Prototype Design

Prototypes
- interactive design model of the product

Low-fidelity

High-fidelity

Tangible & Testable Artifacts

Low-tech
- Partial functionality
- Simulated interaction

High-tech
- “Full” functionality
- True interaction
Prototype Design

Paper Prototypes

- Interactive
- Lo-fi appearance / input
- Hi-fi depth / breadth

- Simulation of a back-end
- Early feedback
- Experiment with alternatives
- Big picture focus
Prototype Design

Creating Paper Prototypes

One solid base
Separate sketches for each screen
Input related elements
Separate sketches for overlays
Sketches for changing elements
Simulate intended layout
Consistent style of elements
High level content where possible
Minimum colors
Should look and feel like a sketch

Flickr. CannedTuna
Prototype Design

Paper Prototyping Tips

- Make it large
- Add ideas as they come
- Make it monochrome
- Work fast!
- Preprint widgets
- Use verbal description
- One sketch per screen
Hi Sarah!

My account

Payment
Order history
Settings
Help

Hi Sarah!

Right now @ Chez

Chez Restaurant

Chez Kitchen

See what's happening at the Chez restaurant and in our kitchen, right now, using our live stream channels!

Comments:

Hi Sarah!

Menu today
My plan
Events
Connect

Hi Sarah!

My plan
Live
Events
Connect

Hi Sarah!

My plan
Live
Events
Connect

Hi Sarah!

My plan
Live
Events
Connect

Hi Sarah!

Your order:

- Caesar Salad (5$)
- Pasta Carbonara (8$)

Pick up time: in 10 min

Order online
Pick up at the restaurant

- Soup 5$  
- Pasta carbonara 8$
Prototype Design

Prototypes - interactive design model of the product

Testing and Evaluation

Create Design Ideas

Static representations of the product

Sketches  Wireframes  Mockups

Visualization

Low-fidelity  High-fidelity
Prototype Design

Paper Prototyping Evaluation

1. Identify testing goals
2. Identify items to test
3. Choose testers
4. Prepare materials
5. Assign team roles
6. Run evaluation
2. Identify items to test

- What do you want to know?
- What aspects of UX are you evaluating?
- What aspects are the most risky?

3. Choose testers

4. Prepare materials

5. Assign team roles

6. Run evaluation
1. Identify testing goals

2. Identify items to test
   - What do you want to know?
   - What aspects of UX are you evaluating?
   - What aspects are the most risky?
   - Which components/features are you testing?
   - How “deep” do you test each feature?
   - Which tasks you are evaluating?

3. Choose testers

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### Good Examples:

Please log into the app

You are at the main page and want to order pancakes to pick up at the restaurant. How would you do that?

### Bad Examples:

Please type in your username

Go to the menu, choose breakfast menu, find pancakes, click “Order”, type in your credit card information, click “Confirm”.

Go to your account using the icon in the top left corner, choose “Payment methods”, click “Change”.

Click the order status icon in the top right corner.

You want to change your default payment method. How would you do that?

You want to see what is the status of your order. How would you do that?
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   - What do you want to know?
   - What aspects of UX are you evaluating?
   - What aspects are the most risky?
2. Identify items to test
   - Which components/features are you testing?
   - How “deep” do you test each feature?
   - Which tasks you are evaluating?
3. Choose testers
   - Identify users group
   - Identify user’s level (novice, experienced, expert)
   - ~5 testers is usually enough
4. Prepare materials
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2. Identify testing goals

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- Main prototype with all screens, elements and input methods
- Additional materials to make changes on a fly
- Recording setup
1. Identify testing goals
- What do you want to know?
- What aspects of UX are you evaluating?
- What aspects are the most risky?

2. Identify items to test
- Which components/features are you testing?
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4. Prepare materials
- Main prototype with all screens, elements and input methods
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5. Assign team roles
- “Computer”
- Interviewer
- Note-taker/observer

6. Run evaluation
Prototype Design

Low-fidelity prototype \[\rightarrow\] The Wizard of Oz technique - a human simulates the responses of the system \[\rightarrow\] High-fidelity prototype

John F. ("Jeff") Kelley

OZ = Offline Zero

You need:

- Detailed test plan with test scenarios
- Script of instructions for the facilitator, wizard, participants
- Procedure for the wizard to properly respond to input from a participant
- The "wizard"

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   - Which components/features are you testing?
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4. Prepare materials
   - Main prototype with all screens, elements and input methods
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5. Assign team roles
   - “Computer”
   - Interviewer
   - Note-taker/observer

6. Run evaluation
   - Present a task script to your participant
   - Give goals, not directions/instructions
   - Ask about reasons, opinions, suggestions. Ask to think aloud
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