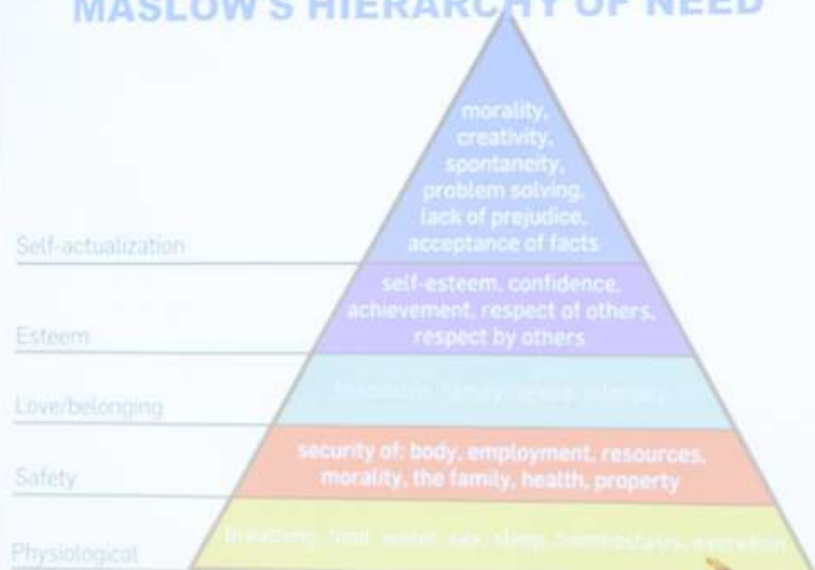




MASLOW'S HIERARCHY OF NEED



AP-Motiv. & Theory of Human Motivation / Psychological Review / Maslow, 1954



WHAT DO WE NEED TO KNOW ABOUT NEEDS?

Needs

- Self-Actualization
- Esteem
- Love & Belonging
- Safety
- Physiological



Capabilities

- Mobility
- Manipulation
- Perception
- Cognition
- Expression

LEARNING THROUGH ITERATIVE DESIGN

- Need finding up front is crucial for defining focus of conceptual design
- But design decisions in the earliest part of the process occur when everyone knows the least about what is really needed
- Iterative design with use studies along the way helps refine need finding

Gerhard Fischer, Understanding, Fostering, Supporting Cultures of Participation, *Interactions*, May + June 2011, 53.



INTERVIEWING

What do you want to know about the user?

Goals

Values

Capabilities

Constraints



Avoiding leading questions

Asking them to show as well as tell



INTERVIEWING

What do you want to know about the user?

- Goals
- Values
- Capabilities
- Constraints



Avoiding leading questions

Asking them to show as well as tell





INTERVIEWING

- Collect information directly from user
- Getting their perspective: how they feel about it
- Time and skill intensive
- Capital generating
- What people say often differs from what they do

OBSERVING

Observing *actual* activity

- **Approximate to design target**
Immerse in context
Shadow, record, review
Rich description of activity
- **Resources used to accomplish**
- **Hindrances that get in the way**



TEMPORARY DISABILITY IN EVERYDAY ACTIVITIES

Sometimes hard to imagine designing at scale for disabilities

Hard to get extended access to disability situations

What are everyday situations of temporary or simulated disability?



DIGITAL PROTOTYPING



PowerPoint

Web

Second Life



PROTOTYPING

+

- Enables quick, cheap design iterations
- Approaches actual usage
- Learn from usage experience

-

- Low fidelity
- Limited interaction (garden path)





























