The Hill Group
Fabrication from Estimate to Operation
Introduction to Hill
Model Based Estimating
Design Model Limitations
Modular Central Plant
Intro to The Hill Group
WHO IS THE HILL GROUP?

- Collaborative partner throughout a building’s life cycle

Construction
Energy Efficiency/Sustainability
Service and Building Maintenance
Commissioning/Test & Balance/LEED Consulting
Building Operations/Stationary Engineers
Engineering Services
Facilities Solutions
Architectural Systems
VALUE TO THE TEAM -- INFRASTRUCTURE

- 27 acres and four buildings with over 300K square feet dedicated to:
  - office
  - production
  - storage
  - collaboration
  - modular construction
## Weld System

<table>
<thead>
<tr>
<th>Service</th>
<th>Length of Pipe (ft)</th>
<th>Quantity of Fittings/Valves</th>
<th>System Capacity (Gallons)</th>
<th>E time (hrs)</th>
<th>Install Time (MD)</th>
<th>$Material Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>CHILLED WATER: CHW 0-2 CuxWeld</td>
<td>32'-10 1/4&quot;</td>
<td>10</td>
<td>18.4</td>
<td>32:26</td>
<td>4.1</td>
<td>465.18</td>
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## Groove System

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<tr>
<td>CHILLED WATER: CHW 0-2 CuxVic</td>
<td>33'-5 3/4&quot;</td>
<td>14</td>
<td>19.1</td>
<td>16:58</td>
<td>2.1</td>
<td>1,379.02</td>
</tr>
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Design Model Limitations
The disconnect includes:

Real physical dimensions
Actual Bill of Materials
Real material pricing information
Real labor metrics
Hanging mechanisms relative to other systems
Coordinated prefabrication opportunities
Coordinated multi-trade modular opportunities
Modular Central Plant
Skid Packages Assembled Offsite

- 4 Chiller Skids
- 2 Pump Skids
- 2 Heat Exchanger Skids
- 2 Electrical Panel Skids
The Hill Group
Thank You