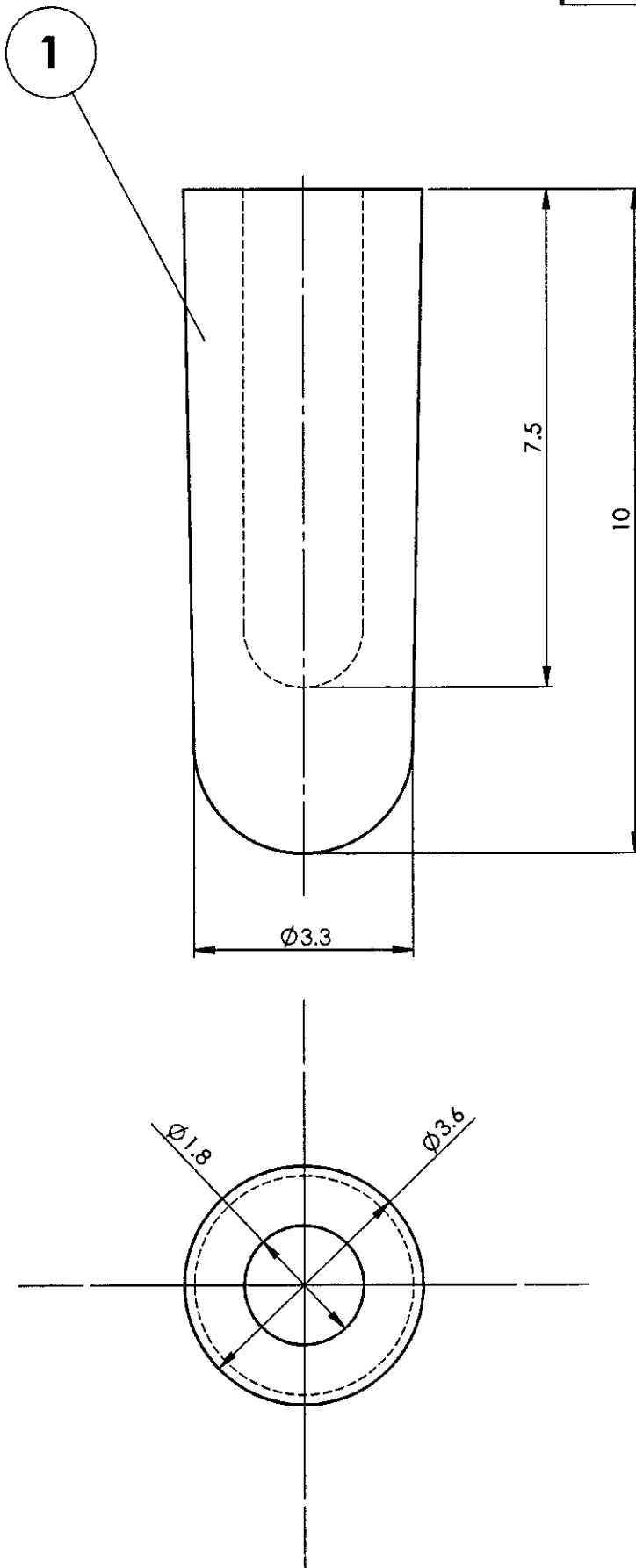
REF.DRG.NO.mi001576, ITEM-1


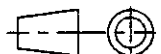
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553.
WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY


AAA16494

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①8 CHAMFERED

REVISIONS				APPROVED & DATE
ALT.	ZONE	DESCRIPTION		
a		DRAWING REVISED.		



1	CAP	Ø3.6x10	1		IS:5831	0.000	
Default	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF CONSTRUCTION		SURFACE AREA IN Sq.m.:0.000			WT/ASSY IN Kgs:		
CAP					SCALE	SSE/D	
					10:1	CHD	
					ALT.	ALTD	A.Palanichamy
					a	DRN	3D:A.Palanichamy 2D:P.Murugan
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600036							
					SHEET 1 OF 1	AAA16494	A3

06-02-2024	19-07-2013	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

REF.DRG.NO.mi001576, ITEM-2

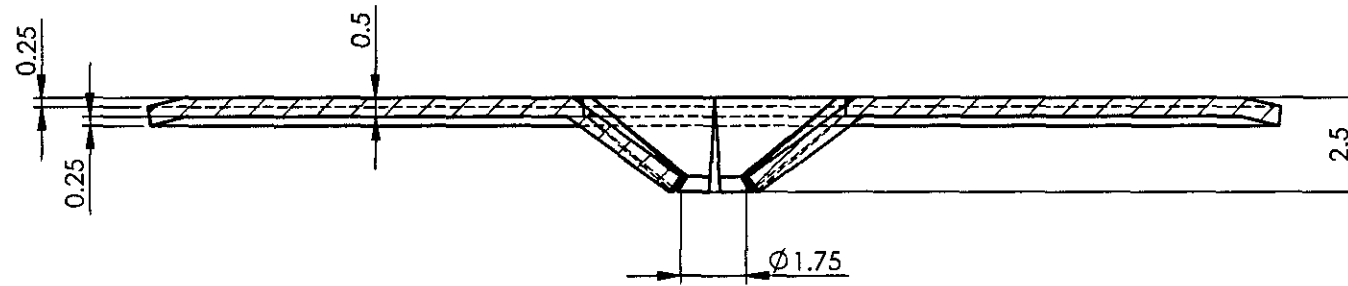
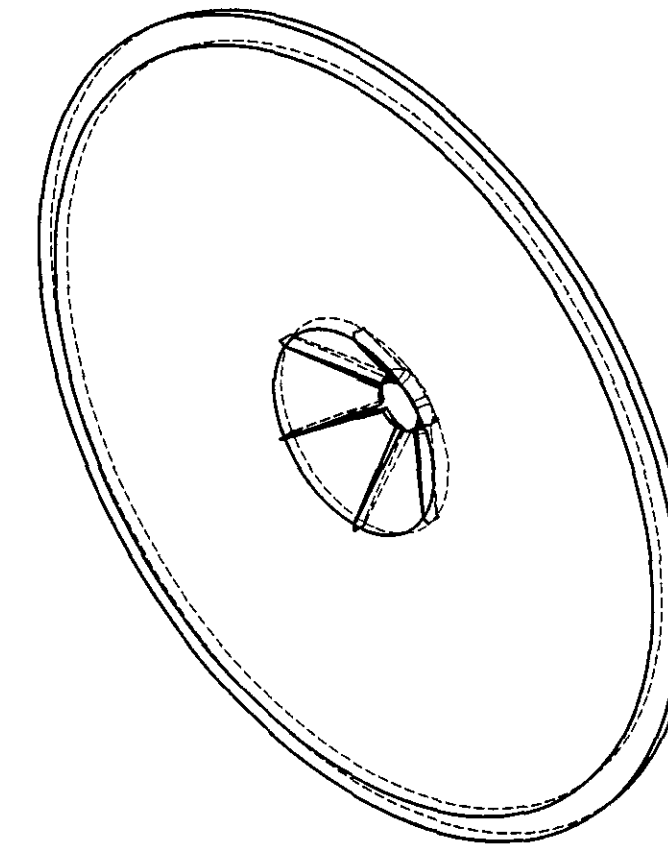
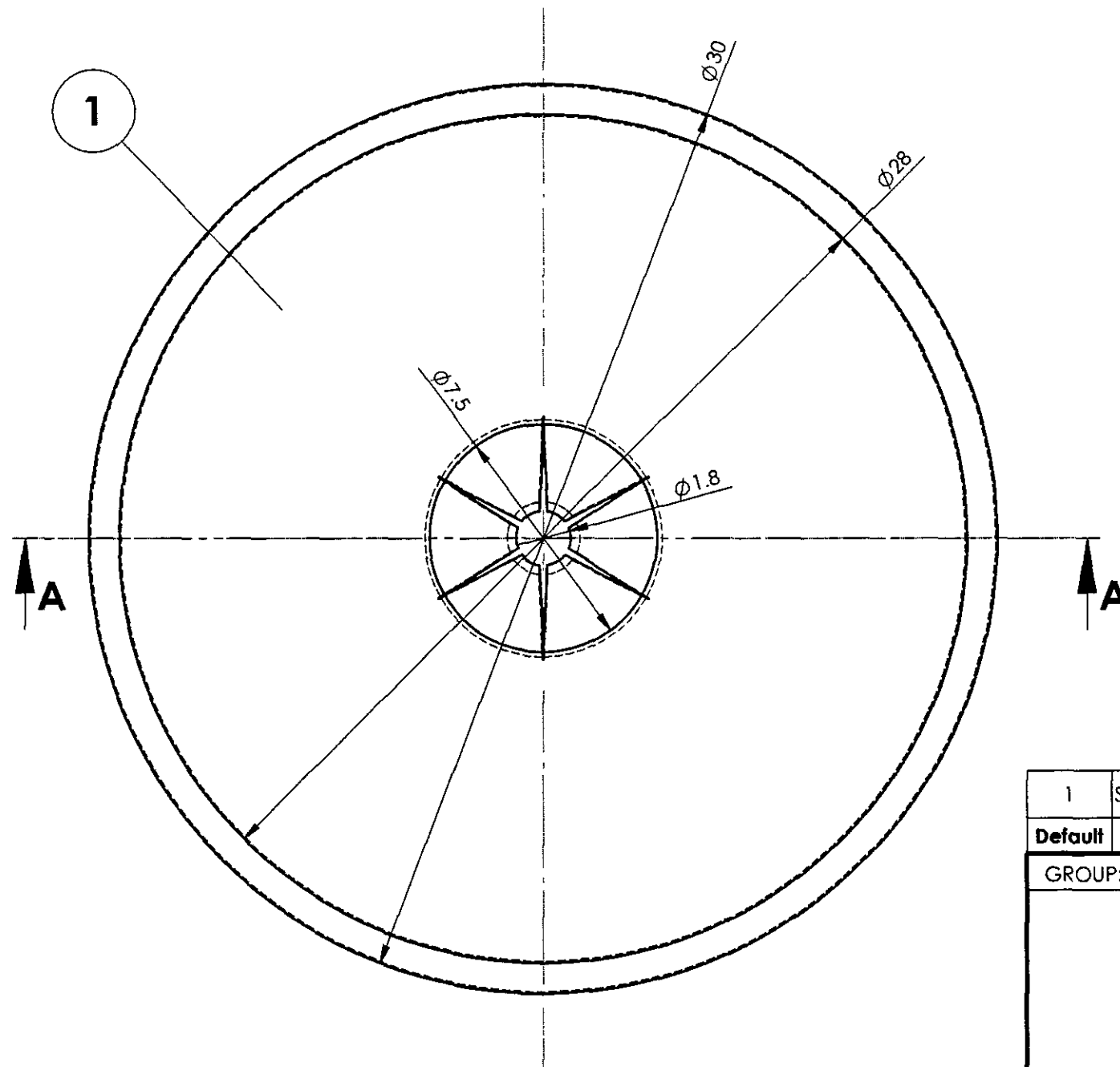
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

AAA16495

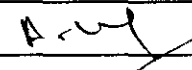
▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①B CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		DRAWING REVISED.	


SECTION A-A
SCALE 5 : 1

ISOMETRIC VIEW

1	SERRATED SPRING WASHER	DIA 30 x 0.5 THICK	1		IS:4072 Gr.65C6	0.003	COATING TO MDT5057
Default	DESCRIPTION	DIMENSIONS	ITEM NO	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF CONSTRUCTION				SURFACE AREA IN Sq.m.:0.001		WT/ASSY IN Kgs:	
SERRATED SPRING WASHER					SCALE 2:1	SSE/D CHD	
					ALT. a	ALTD DRN	A.Palanichamy
					3D:A.Palanichamy 2D:P.Murugan		
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		AAA16495	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A3	

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER EN ISO 2553.
WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

REF.DRG.NO.mi001576, ITEM-3

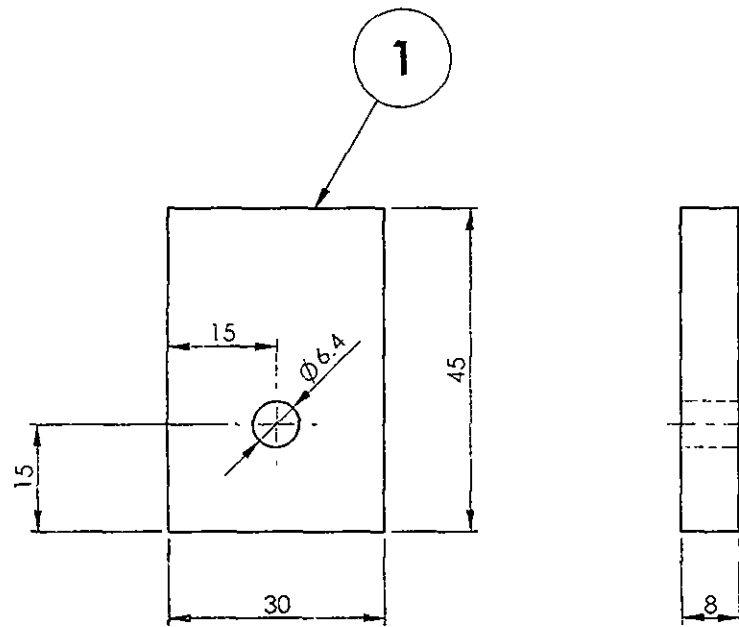
06-02-2024	19-07-2013	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

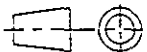
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▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
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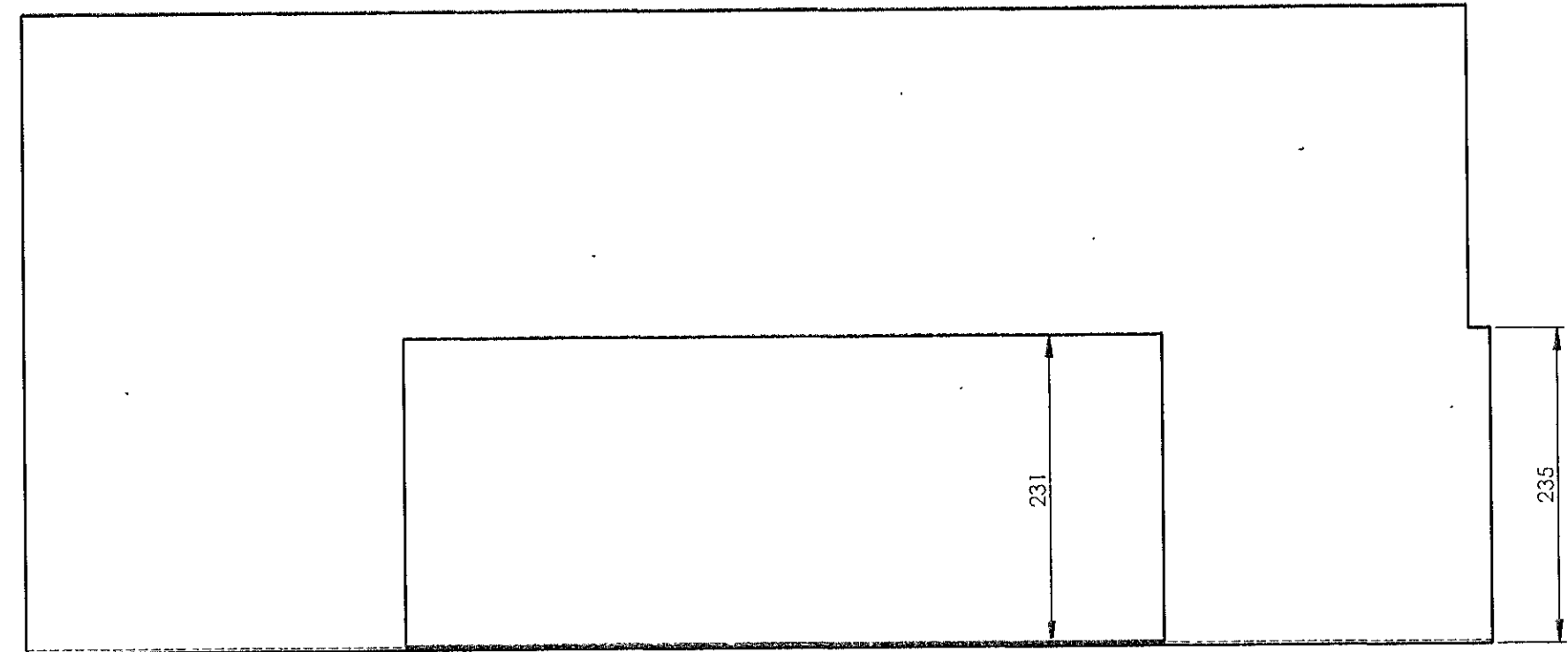
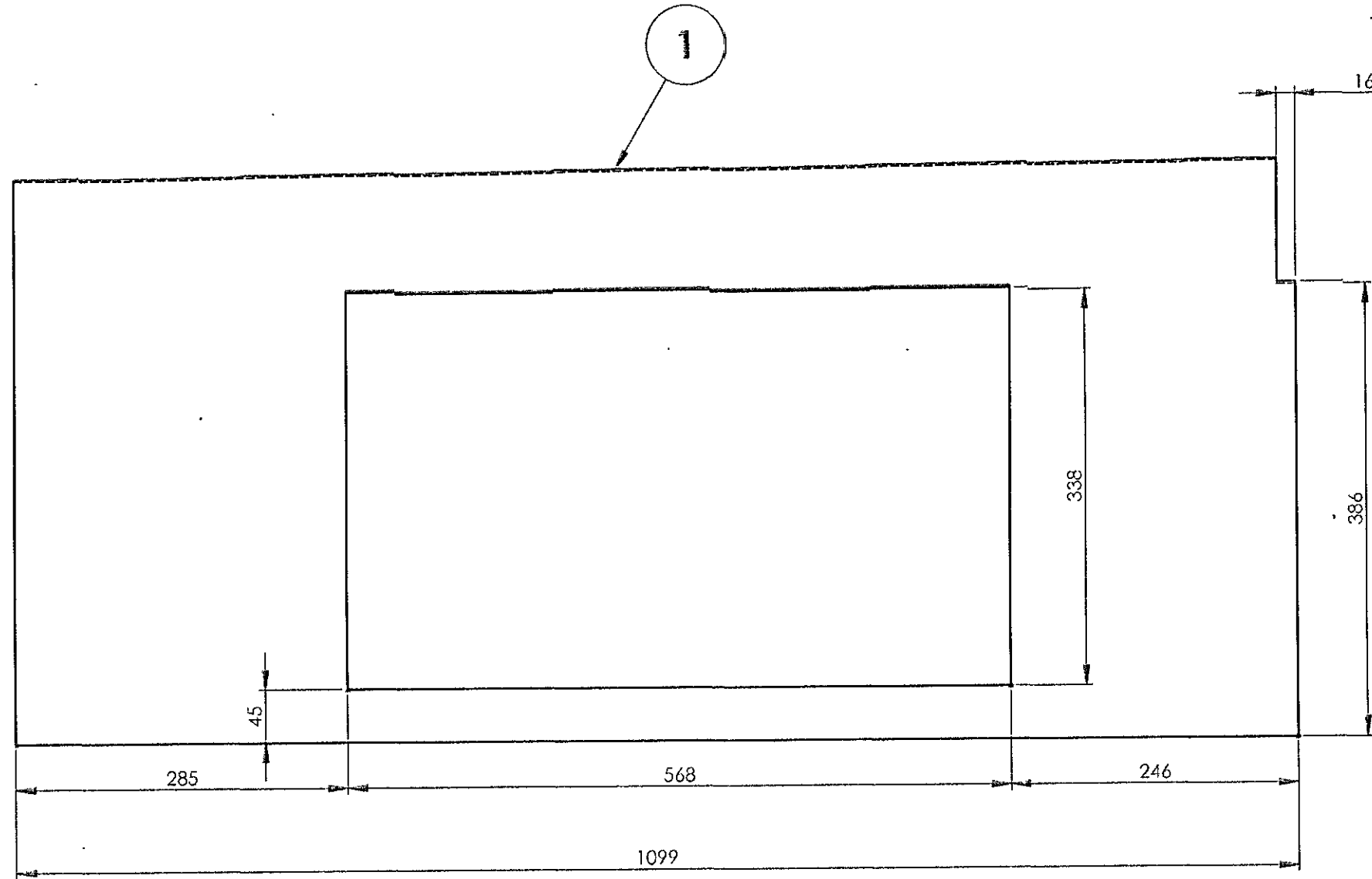
—	GROUNDING FLAP	8 x 30 x 45	1		RDSO/SPEC C- K201 X5 Cr Ni 18 10	0.084	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.004			WT/ASSY IN Kgs:0.083		
GROUNDING FLAP					SCALE	SSE/D	<i>As per spec</i>
					1:1	CHD	
					ALT.	ALTD	
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1			
INTEGRAL COACH FACTORY, CHENNAI - 600038					AAA16900		A3

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS ADD TOLERANCES AS VALUES. REFER DRAWING NO IC/STD 9 0 001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.


REF.DRG.NO.4.10113.0.20.095.138

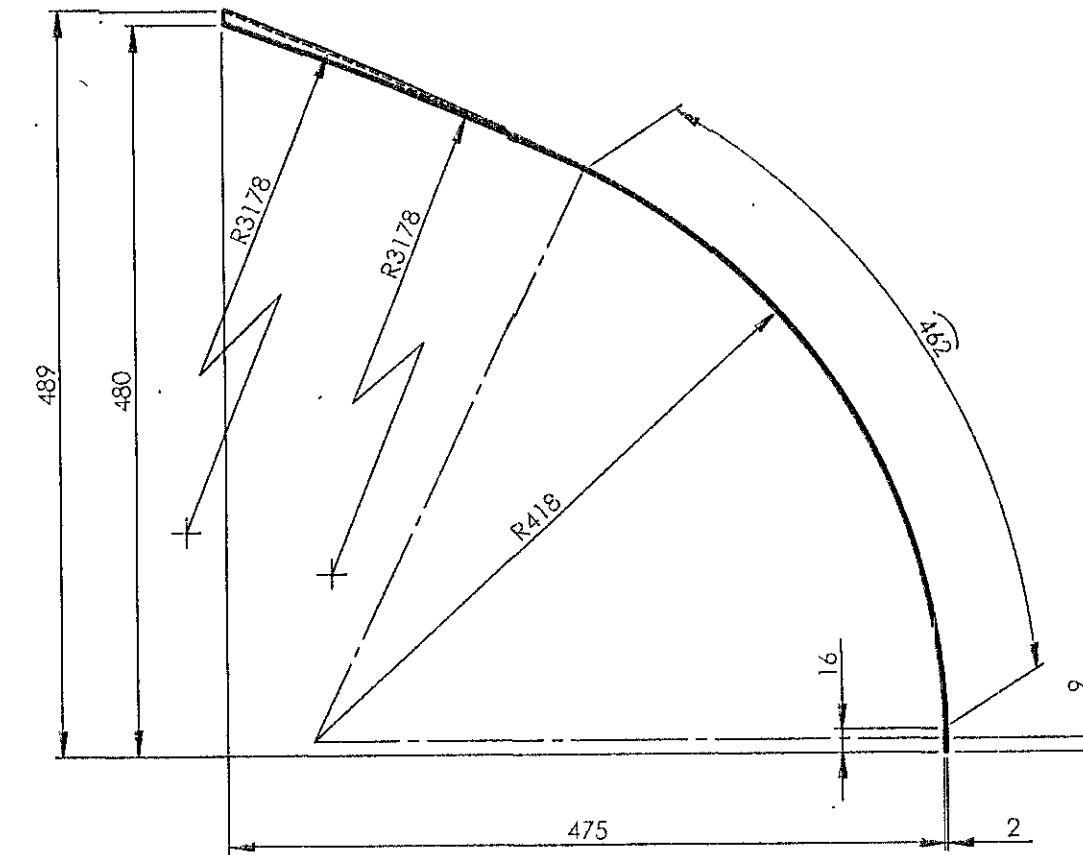
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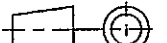
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ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:813-1986.



▽ ROUGH MACHINED	⑧1 ROUGH CLEANED
▽▽ FINISH MACHINED	⑧1b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	⑧18 CHAMFERED

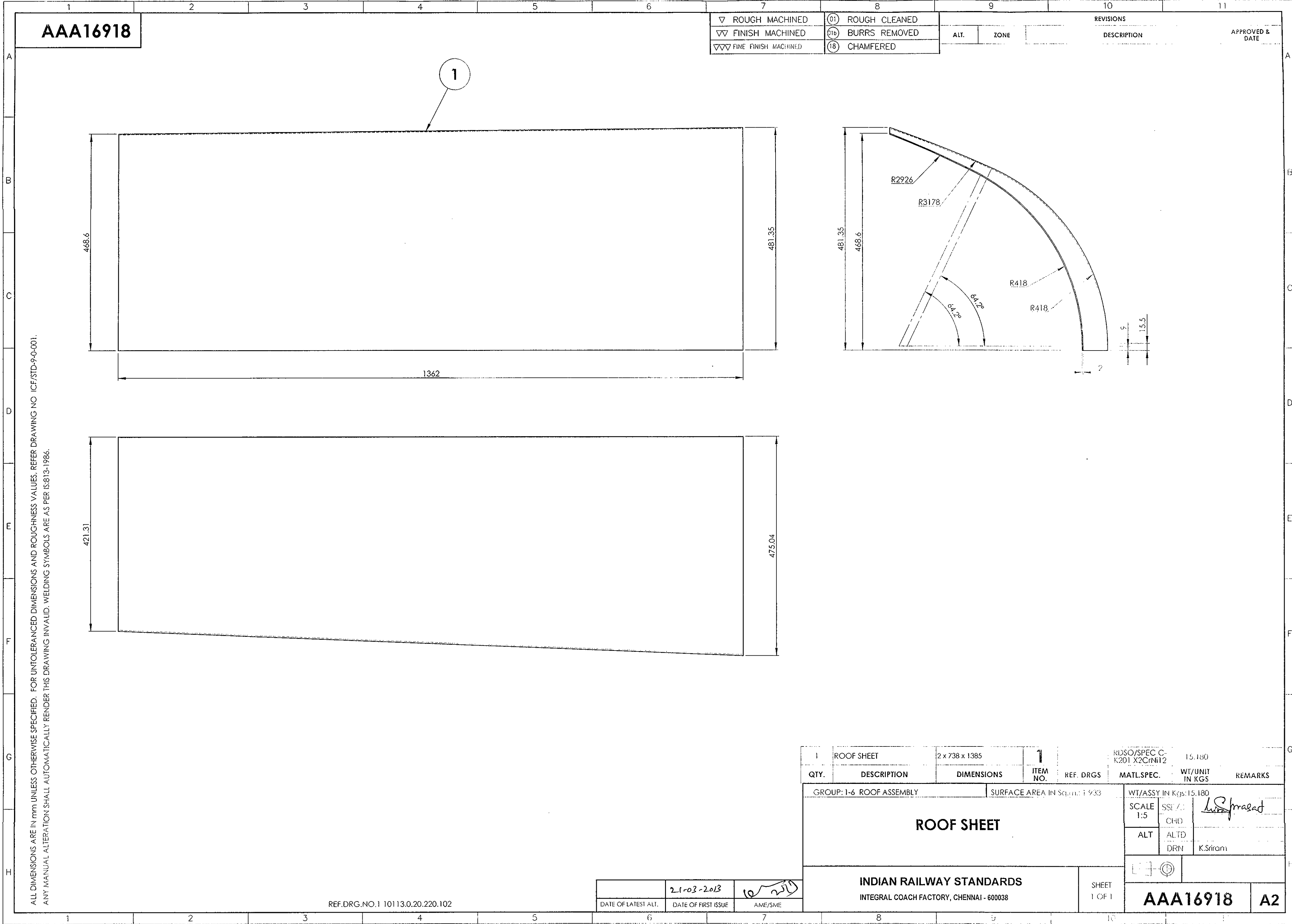
REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		ITEM-1 CUTAWAY REVISED. VIEWS UPDATED.	



1	ROOF SHEET	2 x 740 x 1099	1		RDSO/SPEC C-K201 X2CrNi12	8.879		
Default	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	
GROUP: 1-6 ROOF ASSEMBLY			SURFACE AREA IN Sq.m : 1.137		WT/ASSY IN Kgs:8.879			
ROOF SHEET					SCALE 1:5	SSE/D		
						CHD		
					ALT a	ALTD	E.SATHISH KUMAR	
						DRN	K.Sriram	
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1				
					AAA16917		A2	


12/2/26	21-03-2013	
DATE OF LATEST ALT	DATE OF FIRST ISSUE	A.M.E./S.M.E.

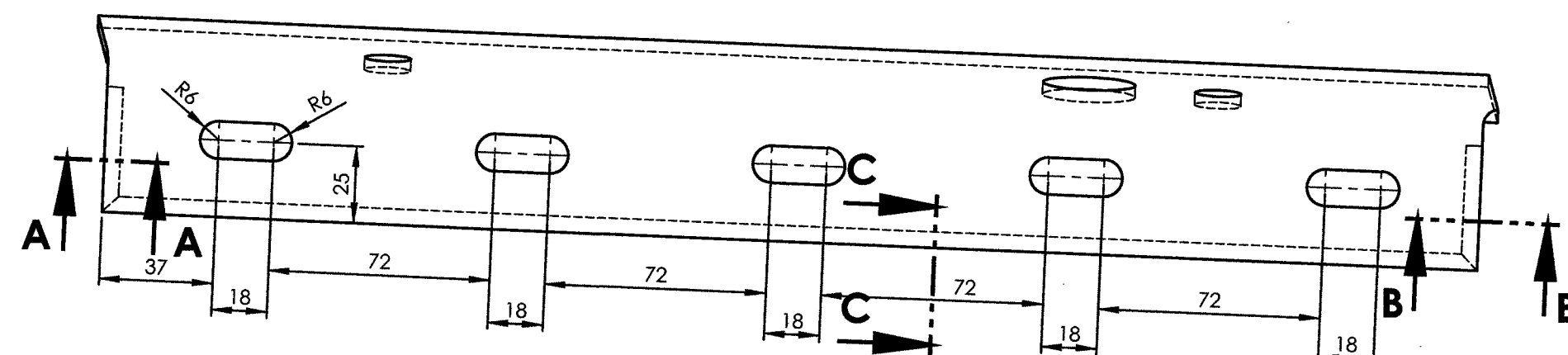
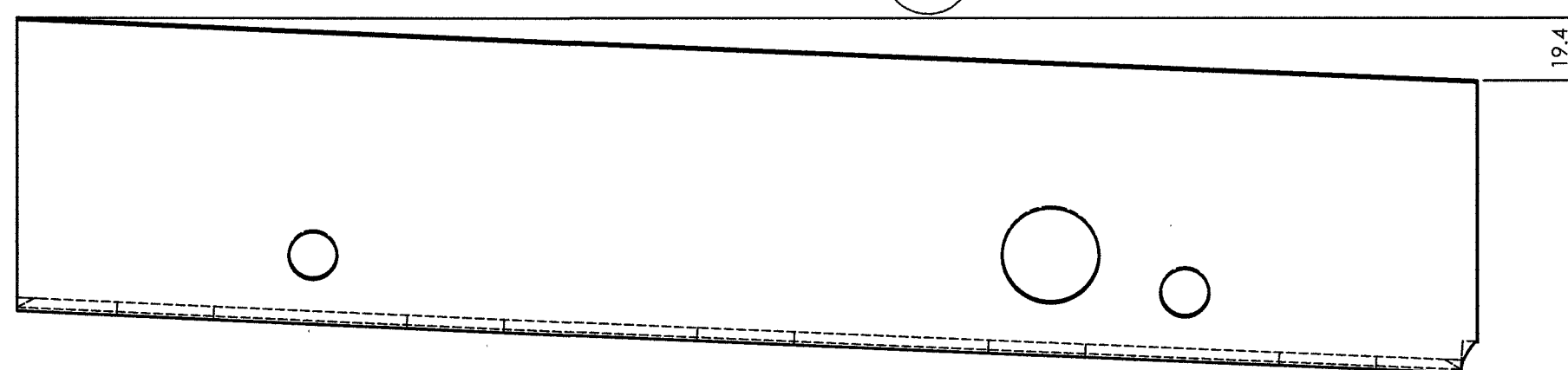
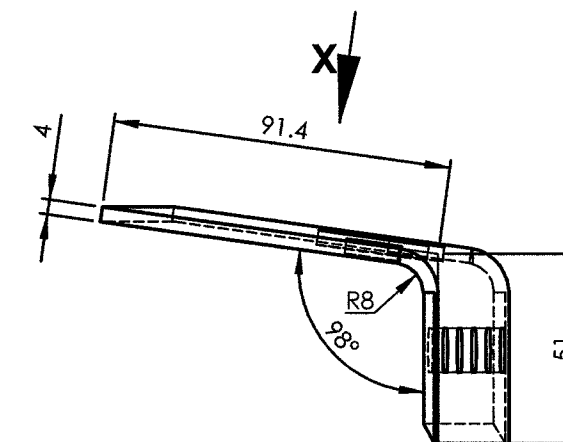
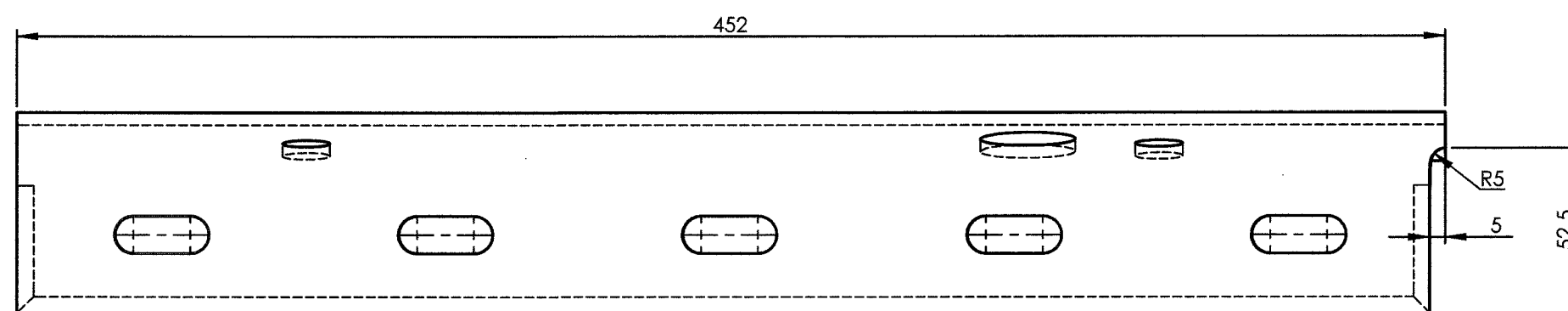
REF.DRG.NO.1 10113.20.220.101



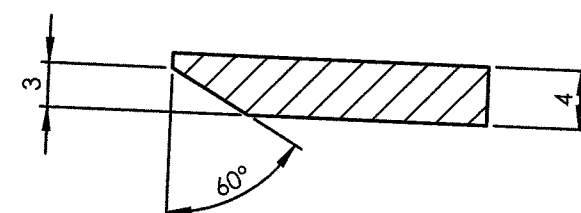
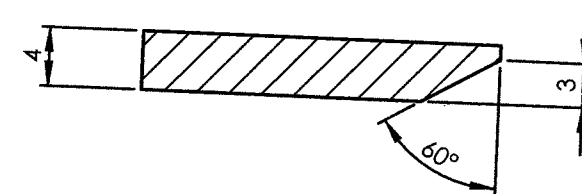
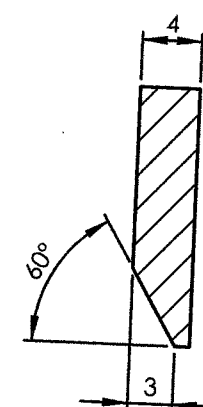
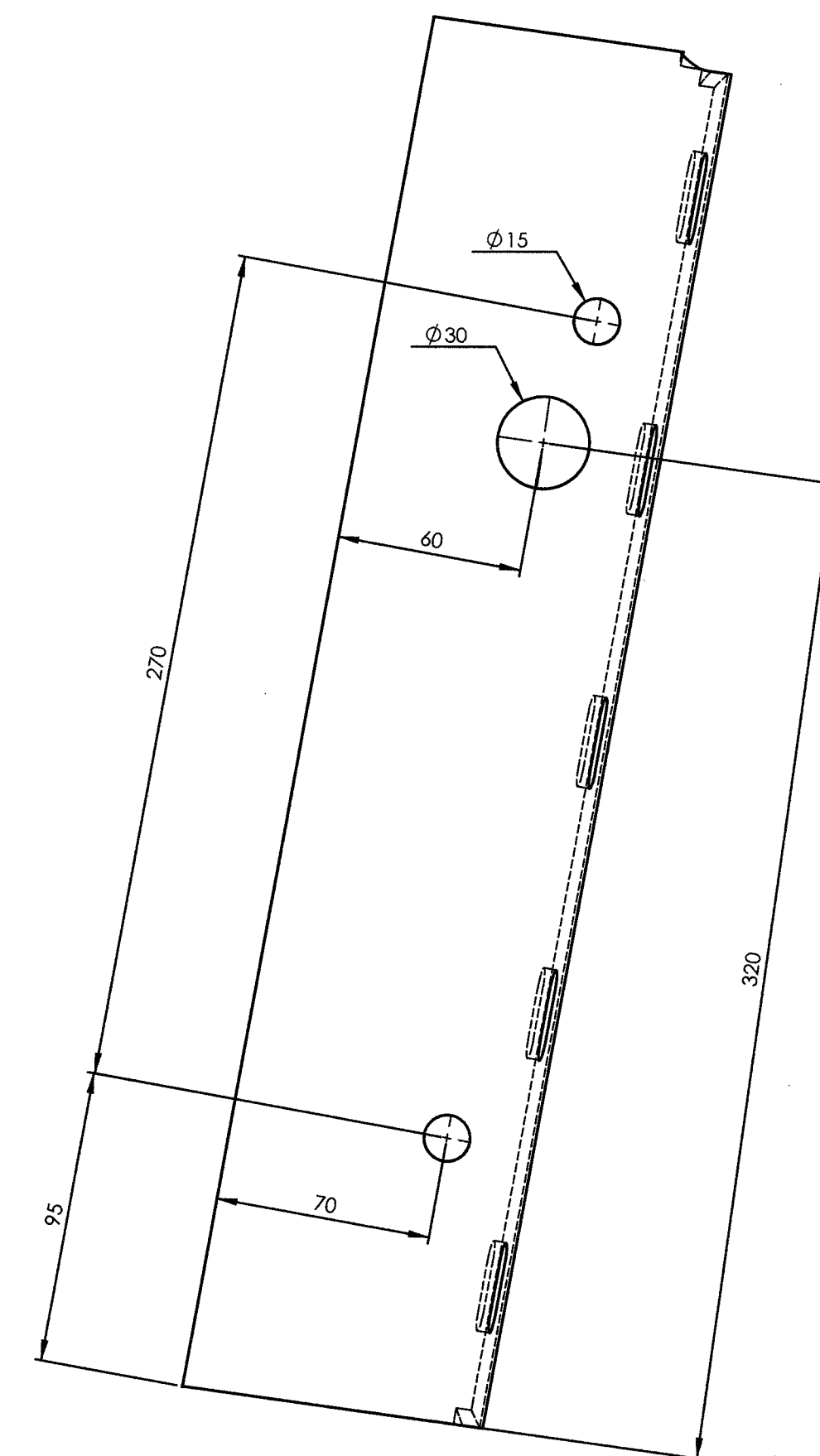
AAA16920

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	①b BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	①B CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
a		Ø 30 HOLES ADDED .	



VIEW Y

SECTION A-A
SCALE 2 : 1SECTION B-B
SCALE 2 : 1SECTION C-C
SCALE 2 : 1

VIEW X

1	STIFFENING ANGLE	4 x 157 x 458	1		RDSO/SPEC C-K201 X2CrNi12	1.838	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY					SURFACE AREA IN Sq.m.: 0.123		
STIFFENING ANGLE					WT/ASSY IN Kgs:		
					SCALE 1:2	SSE/D	K. Panduranga Rao
					ALT a	CHD	
						ALTD	E.SATHISH KUMAR
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038						DRN	K.Sriram
					SHEET 1 OF 1		
AAA16920							A2

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO. ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS813-1986. WEIGHT GIVEN IN DRAWING IS FOR INDICATIVE PURPOSE ONLY

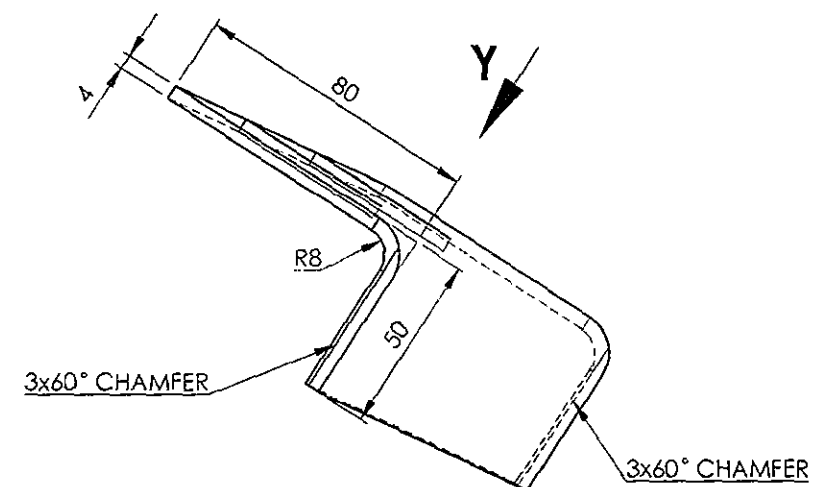
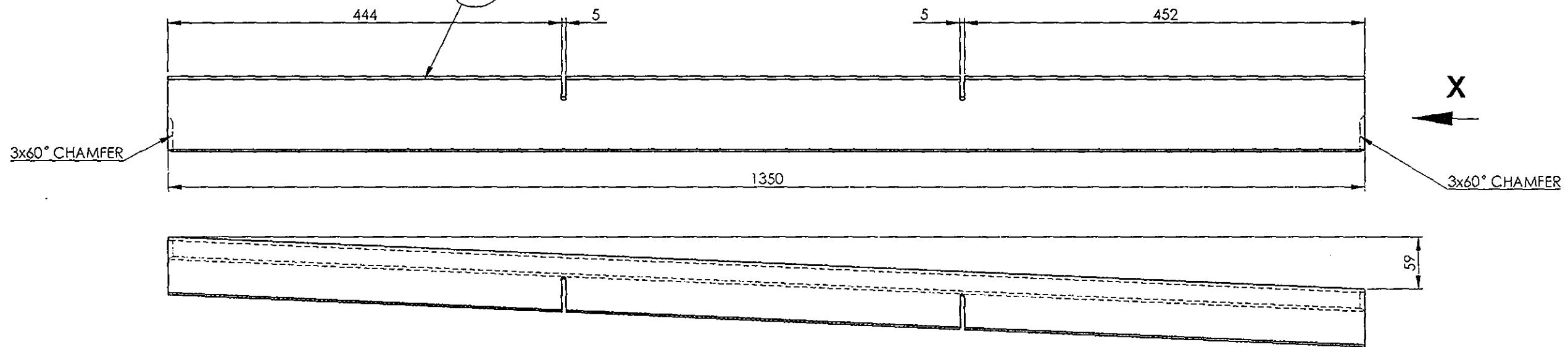
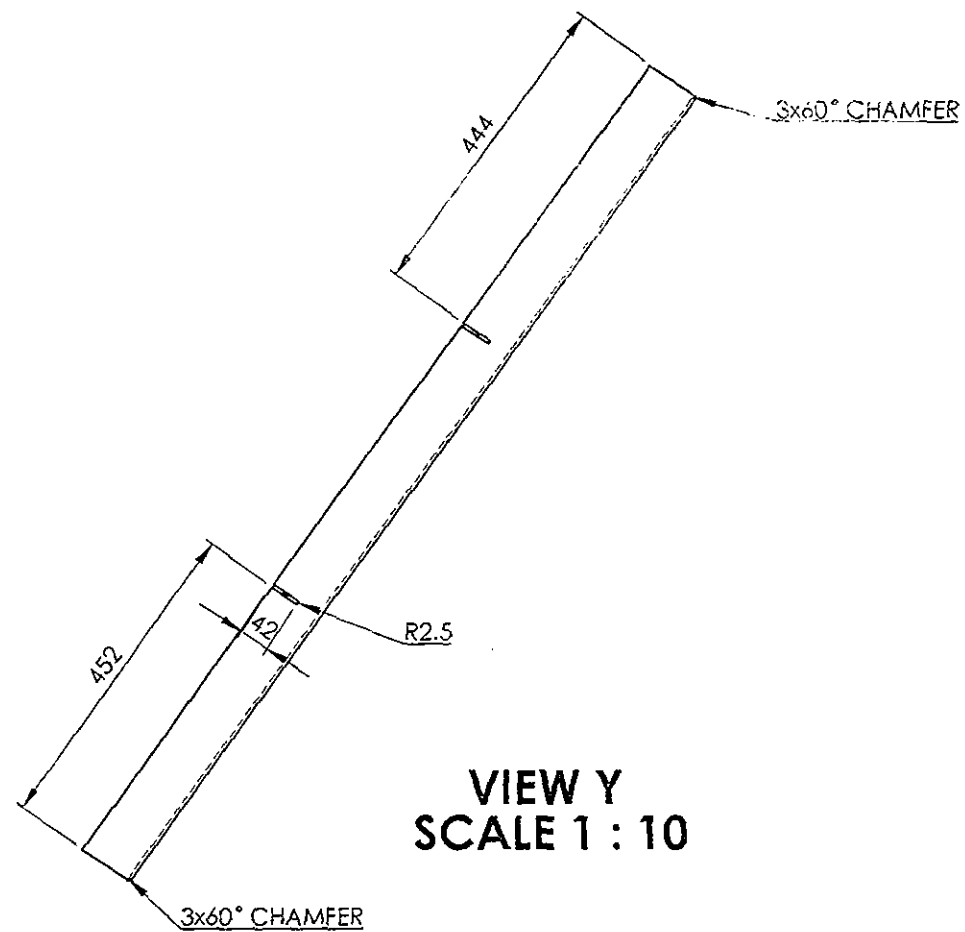
REF.DRG.NO.3 10113.0.20.200.119


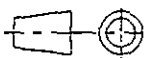
26-2-2019	21-3-2013	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

AAA16921

▽ ROUGH MACHINED	③ ROUGH CLEANED
▽▽ FINISH MACHINED	④ BURRS REMOVED
▽▽▽ FINE FINISH- VACUUM	⑤ CHAMFERED

REVISIONS				APPROVED & DATE	
ALT.	ZONE	DESCRIPTION			

VIEW X
SCALE 1 : 2VIEW Y
SCALE 1 : 10

1	STIFFENING ANGLE	4 x 121 x 1355	1		RDSO/SPEC C- K201 X2CrNi12	5.224	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.339			WT/ASSY IN Kgs:5.224		
STIFFENING ANGLE					SCALE	SSE/D	
					1:5	CHD	
					ALT.	ALTD	
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							
					SHEET 1 OF 1	AAA16921	
							A3

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICT/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.2 10113.0.20.200.109

DATE OF LATEST ALT.	21-03-2013	AME/SME
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AAA16922

▽ ROUGH MACHINED

① ROUGH CLEANED

▽▽ FINISH MACHINED

② BURRS REMOVED

▽▽▽ FINE FINISH VACUUMED

③ CHAMFERED

REVISIONS

ALT.

ZONE

DESCRIPTION

APPROVED &
DATE

1

3x60° CHAMFER

1350

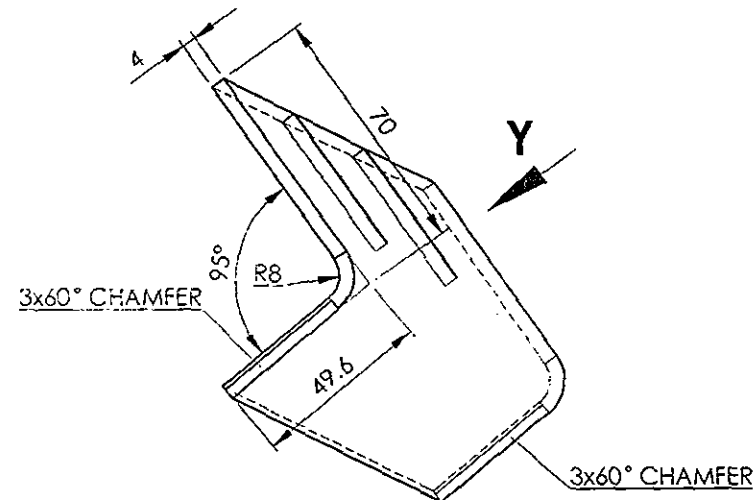
3x60° CHAMFER

X



58.9

3x60° CHAMFER

VIEW X
SCALE 1 : 2

VIEW Y

3x60° CHAMFER

452

R2.5

1	STIFFENING ANGLE	4 x 121 x 1350	1		RDSO/SPEC C- K201 X2CrNi12	4.841	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY				SURFACE AREA IN Sq.m.: 0.315		WT/ASSY IN Kgs: 4.841	
STIFFENING ANGLE					SCALE 1:5	SSE/D CHD	<i>K. Siram</i>
					ALT.	ALTD	
						DRN	K. Siram
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		AAA16922	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A3	

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD. 9.0.001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813:1986.

REF.DRG.NO.2 10113.0.20.200.111

21-03-2013

DATE OF LATEST ALT.

DATE OF FIRST ISSUE

AME/SME

INDIAN RAILWAY STANDARDS

INTEGRAL COACH FACTORY, CHENNAI - 600038

SHEET
1 OF 1

AAA16922

A3

AAA16923

▽ ROUGH MACHINED

⊙ ROUGH CLEANED

▽▽ FINISH MACHINED

⊙⊙ BURRS REMOVED

▽▽▽ FINE FINISH MACHINED

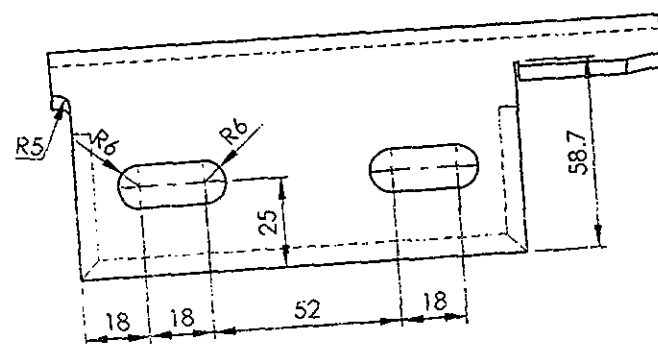
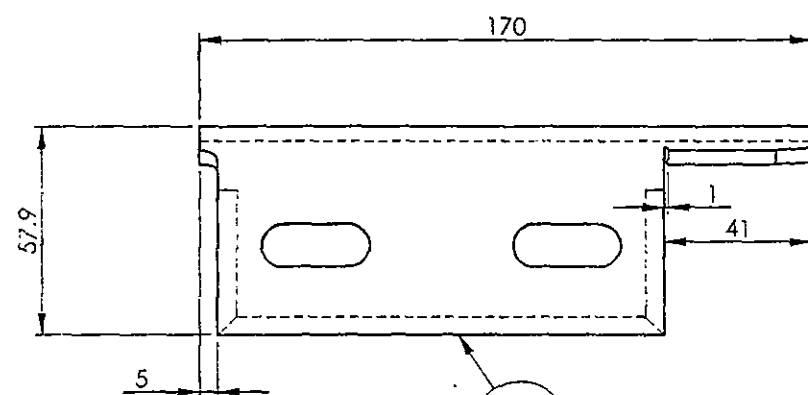
⊙⊙ CHAMFERED

REVISIONS

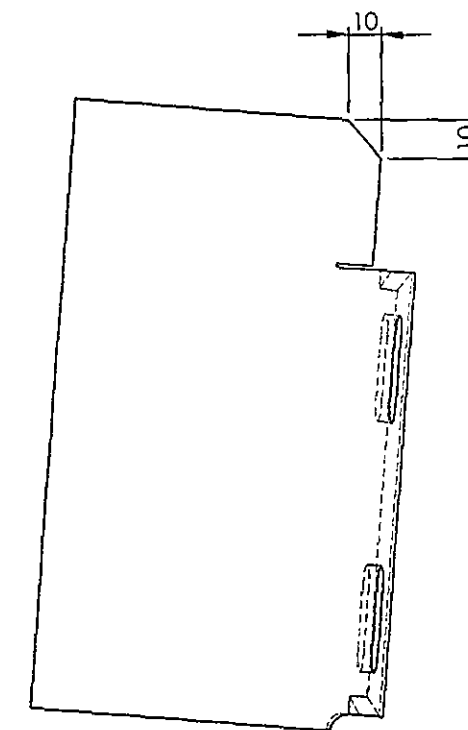
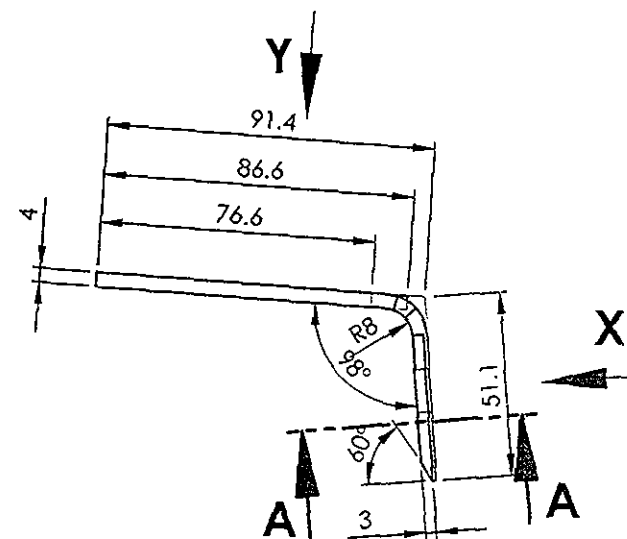
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ZONE

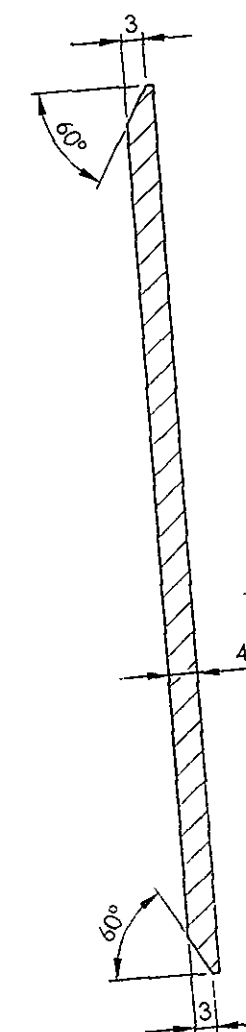
DESCRIPTION

APPROVED &
DATE

VIEW X



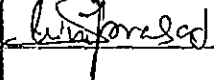
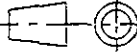
VIEW Y

SECTION A-A
SCALE 1:1

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO 10113.20.200.113.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.3 10113.20.200.113

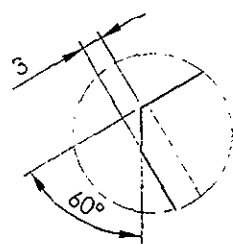
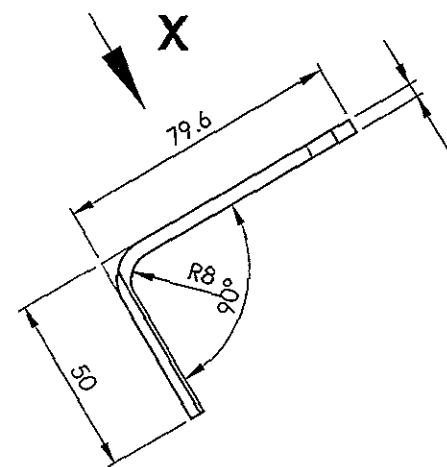
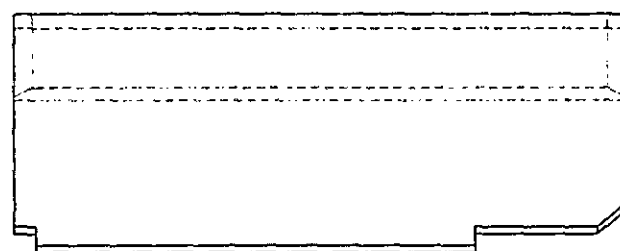
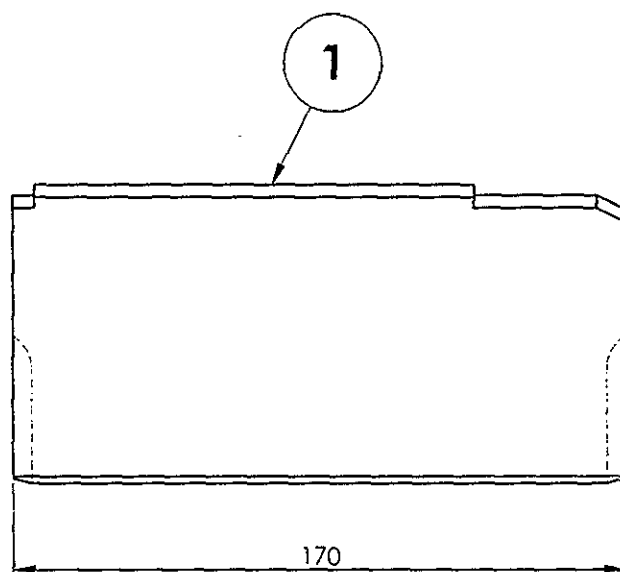
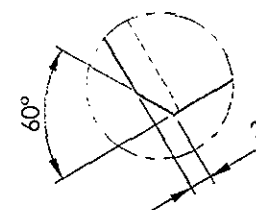
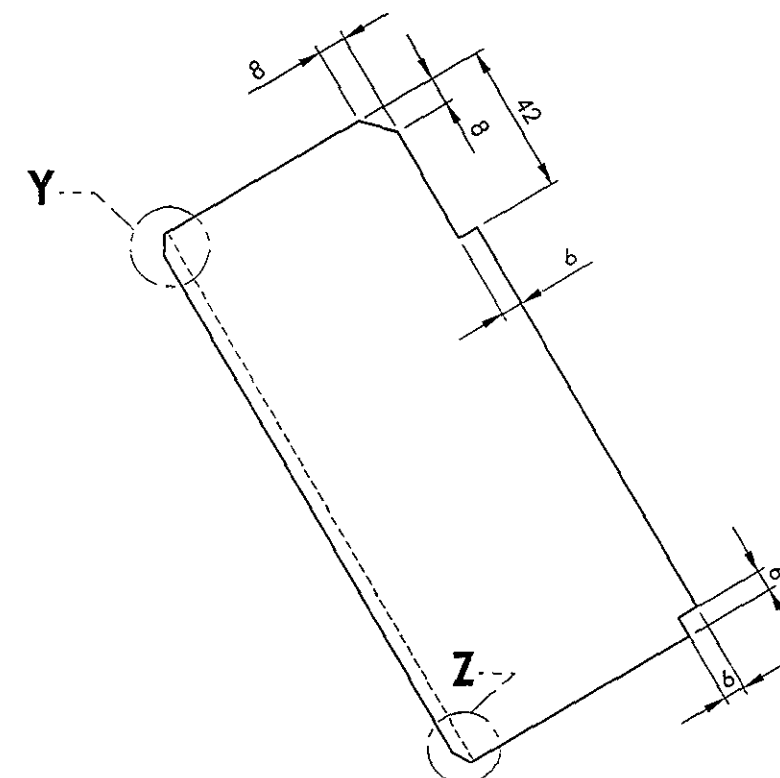
	21-03-2013	Ue 2013
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

1	STIFFENING ANGLE	4 x 136 x 170	1		RDSO/SPEC C- K201 X2 Cr Ti 12	0.631	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.043			WT/ASSY IN Kgs:0.631		
STIFFENING ANGLE					SCALE	SSE/D	
					1:2	CHD	
					ALT.	ALTD	
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1			
					AAA16923		A3

AAA16924

▽ ROUGH MACHINED	③ ROUGH CLEANED
▽▽ FINISH MACHINED	④ BURRS REMOVED
▽▽▽ FINISH MACHINED	⑤ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE

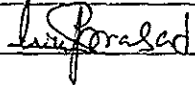
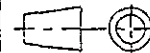
DETAIL Y
SCALE 1:1DETAIL Z
SCALE 1:1

VIEW X

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9 0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.3 10113.20.200.115

DATE OF LATEST ALT.	21-03-2013	AME/SME
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1	STIFFENING ANGLE	4 x 121 x 170	1		RDSO/SPEC C-K201 X2CrNi12	0.644	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.043			WT/ASSY IN Kgs:0.644		
STIFFENING ANGLE					SCALE 1:2	SSE/D	
						CHD	
					ALT.	ALTD	
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							
					SHEET 1 OF 1	AAA16924	A3

AAA16926

▽ ROUGH MACHINED

⑦ ROUGH CLEANED

▽▽ FINISH MACHINED

⑧ BURRS REMOVED

▽▽▽ FINISH VACUUM

⑧ CHAMFERED

REVISIONS

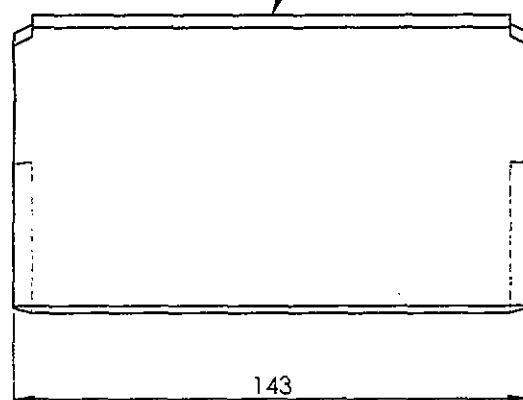
ALT.

ZONE

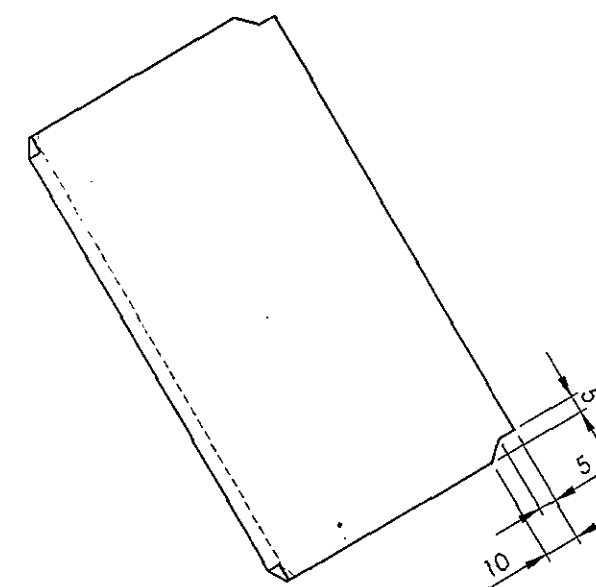
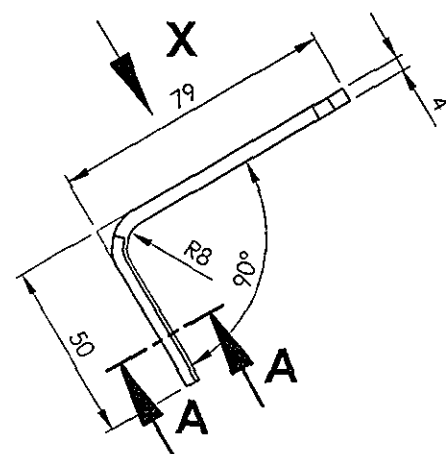
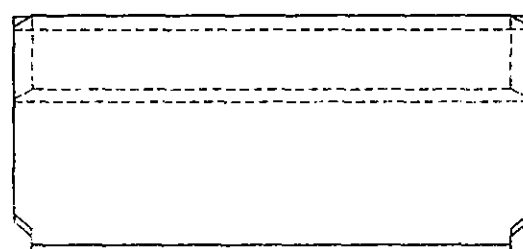
DESCRIPTION

APPROVED &
DATE

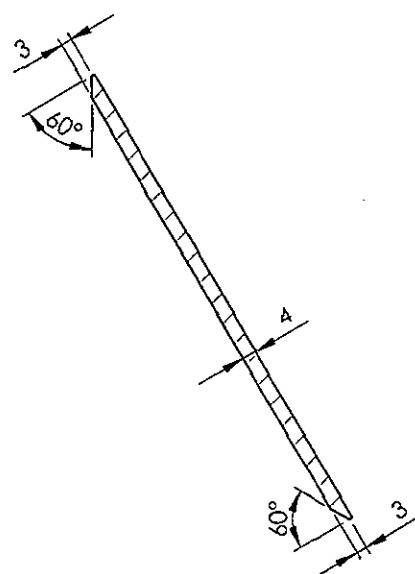
1




143



VIEW X



SECTION A-A

1	STIFFENING ANGLE	4 x 121 x 143	1		RDSO/SPEC C- K201 X2CrNi12	0.544		
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS	
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.036			WT/ASSY IN Kgs:0.544			
STIFFENING ANGLE					SCALE	SSE/D	<i>Signature</i>	
					1:2	CHD		
					ALT.	ALTD	K.Srirom	
						DRN		
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							AAA16926	A3
					SHEET 1 OF 1			

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/SID 9 0 001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.3 10113.0.20.200.123

21-03-2013

DATE OF LATEST ALT.

DATE OF FIRST ISSUE

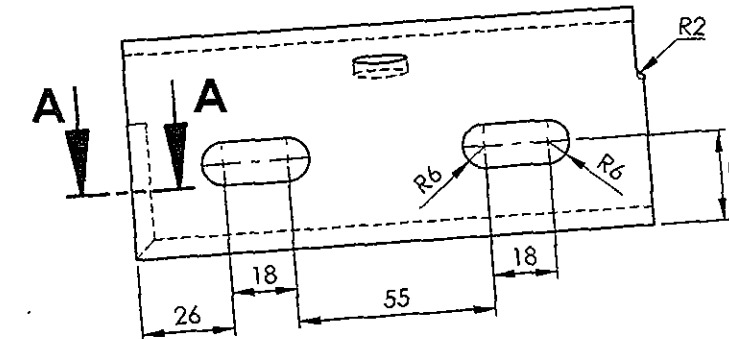
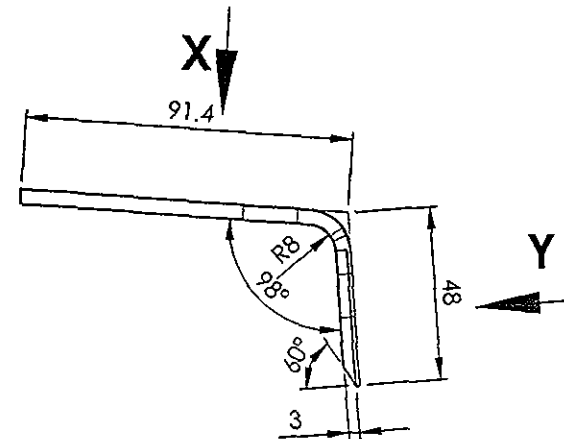
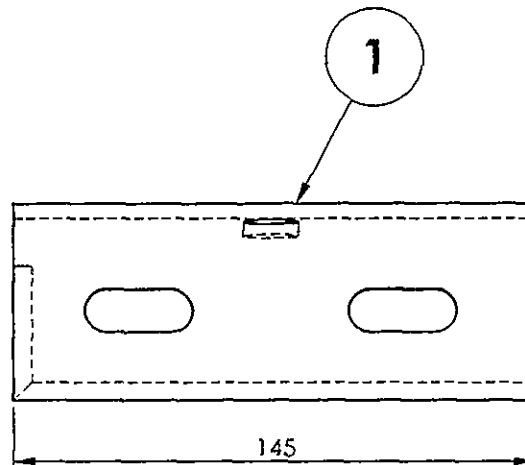
AME/SME

AAA16927

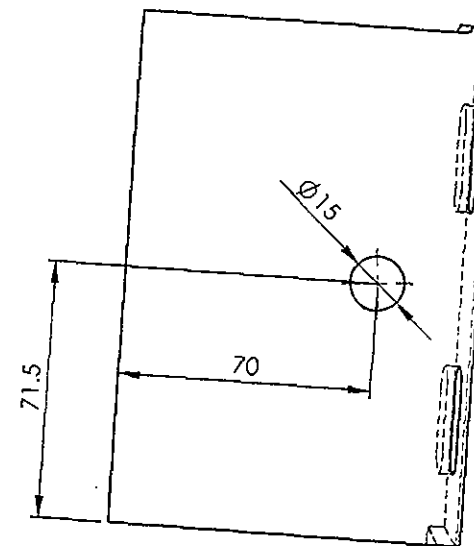
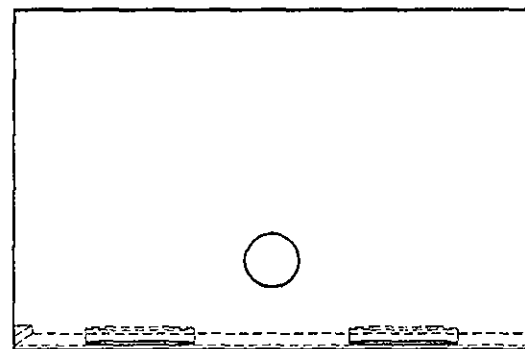
▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS

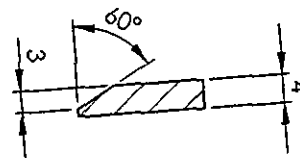
ALT.	ZONE	DESCRIPTION	APPROVED & DATE
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VIEW Y



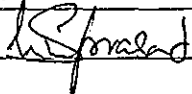
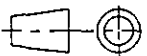
VIEW X

SECTION A-A
SCALE 1:1

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/SID-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.3 10113.0.20.200.125

	21-03-2013	
DATE OF LATEST ALT.	DATE OF FIRST ISSUE	AME/SME

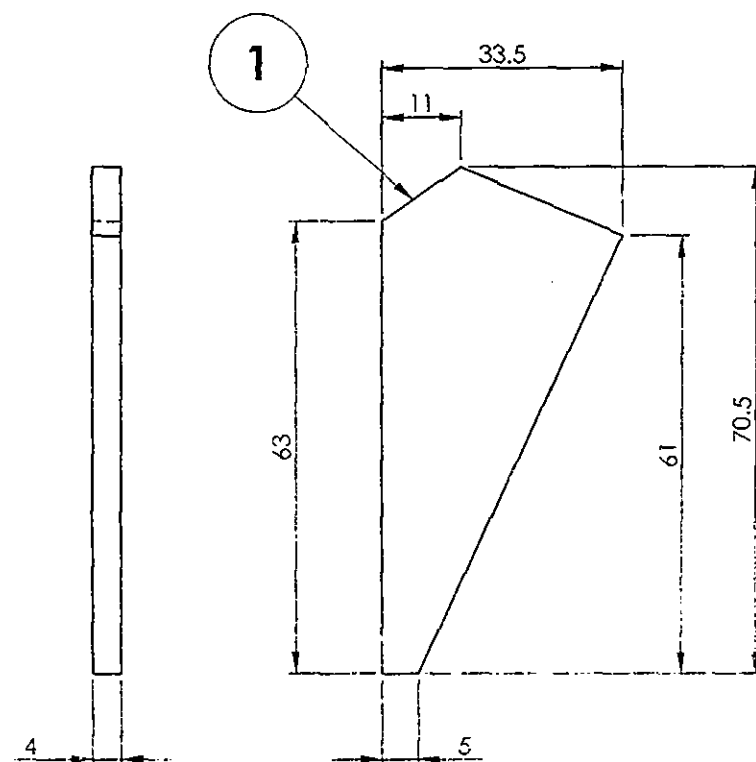
1	STIFFENING ANGLE	4 x 135 x 145	1		RDSO/SPEC C- K201 X2CrNi12	0.573	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.039			WT/ASSY IN Kgs:0.573		
STIFFENING ANGLE					SCALE	SSE/D	
					1:2	CHD	
					ALT.	ALTD	
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							
					SHEET 1 OF 1		AAA16927

AAA16929

▽ ROUGH MACHINED	③ ROUGH CLEANED
▽▽ FINISH MACHINED	④ BURRS REMOVED
▽▽▽ -1.5 - 1.5 - 1.5 - 1.5	⑤ CHAMFERED

REVISIONS

ALT.	ZONE	DESCRIPTION	APPROVED & DATE
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1	RIB	4 x 33.5 x 70.5	1		RDSO/SPEC C- K201 X2 Cr Ni 12	0.043	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY				SURFACE AREA IN Sq.m.:0.003		WT/ASSY IN Kgs:0.043	
RIB					SCALE	SSE/D	K. Srirom
					1:1	CHD	
					ALT.	ALTD	
						DRN	
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		AAA16929	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A3	
DATE OF LATEST ALT.		DATE OF FIRST ISSUE		AME/SME			
		21-03-2013					

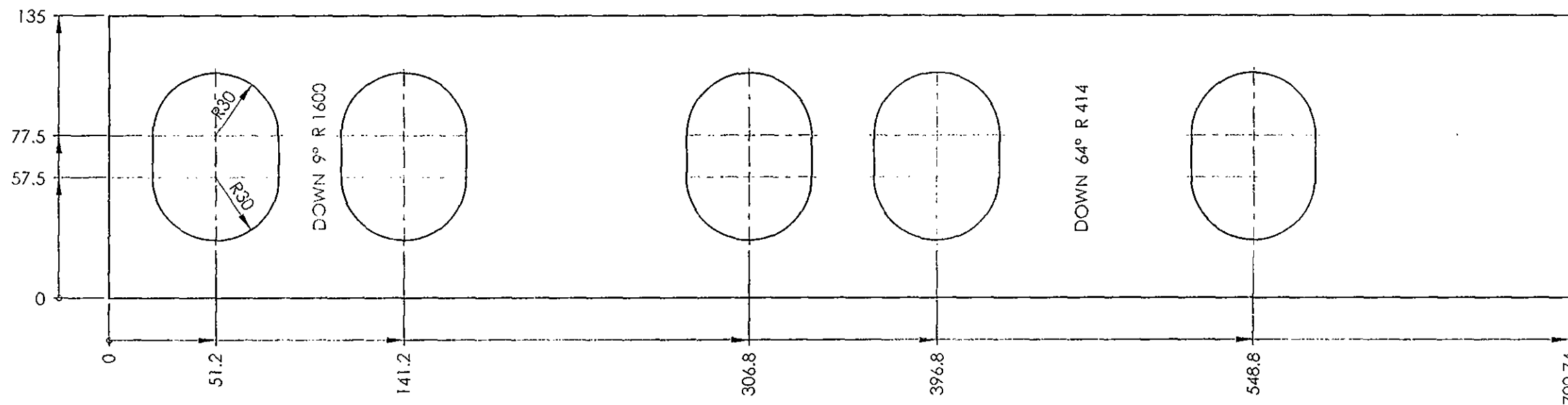
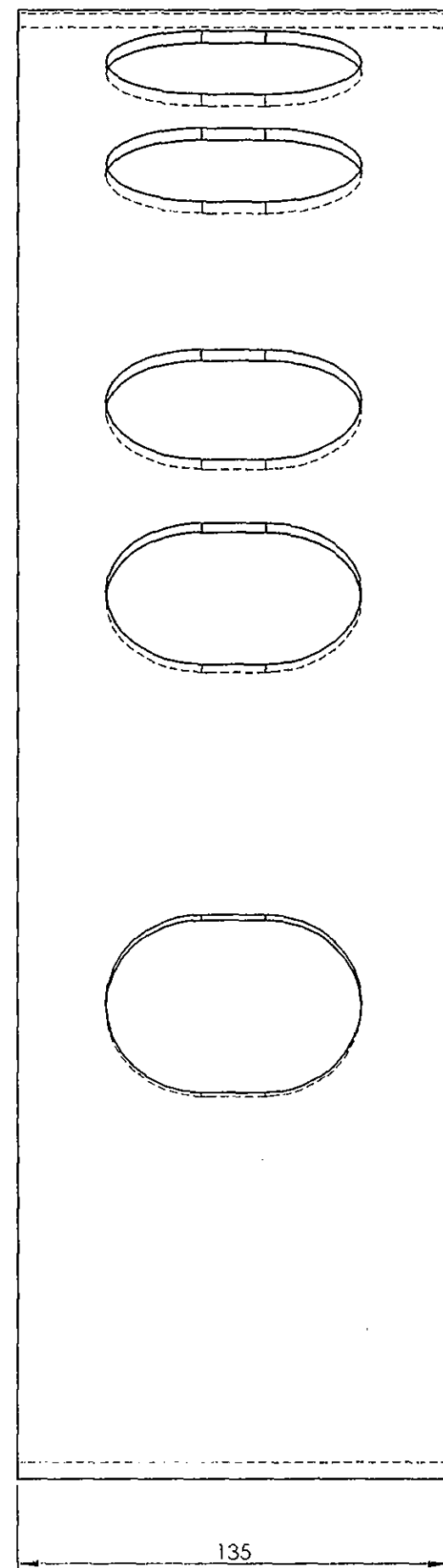
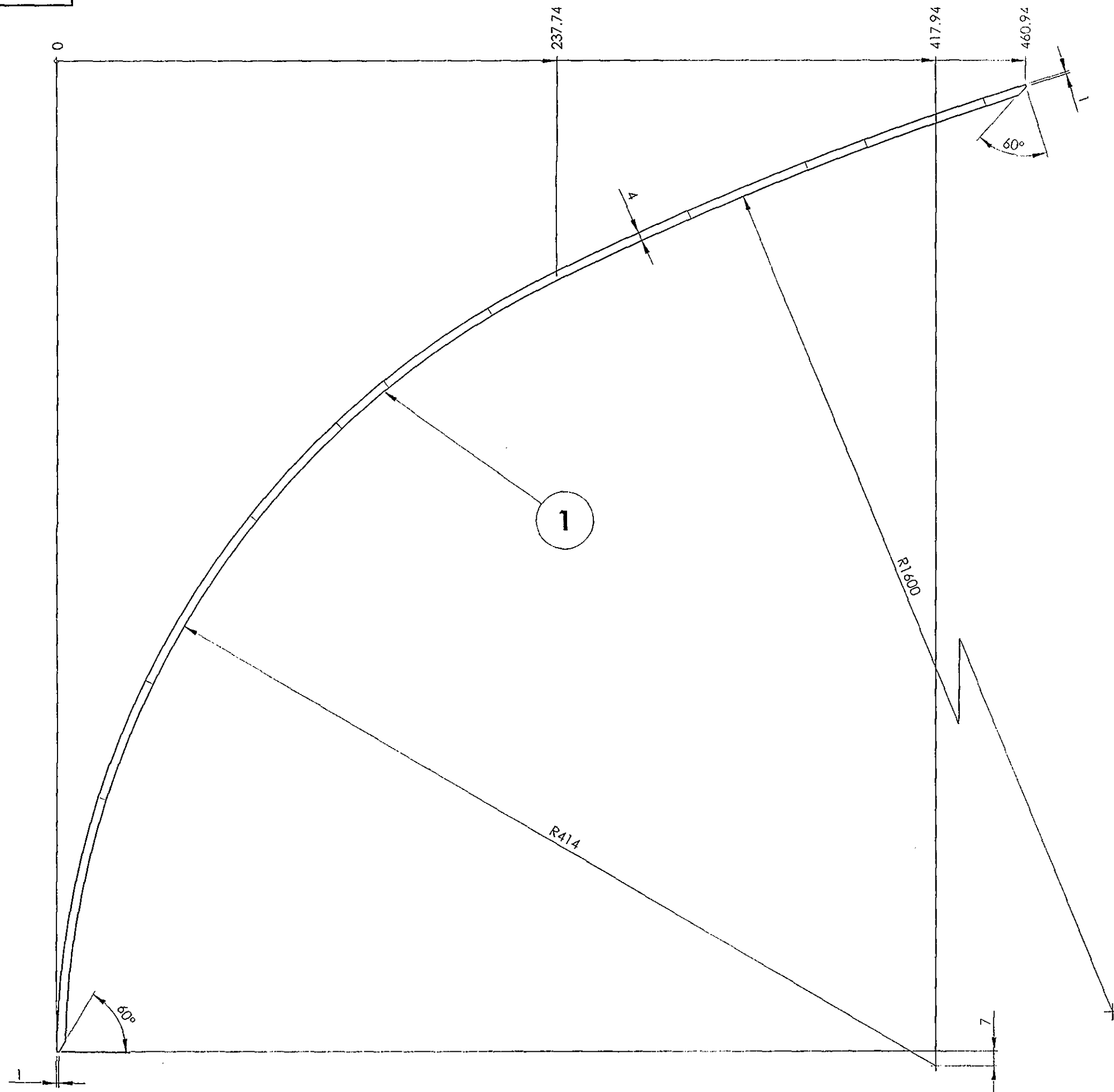
ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD 9 0 001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813-1986.

REF.DRG.NO.4 10113.0.20.200.138

AAA16932

▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

REVISIONS			APPROVED & DATE
ALT.	ZONE	DESCRIPTION	



DEVELOPMENT VIEW

REF.DRG.NO.3 10113.0.20.210.117

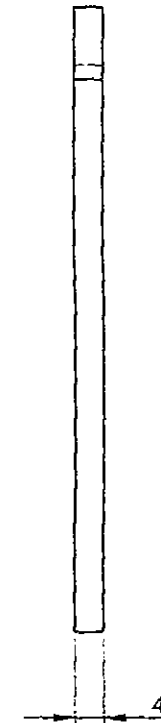
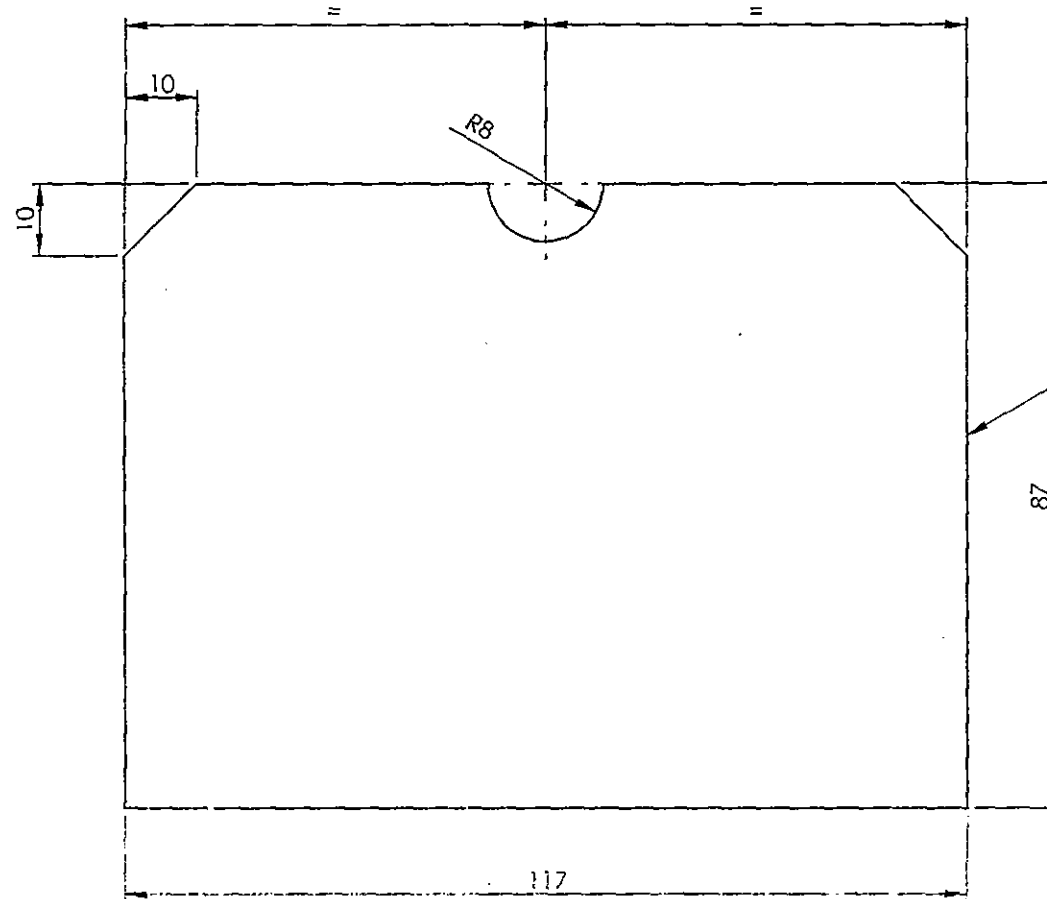
DATE OF LATEST ALT.	21-03-2013	AME/SME
DATE OF FIRST ISSUE		

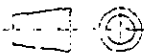
QTY.	FLANGE	4 x 135 x 701	ITEM NO. 1	REF. DRGS.	MATL. SPEC. KDSO/SPEC C 1-01 X2Cn112	WT/UNIT IN KGS 2.367	RE MARKS
GROUP: I-6 ROOF ASSEMBLY				SURFACE AREA IN Sq.m: 0.160		WT/ASSY IN Kgs: 2.367	
FLANGE				SCALE 1:2	SSE/D CHD	K. Sriram	
				ALT	ALTD		
				DRN			
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1		AAA16932	
INTEGRAL COACH FACTORY, CHENNAI - 600038						A2	

AAA16933

▽ ROUGH MACHINED	⊖ ROUGH CLEANED
▽▽ FINISH MACHINED	⊖⊖ BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	⊖⊖⊖ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE



1	WEB	4 x 87 x 117	1		RDSO/SPEC C- K201 X2CrNi12	0.319	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.022			WT/ASSY IN Kgs:0.319		
WEB					SCALE	SSE/D	<i>Unsprayed</i>
					1:1	CHD	
					ALT.	ALTD	
						DRN	K.Srirom
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038							
					SHEET 1 OF 1		AAA16933

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICE/STD 9 0 001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS: 813:1986.

REF.DRG.NO.3 10113.0.20.200.122

1	2	3	4	5	6	7	8	
AAA16934			▽ ROUGH MACHINED	⊙ ROUGH CLEANED	REVISIONS			
			▽▽ FINISH MACHINED	⊙⊙ BURRS REMOVED	ALT.	ZONE	DESCRIPTION	APPROVED & DATE
			▽▽▽ FINISH VACUUMED	⊙⊙⊙ CHAMFERED				

SECTION A-A

1	STIFFENING ANGLE	4 x 117 x 118	1		RDSO/SPEC C-K201 X2CrNi12	0.434	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.029		WT/ASSY IN Kgs:0.434			
<h2 style="margin: 0;">STIFFENING ANGLE</h2>						SCALE	SSE/D
						1:1	CHD
						ALT.	ALT.D
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600039				SHEET 1 OF 1			
					AAA16934		

REF.DRG.NO.3 10113.0.20.200.124

21-03-2013

AME/SME

DATE OF LATEST ALT.

DATE OF FIRST ISSUE

AME/SME

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AAA16934

▽ ROUGH MACHINED	⊙ ROUGH CLEANED
▽▽ FINISH MACHINED	⊙⊙ BURRS REMOVED
▽▽▽ FINISH VACUUMED	⊙⊙⊙ CHAMFERED

REVISIONS			
ALT.	ZONE	DESCRIPTION	APPROVED & DATE

SECTION A-A

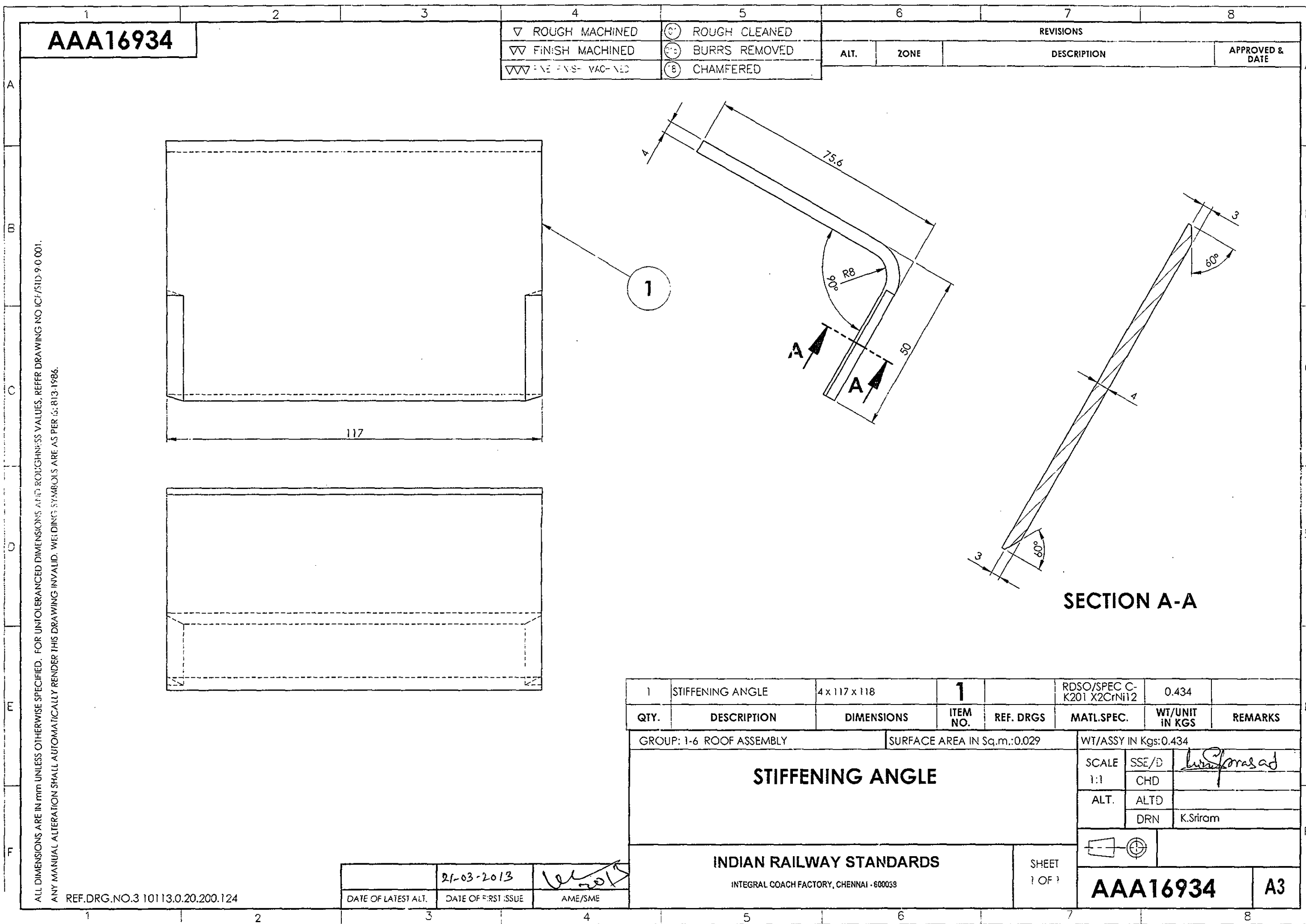
1	STIFFENING ANGLE	4 x 117 x 118	1		RDSO/SPEC C-K201 X2CrNi12	0.434	
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.:0.029		WT/ASSY IN Kgs:0.434			
STIFFENING ANGLE						SCALE	SSE/D
						1:1	CHD
						ALT.	ALT.D
						DRN	K.Sriram
INDIAN RAILWAY STANDARDS				SHEET 1 OF 1			
INTEGRAL COACH FACTORY, CHENNAI - 600039							
DATE OF LATEST ALT.		21-03-2013	AME/SME				
DATE OF FIRST ISSUE							

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO IC/STD.9.0.001. ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:813-1986.

REF.DRG.NO.3 10113.0.20.200.124

AAA16934

A3



1		2		3		4		5		6		7		8		
AAA16934				▽ ROUGH MACHINED		⊙ ROUGH CLEANED		REVISIONS								
				▽▽ FINISH MACHINED		⊙⊙ BURRS REMOVED		ALT.		ZONE		DESCRIPTION			APPROVED & DATE	
				▽▽▽ FINISH VACUUMED		⊙⊙⊙ CHAMFERED										

AAA16935

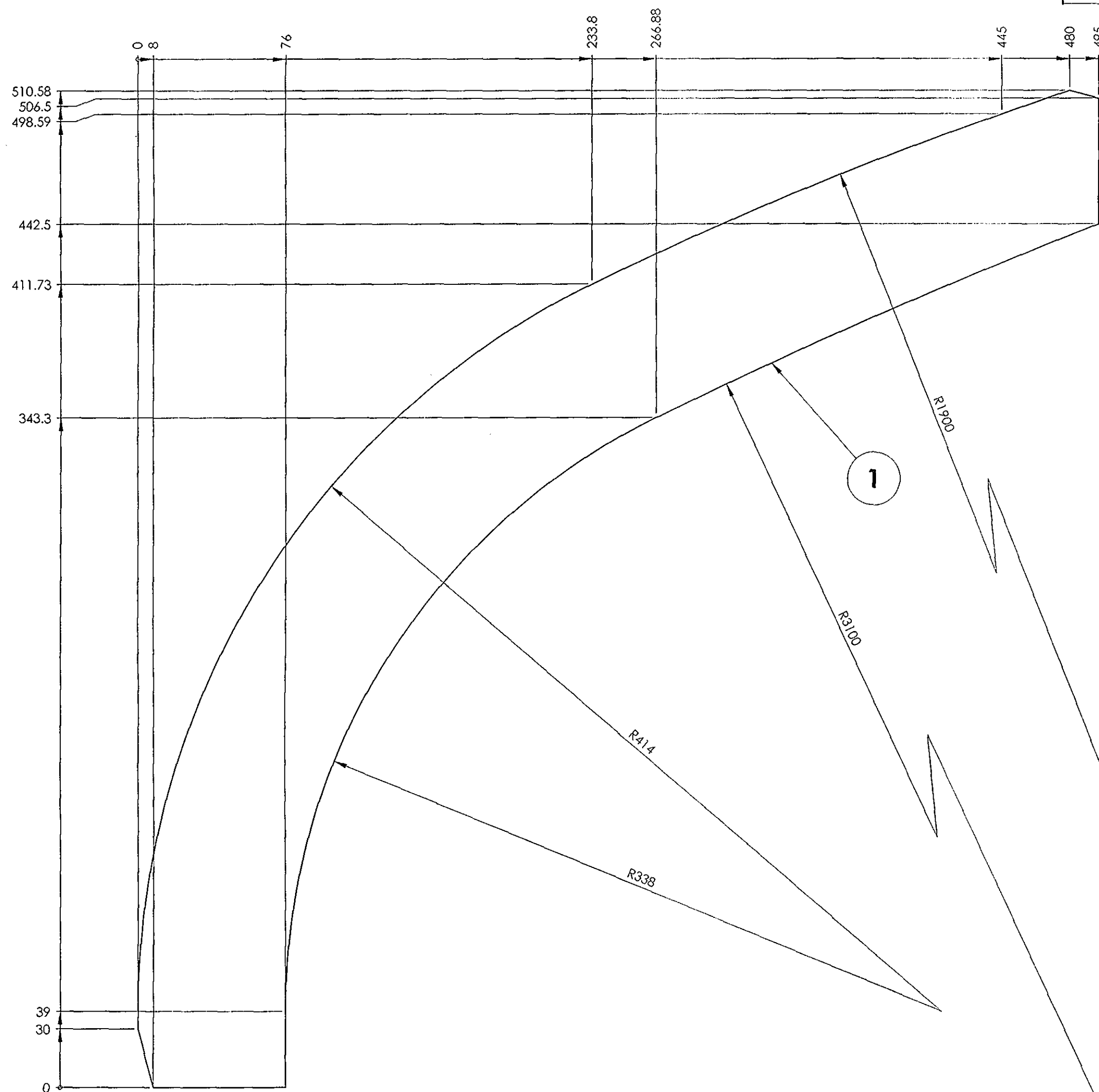
▽ ROUGH MACHINED	① ROUGH CLEANED
▽▽ FINISH MACHINED	② BURRS REMOVED
▽▽▽ FINE FINISH MACHINED	③ CHAMFERED

ALT.

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REVISIONS

DESCRIPTION

APPROVED &
DATE

ALL DIMENSIONS ARE IN mm UNLESS OTHERWISE SPECIFIED. FOR UNTOLERANCED DIMENSIONS AND ROUGHNESS VALUES, REFER DRAWING NO ICF/STD-9-0-001.
ANY MANUAL ALTERATION SHALL AUTOMATICALLY RENDER THIS DRAWING INVALID. WELDING SYMBOLS ARE AS PER IS:813-1986.

REF.DRG.NO.2 10113.0.20.210.104

DATE OF LATEST ALT.	21-03-2013	AME/SME
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1	ROOF ARCH	4 x 495 x 511	1	RDSO/SPEC C- K201 X2CrNi12	1.737		
QTY.	DESCRIPTION	DIMENSIONS	ITEM NO.	REF. DRGS	MATL.SPEC.	WT/UNIT IN KGS	REMARKS
GROUP: 1-6 ROOF ASSEMBLY		SURFACE AREA IN Sq.m.: 0.115		WT/ASSY IN Kgs: 1.737			
ROOF ARCH				SCALE 1:2	SSE/D CHD	<i>K. Sriram</i>	
				ALT	ALTD		
				DRN	K. Sriram		
INDIAN RAILWAY STANDARDS INTEGRAL COACH FACTORY, CHENNAI - 600038				SHEET 1 OF 1		AAA16935 A2	