

LFE Medieninformatik • Melanie Kunz

From paper prototyping to Sketching with hardware

**Medieninformatik Hauptseminar
Wintersemester 2009/2010
„Prototyping“**





Prototyping

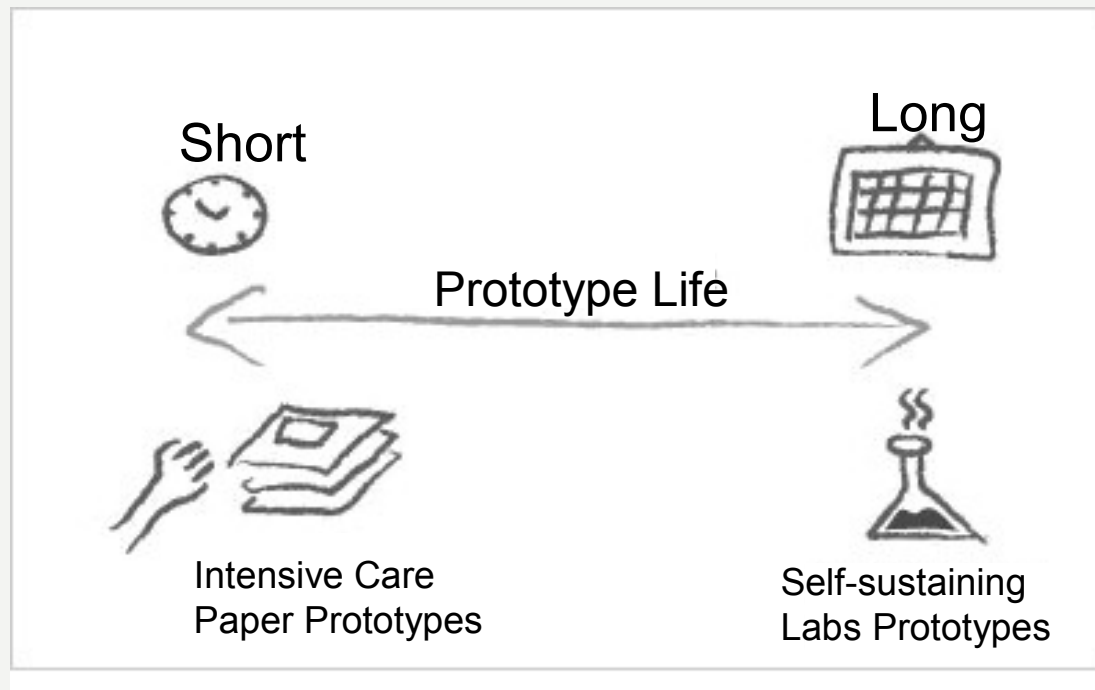
= a bordered representation of a design where users can interact

- we design a view executable paradigm of the final product
- has the essential features
- to check the usability and producibility
- to validate the customer requirement

➔ A prototype is also the first full-size model to be manufactured and has the essential features



Low - and Highfidelity Prototyping

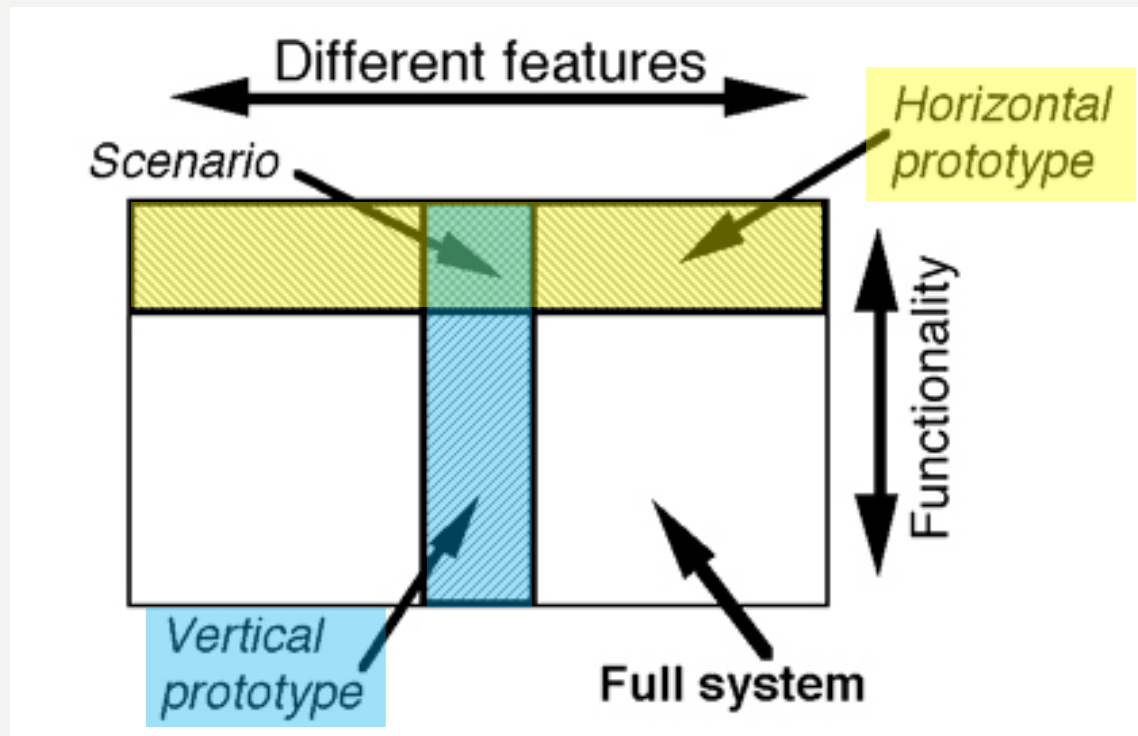




Low- and Highfidelity Prototyping

Type	Advantages	Disadvantages
Low-Fidelity Prototype	<ul style="list-style-type: none">• Lower development cost• Evaluate multiple design concepts• Useful communication device	<ul style="list-style-type: none">• Limited error checking
High-Fidelity Prototype	<ul style="list-style-type: none">• Complete functionality• Fully interactive• Look and feel of final product	<ul style="list-style-type: none">• more expensive• time-consuming to create

Vertical and Horizontal Prototyping



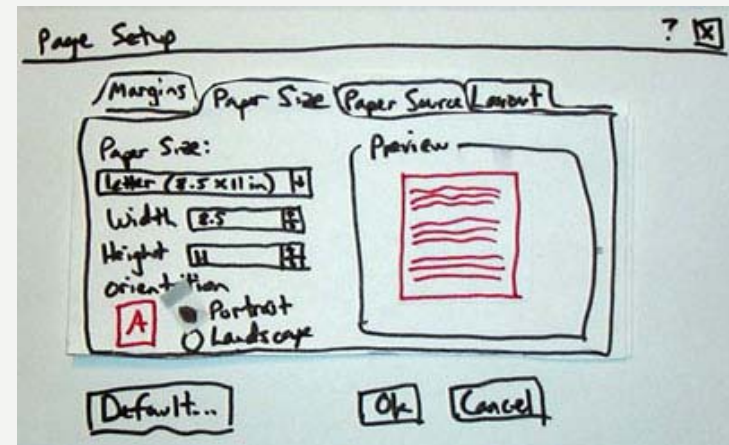
Paper Prototyping

History

- started in the mid 1980s
- in the mid 1990s: more popular

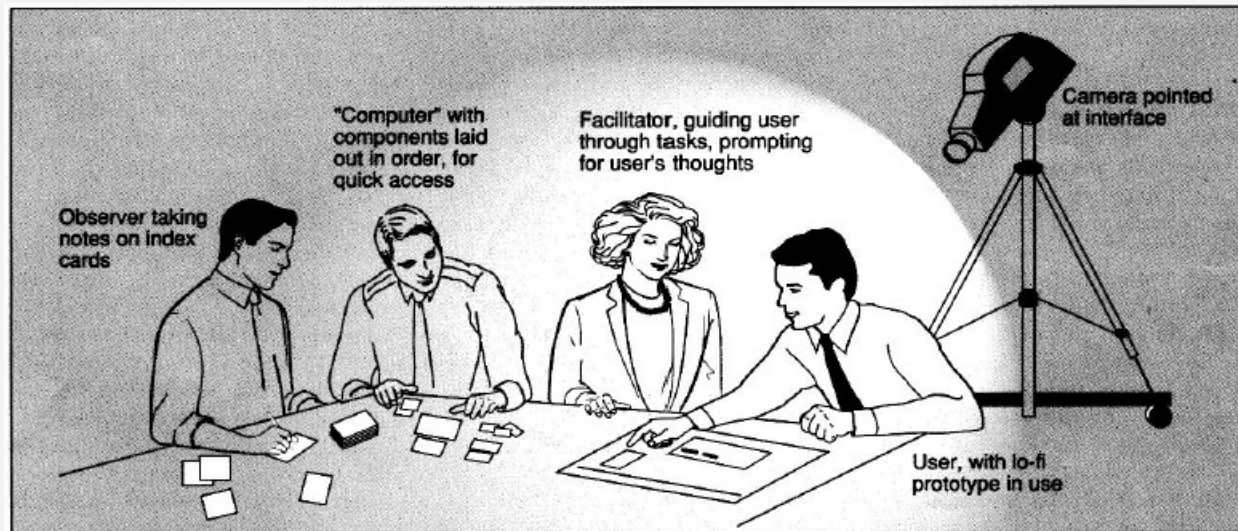
Definition

- method for designing, testing and refining user interfaces
- users perform realistic tasks by interacting with a paper version of the product



Paper Prototyping – How it works

- type of representative users and task
- screen shots and/or hand-sketched drafts
- usability test:

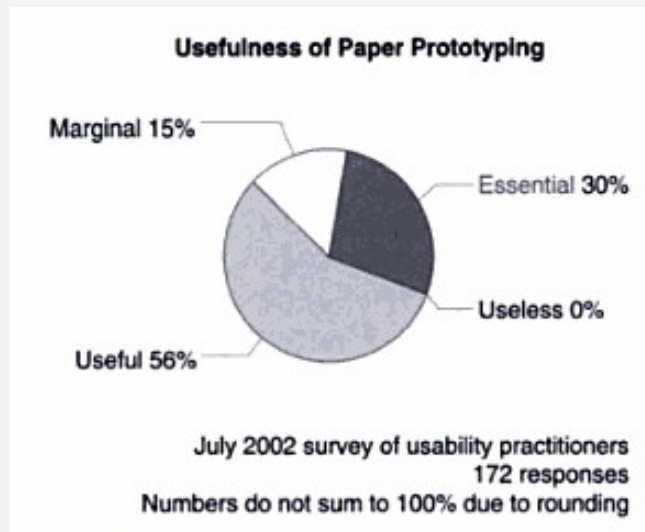


► misunderstandings, selfexplanatory or confusing parts



Paper Prototyping – pros and cons

Usefulness of Paper prototyping by a survey of Carolyn Snyder in July 2002:





Paper Prototyping – pros and cons

Advantage

- + no technical knowledge
- + little time-consuming
- + low-cost
- + evaluation of user before implementation

Disadvantage

- Limited error checking
- no full-interaction
- not the look of final product



Experience Prototyping

- started in the 1980s
- find user needs given from experience
- why?
 - to understand user experience
 - to explore and evaluate design ideas
 - to communicate design ideas

Experience Prototyping in practice

1. Understanding existing user experiences and context



Experience Prototyping in practice

2. Exploring and evaluating design ideas





Experience Prototyping in practice

3. Communicating ideas to an audience





Experience Prototyping – pros and cons

- Costs of using techniques
- Human-computer interaction methods are seen as too time consuming
- complexity of the prototype

- + functionality
- + looking of the new product



Vielen Dank für Ihre
Aufmerksamkeit!