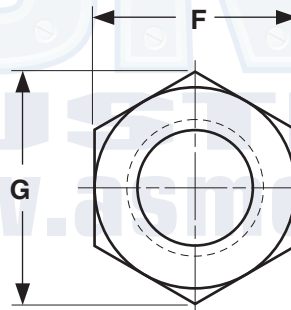
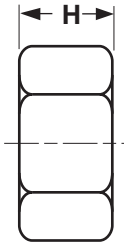


# NUTS

## THICK HEX

Grade 9



| THICK HEX NUTS                            |        |                    |       |       |                      |       |                       |       |       | ASME B18.2.2-2010 |
|---|--------|--------------------|-------|-------|----------------------|-------|-----------------------|-------|-------|-------------------|
| Nominal or Basic Major Diameter of Thread |        | F                  |       |       | G                    |       | H                     |       |       |                   |
|   |        | Width Across Flats |       |       | Width Across Corners |       | Thickness of Hex Nuts |       |       |                   |
|   |        | Basic              | Max   | Min   | Max                  | Min   | Basic                 | Max   | Min   |                   |
| 1/4                                       | 0.2500 | 7/16               | 0.438 | 0.428 | 0.505                | 0.488 | 9/32                  | 0.288 | 0.274 |                   |
| 5/16                                      | 0.3125 | 1/2                | 0.500 | 0.489 | 0.577                | 0.557 | 21/64                 | 0.336 | 0.320 |                   |
| 3/8                                       | 0.3750 | 9/16               | 0.562 | 0.551 | 0.650                | 0.628 | 13/32                 | 0.415 | 0.398 |                   |
| 7/16                                      | 0.4375 | 11/16              | 0.688 | 0.675 | 0.794                | 0.768 | 29/64                 | 0.463 | 0.444 |                   |
| 1/2                                       | 0.5000 | 3/4                | 0.750 | 0.736 | 0.866                | 0.840 | 9/16                  | 0.573 | 0.552 |                   |
| 9/16                                      | 0.5625 | 7/8                | 0.875 | 0.861 | 1.010                | 0.982 | 39/64                 | 0.621 | 0.598 |                   |
| 5/8                                       | 0.6250 | 15/16              | 0.938 | 0.922 | 1.083                | 1.051 | 23/32                 | 0.731 | 0.706 |                   |
| 3/4                                       | 0.7500 | 1-1/8              | 1.125 | 1.088 | 1.299                | 1.240 | 13/16                 | 0.827 | 0.798 |                   |
| 7/8                                       | 0.8750 | 1-5/16             | 1.312 | 1.269 | 1.516                | 1.447 | 29/32                 | 0.922 | 0.890 |                   |



## GRADE-9

|                                |   |
|--------------------------------|---|
| <b>Description</b>             | A thick hex nut made from steel with a maximum carbon content of 0.55%, a minimum manganese content of 0.60% and a maximum sulfur content of 0.05%. Nuts are thicker than heavy hex nuts of the same nominal size.                |
| <b>Applications/Advantages</b> | For use with bolts with a minimum tensile strength equal to or less than 180,000 psi..  |
| <b>Material</b>                | Nuts shall be made from a steel which conforms to the following chemical composition requirements:<br><b>Carbon:</b> 0.20-0.55%; <b>Manganese:</b> 0.60% minimum; <b>Phosphorous:</b> 0.04% maximum; <b>Sulfur:</b> 0.05% maximum |
| <b>Hardness</b>                | 1/4 through 5/8 in.: Rockwell C32 - C38<br>3/4 and 7/8 in.: Rockwell C35 - C40  |
| <b>Proof Load</b>              | 180,000 psi.  |
| <b>Plating</b>                 | EcoGuard™ 1000-hour gray/silver coating   |