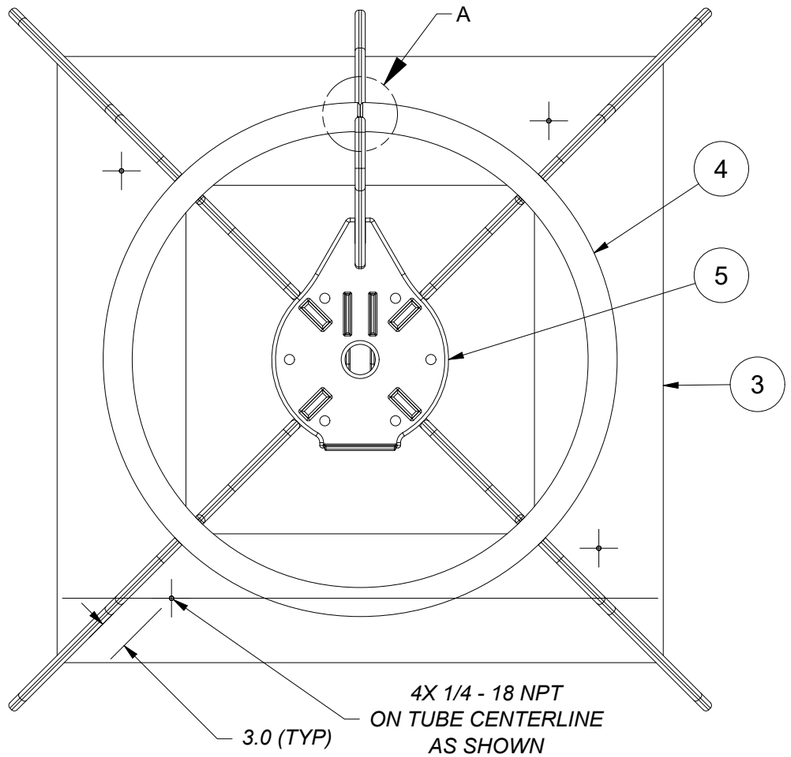
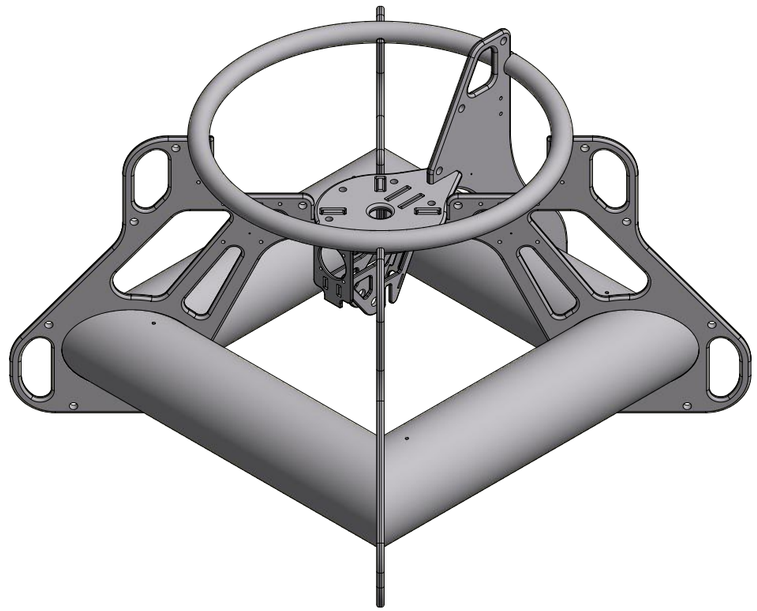
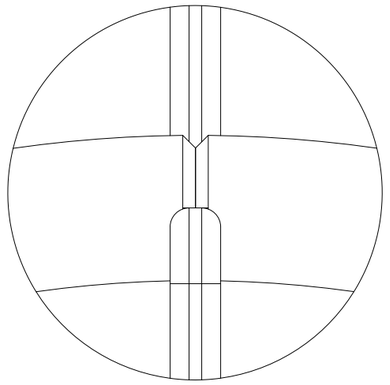
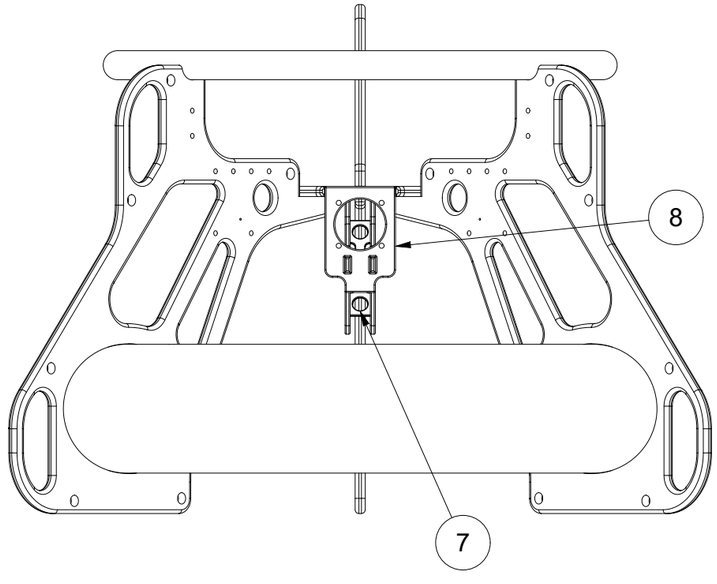
| Parts List | | | |
|---|---|---|---|
| ITEM | QTY | PART NUMBER | DESCRIPTION |
| 1 | 4 | 232-1-0101 | CORNER PLATE |
| 2 | 1 | 232-1-0102 | PICKUP PLATE |
| 3 | 4 | 232-1-0103 | PIPE SECTION |
| 4 | 1 | 232-1-0104 | TOP RING |
| 5 | 1 | 232-1-0105 | MAIN FLANGE |
| 6 | 2 | 232-1-0106 | RELEASE CHEEK PLATE |
| 7 | 1 | 232-1-0107 | RELEASE CHEEK JOINER PLATE |
| 8 | 1 | 232-1-0108 | RELEASE MOUNTING PLATE |

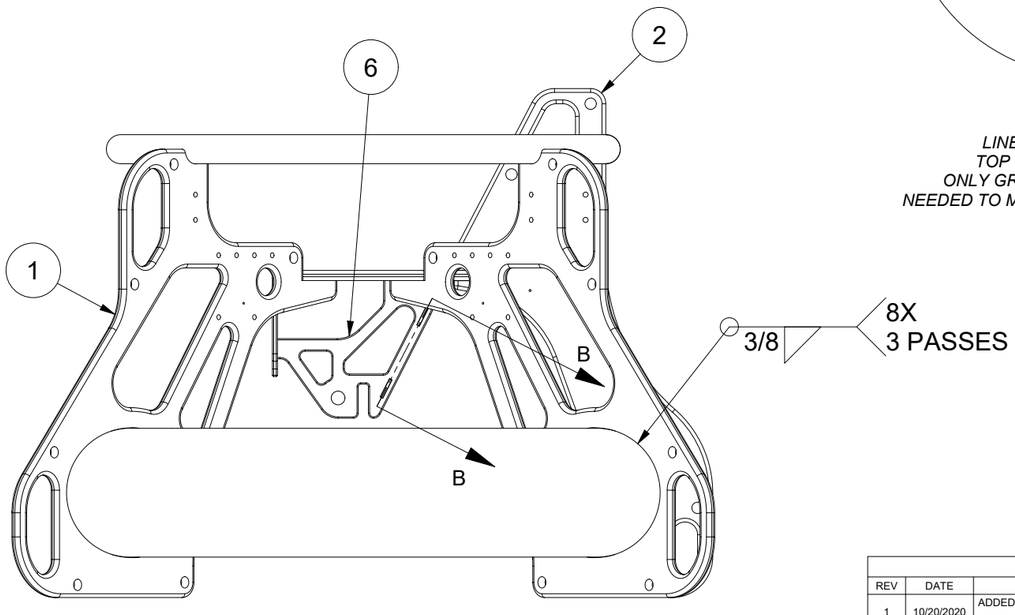




DETAIL A
*LINE UP WELDED SEAM OF TOP RING (-0104) AS SHOWN ONLY GRIND WELD ON TOP RING AS NEEDED TO MATE WITH PICKUP PLATE (-0102)*




*NOTES:*
*1) TIG/MIG WELD ALL PARTS AS SHOWN IAW AWS D1.2*
*USING AN APPROPRIATE FILLER METAL PER AWS A5.10*
*2) CONTINUOUS WELDS WITH NO EXPOSED SEAMS/HOLES*
*3) APPROXIMATE WEIGHT - 643 lbmass*

| REVISION HISTORY | | | |
|---|---|---|---|
| REV | DATE | DESCRIPTION | APPROVED |
| 1 | 10/20/2020 | ADDED VIEWS FOR WELD CALLOUTS; ADDED WELD PREPS TO -0101, -0104, -0105, -0106, -0107, & -0108; ADDED MISSING DIMENSIONS ALL DRAWINGS | C. LUMPING |

*UNLESS OTHERWISE NOTED:*
*DIMENSIONS IN INCHES*
***TOLERANCES:***

| *DECIMAL* | *ANGLE* | *FRACTION* |
|---|---|---|
| .x ± 0.1 | ±1 deg | ±1/32 |
| .xx ± 0.01 | | |
| .xxx ± 0.005 | | |

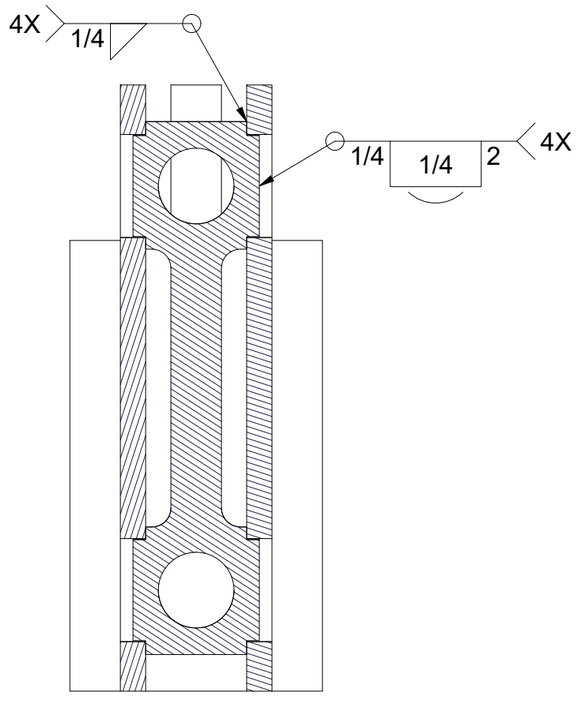
*BREAK ALL SHARP EDGES R0.02 MIN*

| | | |
|---|---|---|
| DESIGN | *Don Peters* | DATE *12/9/2007* |
| DRAFT | *Christopher Lumping* | DATE *1/8/2008* |
| CHECKED | | DATE |
| MATERIAL | *Welded Aluminum (6061-T6)* | |
| FINISH | *SEE APPLICABLE NOTES* | |

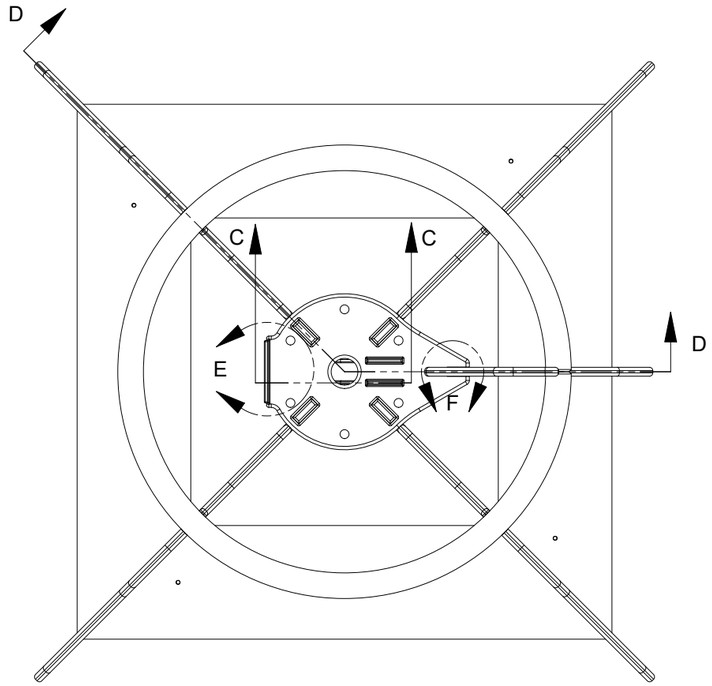
WOODS HOLE OCEANOGRAPHIC INSTITUTION
APPLIED OCEAN PHYSICS & ENGINEERING
86 WATER STREET, WOODS HOLE, MA 02543

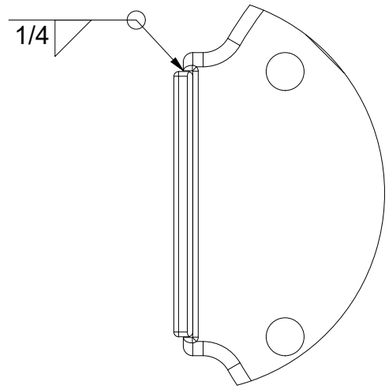
TITLE
***WHALE MULTI-FUNCTION NODE***
*MAIN FRAME WELDMENT*

| SIZE | DWG NO | REV |
|---|---|---|
| B | *232-1-0100* | *1* |
| SCALE | | SHEET 1 OF 10 |

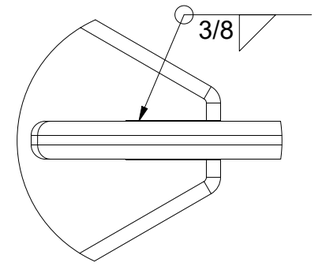



SECTION B-B

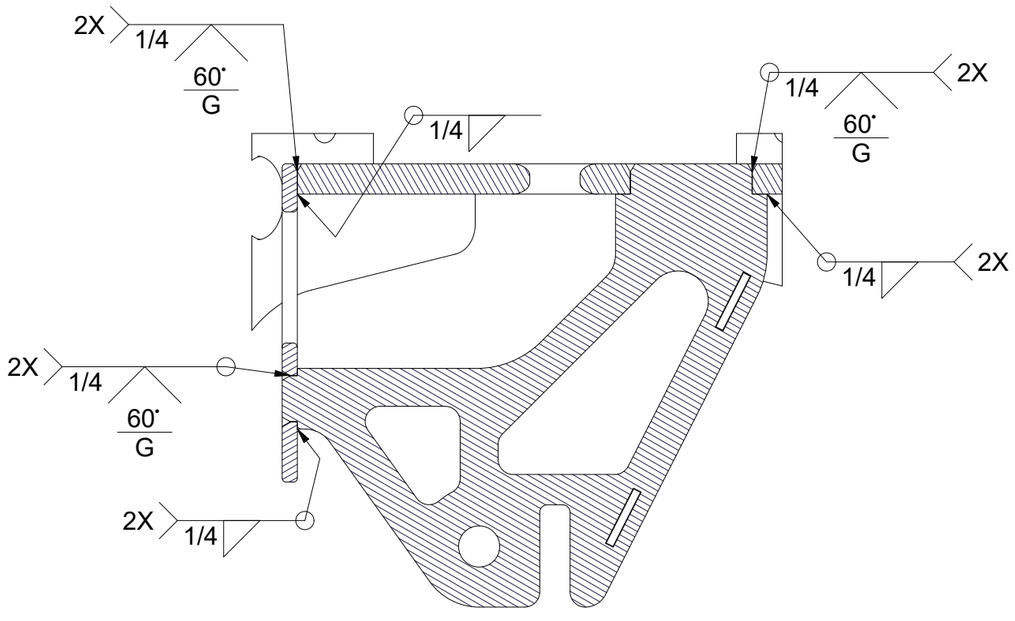


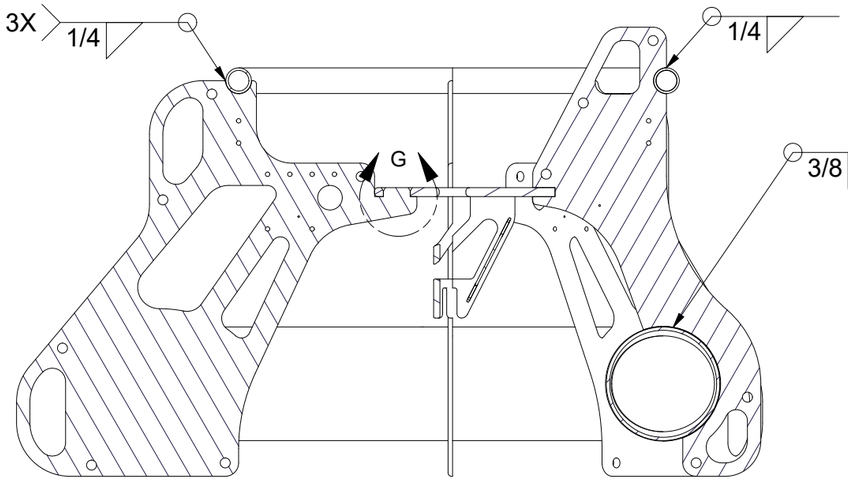

DETAIL E



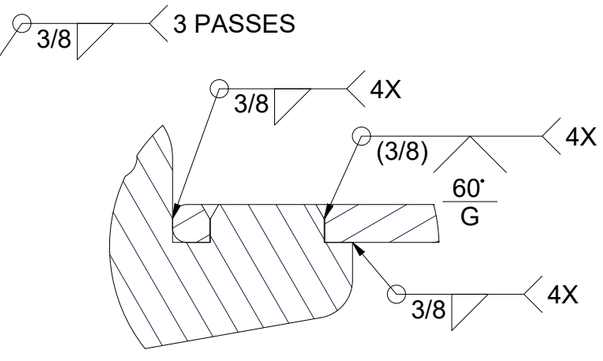

DETAIL F




SECTION C-C

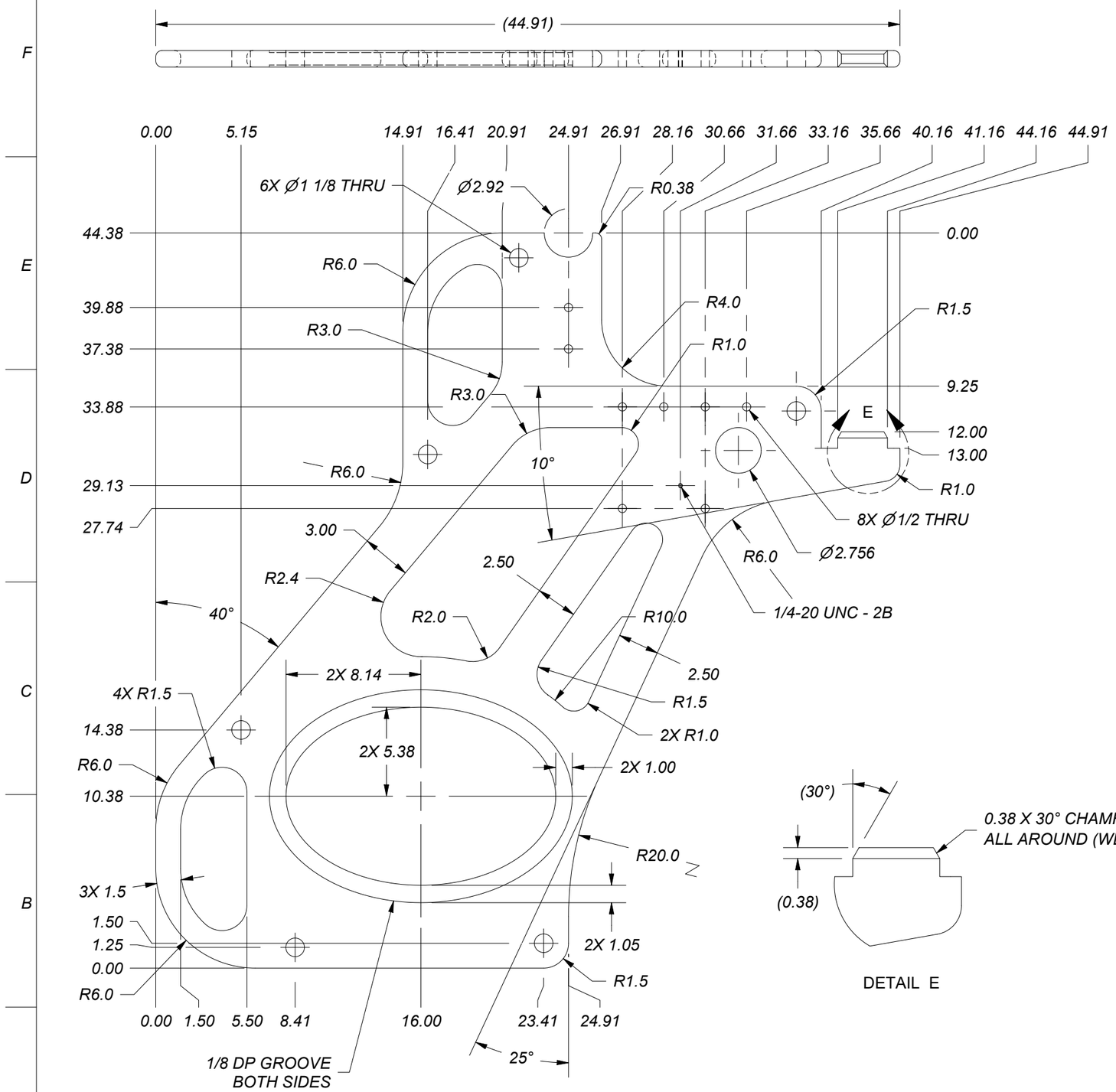



SECTION D-D




DETAIL G

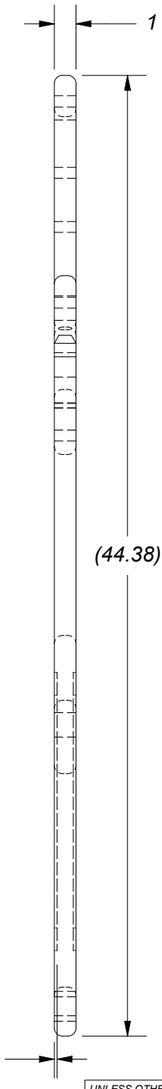
| | | | |
|---|---|---|---|
| UNLESS OTHERWISE NOTED: DIMENSIONS IN INCHES<br>TOLERANCES:<br>DECIMAL .x ± 0.1, .xx ± 0.01, .xxx ± 0.005 — ANGLE ±1 deg — FRACTION ±1/32<br>BREAK ALL SHARP EDGES R0.02 MIN | | | WOODS HOLE OCEANOGRAPHIC INSTITUTION<br>APPLIED OCEAN PHYSICS & ENGINEERING<br>86 WATER STREET, WOODS HOLE, MA 02543 |
| | DESIGN: Don Peters | DATE: 12/9/2007 | TITLE: WHALE MULTI-FUNCTION NODE |
| | DRAFT: Christopher Lumping | DATE: 1/8/2008 | MAIN FRAME WELDMENT |
| MATERIAL: Welded Aluminum (6061-T6) | CHECKED | DATE | |
| FINISH: SEE APPLICABLE NOTES | | | SIZE B — DWG NO 232-1-0100 — REV 1 |
| | | | SCALE — SHEET 2 OF 10 |







DETAIL E





UNLESS OTHERWISE NOTED:
DIMENSIONS IN INCHES

**TOLERANCES:**

| DECIMAL | ANGLE | FRACTION |
|---|---|---|
| .x ± 0.1 | ±1 deg | ±1/32 |
| .xx ± 0.01 | | |
| .xxx ± 0.005 | | |

BREAK ALL SHARP EDGES R0.02 MIN

| | | |
|---|---|---|
| MATERIAL: 6061-T6 ALUMINUM | | |
| FINISH: SEE APPLICABLE NOTES | | |
| DESIGN: Don Peters | DATE: 12/9/2007 | |
| DRAFT: Christopher Lumping | DATE: 1/8/2008 | |
| CHECKED | DATE | |

WOODS HOLE OCEANOGRAPHIC INSTITUTION
APPLIED OCEAN PHYSICS & ENGINEERING
86 WATER STREET, WOODS HOLE, MA 02543

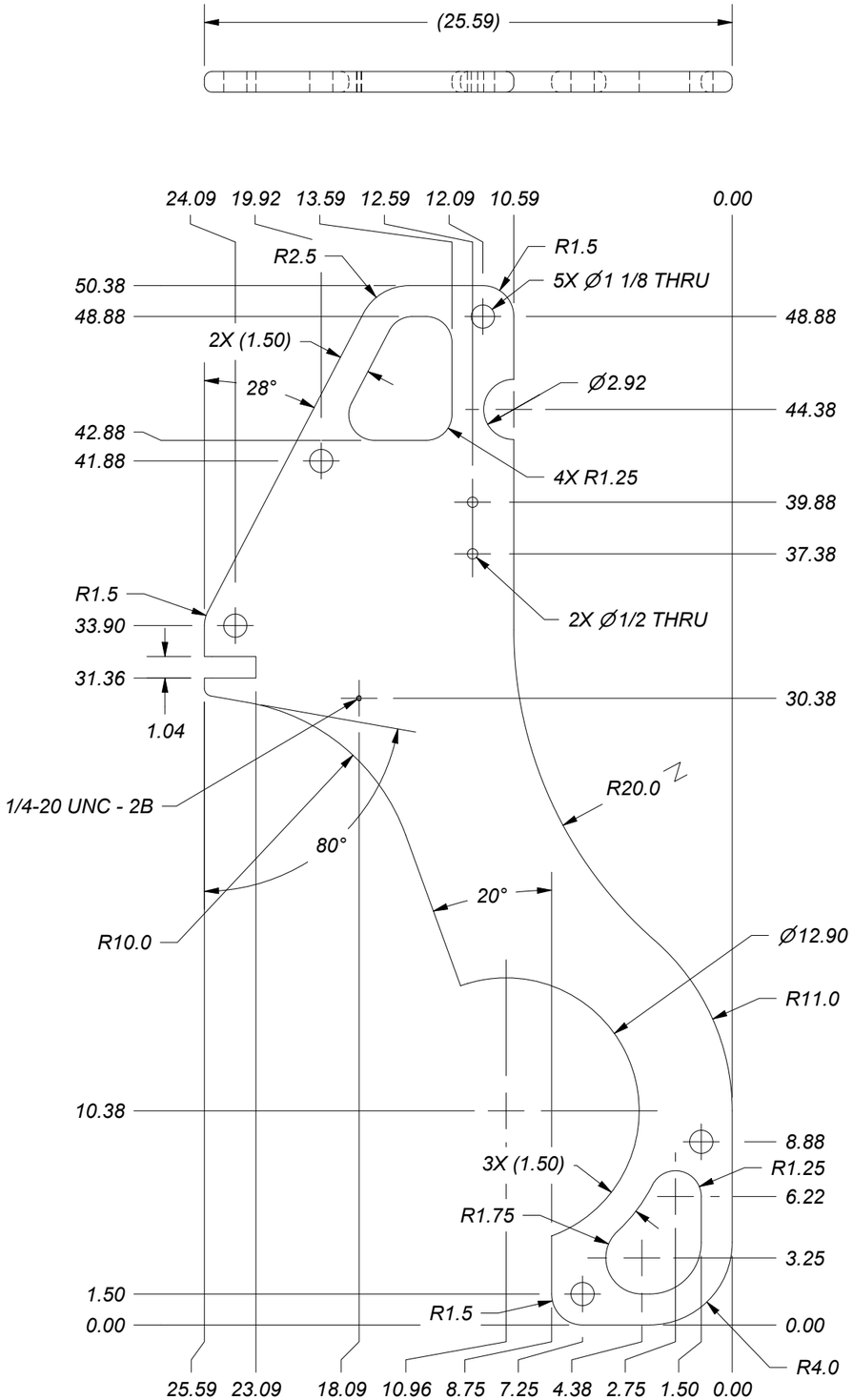
TITLE

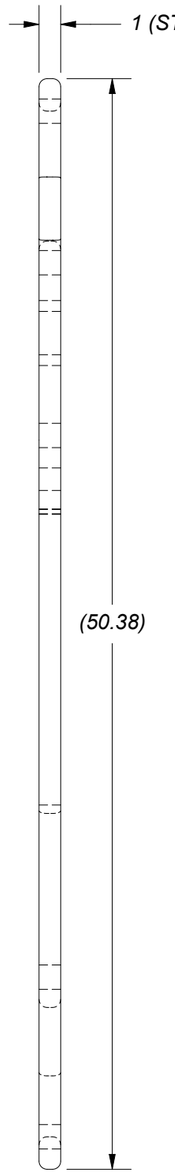
# WHALE MULTI-FUNCTION NODE

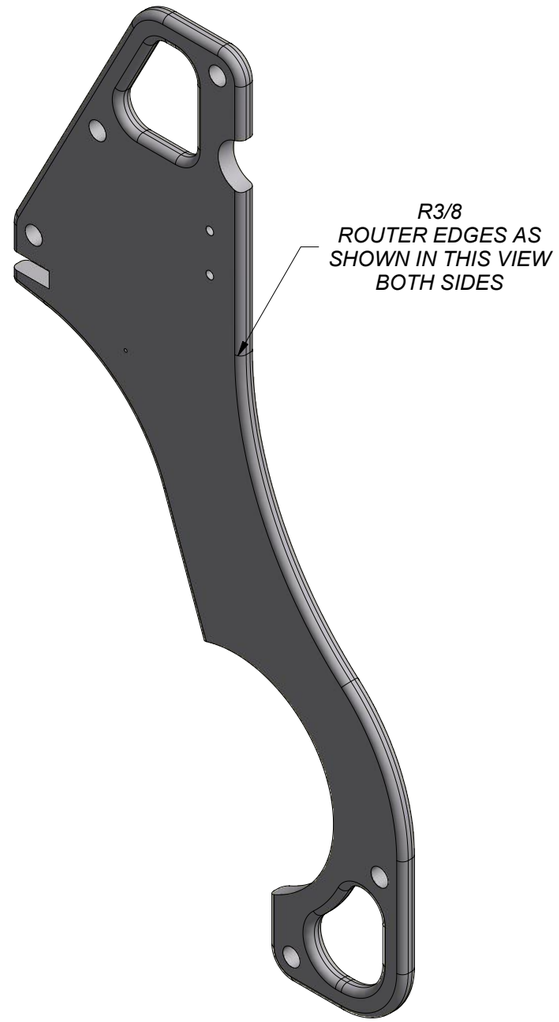
## CORNER PLATE

| SIZE | DWG NO | REV |
|---|---|---|
| B | 232-1-0101 | 1 |

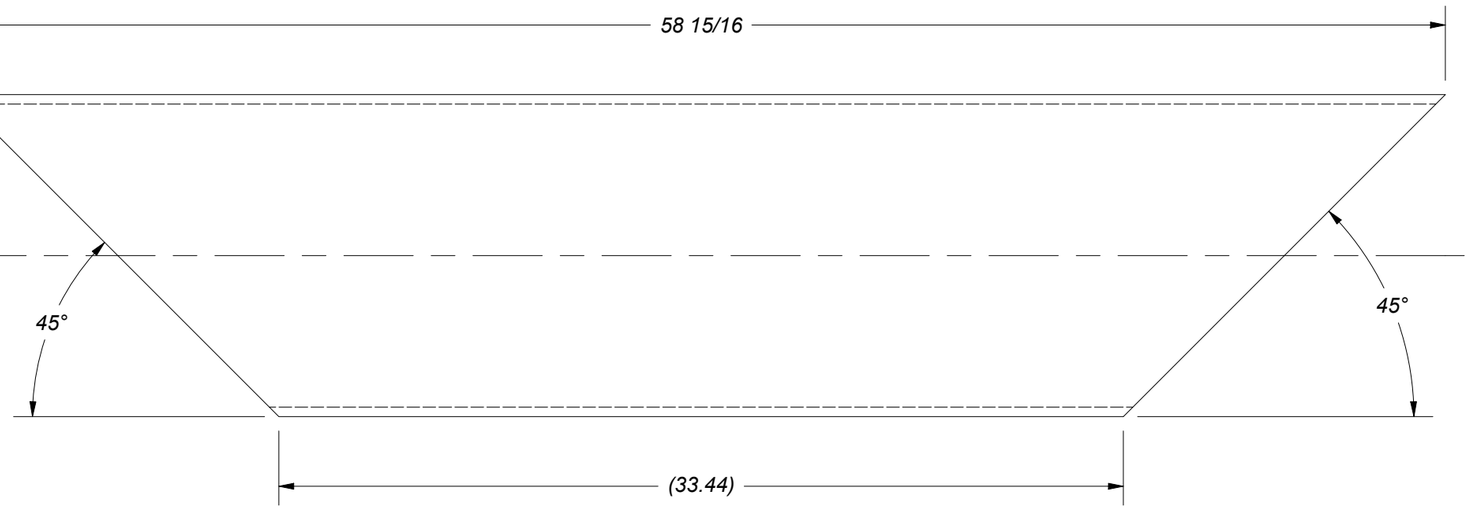
SCALE | SHEET 3 OF 10

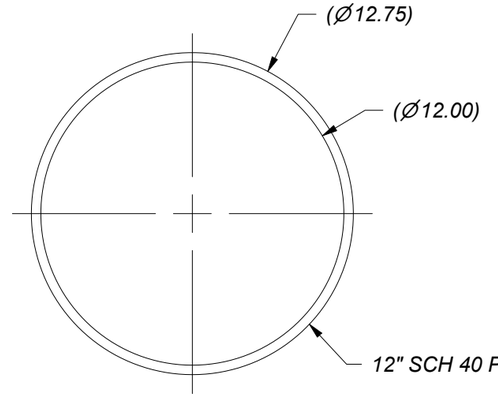



| | | |
|---|---|---|
| UNLESS OTHERWISE NOTED:<br>DIMENSIONS IN INCHES<br>**TOLERANCES:**<br>DECIMAL .x ± 0.1, .xx ± 0.01, .xxx ± 0.005 / ANGLE ±1 deg / FRACTION ±1/32<br>BREAK ALL SHARP EDGES R0.02 MIN | | WOODS HOLE OCEANOGRAPHIC INSTITUTION<br>APPLIED OCEAN PHYSICS & ENGINEERING<br>86 WATER STREET, WOODS HOLE, MA 02543 |
| | DESIGN: Christopher Lumping — DATE: 1/8/2008 | TITLE: ***WHALE MULTI-FUNCTION NODE*** |
| | DRAFT: Christopher Lumping — DATE: 1/8/2008 | *PICKUP PLATE* |
| MATERIAL: 6061-T6 ALUMINUM | CHECKED — DATE | |
| FINISH: SEE APPLICABLE NOTES | | SIZE: B — DWG NO: 232-1-0102 — REV: 1 |
| | | SCALE — SHEET 4 OF 10 |




UNLESS OTHERWISE NOTED:
DIMENSIONS IN INCHES

**TOLERANCES:**

| DECIMAL | ANGLE | FRACTION |
|---|---|---|
| .x ± 0.1 | ±1 deg | ±1/32 |
| .xx ± 0.01 | | |
| .xxx ± 0.005 | | |

BREAK ALL SHARP EDGES R0.02 MIN

MATERIAL: 6061-T6 ALUMINUM

FINISH: SEE APPLICABLE NOTES

| | | |
|---|---|---|
| DESIGN | Don Peters | DATE 12/9/2007 |
| DRAFT | Christopher Lumping | DATE 1/8/2008 |
| CHECKED | | DATE |

WOODS HOLE OCEANOGRAPHIC INSTITUTION
APPLIED OCEAN PHYSICS & ENGINEERING
86 WATER STREET, WOODS HOLE, MA 02543

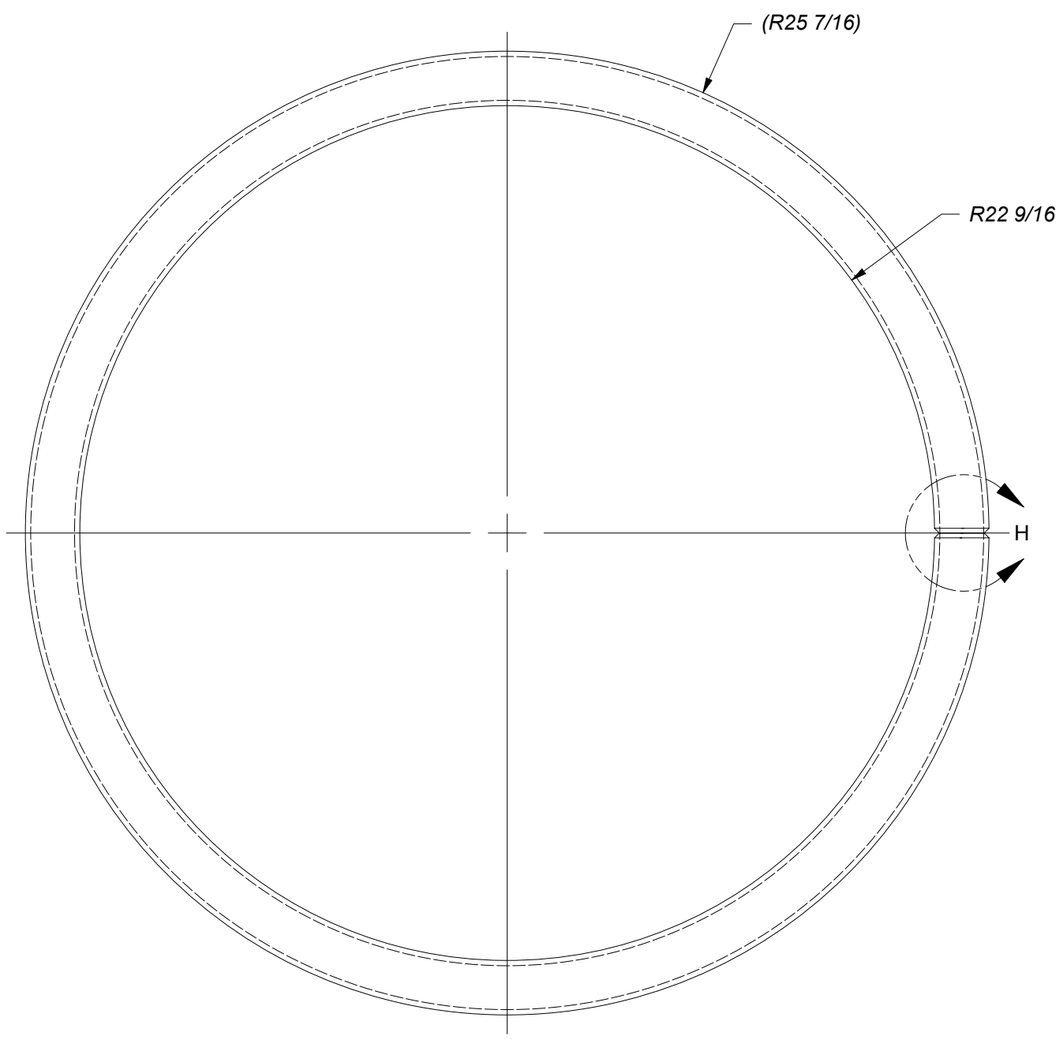
TITLE

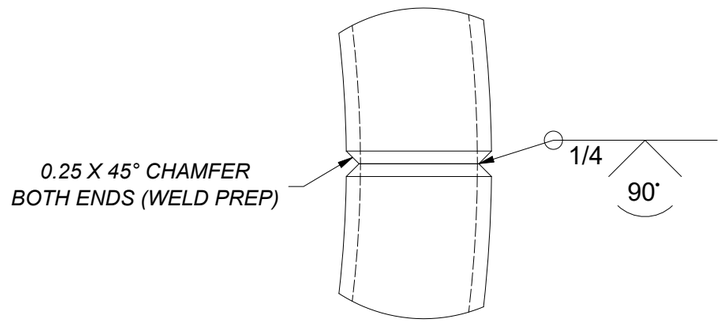
# WHALE MULTI-FUNCTION NODE

## PIPE SECTION

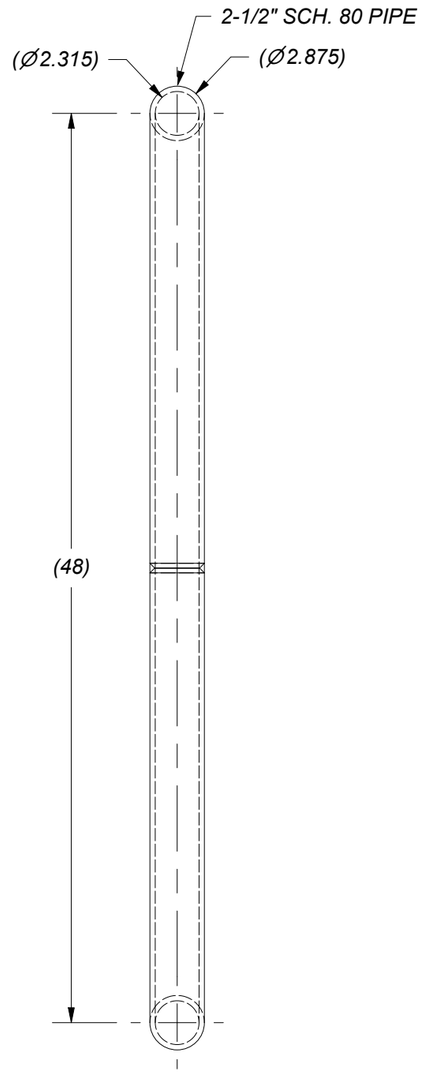
| SIZE | DWG NO | REV |
|---|---|---|
| B | 232-1-0103 | 1 |

SCALE | SHEET 5 OF 10

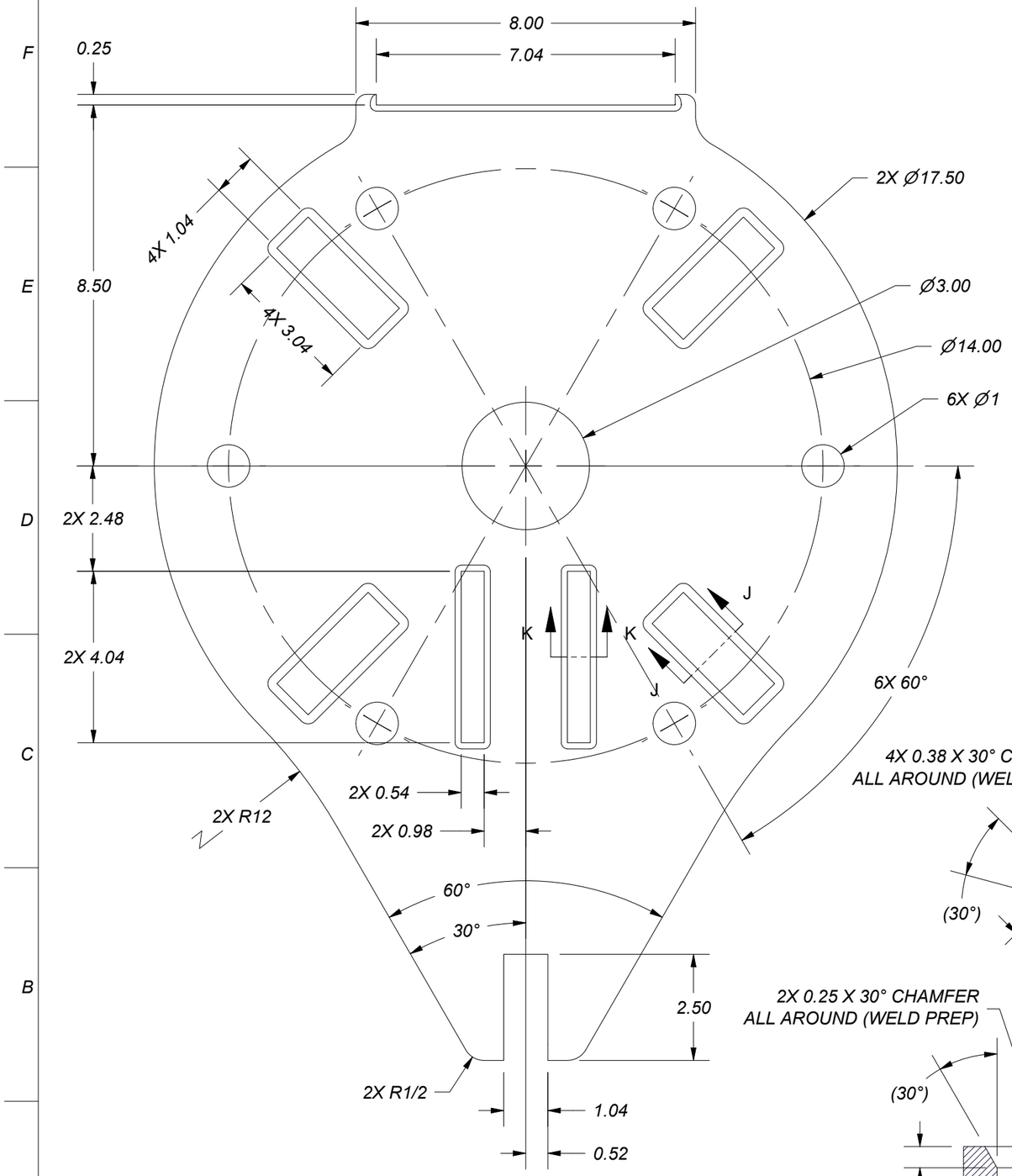


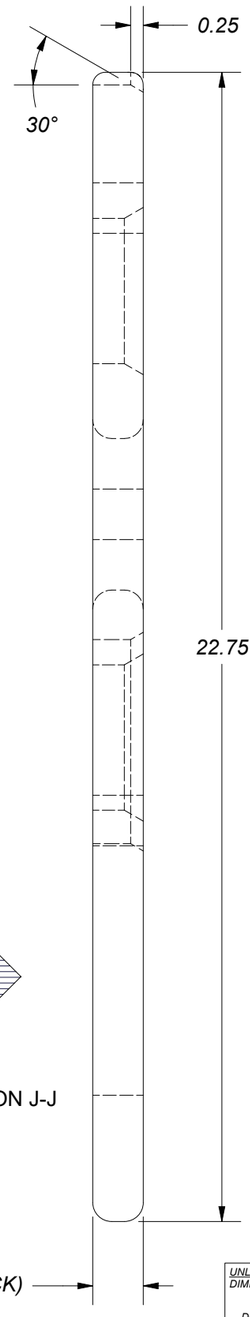



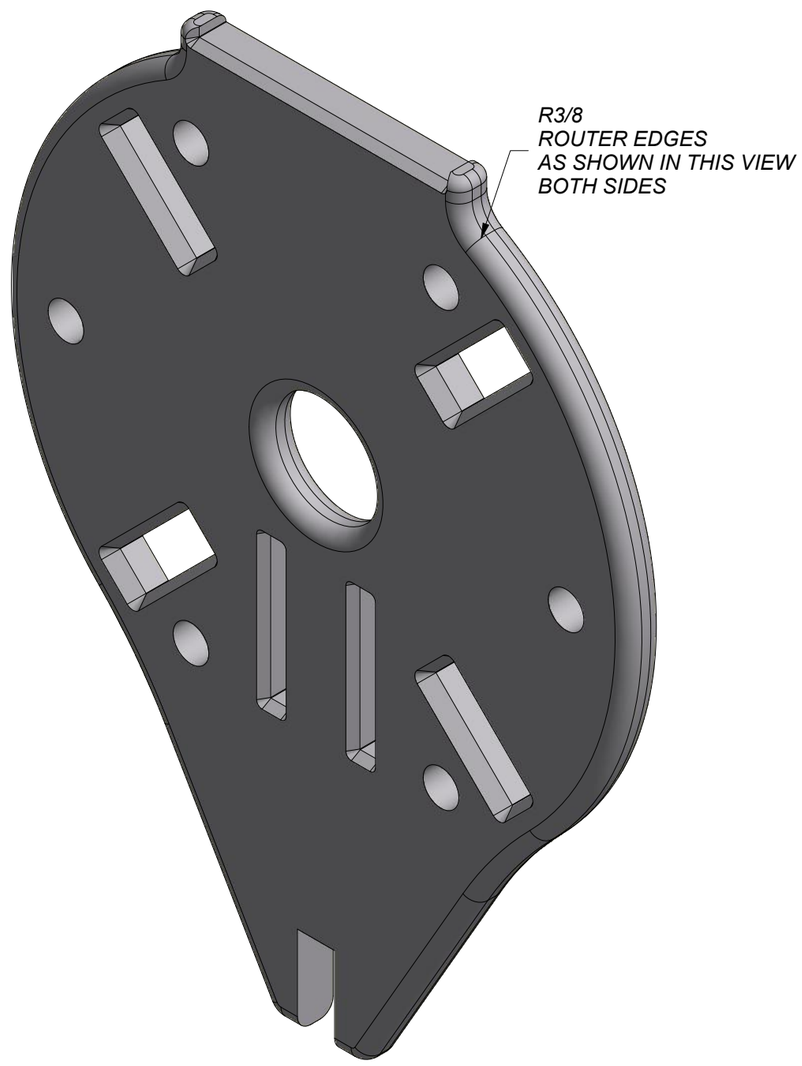

DETAIL H

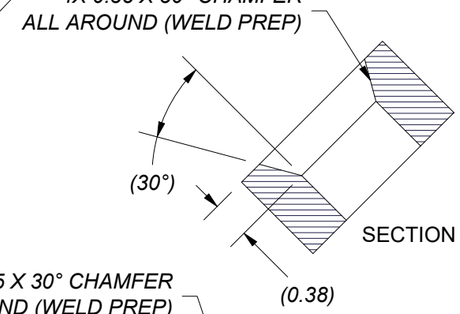



| | | |
|---|---|---|
| UNLESS OTHERWISE NOTED: DIMENSIONS IN INCHES<br>TOLERANCES:<br>DECIMAL: .x ± 0.1, .xx ± 0.01, .xxx ± 0.005<br>ANGLE: ±1 deg<br>FRACTION: ±1/32<br>BREAK ALL SHARP EDGES R0.02 MIN | | WOODS HOLE OCEANOGRAPHIC INSTITUTION<br>APPLIED OCEAN PHYSICS & ENGINEERING<br>86 WATER STREET, WOODS HOLE, MA 02543 |
| MATERIAL: 6061-T6 ALUMINUM | DESIGN: Don Peters — DATE: 12/9/2007<br>DRAFT: Christopher Lumping — DATE: 1/8/2008<br>CHECKED — DATE | TITLE: WHALE MULTI-FUNCTION NODE<br>TOP RING |
| FINISH: SEE APPLICABLE NOTES | | SIZE: B — DWG NO: 232-1-0104 — REV: 1 |
| | | SCALE — SHEET 6 OF 10 |




SECTION J-J




SECTION K-K

UNLESS OTHERWISE NOTED:
DIMENSIONS IN INCHES

**TOLERANCES:**

| DECIMAL | ANGLE | FRACTION |
|---|---|---|
| .x ± 0.1 | ±1 deg | ±1/32 |
| .xx ± 0.01 | | |
| .xxx ± 0.005 | | |

BREAK ALL SHARP EDGES R0.02 MIN

MATERIAL: 6061-T6 ALUMINUM

FINISH: SEE APPLICABLE NOTES

| | | |
|---|---|---|
| DESIGN: Don Peters | DATE: 12/9/2007 | |
| DRAFT: Christopher Lumping | DATE: 1/8/2008 | |
| CHECKED | DATE | |

WOODS HOLE OCEANOGRAPHIC INSTITUTION
APPLIED OCEAN PHYSICS & ENGINEERING
86 WATER STREET, WOODS HOLE, MA 02543

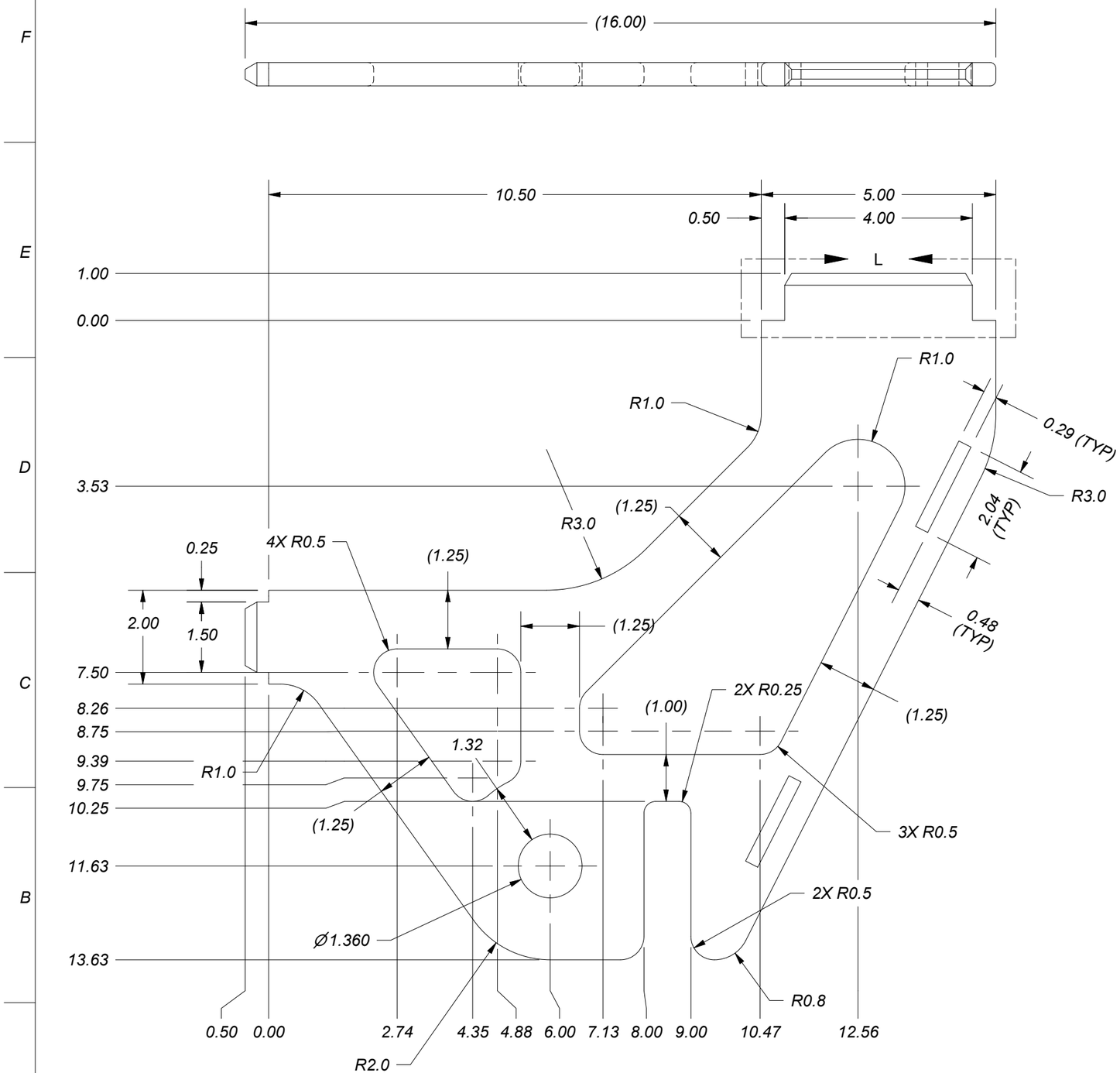
TITLE

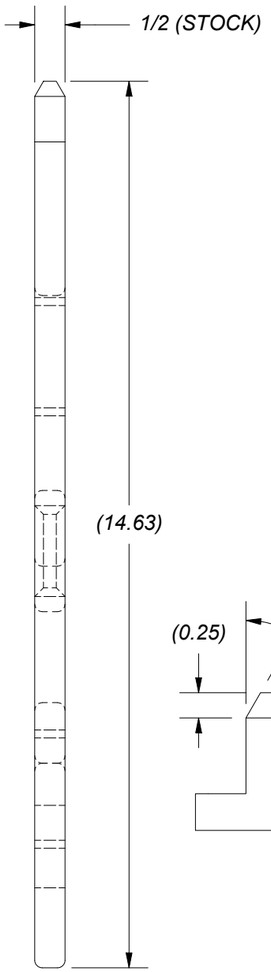
# WHALE MULTI-FUNCTION NODE

## MAIN FLANGE

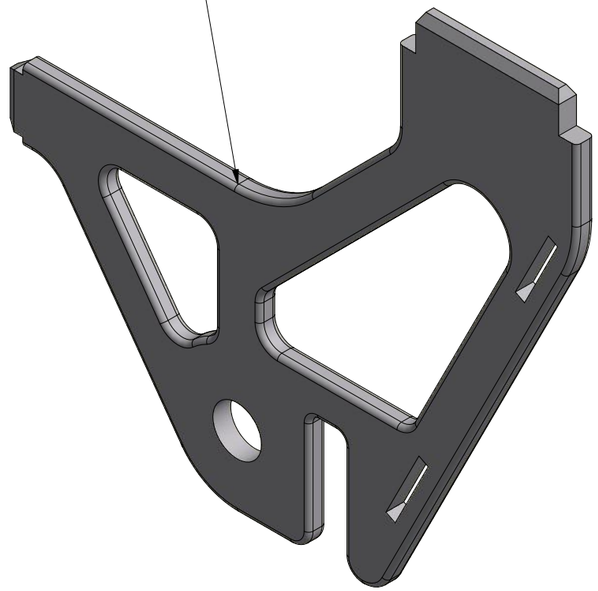
| SIZE | DWG NO | REV |
|---|---|---|
| B | 232-1-0105 | 1 |

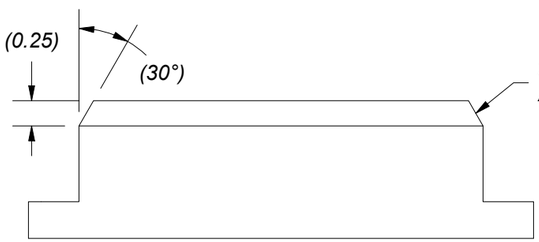
SCALE | SHEET 7 OF 10



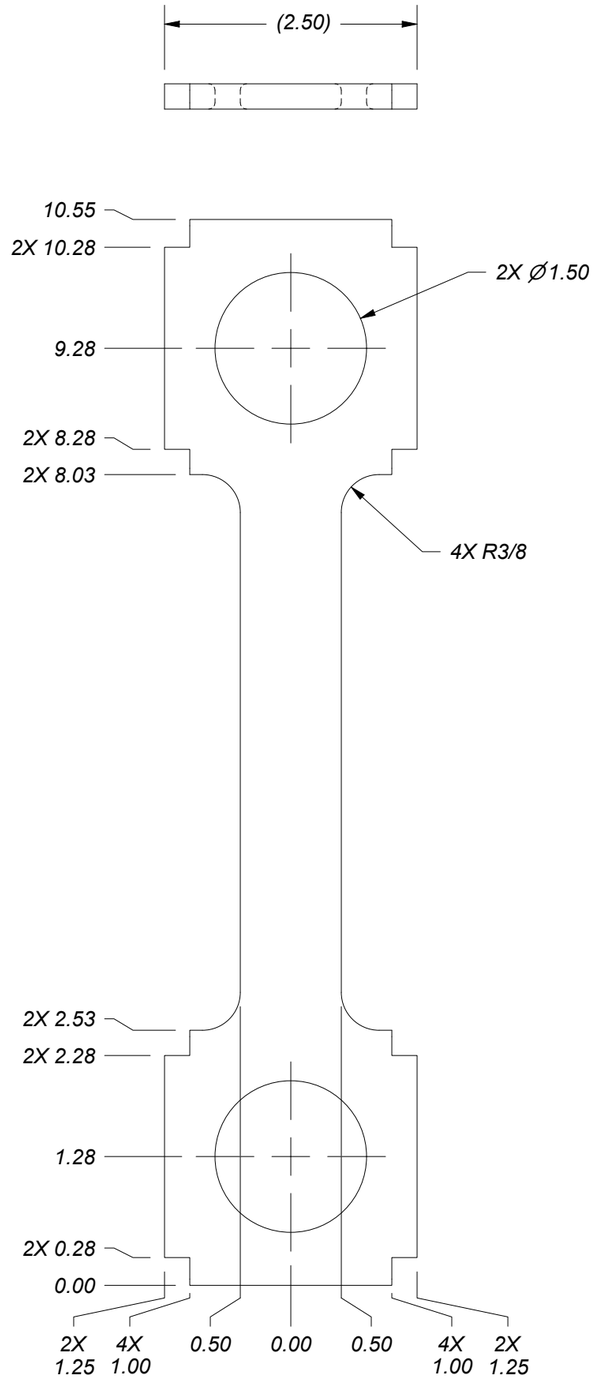

TRUE R1/8
ROUTER EDGES
AS SHOWN IN THIS VIEW
BOTH SIDES

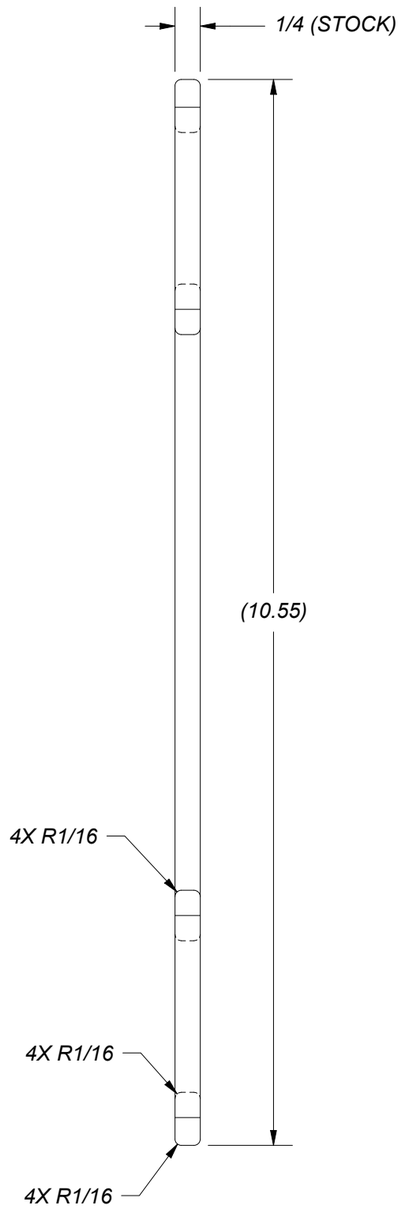


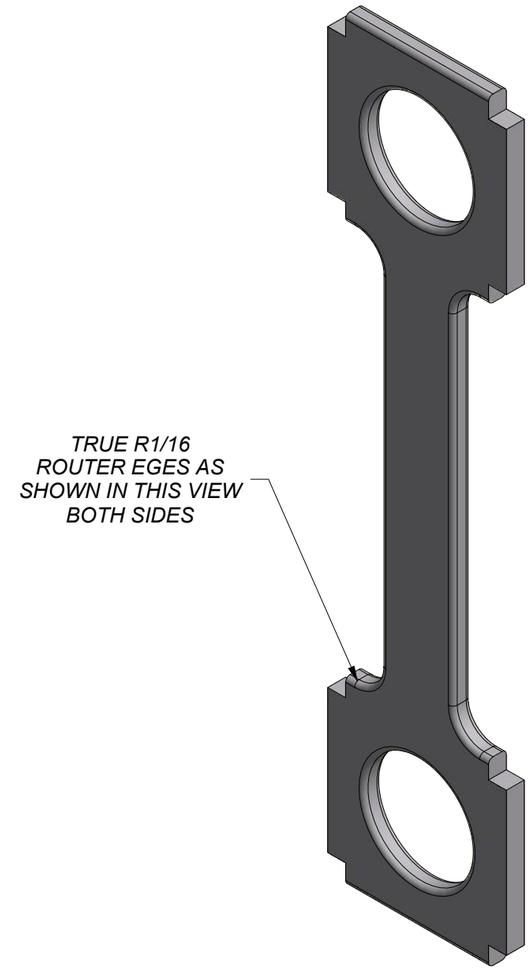



DETAIL L

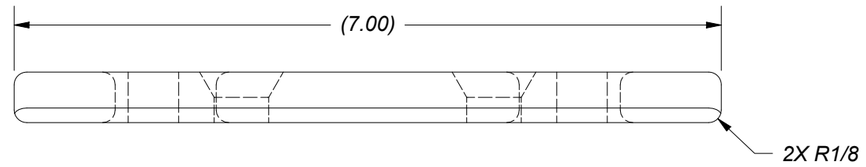
| | | |
|---|---|---|
| UNLESS OTHERWISE NOTED: DIMENSIONS IN INCHES<br>TOLERANCES:<br>DECIMAL .x ± 0.1 .xx ± 0.01 .xxx ± 0.005 ANGLE ±1 deg FRACTION ±1/32<br>BREAK ALL SHARP EDGES R0.02 MIN | | WOODS HOLE OCEANOGRAPHIC INSTITUTION<br>APPLIED OCEAN PHYSICS & ENGINEERING<br>86 WATER STREET, WOODS HOLE, MA 02543 |
| | DESIGN: Don Peters — DATE: 12/10/2007 | TITLE: **WHALE MULTI-FUNCTION NODE**<br>RELEASE CHEEK PLATE |
| MATERIAL: 6061-T6 ALUMINUM | DRAFT: Christopher Lumping — DATE: 1/8/2008<br>CHECKED — DATE | |
| FINISH: SEE APPLICABLE NOTES | | SIZE: B — DWG NO: 232-1-0106 — REV: 1 |
| | | SCALE — SHEET 8 OF 10 |

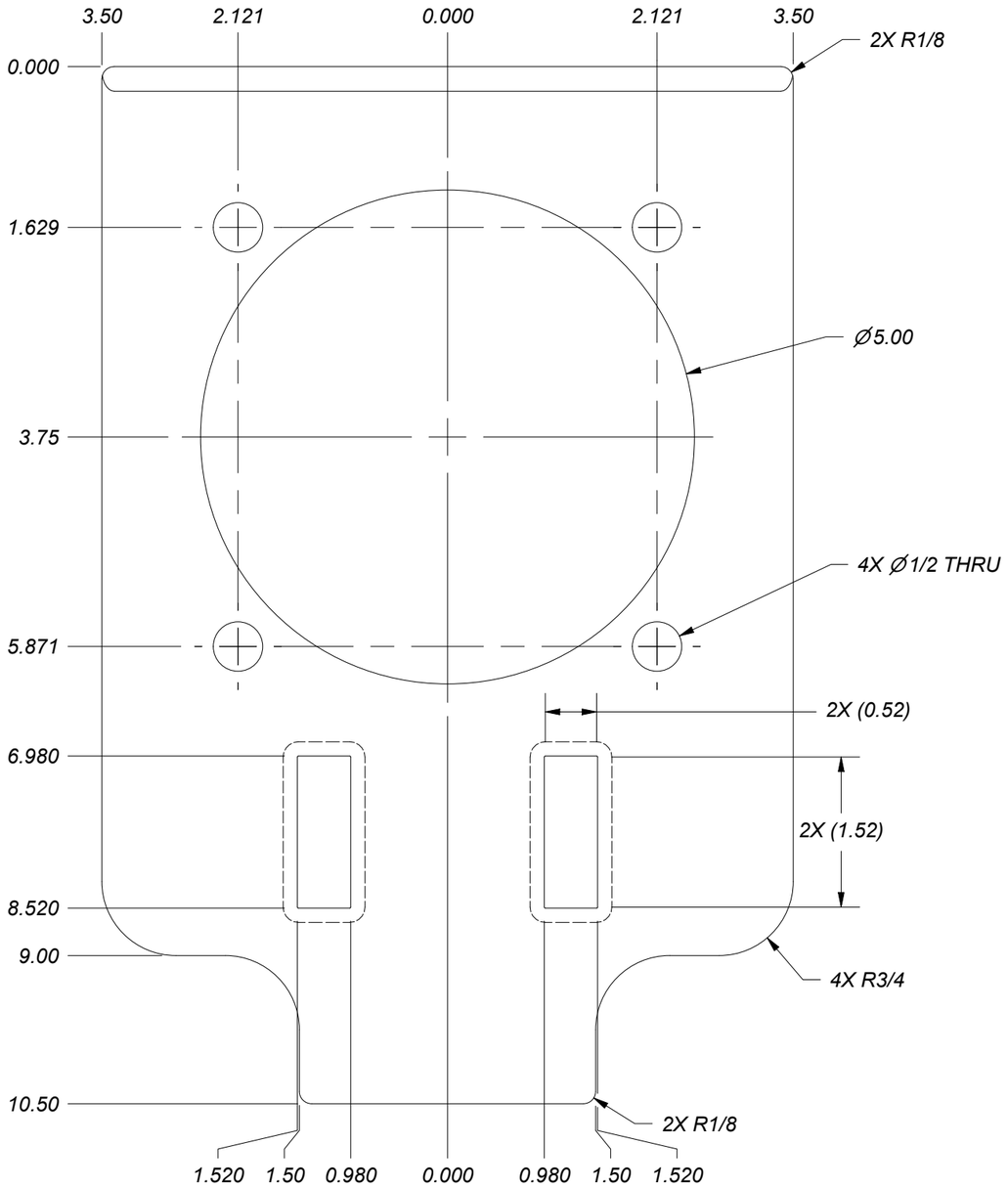


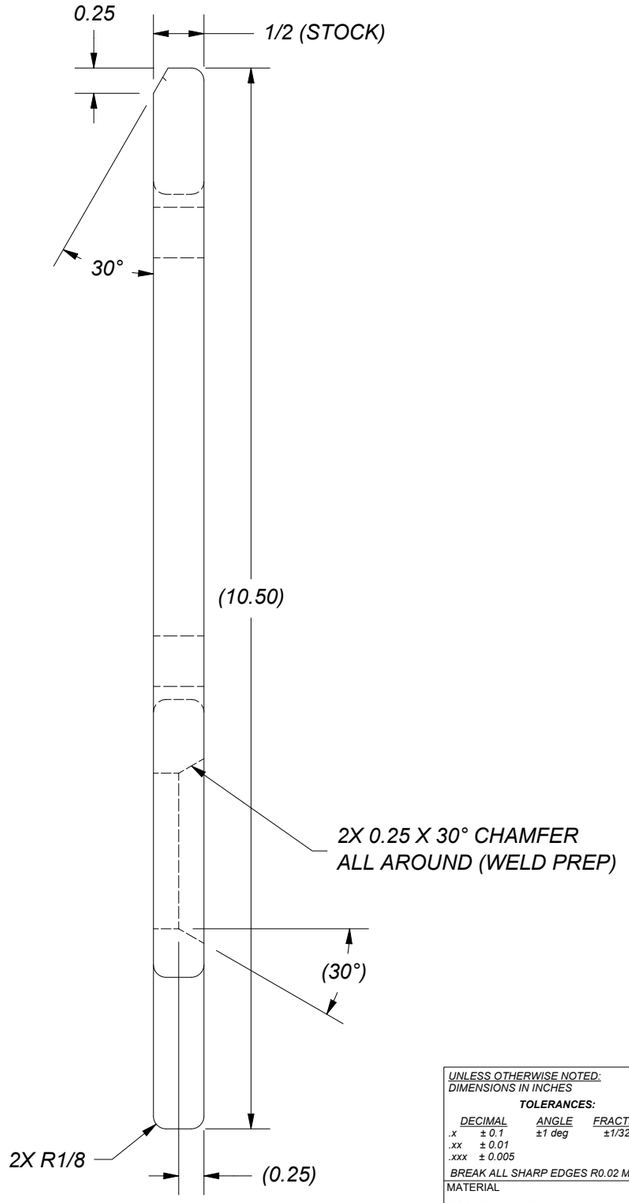



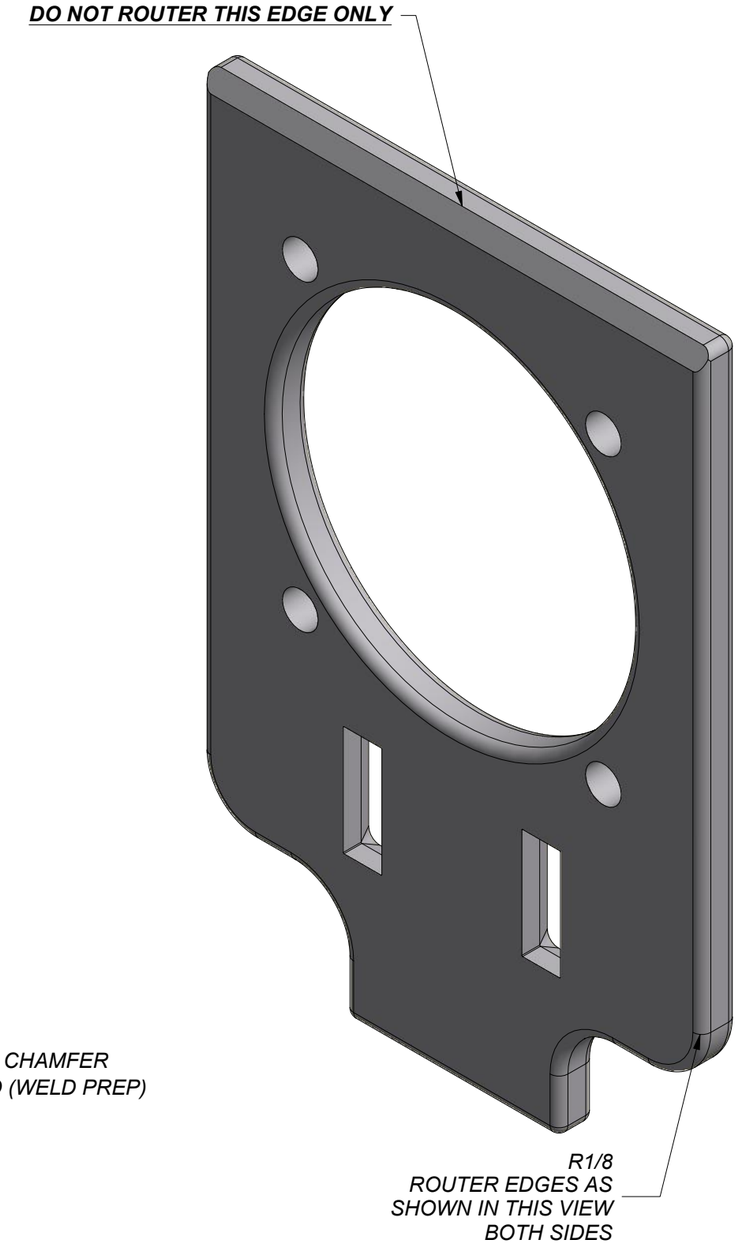




| | | | |
|---|---|---|---|
| UNLESS OTHERWISE NOTED: DIMENSIONS IN INCHES<br>TOLERANCES:<br>DECIMAL .x ± 0.1, .xx ± 0.01, .xxx ± 0.005 — ANGLE ±1 deg — FRACTION ±1/32<br>BREAK ALL SHARP EDGES R0.02 MIN | | | WOODS HOLE OCEANOGRAPHIC INSTITUTION<br>APPLIED OCEAN PHYSICS & ENGINEERING<br>86 WATER STREET, WOODS HOLE, MA 02543 |
| | DESIGN: Don Peters | DATE: 12/11/2007 | TITLE: **WHALE MULTI-FUNCTION NODE**<br>RELEASE CHEEK JOINER PLATE |
| | DRAFT: Christopher Lumping | DATE: 1/8/2008 | |
| MATERIAL: 6061-T6 ALUMINUM | CHECKED | DATE | |
| FINISH: SEE APPLICABLE NOTES | | | SIZE: B — DWG NO: 232-1-0107 — REV: 1 |
| | | | SCALE — SHEET 9 OF 10 |




UNLESS OTHERWISE NOTED:
DIMENSIONS IN INCHES

TOLERANCES:

| DECIMAL | ANGLE | FRACTION |
|---|---|---|
| .x ± 0.1 | ±1 deg | ±1/32 |
| .xx ± 0.01 | | |
| .xxx ± 0.005 | | |

BREAK ALL SHARP EDGES R0.02 MIN

MATERIAL: 6061-T6 ALUMINUM

FINISH: SEE APPLICABLE NOTES

| | | |
|---|---|---|
| DESIGN | Don Peters | DATE 12/11/2007 |
| DRAFT | Christopher Lumping | DATE 1/8/2008 |
| CHECKED | | DATE |

WOODS HOLE OCEANOGRAPHIC INSTITUTION
APPLIED OCEAN PHYSICS & ENGINEERING
86 WATER STREET, WOODS HOLE, MA 02543

TITLE

# WHALE MULTI-FUNCTION NODE

## RELEASE MOUNTING PLATE

| SIZE | DWG NO | REV |
|---|---|---|
| B | 232-1-0108 | 1 |

SCALE | SHEET 10 OF 10