<table>
<thead>
<tr>
<th>Inches</th>
<th>Decimal Form</th>
</tr>
</thead>
<tbody>
<tr>
<td>1&quot;</td>
<td>.08</td>
</tr>
<tr>
<td>2&quot;</td>
<td>.16</td>
</tr>
<tr>
<td>3&quot;</td>
<td>.25</td>
</tr>
<tr>
<td>4&quot;</td>
<td>.33</td>
</tr>
<tr>
<td>5&quot;</td>
<td>.42</td>
</tr>
<tr>
<td>6&quot;</td>
<td>.50</td>
</tr>
<tr>
<td>7&quot;</td>
<td>.58</td>
</tr>
<tr>
<td>8&quot;</td>
<td>.67</td>
</tr>
<tr>
<td>9&quot;</td>
<td>.75</td>
</tr>
<tr>
<td>10&quot;</td>
<td>.83</td>
</tr>
<tr>
<td>11&quot;</td>
<td>.92</td>
</tr>
<tr>
<td>12&quot;</td>
<td>1.00</td>
</tr>
</tbody>
</table>

These items must be committed to memory!!!
HOW TO CALCULATE BOARD FEET

Using the nominal dimensions...

\[(t \times w) / 12" = \text{board feet (bf)/lf of board}\]

Then multiply bf x length of board

2x4 dimensional lumber

2”x4” = 8”/12” = .67 board feet/lf of lumber
As a result .67 becomes a simple conversion factor for 2x4’s.

So, to convert an 8’ long 2x4 to bf is...

.67 x 8’ = 5.36 bf.

Then round up or down to the nearest whole board foot - or 5 bf.
HOW TO CALCULATE BOARD FEET

Using the nominal dimensions...

\[(L \times W) / 12" = \text{board feet (bf)}\]

2x4 dimensional lumber
2” x 4” = 8” / 12” = .67 board feet/lf of lumber

2x6 dimensional lumber = 1.0 bf/lf of lumber
2x8 dimensional lumber = 1.33 bf/lf of lumber
2x10 dimensional lumber = 1.67 bf/lf of lumber
2x12 dimensional lumber = 2.0 bf/lf of lumber

This formula is applicable to all dimensional lumber.
ESSENTIAL CONSTRUCTION MATH

Perimeter

- Square, circle, trapezoid, triangle, etc.
- Usage?
  - Rebar
  - Masonry joint reinforcing
  - Starting point for wood framing
  - Starting point for sheathing - wall & roof
  - Starting point for foundation systems
ESSENTIAL CONSTRUCTION MATH

Area
- Square, circle, trapezoid, triangle, etc.
- Usage?
  - Wall sheathing & housewrap
  - Floor sheathing
  - Roof sheathing & roofing felt
  - Drywall
- Starting point for many others:
  - Concrete
  - Excavation
  - Masonry
ESSENTIAL CONSTRUCTION MATH

Volume
- Square, circle, trapezoid, triangle, etc.
- Usage?
  - Earthwork
  - Excavation
  - Backfill
  - Concrete
  - Grout
QUESTIONS & ANSWERS

“Our lives begin to end the day we become silent about things that matter.”
- Martin Luther King Jr.

“He who asks a question is a fool for five minutes; he who does not ask a question remains a fool forever.”
- Chinese Proverb

“Education is the movement from darkness to light.”
- Allan Bloom

“Cultivation to the mind is as necessary as food to the body.”
- Marcus Tullius Cicero

“What one has not experienced, one will never understand in print.”
- Isadora Duncan