

REVISIONS			
REV	DESCRIPTION	DATE	APVD

# MECH 72165 - YEAR 2 PROJECT

## GROUP 1

DAVID LUTELMOWSKI & NAMOSHI BHATT

SUBMITTED: DECEMBER 11, 2020

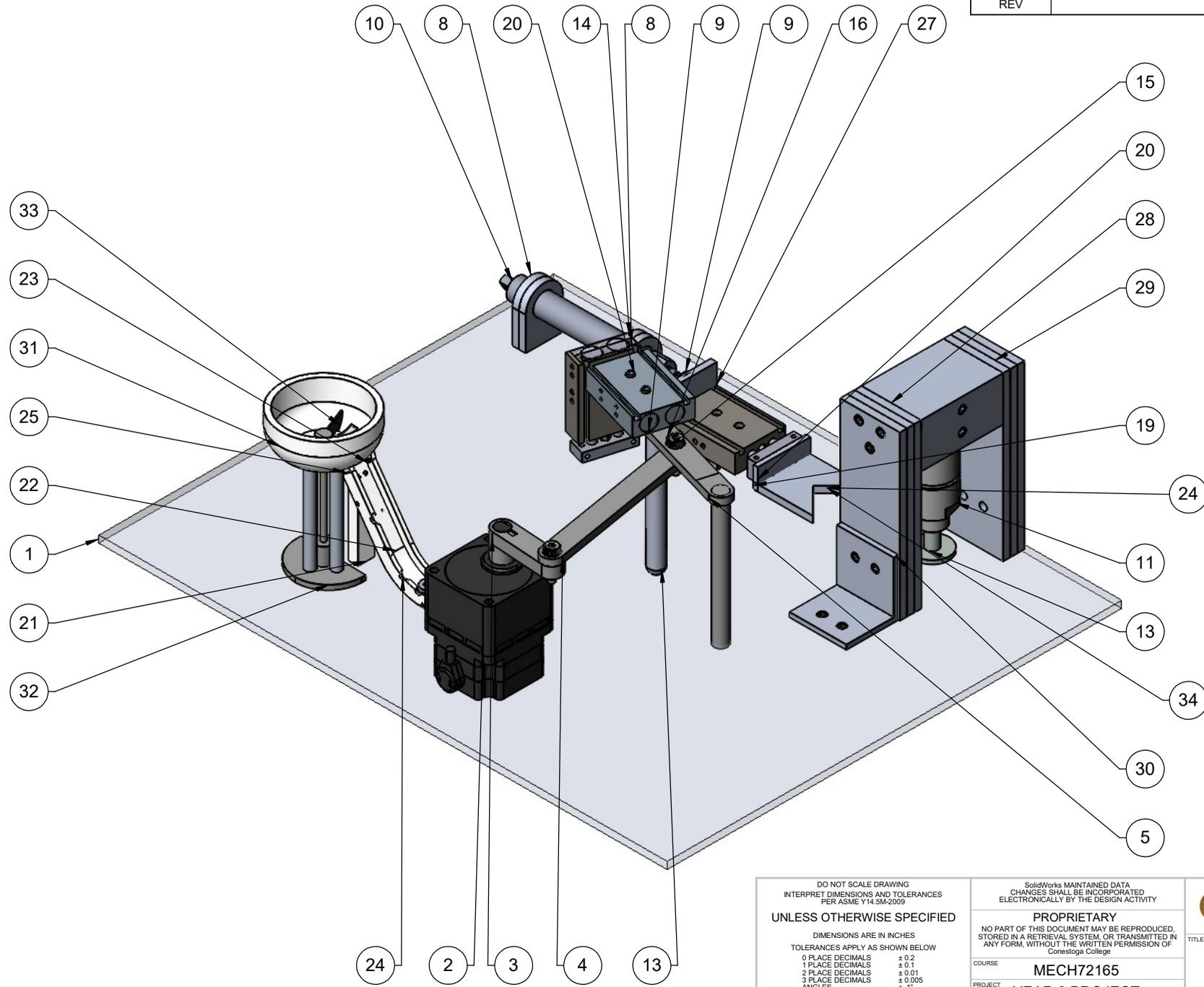
SUBMITTED TO: ANDREW CAMPBELL

DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009  <b>UNLESS OTHERWISE SPECIFIED</b>  DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY  <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		 <b>CONESTOGA</b> Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
<b>THIRD ANGLE PROJECTION</b> 		COURSE <b>MECH 72165</b> PROJECT <b>YEAR 2 PROJECT</b>		TITLE <b>FINAL WORKING DRAWINGS</b>	
DRAWN BY <b>NA</b>		DATE <b>DEC. 11/20</b>		SIZE <b>B</b>	
CHECKED BY		DATE		REVISION <b>0</b>	
APPROVED		DATE		SCALE <b>1:2</b>	
				WEIGHT <b>SHEET 1 OF 29</b>	

REVISIONS			
REV	DESCRIPTION	DATE	APVD

**NOTES:**  
**CLEAN ALL EDGES/TAPPED HOLES ON ALUMINUM PARTS**  
**PRINT IN HIGHEST QUALITY FOR 3D PRINTED PARTS**

DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009  <b>UNLESS OTHERWISE SPECIFIED</b>  DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY  <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		 <b>CONESTOGA</b> Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
<b>THIRD ANGLE PROJECTION</b> 		COURSE <b>MECH 72165</b>		TITLE <b>FINAL WORKING DRAWINGS</b>	
DRAWN BY <b>NA</b>		DATE <b>DEC. 11/20</b>		SIZE <b>B</b>	
CHECKED BY		DATE		REVISION <b>0</b>	
APPROVED		DATE		SCALE <b>1:2</b>	
				WEIGHT <b>SHEET 2 OF 29</b>	



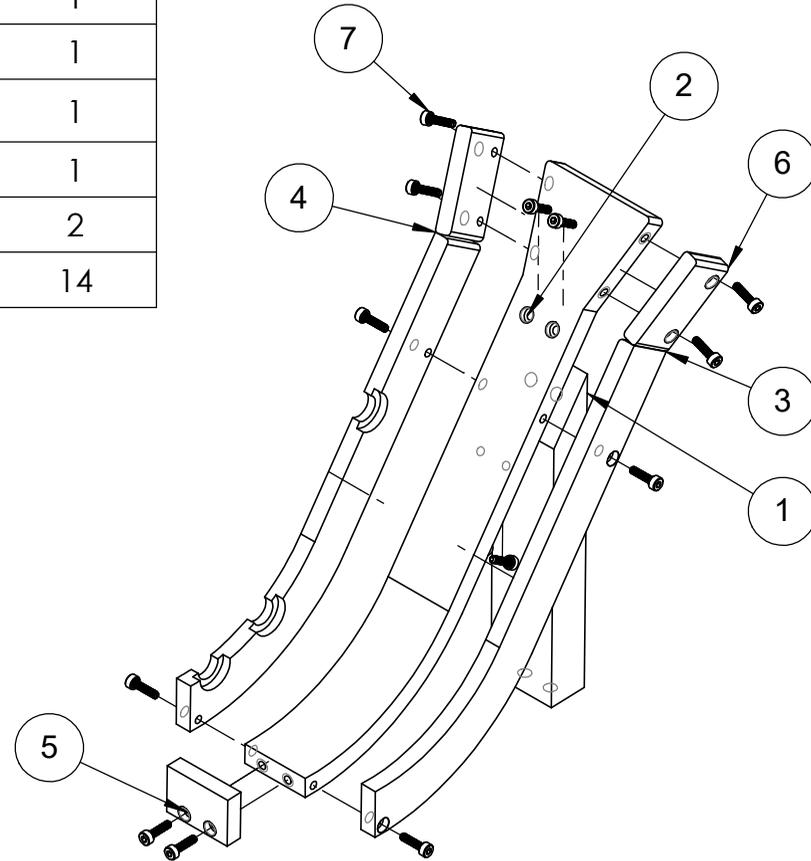
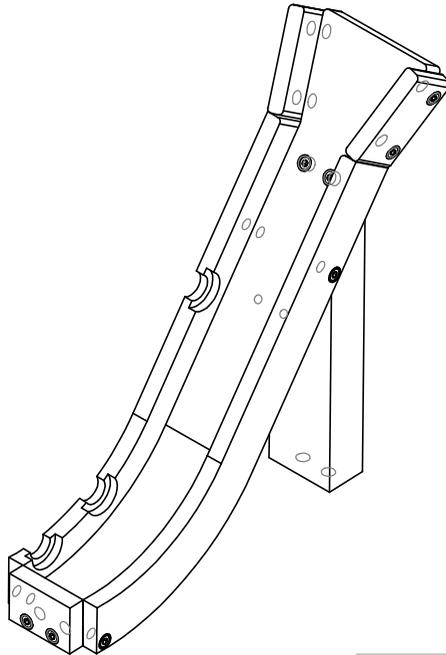
REVISIONS			
REV	DESCRIPTION	DATE	APVD
ITEM NO.	DESCRIPTION	SHEET NUMBER	
1	BASE PLATE	NA	
2	ROBOT MOTOR	NA	
3	LINK 1	19	
4	LINK 2	20	
5	LINK 3	21	
6	LINK 3 SUPPORT	25	
9	ACTUATOR 1	NA	
8	T-BRACKET	22	
9	ACUATOR 3	NA	
10	ACUATOR 4	NA	
11	ACUATOR 5	NA	
12	LOCK KEY	18	
13	MOVING SUPPORT	28	
14	T-BRACKET	29	
15	PLAIN BUSHING	24	
16	METRIC SOCKET HEAD SHOULDER SCREW 10M 2	NA	
19	INDEXER	27	
20	INDEXER TOP	26	
21	MAGAZINE BASE	5	
22	MAGAZINE BODY	6	
23	MAGAZINE RIGHT	8	
24	MAGAZINE LEFT	8	
25	MAGAZINE TOP	9	
26	MAGAZINE MOTOR MOUNT	7	
27	L-BRACKET	23	
28	PRESS MIDDLE	15	
29	PRESS SIDE	14	
30	PRESS BRACKETS	16	
31	HOPPER	12	
32	HOPPER POST	13	
32	HOPPER MOTOR MOUNT	10	
33	HOPPER MOTOR	11	

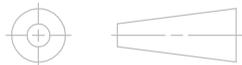
DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 <b>UNLESS OTHERWISE SPECIFIED</b> DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		<b>CONESTOGA</b> Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE <b>MECH72165</b> PROJECT <b>YEAR 2 PROJECT</b>		TITLE <b>FINAL ASSEMBLY</b>	
DRAWN BY <b>NAMOSHI BHATT</b>		DATE <b>DEC.11/20</b>		SIZE <b>B</b>	
CHECKED BY _____		DATE _____		REVISION <b>0</b>	
APPROVED _____		DATE _____		SCALE <b>1:4</b>	
				WEIGHT _____	
				SHEET 3 OF 29	

NOTES:

1. MATERIAL :  
POLYCARBONATE
2. SOCKET HEAD CAP  
SCREW (M2)

ITEM	PART NUMBER	QTY.
1	MAGAZINE BASE	1
2	MAGAZINE BODY	1
3	MAGAZINE SIDE-R	1
4	MAGAZINE SIDE-L	1
5	MAGAZINE BOTTOM	1
6	TOP SIDE PIECE	2
7	M2 - SCREW	14

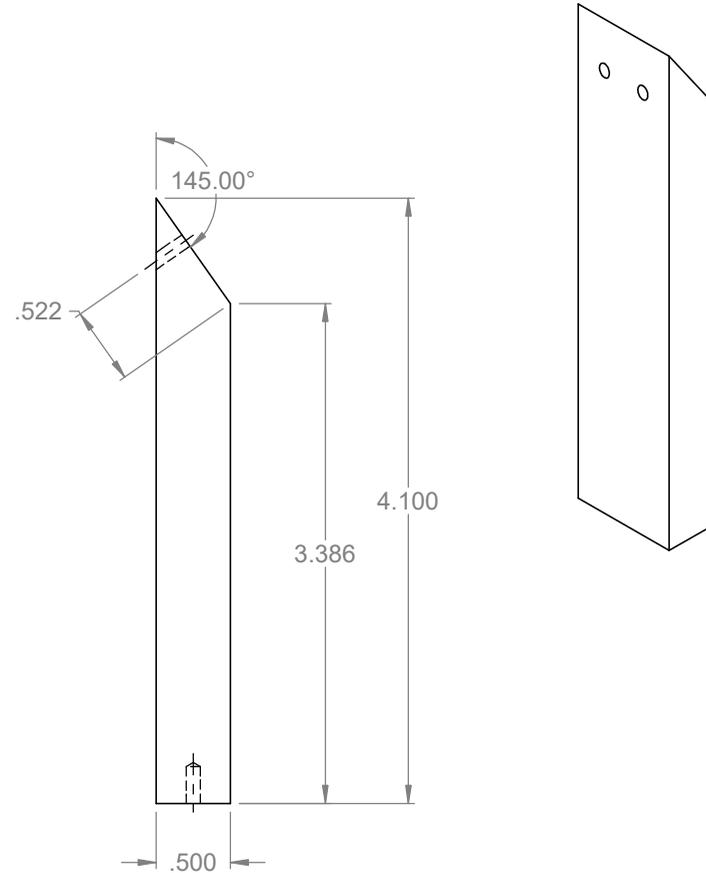
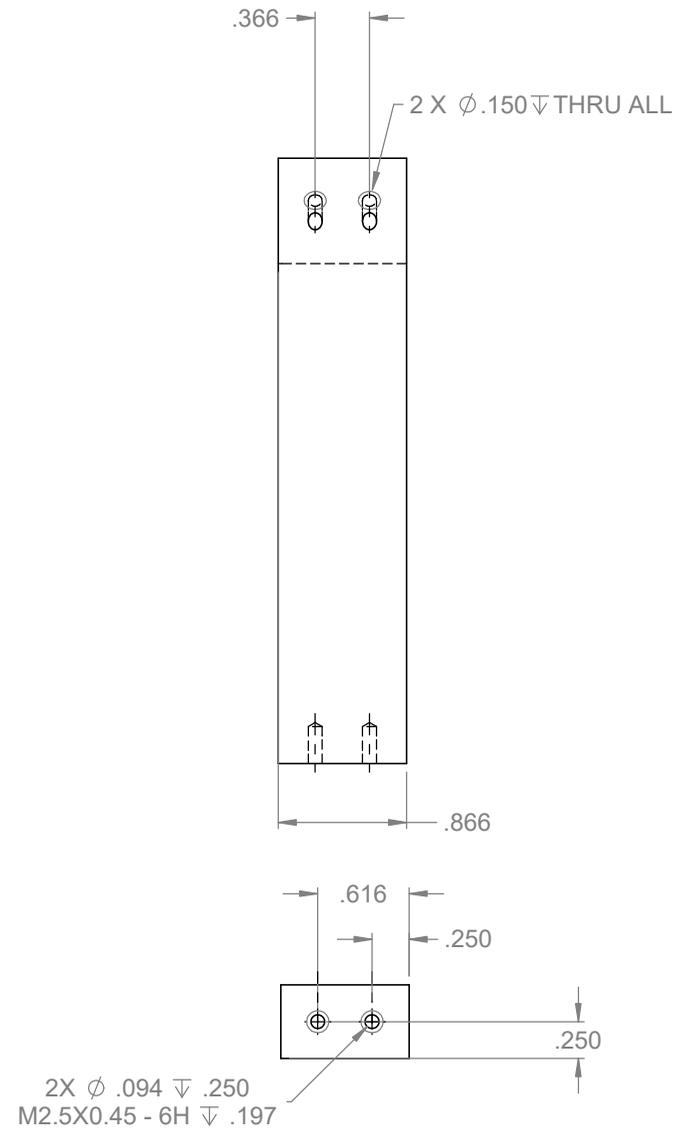


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009  UNLESS OTHERWISE SPECIFIED  DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± .1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY  PROPRIETARY NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College.		 <b>CONESTOGA</b> Connect Life and Learning		299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE <b>MECH2165</b> PROJECT <b>YEAR 2 PROJECT</b>		<b>MAGAZINE EXPLODED VIEW</b>			
DRAWN BY <b>DAVID LUTELMOWSKI</b> CHECKED BY APPROVED		DATE <b>DEC. 11/20</b> DATE DATE		SIZE <b>B</b> SCALE <b>1:2</b>		DRAWING NO. WEIGHT <b>0.193</b>	
						REVISION <b>0</b> SHEET 4 OF 29	

NOTES:

1. MATERIAL : POLYCARBONATE
2. QUANTITY: 1

REVISIONS			
REV	DESCRIPTION	DATE	APVD

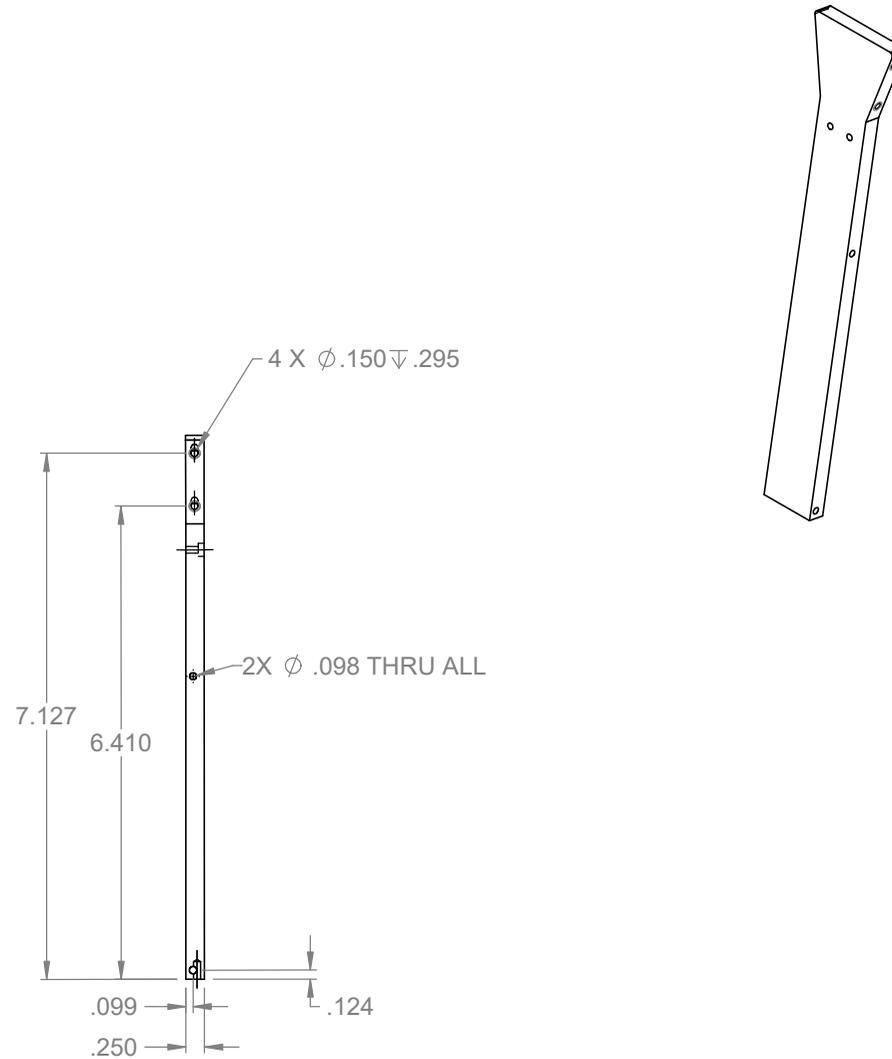
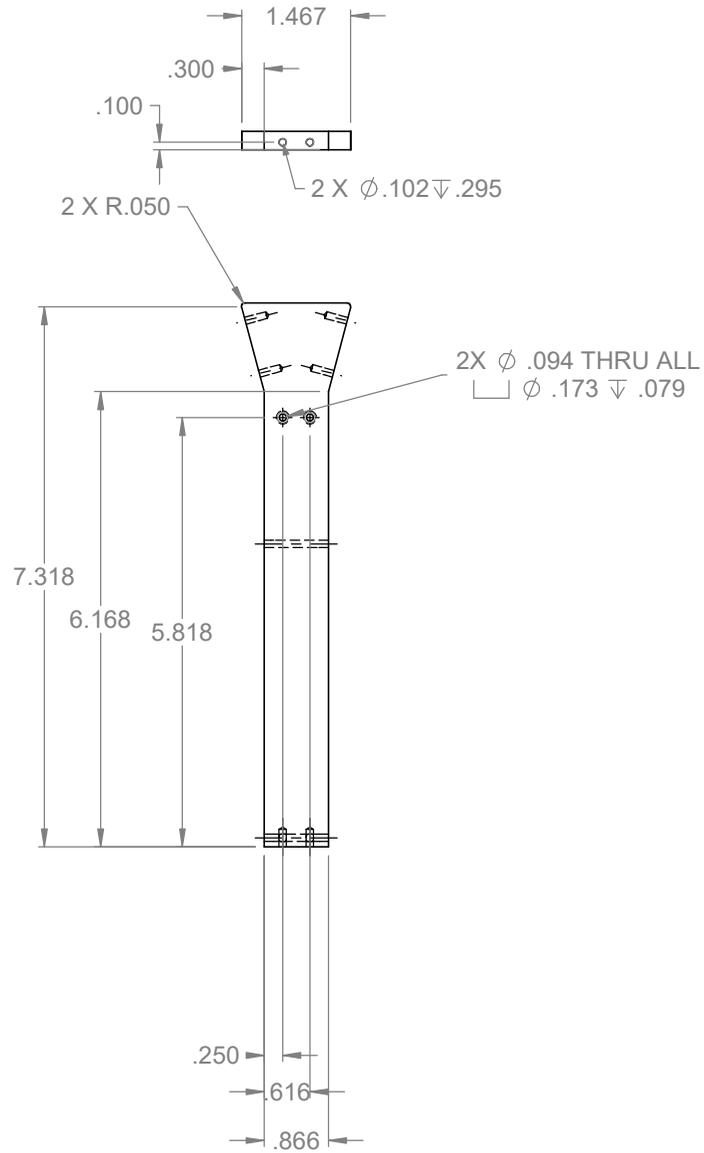


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p>UNLESS OTHERWISE SPECIFIED</p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 µ in</p> <p>THIRD ANGLE PROJECTION</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p>PROPRIETARY</p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE MECH72165</p> <p>PROJECT YEAR 2 PROJECT</p> <p>DRAWN BY DAVID LUTELMOWSKI</p> <p>CHECKED BY</p> <p>APPROVED</p>		<p>CONESTOGA Connect Life and Learning</p> <p>299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE <b>MAGAZINE BASE</b></p> <p>SIZE <b>B</b></p> <p>SCALE 1:1</p> <p>WEIGHT 0.055 lb</p>		<p>DATE DEC. 11/20</p> <p>REVISION <b>0</b></p> <p>SHEET 5 OF 29</p>	
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NOTES:

1. MATERIAL : POLYCARBONATE
2. QUANTITY: 1
3. WILL BE FORMED AFTER WITH HEAT

REVISIONS			
REV	DESCRIPTION	DATE	APVD

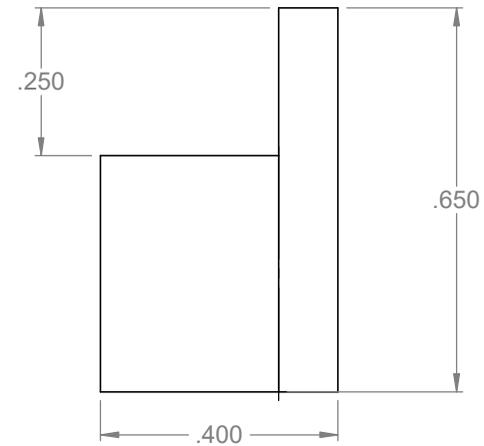
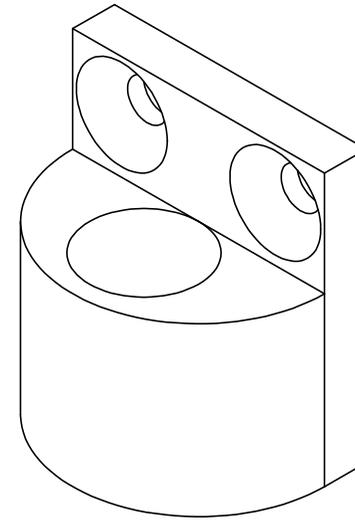
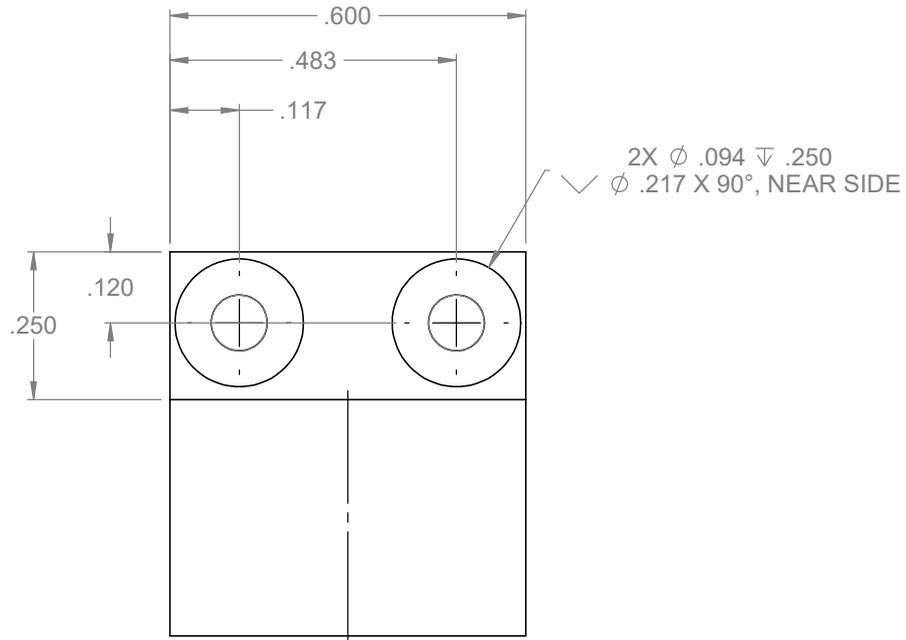
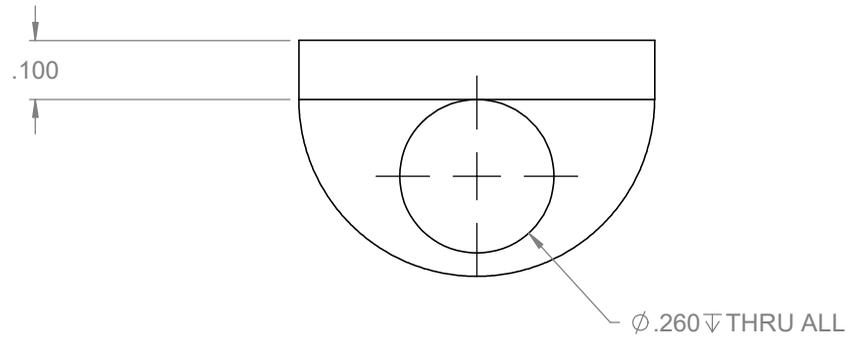


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 UNLESS OTHERWISE SPECIFIED</p> <p>DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in</p> <p>THIRD ANGLE PROJECTION</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p>PROPRIETARY NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE MECH72165</p> <p>PROJECT YEAR 2 PROJECT</p> <p>DATE DEC. 11/20</p> <p>CHECKED BY DAVID LUTELMOWSKI</p> <p>APPROVED</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE <b>MAGAZINE BODY</b></p> <p>SIZE <b>B</b></p> <p>SCALE 1:2</p> <p>WEIGHT 0.057 lb</p> <p>REVISION <b>0</b></p>	
		<p>SHEET 6 OF 29</p>			

NOTES:

1. MATERIAL : POLYCARBONATE
2. QUANTITY: 1

REVISIONS			
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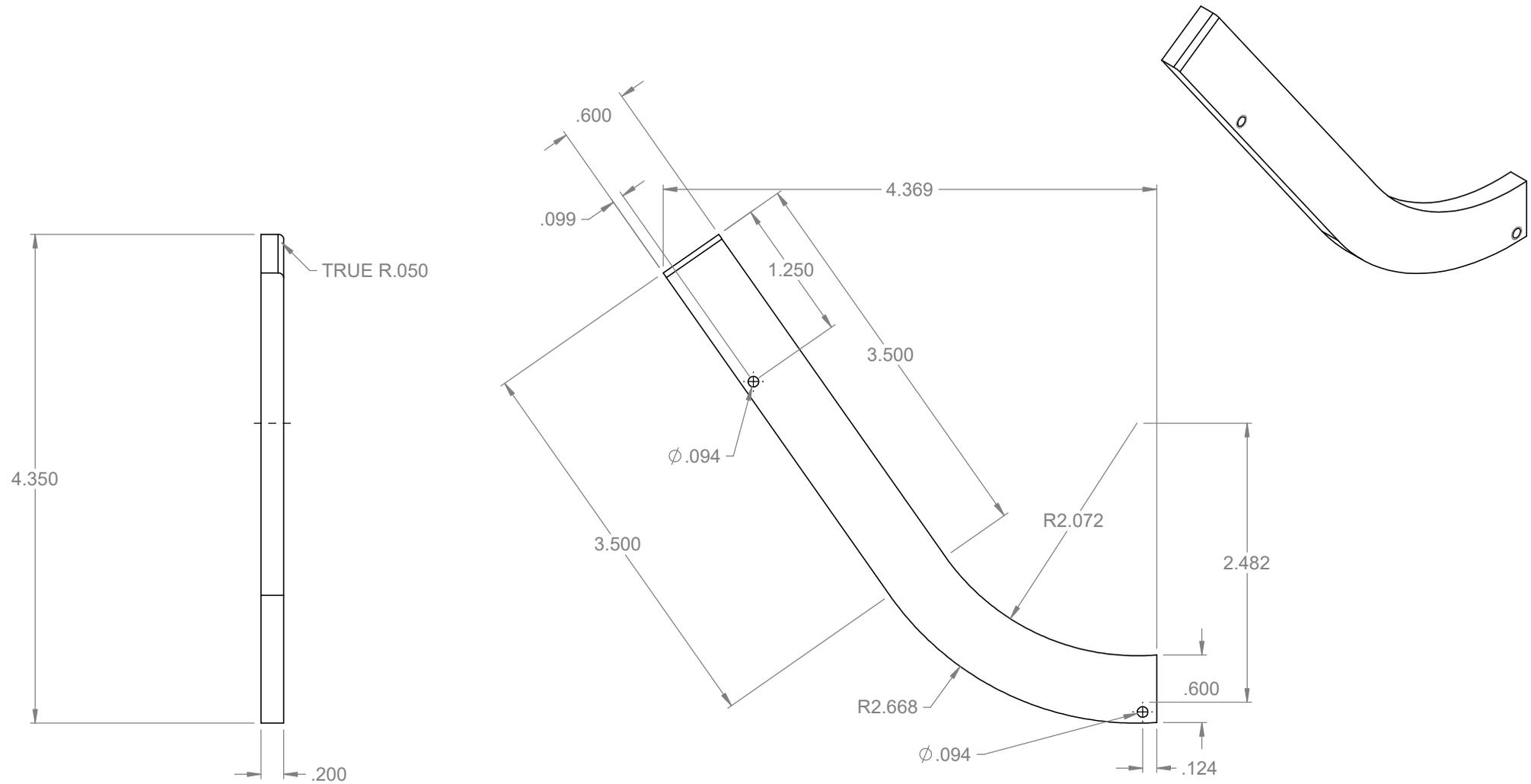


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<p>THIRD ANGLE PROJECTION</p>		<p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>MAGAZINE MOTOR MOUNT</b></p>	
<p>CHECKED BY <b>DAVID LUTELMOWSKI</b></p> <p>APPROVED</p>		<p>DATE <b>DEC. 11/20</b></p> <p>DATE</p>		<p>SIZE <b>B</b></p> <p>DRAWING NO</p>	
<p>REVISION <b>0</b></p>		<p>SCALE <b>4:1</b></p>		<p>WEIGHT <b>0.020 lb</b></p>	
<p>SHEET 7 OF 29</p>					

NOTES:

1. MATERIAL : POLYCARBONATE
2. 0.05" FILLET
3. QUANTITY: 2

REVISIONS			
REV	DESCRIPTION	DATE	APVD

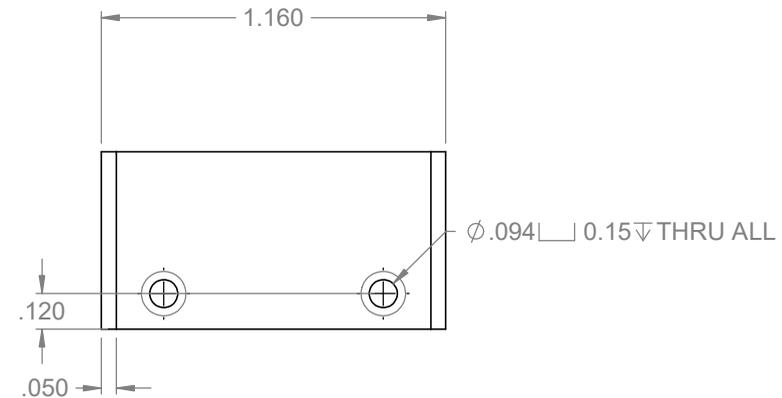
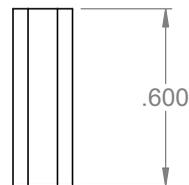
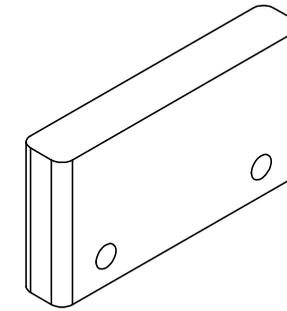
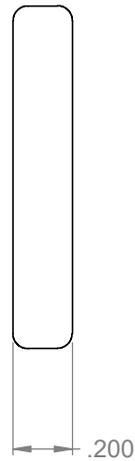


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NOTES:

1. MATERIAL : POLYCARBONATE
2. EDGES HAVE .05" FILLET
3. QUANTITY: 2

REVISIONS			
REV	DESCRIPTION	DATE	APVD

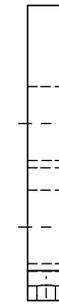
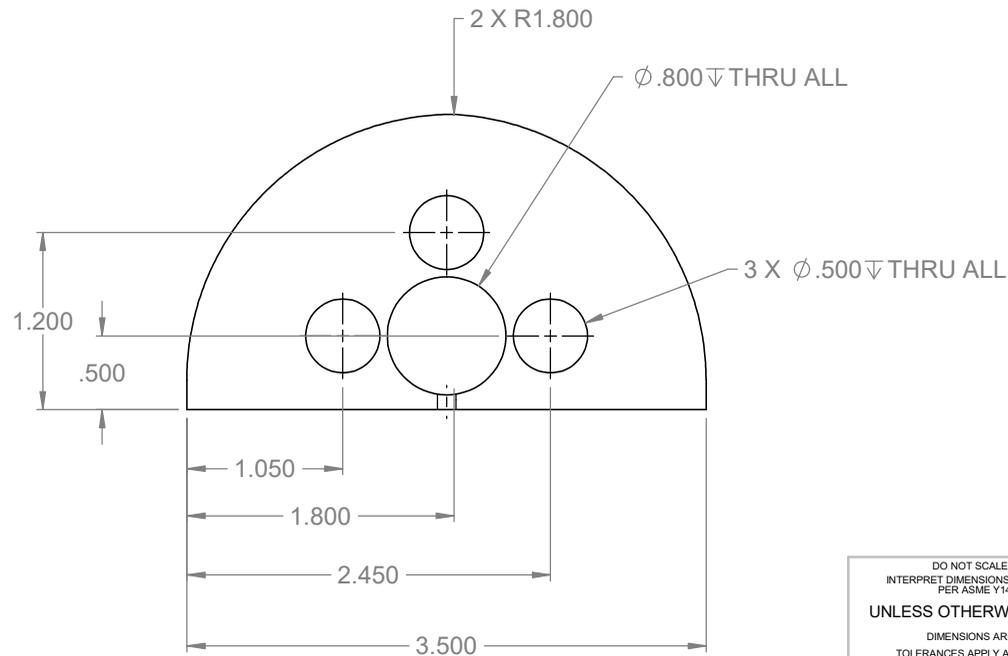
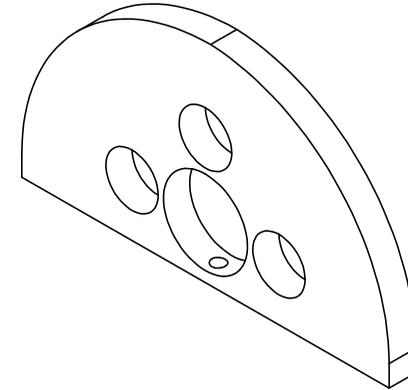
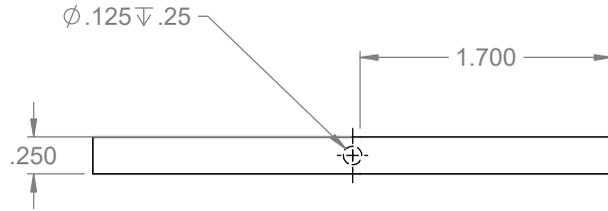


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<p>THIRD ANGLE PROJECTION</p>		<p>COURSE <b>MECH71265</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>TOP MAGAZINE SIDES</b></p>	
<p>DRAWN BY <b>DAVID LUTELMOWSKI</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p>DATE <b>DEC. 11/20</b></p> <p>DATE</p> <p>DATE</p>		<p>SIZE <b>B</b></p> <p>SCALE <b>2:1</b></p> <p>WEIGHT <b>0.005 lb</b></p>	
<p>REVISION</p> <p><b>0</b></p>				<p>SHEET 9 OF 29</p>	

NOTES:

1. MATERIAL : 6061 ALUMINUM
2. STOCK SIZE: 1/4"x4" FLAT BAR
3. QUANTITY: 1

REVISIONS			
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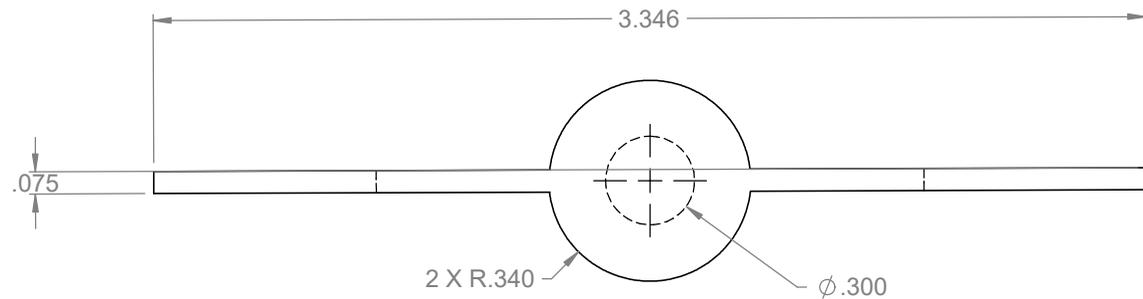
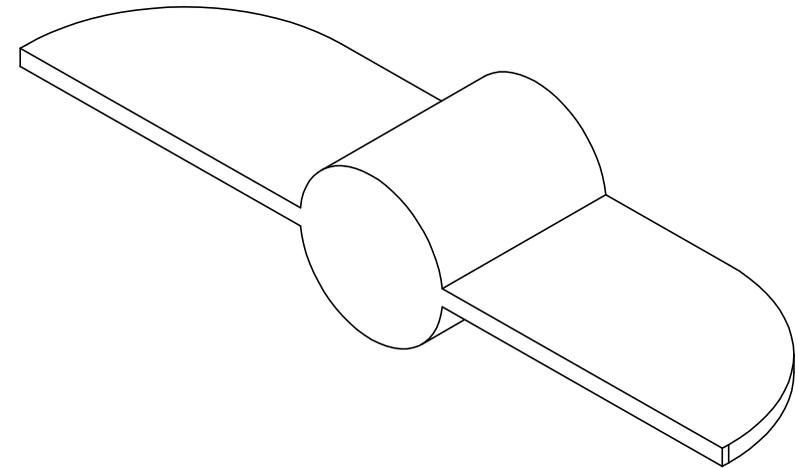
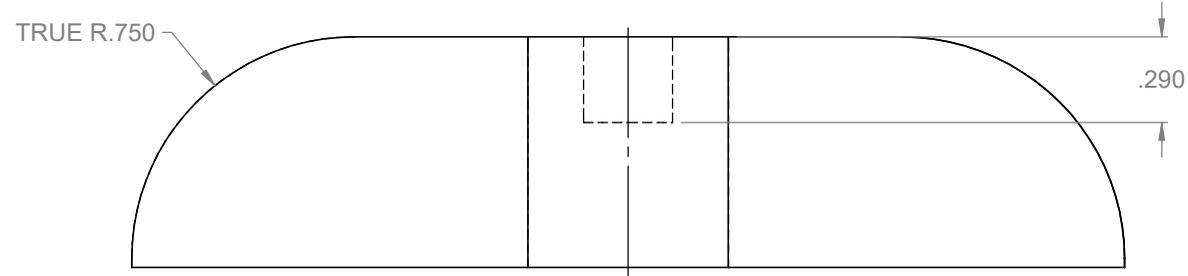


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NOTES:

1. MATERIAL : PLA
2. 3D PRINTED
3. QUANTITY: 1

REVISIONS			
REV	DESCRIPTION	DATE	APVD

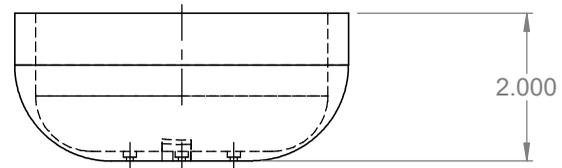
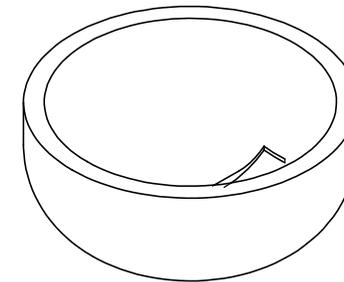
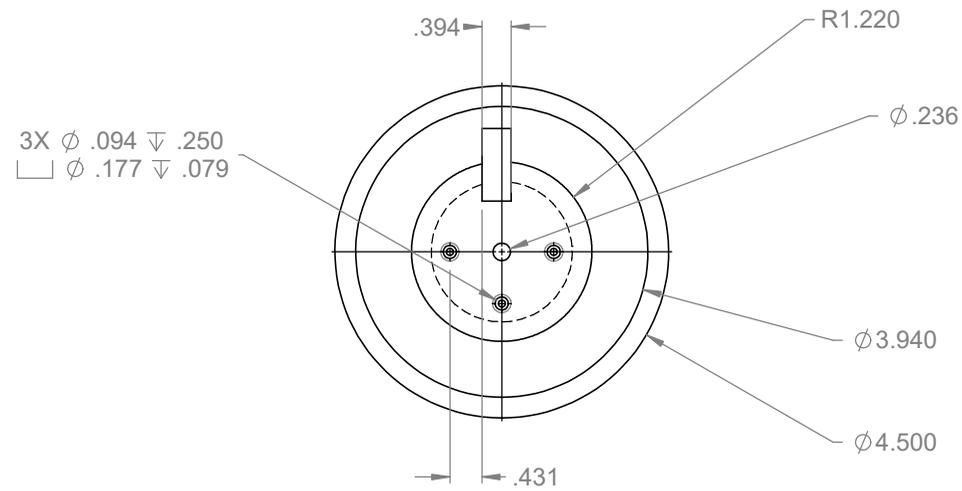


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 µ in</p> <p><b>THIRD ANGLE PROJECTION</b></p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b></p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE: <b>MECH72165</b></p> <p>PROJECT: <b>YEAR 2 PROJECT</b></p> <p>DATE: <b>DEC. 11/20</b></p> <p>CHECKED BY: <b>DAVID LUTELMOWSKI</b></p> <p>APPROVED: _____</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE: <b>HOPPER BLADE</b></p> <p>SIZE: <b>B</b></p> <p>SCALE: <b>2:1</b></p> <p>WEIGHT: <b>0.115 lb</b></p> <p>REVISION: <b>0</b></p> <p>SHEET 11 OF 29</p>	
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NOTES:

1. MATERIAL : ABS
2. 3D PRINTED
3. QUANTITY: 1

REVISIONS			
REV	DESCRIPTION	DATE	APVD

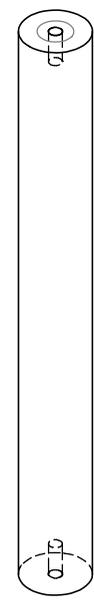
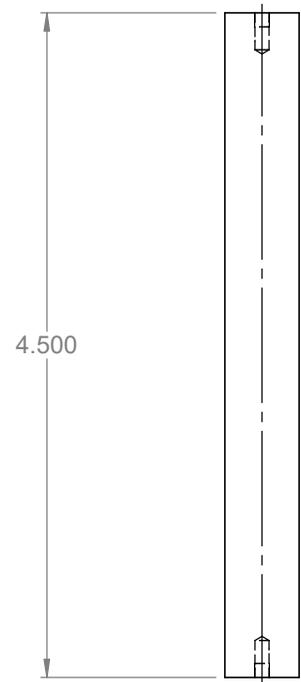
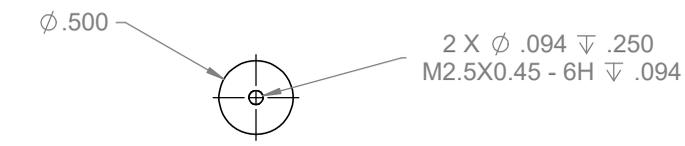


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 µ in</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b></p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p>	
<p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>HOPPER BOWL</b></p>		<p>REVISION <b>0</b></p>	
<p>THIRD ANGLE PROJECTION</p>		<p>DRAWN BY <b>DAVID LUTELMOWSKI</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p>DATE <b>DEC. 11/20</b></p> <p>DATE</p> <p>DATE</p>	
		<p>SIZE <b>B</b></p> <p>SCALE <b>1:2</b></p>		<p>DRAWING NO</p> <p>WEIGHT <b>0.216 lb</b></p>	
				<p>SHEET 12 OF 29</p>	

NOTES:

1. MATERIAL 6061 ALUMINUM
2. STOCK SIZE: 1/2" ROUND BAR
3. QUANTITY: 3

REVISIONS			
REV	DESCRIPTION	DATE	APVD

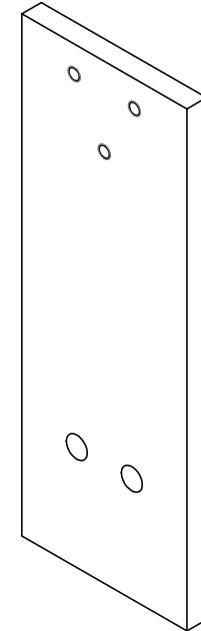
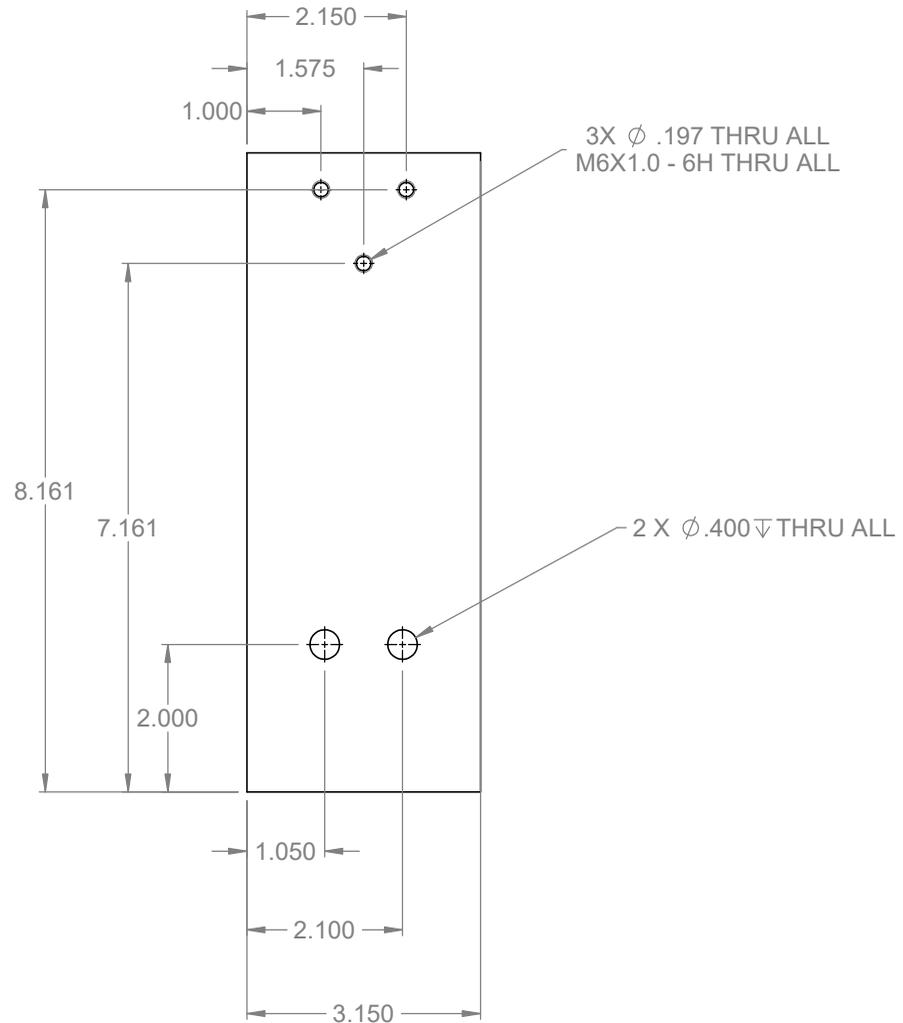


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY PROPRIETARY NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE MECH72165 PROJECT YEAR 2 PROJECT		TITLE <h1>HOPPER POST</h1>	
CHECKED BY DAVID LUTELMOWSKI		DATE DEC. 11/20		SIZE B	
APPROVED		DATE		DRAWING NO. SCALE 1:1 WEIGHT 0.086 lb SHEET 13 OF 29	
				REVISION 0	

NOTES:

1. MATERIAL : 6061 ALUMINUM
2. STOCK SIZE: 3/8"X4" FLAT BAR
3. QUANTITY: 6

REVISIONS			
REV	DESCRIPTION	DATE	APVD

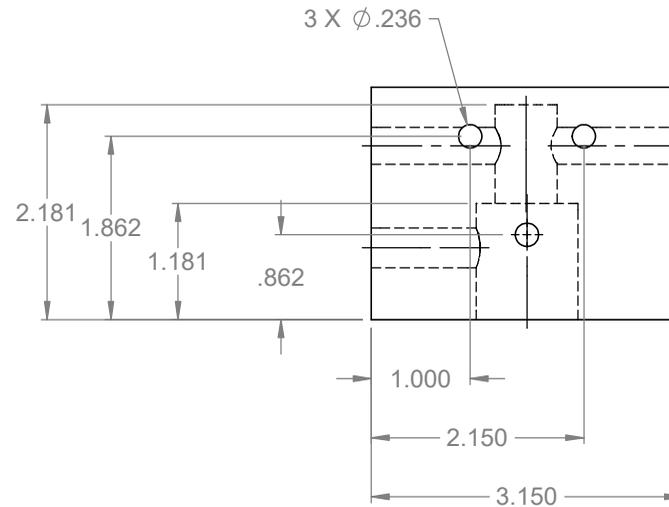
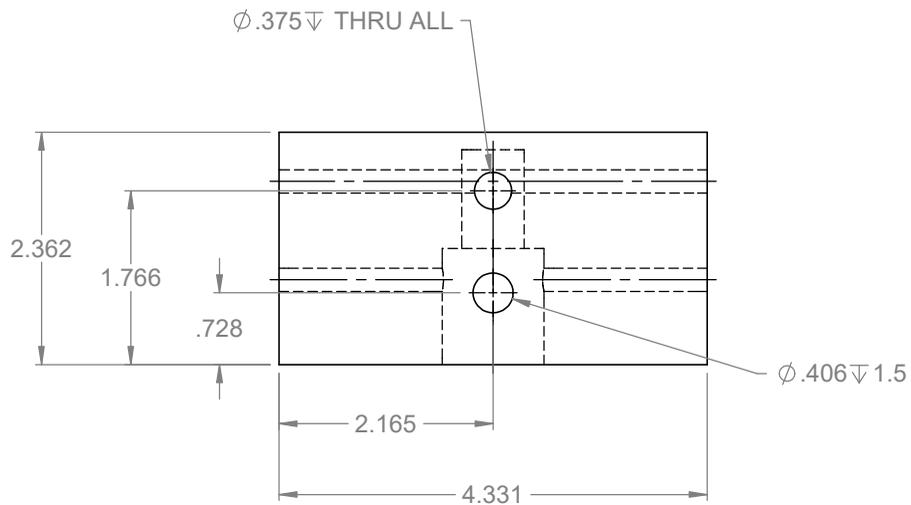
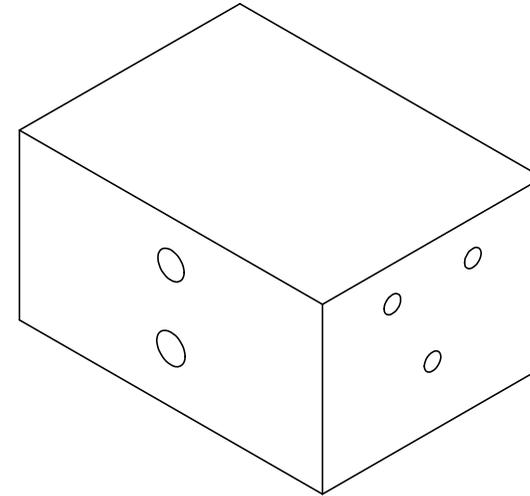
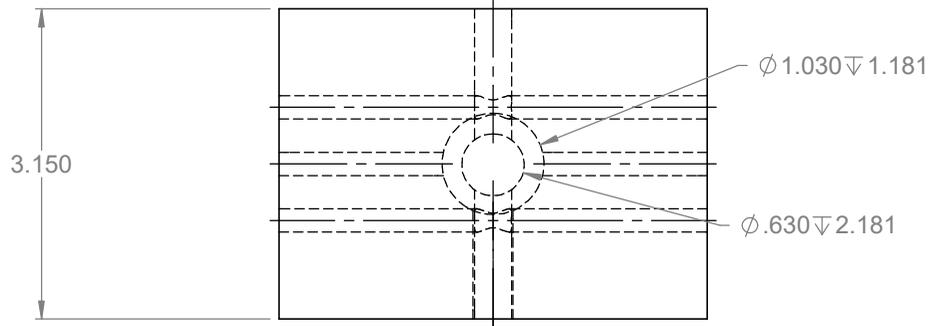


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS <math>\pm</math> 0.2 1 PLACE DECIMALS <math>\pm</math> 0.1 2 PLACE DECIMALS <math>\pm</math> 0.01 3 PLACE DECIMALS <math>\pm</math> 0.005 ANGLES <math>\pm</math> 1° SURFACE ROUGHNESS 32 <math>\mu</math> in</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b></p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p>	
<p>THIRD ANGLE PROJECTION</p>		<p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>PRESS SIDE PLATE</b></p>	
<p>CHECKED BY <b>DAVID LUTELMOWSKI</b></p> <p>APPROVED</p>		<p>DATE <b>DEC. 11/20</b></p> <p>DATE</p>		<p>SIZE <b>B</b></p> <p>DRAWING NO</p>	
		<p>SCALE <b>1:2</b></p>		<p>WEIGHT <b>0.985 lb</b></p>	
				<p>REVISION <b>0</b></p>	
				<p>SHEET 14 OF 29</p>	

NOTES:

1. MATERIAL : 6061 ALUMINUM
2. CUSTOM ORDERED STOCK SIZE: 3.150"x2.362"
3. QUANTITY: 1

REVISIONS			
REV	DESCRIPTION	DATE	APVD

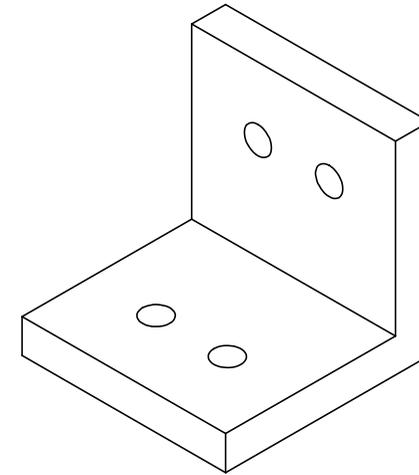


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY PROPRIETARY NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE MECH72165 PROJECT YEAR 2 PROJECT		TITLE MIDDLE PRESS	
CHECKED BY DAVID LUTELMOWSKI		DATE DEC. 11/20		SIZE B	
APPROVED		DATE		SCALE 1:1	
		WEIGHT 2.927 lb		SHEET 15 OF 29	
				REVISION 0	

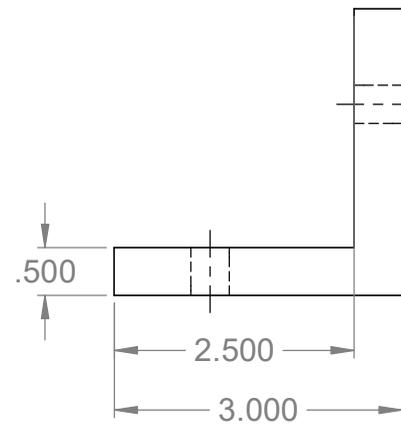
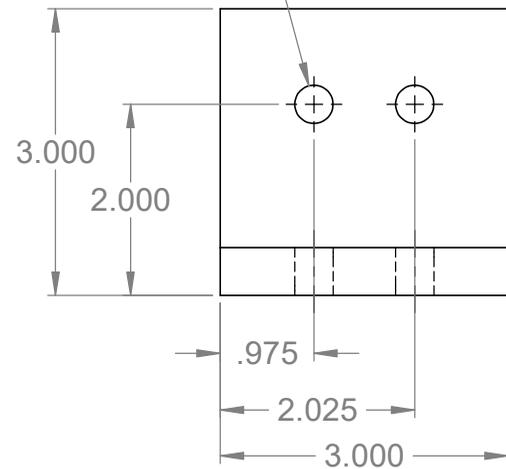
**NOTES:**

1. MATERIAL : 6061 ALUMINUM
2. STOCK SIZE: 1/2"x3"x3"
3. QUANTITY: 2

REVISIONS			
REV	DESCRIPTION	DATE	APVD



4 X  $\phi$ .400  $\nabla$  THRU ALL



DO NOT SCALE DRAWING  
INTERPRET DIMENSIONS AND TOLERANCES  
PER ASME Y14.5M-2009

**UNLESS OTHERWISE SPECIFIED**

DIMENSIONS ARE IN INCHES

TOLERANCES APPLY AS SHOWN BELOW

0 PLACE DECIMALS	± 0.2
1 PLACE DECIMALS	± 0.1
2 PLACE DECIMALS	± 0.01
3 PLACE DECIMALS	± 0.005

ANGLES ± .1°  
SURFACE ROUGHNESS 32  $\mu$  in

**THIRD ANGLE PROJECTION**

SolidWorks MAINTAINED DATA  
CHANGES SHALL BE INCORPORATED  
ELECTRONICALLY BY THE DESIGN ACTIVITY

**PROPRIETARY**

NO PART OF THIS DOCUMENT MAY BE REPRODUCED,  
STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN  
ANY FORM, WITHOUT THE WRITTEN PERMISSION OF  
Conestoga College.

COURSE **MECH72165**

PROJECT **YEAR 2 PROJECT**

DRAWN BY **DAVID LUTELMOWSKI** DATE **DEC. 11/20**

CHECKED BY \_\_\_\_\_ DATE \_\_\_\_\_

APPROVED \_\_\_\_\_ DATE \_\_\_\_\_

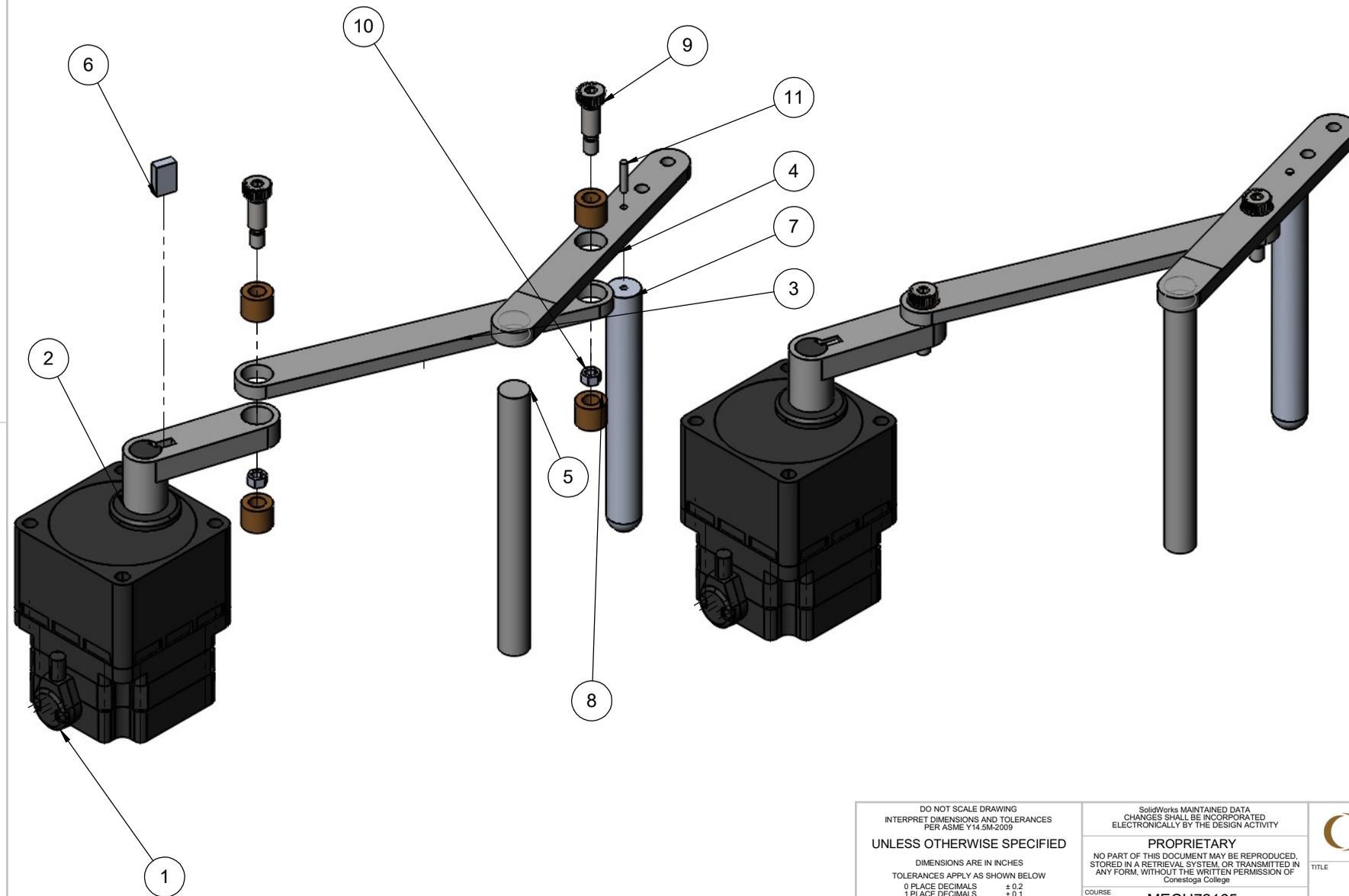
**CONESTOGA**  
Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4

TITLE **PRESS BRACKET**

SIZE **B** DRAWING NO. \_\_\_\_\_ REVISION **0**

SCALE **1:2** WEIGHT **0.780 lb** SHEET **16 OF 29**

REVISIONS			
REV	DESCRIPTION	DATE	APVD

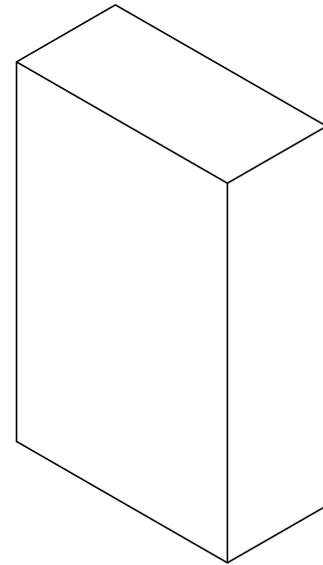
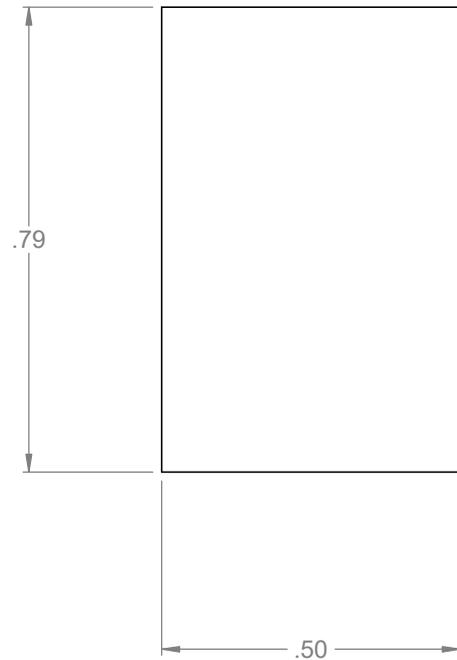


ITEM NO.	DESCRIPTION	QTY.
1	ROBOT MOTOR	1
2	LINK 1	1
3	LINK 2	1
4	LINK 3	1
5	LINK 3 SUPPORT	1
6	LOCK KEY	1
7	MOVING SUPPORT	1
8	PLAIN BUSHING	4
9	METRIC SOCKET HEAD SHOULDER SCREW 10M 2	2
10	M6 NUT	2
11	M4 DOUBLE END NUT	1

<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 µ in</p> <p>THIRD ANGLE PROJECTION</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b></p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE: MECH72165 PROJECT: YEAR 2 PROJECT</p> <p>DRAWN BY: NAMOSHI BHATT DATE: DEC.11/20 CHECKED BY: DATE: DATE: DATE: APPROVED: DATE: DATE: DATE:</p>		<p><b>CONESTOGA</b> Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE: <b>R-SUBASSEM</b></p> <p>SIZE: <b>B</b> DRAWING NO: REVISION: <b>0</b></p> <p>SCALE: 1:2.5 WEIGHT: SHEET 17 OF 29</p>	
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NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM(3/8"X4"X1")
2. CAN BE MILLED WITH SMALLER BLANK
3. SURFACE FINISHING REQUIRED



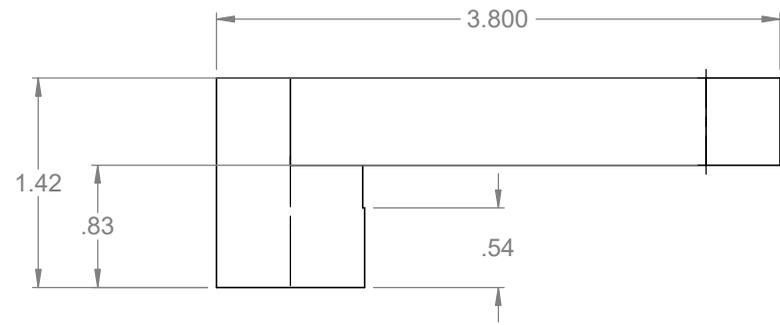
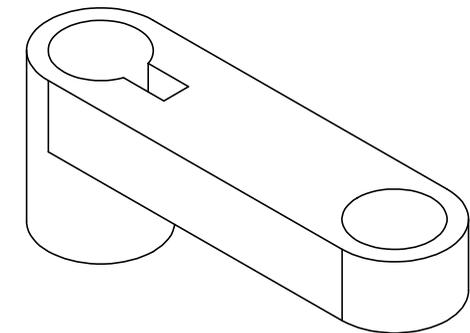
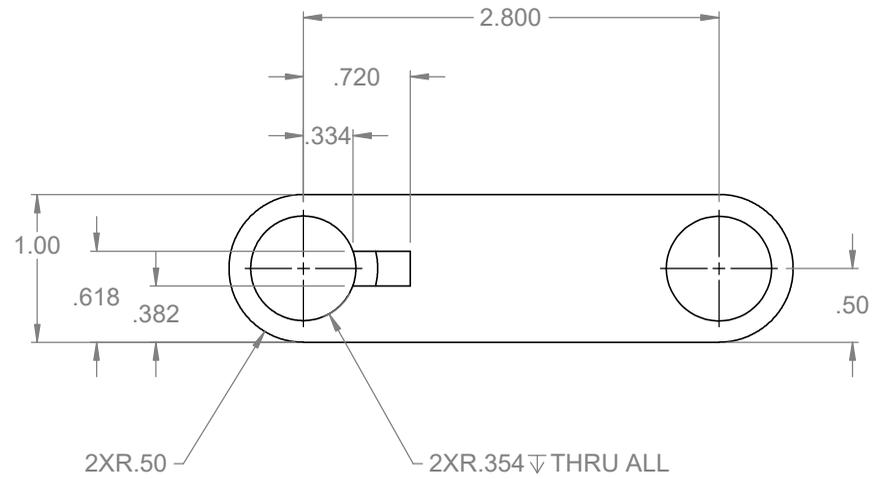
REVISIONS			
REV	DESCRIPTION	DATE	APVD

DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY PROPRIETARY NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE MECH72165 PROJECT YEAR 2 PROJECT		TITLE KEY	
DRAWN BY NAMOSHI BHATT CHECKED BY APPROVED		DATE DEC.11/20 DATE		SIZE B SCALE 4:1	
		DRAWING NO.		REVISION 0	
		WEIGHT 0.009 lb		SHEET 18 OF 29	

NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM (4"X2"X1")
2. SPECIAL BLANK SIZE WILL BE NEEDED

REVISIONS			
REV	DESCRIPTION	DATE	APVD

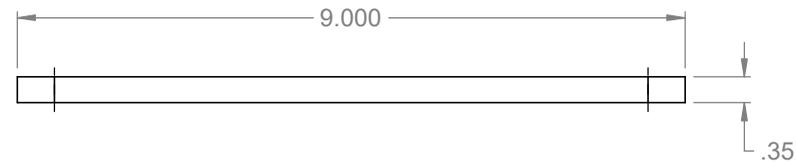
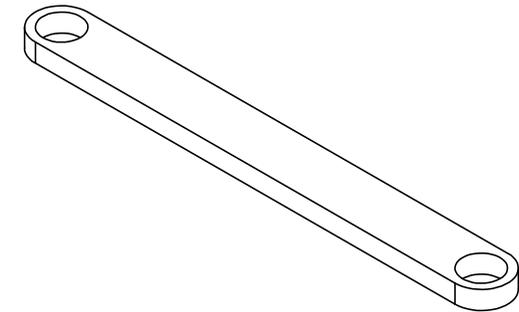
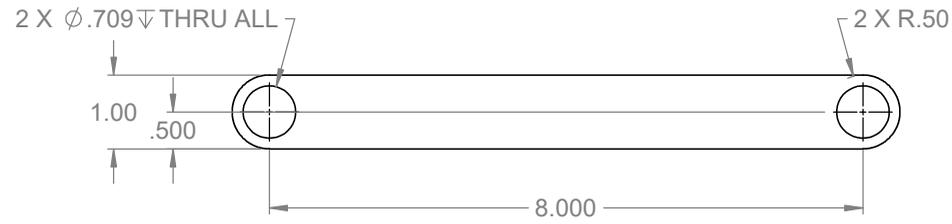


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY		 <b>CONESTOGA</b> Connect Life and Learning		299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
UNLESS OTHERWISE SPECIFIED		PROPRIETARY		TITLE			
DIMENSIONS ARE IN INCHES		NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		LINK ONE			
TOLERANCES APPLY AS SHOWN BELOW		COURSE		REVISION			
0 PLACE DECIMALS ± 0.2		MECH72165		0			
1 PLACE DECIMALS ± 0.1		PROJECT		SCALE			
2 PLACE DECIMALS ± 0.01		YEAR 2 PROJECT		1:1			
3 PLACE DECIMALS ± 0.005		DRAWN BY		SIZE		WEIGHT	
ANGLES ± 1°		NAMOSHI BHATT		B		0.547 lb	
SURFACE ROUGHNESS 32 μ in		DATE		DRAWING NO		SHEET 19 OF 29	
THIRD ANGLE PROJECTION		DEC.11/20					
		CHECKED BY		DATE			
		APPROVED		DATE			

NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM (9"X1.2"X3/8")
2. REMOVE ALL BURRS

REVISIONS			
REV	DESCRIPTION	DATE	APVD

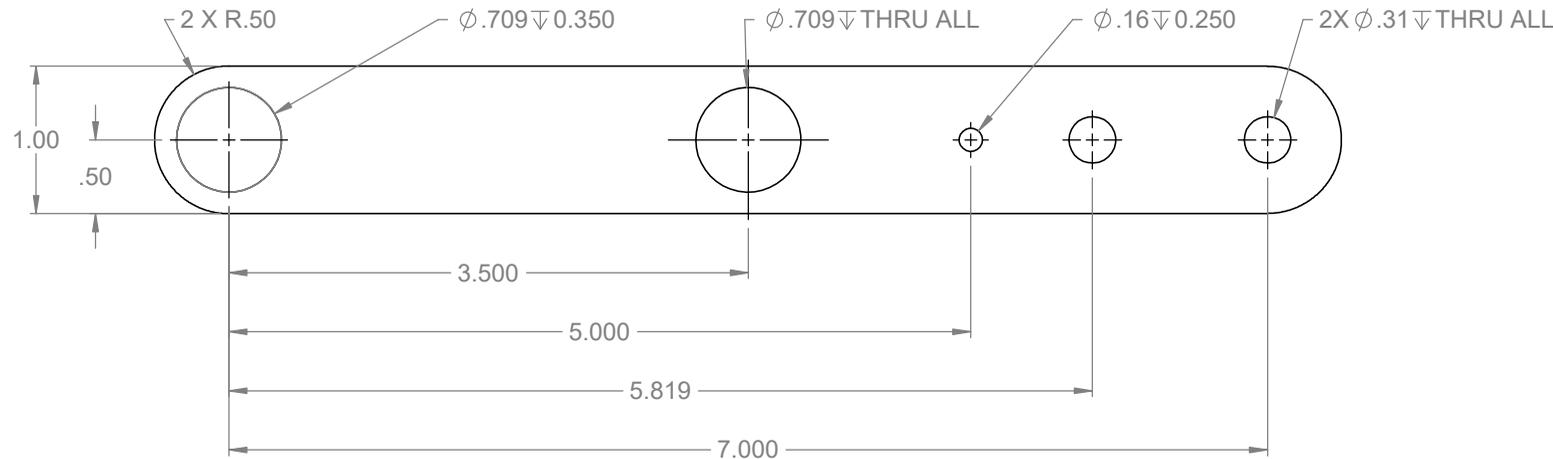
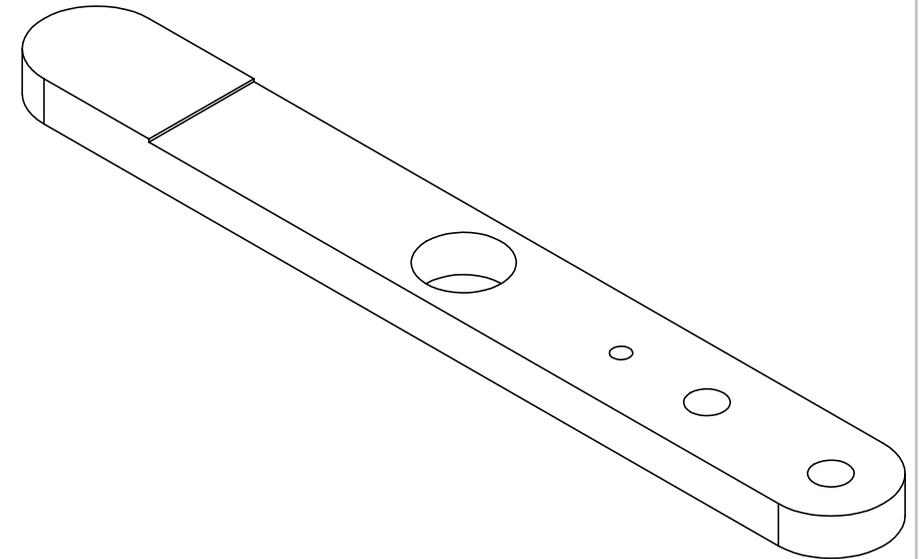
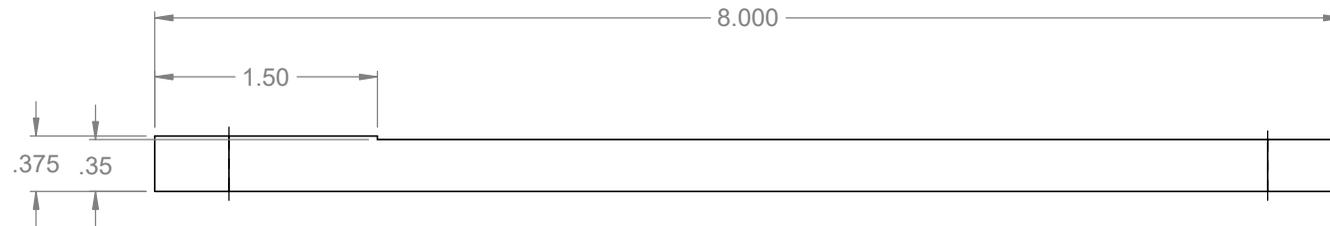


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 <b>UNLESS OTHERWISE SPECIFIED</b> DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE <b>MECH72165</b>		TITLE <b>LINK TWO</b>	
DRAWN BY <b>NAMOSHI BHATT</b>		DATE <b>DEC.11/20</b>		SIZE <b>B</b>	
CHECKED BY		DATE		REVISION <b>0</b>	
APPROVED		DATE		SCALE <b>1:2</b>	
				WEIGHT <b>0.800 lb</b>	
SHEET 20 OF 29					

NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM(9"X1.2"X3/8")
2. REMOVE ALL BURRS

REVISIONS			
REV	DESCRIPTION	DATE	APVD

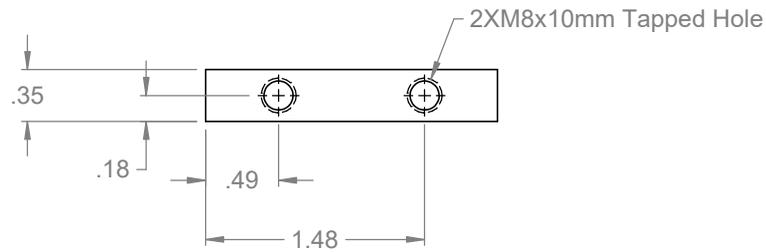
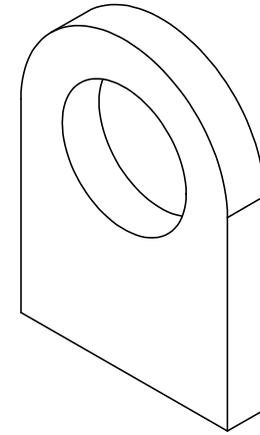
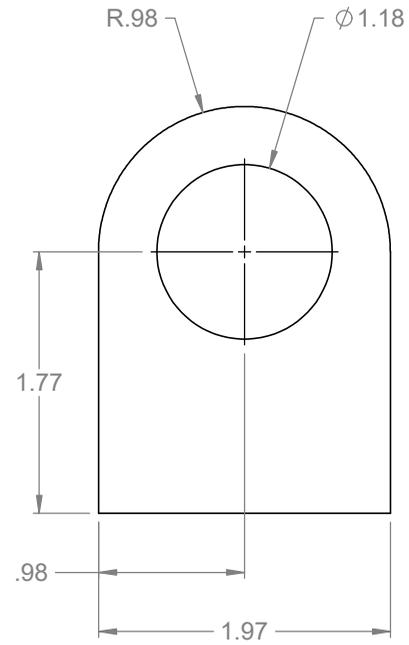


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 UNLESS OTHERWISE SPECIFIED</p> <p>DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in</p> <p>THIRD ANGLE PROJECTION</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p>PROPRIETARY NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE: MECH72165 PROJECT: YEAR 2 PROJECT</p> <p>DRAWN BY: NAMOSHI BHATT DATE: DEC.11/20 CHECKED BY: DATE: DATE: DATE: APPROVED: DATE: DATE: DATE:</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE: <b>LINK THREE</b></p> <p>SIZE: <b>B</b> DRAWING NO: <b>0</b></p> <p>SCALE: 1:1 WEIGHT: 0.693 lb SHEET 21 OF 29</p>	
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NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM(3"X2"X3/8")
2. CLEAN ALL TAPPED HOLES

REVISIONS			
REV	DESCRIPTION	DATE	APVD

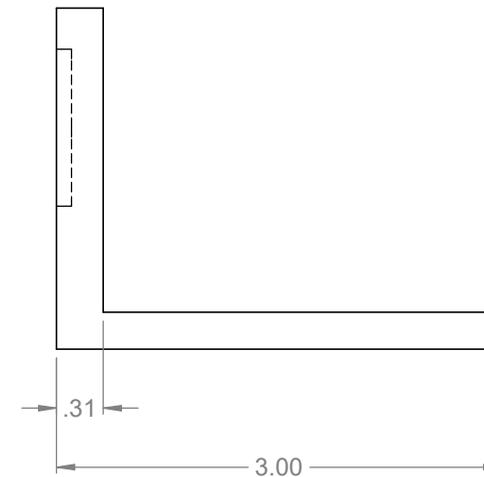
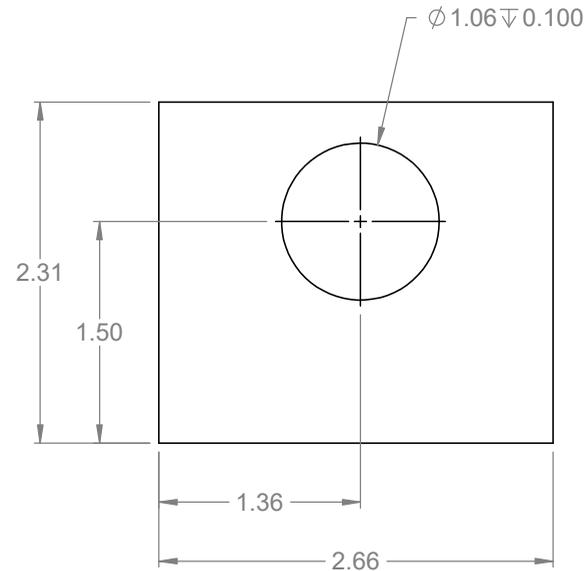
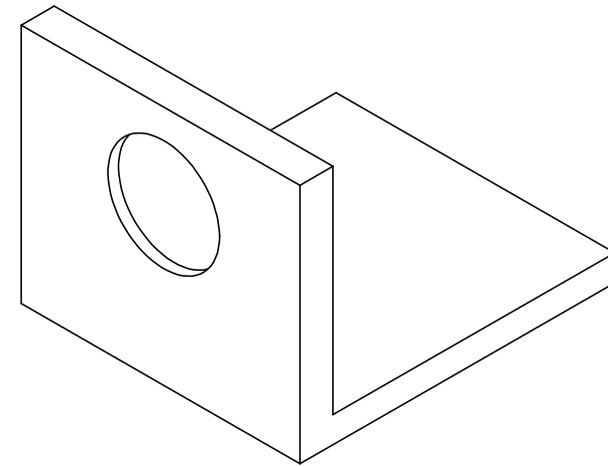


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 µ in</p> <p>THIRD ANGLE PROJECTION</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b></p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p> <p>DRAWN BY <b>NAMOSHI BHATT</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p><b>C</b> CONESTOGA Connect Life and Learning</p> <p>299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE <b>BRACKET</b></p> <p>SIZE <b>B</b></p> <p>SCALE <b>1:1</b></p> <p>WEIGHT <b>0.130 lb</b></p>		<p>REVISION <b>0</b></p> <p>SHEET 22 OF 29</p>
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NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM(1/2"X3"X3")
2. REMOVE ALL BURRS

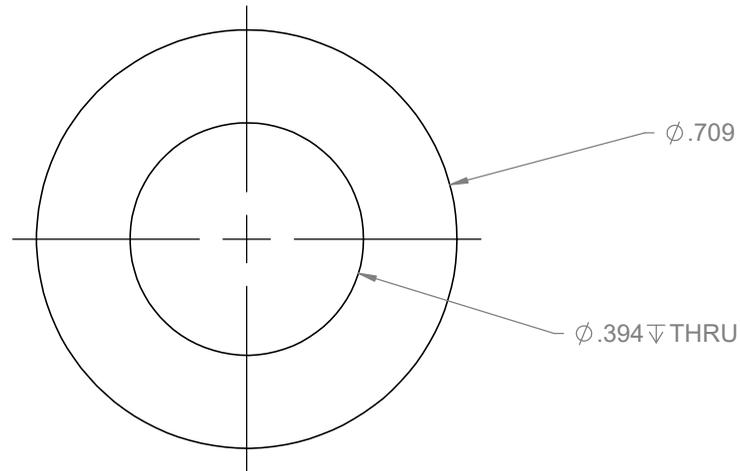
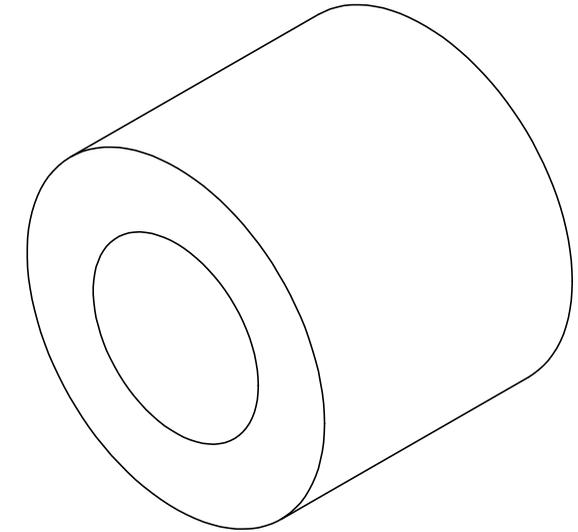
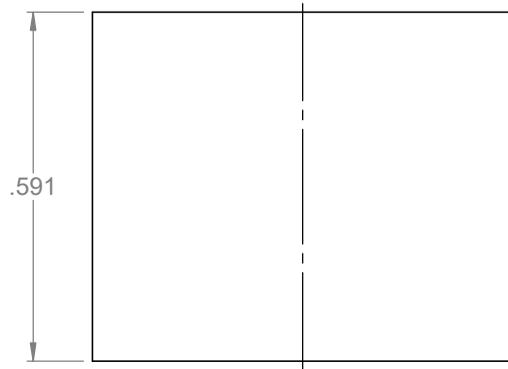
REVISIONS			
REV	DESCRIPTION	DATE	APVD



<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p>		<p><b>C CONESTOGA</b> Connect Life and Learning</p> <p>299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p>	
<p>THIRD ANGLE PROJECTION</p>		<p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>L-BRACKET</b></p>	
<p>DRAWN BY <b>NAMOSHI BHATT</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p>DATE <b>DEC.11/20</b></p> <p>DATE</p> <p>DATE</p>		<p>SIZE <b>B</b></p> <p>SCALE <b>1:1</b></p>	
		<p>WEIGHT <b>0.354 lb</b></p>		<p>REVISION <b>0</b></p> <p>SHEET 23 OF 24</p>	

NOTES:  
 1. BLANK MATERIAL : OLLITE BRONZE ROUND BAR  
 (1-3/8"X0.6")

REVISIONS			
REV	DESCRIPTION	DATE	APVD

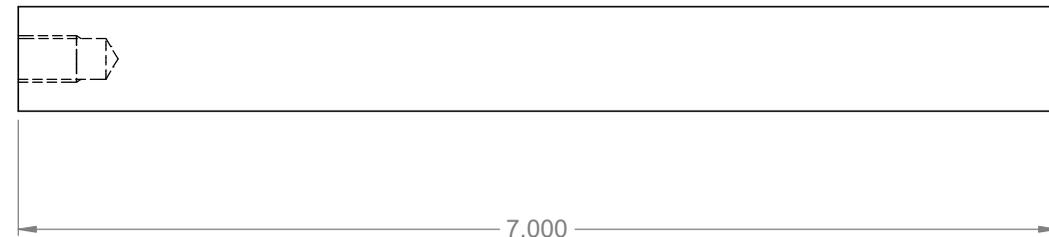
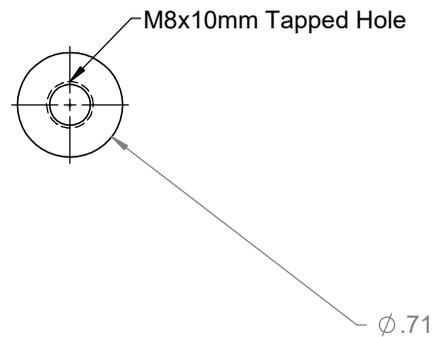
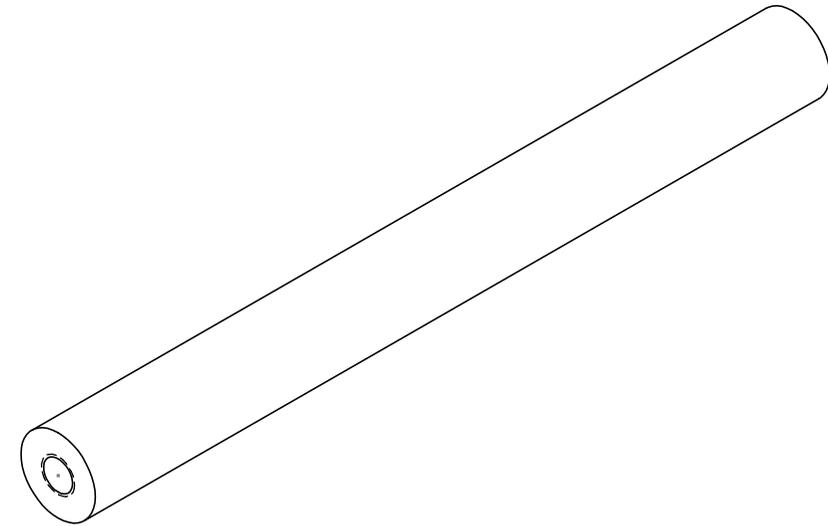


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009  <b>UNLESS OTHERWISE SPECIFIED</b>  DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY  <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		 <b>CONESTOGA</b> Connect Life and Learning		299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
<b>THIRD ANGLE PROJECTION</b> 		COURSE <b>MECH72165</b>		TITLE <b>PLAIN BUSHING</b>		PROJECT <b>YEAR 2 PROJECT</b>	
DRAWN BY <b>NAMOSHI BHATT</b>		DATE <b>DEC.11/20</b>		SIZE <b>B</b>		DRAWING NO. 	
CHECKED BY 		DATE 		SCALE <b>4:1</b>		WEIGHT <b>0.0430 lb</b>	
APPROVED 		DATE 		SHEET 24 OF 29		REVISION <b>0</b>	

NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM ROUND BAR  
(1/2"X7.1")
2. FACE BOTH ENDS

REVISIONS			
REV	DESCRIPTION	DATE	APVD

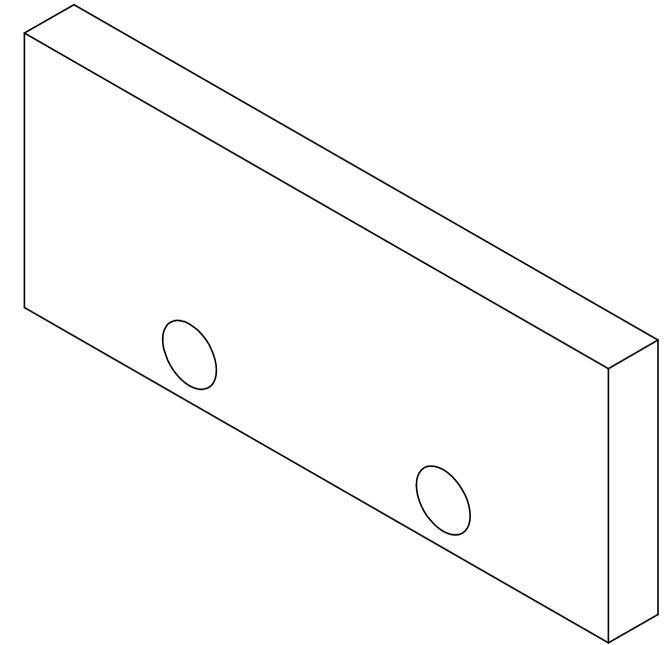
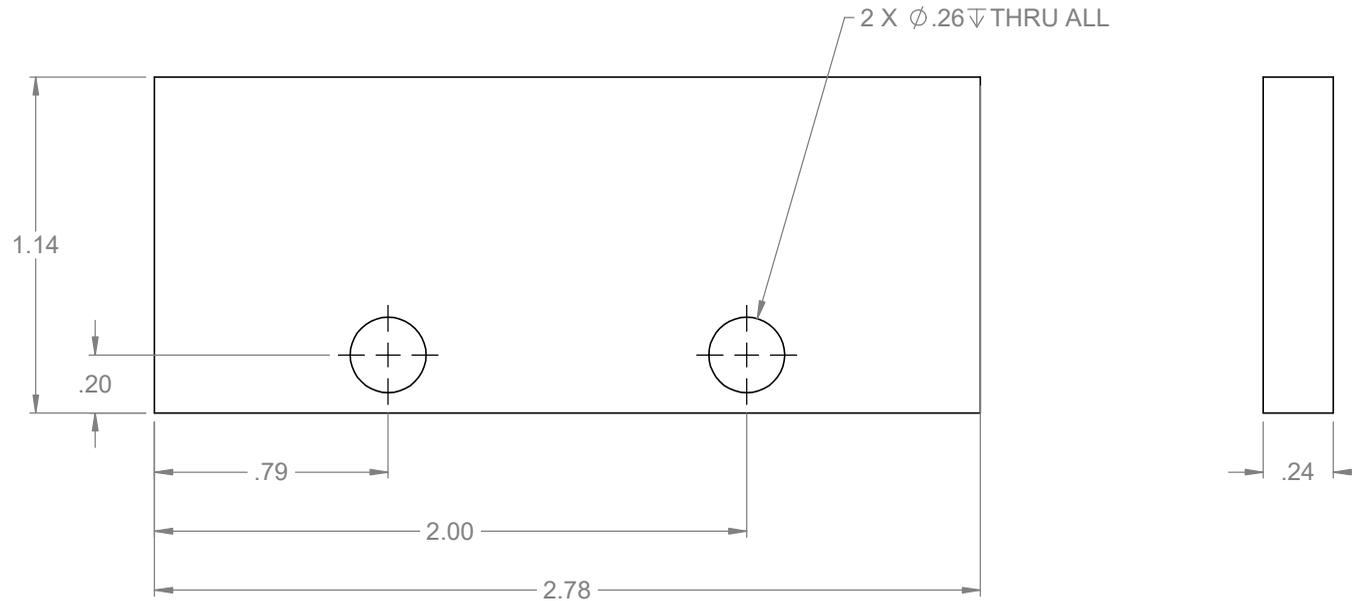


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 µ in</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p>	
<p>THIRD ANGLE PROJECTION</p>		<p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>LINK 3 SUPPORT</b></p>	
<p>DRAWN BY <b>NAMOSHI BHATT</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p>DATE <b>DEC.11/20</b></p> <p>DATE</p> <p>DATE</p>		<p>SIZE <b>B</b></p> <p>SCALE <b>1:1</b></p> <p>WEIGHT <b>0.779 lb</b></p>	
				<p>REVISION <b>0</b></p>	
				<p>SHEET 25 OF 29</p>	

NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM (1/4"X1-1/2"X4")
2. REMOVE ALL BURRS

REVISIONS			
REV	DESCRIPTION	DATE	APVD

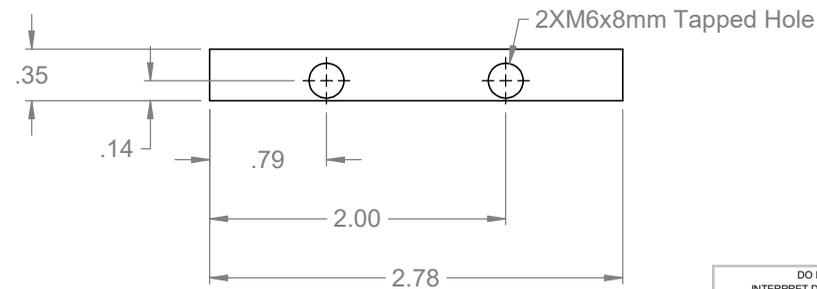
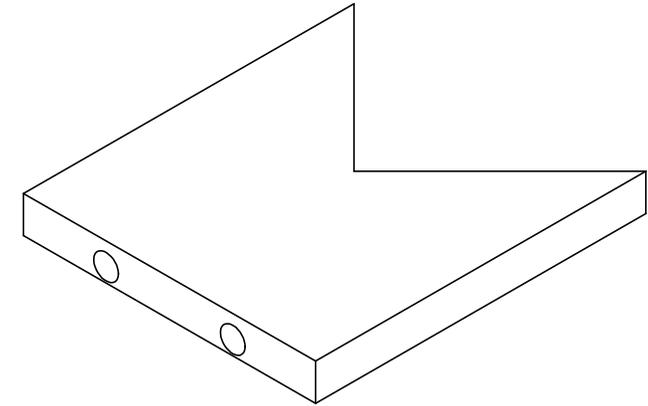
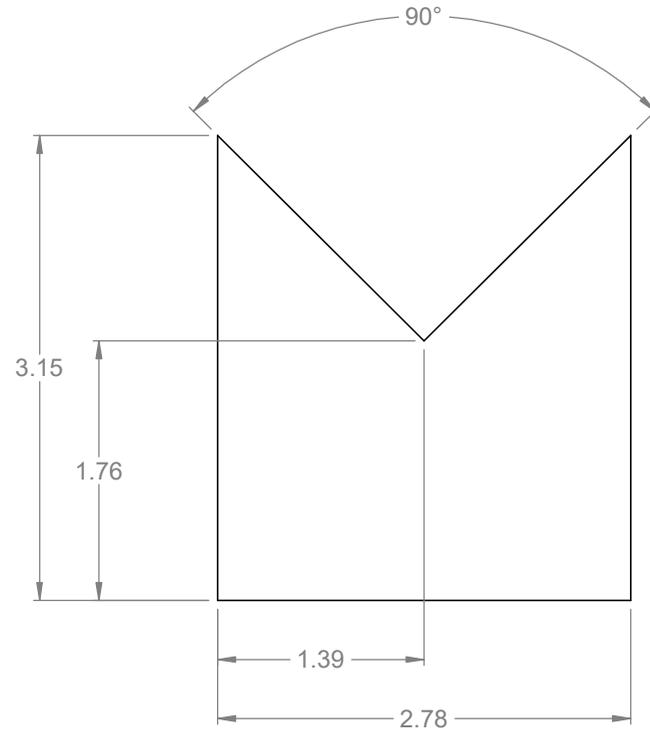


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 <b>UNLESS OTHERWISE SPECIFIED</b> DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		<b>CONESTOGA</b> Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
THIRD ANGLE PROJECTION 		COURSE <b>MECH72165</b>		TITLE <h1>INDEX TOP</h1>	
DRAWN BY <b>NAMOSHI BHATT</b>		DATE <b>DEC.11/20</b>		SIZE <b>B</b>	
CHECKED BY		DATE		DRAWING NO	
APPROVED		DATE		SCALE <b>2:1</b>	
				WEIGHT <b>0.071 lb</b>	
				REVISION <b>0</b>	
				SHEET 26 OF 29	

NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM (4"X3"X3/8")
2. ALL ANGLES ARE 0 PLACE DECIMALS

REVISIONS			
REV	DESCRIPTION	DATE	APVD

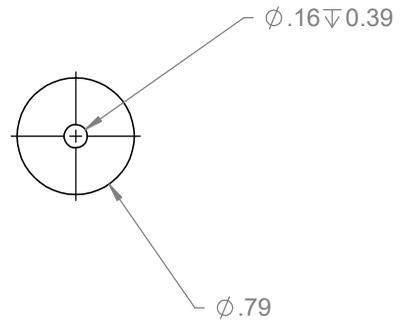
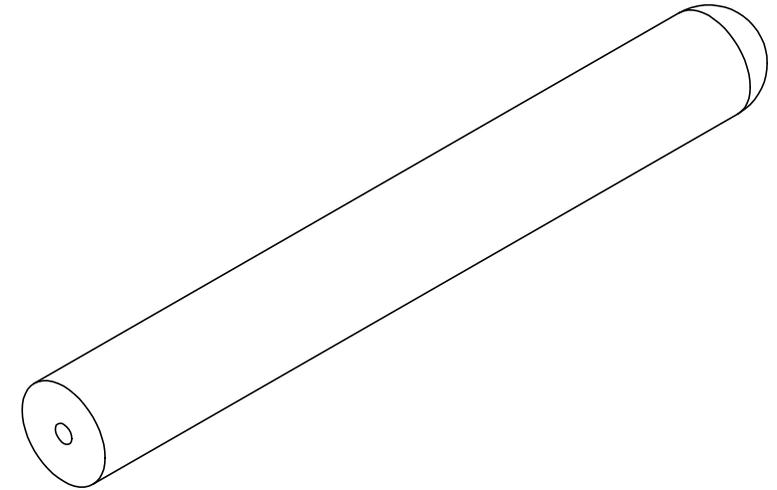


<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in</p> <p>THIRD ANGLE PROJECTION</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b></p> <p>NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p> <p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p> <p>DRAWN BY <b>NAMOSHI BHATT</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p><b>CONESTOGA</b> Connect Life and Learning</p> <p>299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p> <p>TITLE <b>INDEXER</b></p> <p>SIZE <b>B</b></p> <p>SCALE <b>1:1</b></p> <p>WEIGHT <b>0.230 lb</b></p>		<p>REVISION <b>0</b></p> <p>SHEET 27 OF 29</p>	
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NOTES:

1. BLANK MATERIAL : 6061 ALUMINUM ROUND BAR (1"X7")
2. BLANK MAY NEED TO BE SPECIAL ORDERED

REVISIONS			
REV	DESCRIPTION	DATE	APVD

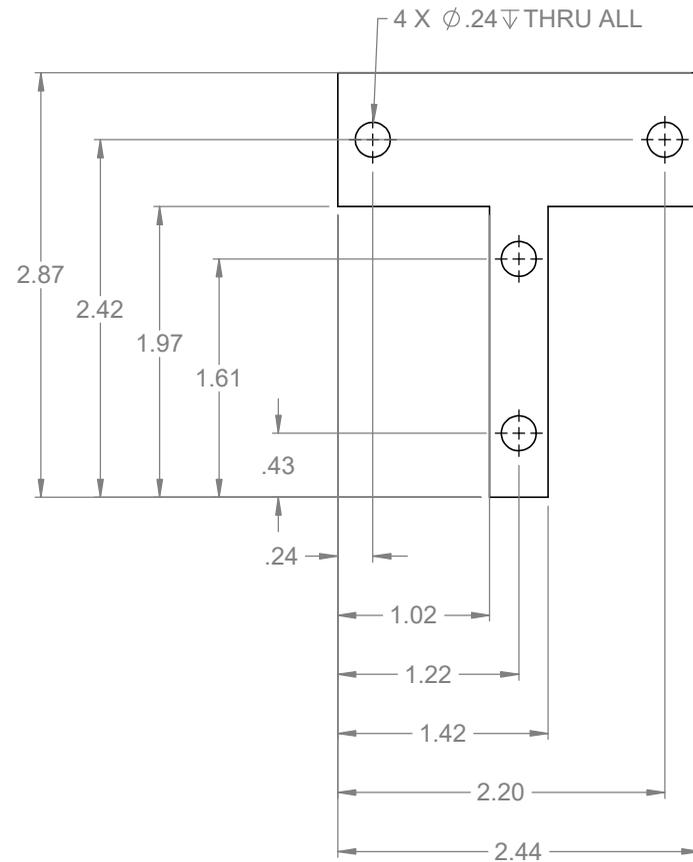
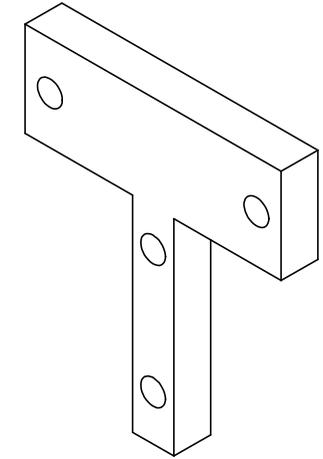


DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009 <b>UNLESS OTHERWISE SPECIFIED</b> DIMENSIONS ARE IN INCHES TOLERANCES APPLY AS SHOWN BELOW 0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in		SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY <b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College		<b>CONESTOGA</b> Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4	
COURSE <b>MECH72165</b>		PROJECT <b>YEAR 2 PROJECT</b>		TITLE <b>MOVING SUPPORT</b>	
DRAWN BY <b>NAMOSHI BHATT</b>		DATE <b>DEC.11/20</b>		SIZE <b>B</b>	
CHECKED BY		DATE		REVISION <b>0</b>	
APPROVED		DATE		SCALE <b>1:1</b>	
				WEIGHT <b>0.306 lb</b>	
SHEET 28 OF 29					

NOTES:

- MATERIAL : 6061 ALUMINUM (3/8"X3"X3")
- REMOVE ALL BURRS

REVISIONS			
REV	DESCRIPTION	DATE	APVD



<p>DO NOT SCALE DRAWING INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M-2009</p> <p><b>UNLESS OTHERWISE SPECIFIED</b></p> <p>DIMENSIONS ARE IN INCHES</p> <p>TOLERANCES APPLY AS SHOWN BELOW</p> <p>0 PLACE DECIMALS ± 0.2 1 PLACE DECIMALS ± 0.1 2 PLACE DECIMALS ± 0.01 3 PLACE DECIMALS ± 0.005 ANGLES ± 1° SURFACE ROUGHNESS 32 μ in</p>		<p>SolidWorks MAINTAINED DATA CHANGES SHALL BE INCORPORATED ELECTRONICALLY BY THE DESIGN ACTIVITY</p> <p><b>PROPRIETARY</b> NO PART OF THIS DOCUMENT MAY BE REPRODUCED, STORED IN A RETRIEVAL SYSTEM, OR TRANSMITTED IN ANY FORM, WITHOUT THE WRITTEN PERMISSION OF Conestoga College</p>		<p><b>C</b> CONESTOGA Connect Life and Learning 299 Doon Valley Drive, Kitchener, ON, N2G 4M4</p>	
<p>THIRD ANGLE PROJECTION</p>		<p>COURSE <b>MECH72165</b></p> <p>PROJECT <b>YEAR 2 PROJECT</b></p>		<p>TITLE <b>T-BRACKET</b></p>	
<p>DRAWN BY <b>NAMOSHI BHATT</b></p> <p>CHECKED BY</p> <p>APPROVED</p>		<p>DATE <b>DEC.11/20</b></p> <p>DATE</p> <p>DATE</p>		<p>SIZE <b>B</b></p> <p>DRAWING NO</p> <p>SCALE <b>1:1</b></p> <p>WEIGHT <b>0.096 lb</b></p>	
				<p>REVISION <b>0</b></p>	
				<p>SHEET 29 OF 29</p>	