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16.660 / 16.853 / ESD.62J Introduction to Lean Six Sigma Methods  
January (IAP) 2008

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# Lean Home Building

## An Unusual Example

# Video Information

- **This is one of two videos to use**
- **The video can be purchased from the Building Industry Association of San Diego**
- **[https://secure.newhomedirectory.org/BIA SD/Registration/video\\_order.asp](https://secure.newhomedirectory.org/BIA SD/Registration/video_order.asp)**
- **The condensed 12 minute DVD version is recommended for this module**

# Learning Objectives

**At the end of this module, you will be able to**

- **Identify lean practices**
- **Estimate the value and benefit in removing waste or time from a process**



# Lean Home Building – The Task

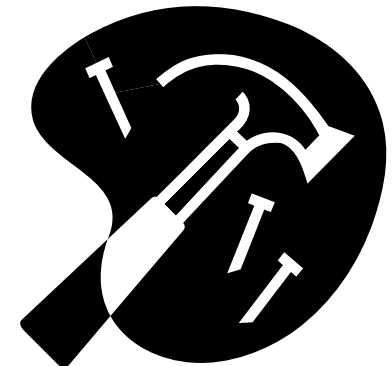


- **We all have some idea of what it takes to build a house**
  
- **For this example we need to build a typical three bedroom suburban house with a two stall garage on a flat lot. It will have a slab-type foundation with embedded utilities.**



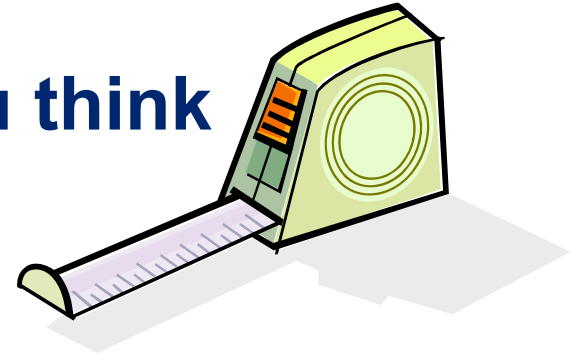
# Lean Home Building – The Requirement

- **Use only conventional technologies**
- **Start with a flat lot with all materials, tools, and labor available**
- **Eliminate all non-value-added work and wait time**
- **Finished state will be ready to move in**
  - **Carpeting down**
  - **Appliances installed**
  - **Lawn and Shrubbery planted**



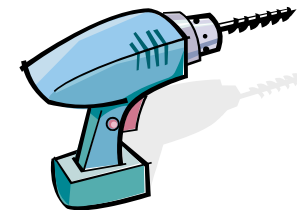
# Lean Home Building – The Question

- **Estimate the shortest time you think it will take to do this task**



- **Divide into groups of four and take five minutes to develop your estimate**

- **Report your estimate to the class**



# While Watching the Video

- **Look for Lean Practices**
  - **Example is communication systems**
- **Be prepared to develop a comprehensive list with your group and report your observations to the class**





# Watch the Video

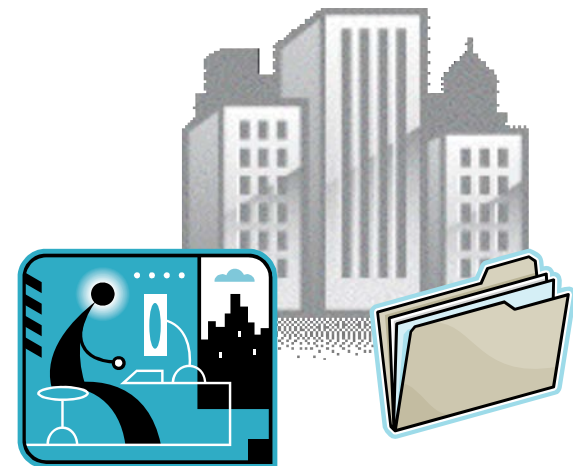


# Which Team had the Closest Estimate?



# Talking About It

- **Take five minutes with your group to develop your list of observed Lean Practices**
- **Share with the class**
- **Do you know of any similar examples,**
  - **Within your industry?**
  - **Within other industries?**



# Acknowledgements

- **Ron Bengelink – ASU**
- **Jackie Candido – MIT**

# Notes