

We will begin shortly

If **authors** covered each other's **books** in the same way **musicians** covered each other's **songs**, which **book** would you want to see covered by which **author**?

*Answer in
the chat!*



Fall 2023

Interactive Data Storytelling

03. Designing for Audience/Sketching

Andrew Moore // amoore07@mica.edu

Tonight's Plan

- Assignment 2 Debrief
- Personas Overview
- Demo
- **Break**
- Storyboarding Overview
- Group Activity

Assignment 2 – Presentation/Feedback

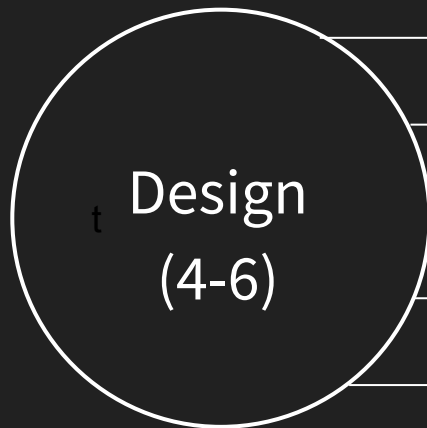
Need two volunteers

- Who did you interview?
- What did you take away from process?

Visual Storytelling II



Storytelling through Design Process

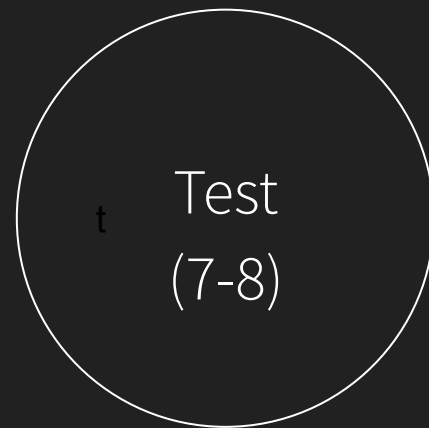


Sketch/Storyboards

Interaction Design

Design Systems

Prototypes



Assignment 3 – Sketching the Story

A. Personas

Summarize what you learned about each person you interviewed

Empathizing with the User

- By building empathy – a deep understanding of the user you are designing for – **you can create better solutions.**
- Empathetic designs create more meaningful, desirable experiences and often can influence the user to act on your point-of-view.
- If a design is selfish or oblivious of user behaviors and feelings, it will be less effective.

Personas

- A persona is a **fictional, yet realistic, description of a typical or intended user of a product or experience.**
- Details the persona's needs, behaviors, and goals, as well potential demographics, eg region, age or occupation.
- There may be more than one persona for a product but identify a primary persona to ward off designing for edge cases.

Personas

- Personas fosters empathy for the specific users we are designing for, and helps us break away from the attempt to design for everyone and instead design for a specific user or small group of users.



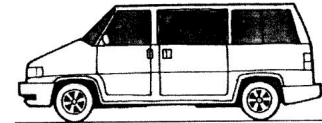
Alessandro's goals

- Go fast
- Have fun



Marge's goals

- Be safe
- Be comfortable



Dale's goals

- Haul big loads
- Be reliable

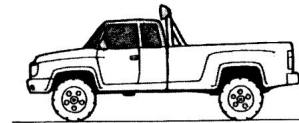


Figure 5-2: A simplified example of how personas are useful. By designing different cars for different people with different specific goals, we are able to create designs that other people with similar needs to our target drivers also find satisfying. The same holds true for the design of digital products and software.

Personas – Examples

Kady Woods

“Watching something you stressed out about for 2 years come to life in 3D is pretty amazing.”



Engineer Ed: Civil Engineer

Ed is a civil engineer for private consulting firm based in Boston, MA. He lives in a house outside of the city with his wife and works from home for most of the week, designing better infrastructure for nearby cities. In his free time he keeps up with yard work, plays with his pets, and meets friends for board game nights once a week. His firm has a great company culture, and he's very happy there and has been there for 5 years.

Demographics

- 30-45 years old
- \$70,000/yr income

Worklife

Spends most of the day designing in AutoCAD, talking to contractors and other team members about the changing needs of the project as new things are discovered about the worksites.

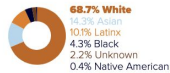
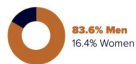
Challenges

- Incorrect initial data can lead to hours of wasted work
- Poor communication between team members
- Hefty programs and file sizes can cause machine to crash

Opportunities

- Ed's work is very visual, and therefore he is open to visual storytelling as a way to convey information
- The creation of a system of a visual legend helps people at all levels in the team understand the information better

General Statistics - Civil Engineers in the US



Based on interview with civil engineer Craig Betts and <https://www.zippia.com/civil-engineer-jobs/demographics/>

Homelife

When not working, Ed consi most of his entertainment th video and moving media as podcasts. In his home life he ing to be able to find a more way to balance the at-home truly being at home.

Info Consumption

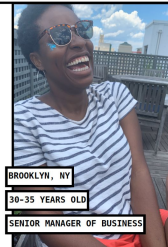
- Ed is much less likely to believe an news with a "Clickbait" title
- Ed believes articles with primary ci
- Ed doesn't really trust opinion piec news, and prefers the facts

SENIOR MANAGER MAYA

A Senior Manager of Solutions and Opportunities with Disney CreativeWorks, building processes, and creative solutions across the Travel and Retail categories. She is a dedicated media professional. Her work in brand partnerships and business development has afforded her the opportunity to travel the world, digesting how consumers interact with content in different ecosystems and develop strategic insights to help push a business forward. She is a passionate and curious media buff with particular interest in documentaries and screenwriting.

She is also deeply interested in equity in education and economic mobility for underrepresented communities and spends much of her free time serving and volunteering in spaces that serve such populations. She is committed to sharing as much information with as many people as she can.

MAYA WILLIAMS



BROOKLYN, NY

30-35 YEARS OLD

SENIOR MANAGER OF BUSINESS

Day-to-day Schedule:

- Wake up with coffee
- Meditative moment (8-15 minutes to focus energy and spirit)
- 9am-12pm; work independently because most of her team is LA-based
- 12pm-6pm; meetings and strategy sessions/planning for projects.

Screen Time to People Time Balance:

- 20% of day is talking to people in person; 30% is via screen
- The rest of her day is primarily computer time

Literature and TV/Movie Preferences:

- Trades – Ad Age and Ad Week
- Media and entertainment– Variety, Hollywood Reporter
- Memoir, non-fiction/observational, a survey of what's happened + perspective, essays
- Fiction that is sci-fi, other worldly, thinking beyond constraints of reality

Opportunities:

- Looking for something easily digestible, doesn't need to be particularly impactful
- Something catchy
- Motivated by competition

Frustrations/Challenges:

- Hard to bring new ideas to a team that has been there for a long time.
- Attention span-wants information to be delivered quickly
- Over-burdened with meetings already- doesn't want to spend much time having to learn what a visualization is saying

Design Consideration:

- Simple format
- Possibly interactive
- Short form
- Typically receives information via email or Instagram/Twitter



The Professional

Roles Could Include:

Employee in Professional Setting, Entrepreneur, Student, Salesperson

Familiarity with Storytelling:

Uses it in presentations and communication without necessarily identifying it as 'storytelling'

Tone:

Formal, professional, and concise

Mental Model:

Added pressure for success since livelihood is usually at stake to some degree

About Me:

As a 'professional', my objective is to communicate my work to my peers and superiors in order to drive some sort of action or decision. This is something I have to do on a regular basis, and oftentimes I'm conveying the same type of information to the same audience using the same format. I usually don't have a lot of time to refine and craft the story I'm trying to tell, and I am primarily sharing quantitative information. The most common structures I use to communicate to my audience are either in-person narration over some sort of visual aid like a document or slide deck, or by asynchronously sending a message to the audience.

Challenges:

- Audience can have a lot of demands on their time and not give full attention
- Audience could be disengaged either because the content is 'dry' or they assume that they already understand the subject
- Presentations tend to be interactive, so it is common to get sidetracked before completing the full narrative
- Building empathy and telling engaging stories tend to involve more time and detail, where business tends to prioritize succinctness and efficiency

Opportunities:

- Introduce more entertainment value to presentations to increase audience engagement while still providing them the relevant information

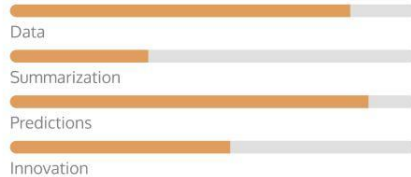
Personas

INVESTMENT ANALYST



An investment analyst is a financial professional with expertise in evaluating financial and investment information, typically for the purpose of making buy, sell and hold recommendations for securities.

MOTIVATIONS



WHAT ARE THEY TRYING TO ACHIEVE

Find patterns in macroeconomic industry trends

Analyze companies in sector to predict winners/losers

Find new companies to invest in

Communicate ideas to portfolio managers

Make recommendation on buy/sell

WHAT ARE THEIR CHALLENGES

Lots of information/data to parse

Need to trust the data and test it against historical averages

Need to new data sources that are accurate

THEY WANT TO

Propose recommendations to Portfolio Manager

Make thesis on sector and companies recommendations

Research new opportunities against various datasets

Quantitative Data in Personas



DATA SCIENTISTS

[View in Context](#) | [More Details](#)

Customer Success Engineer, Sr Director of Platform Operations, Sr Account Manager, VP of Media + Data Strategy

SMB

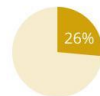
Agency

"Since we can't touch or access any type of PII data, we use you guys. Our clients do have to upload directly into your platform."

ABOUT DATA SCIENTISTS

These users spend most of their time on the Sell Data pages, checking on the distribution status of their segments, sharing segments to social destinations, batch uploading, and enabling / disabling / editing their segments, and distributing data on behalf of clients. Users within this group also spend a significant amount of time on the Buy Data page to view their segments in the marketplace and compare against those belonging to other providers.

From an analytics point of view, this cluster of users were identified by their top used page being the Sell Data pages, including the Batch Upload.



USERS IN PERSONA

ANALYTICS PAGE + FEATURE DATA

Averages calculated per week for the 67 users in this persona using Pendo Analytics data.

PAGES	% OF TIME PER PAGE	FEATURES	% OF CLICKS PER FEATURE
Analytics Environment	29.367010	Left Navigation Bar > Manage > "Analytics Environment" Menu Item	20.513117
My Audiences	16.257409	Create New Audience Button	3.930448
Advanced Audience Builder	5.716331	Admin Center > Primary Tenant Users > Create User	2.083881
Measurement Report	4.731253	My Audiences > Search Box	0.869403
My Taxonomies (US)	4.213356	My Taxonomies > Create New Taxonomy Button	0.231940
User Center - Users	3.119403	Audience Builder > Lookalike Button	0.045522
Audience Builder (US)	2.942239	My Audiences > Footer > Permission Button	0.030597
Profiling	0.588806	My Audiences > Footer > Distribute Button	0.027239
Notification	0.571642	Audience Builder > Save Button	0.024627
Audience Insights	0.414925	My Audience > Distribution Management > Confirm	0.007463
Taxonomy Builder	0.253731	Audience Builder > Lookalike Save Popup > Save Button	0.000000
Datasets	0.243284	Permissions Tracking > Permissions Table > List Item (View)	0.000000

RESPONSIBILITIES

- Monetize offline data assets in LiveRamp
- Promote data in order to get more sales
- Onboard various data assets to as many platforms as possible
- Deliver audiences to the endpoints
- Find new buyers
- Create data products and one-pagers to promote these for Marketing and Sales
- Communicate with and onboard clients

/L TASKS

- Sell Data in Data Marketplace, enable /disable segments, and re-upload segments
- Distribute segments, activate an audience, and check distribution status
- Search for and purchase data marketplace segments

PAIN POINTS

With /L

- Hard to troubleshoot upload errors
- Reach fields sometimes show 0 / null which dissuades potential buyers
- Cannot click share data button w/o monitor
- Limited operators an inability to combine audiences when building custom segments
- Uploading files with blocked advertisers



~~Prince~~ **King Charles**

- Male
- Born in 1948
- Raised in the UK
- Married twice
- Lives in a castle
- Wealthy & famous



Ozzy Osbourne

- Male
- Born in 1948
- Raised in the UK
- Married twice
- Lives in a castle
- Wealthy & famous

* Personas shouldn't be about demographics.
Personas should be about the problems &
challenges people face.

Assignment 3 – Sketching the Story

A. Personas

Summarize what you learned about each person you interviewed

B. Storyboard

Plan out what to include

Design Considerations

Story
Angle

Medium

Tone

Content/
Terminology

Chart Type

Visuals

Colors, Typography
Universal Design
Cultural Considerations
Interaction Design
Animation

Framework/
Mental
Models

Story Angle

- Data storytelling is the ability to effectively communicate insights from a dataset using narratives and visualizations.
- Takes data from data analysis/dashboard to engagement.



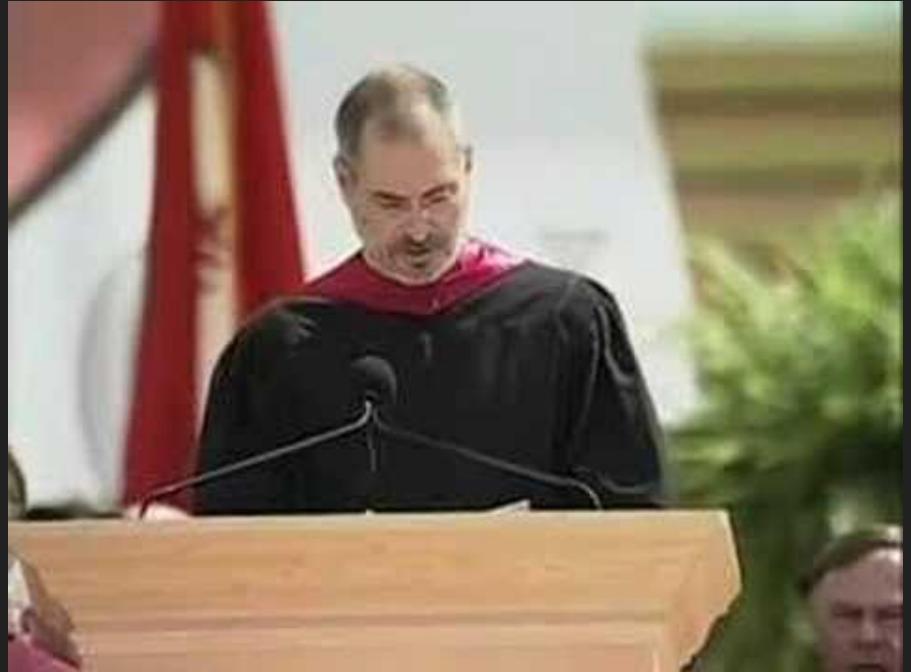
Medium

- Where/how is your audience consuming information?
- How to effectively deliver your message:
 - Video
 - PPT
 - In-person experience
 - Instagram Stories
 - Website



Tone

- The how/style.
- The manner in which an author expresses their attitude
- Deliver based on audience. When to use humor, universal references, or professional?
- In certain environments, eg PPT, we default to overly formal business language.
- Write/communicate like you speak to connect with your audience.



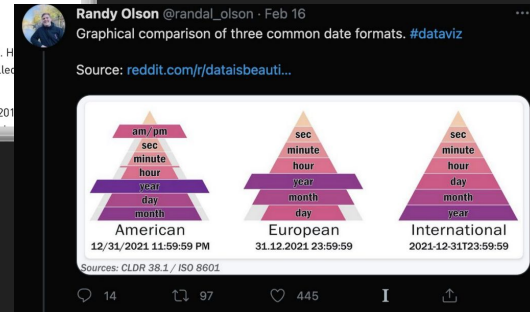
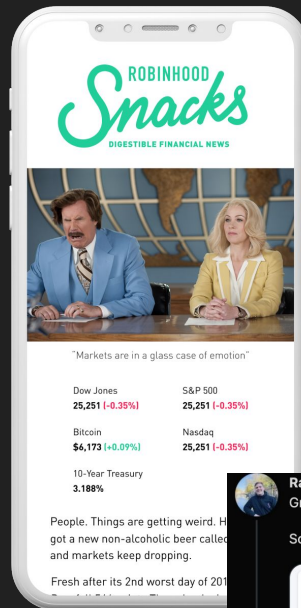
Tone

- Col. Nicole Malachowski, USAF
- Thunderbird, USAF Air Demonstration Squadron



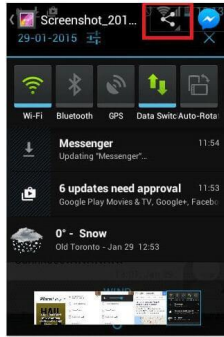
Content – Terminology/Length

- Use appropriate terminology but stay away from jargon. User research to get to know appropriate terms!
- Length of text based on environment or motivations of the user.
- Consider localization – Appropriate date format or language (favorite vs favourite) based on region.



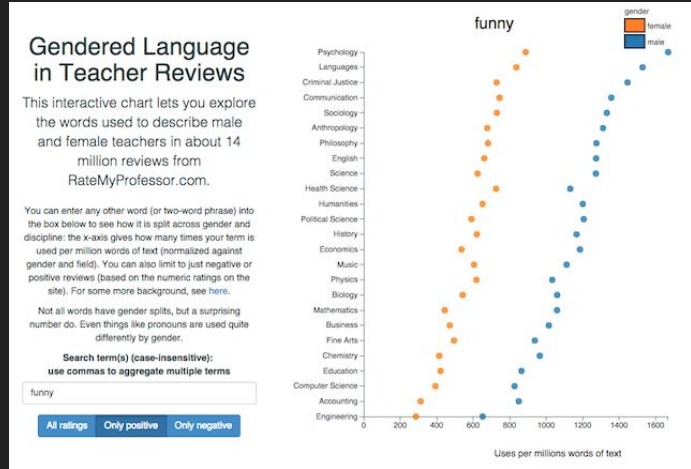
Visuals – Universal Design

- Reinforce universal design language and iconography. Reduce cognitive overload to help your audience interact efficiently, feel smart, continue on your journey.



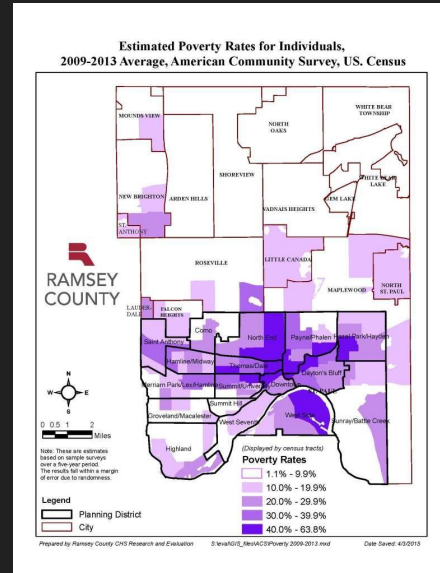
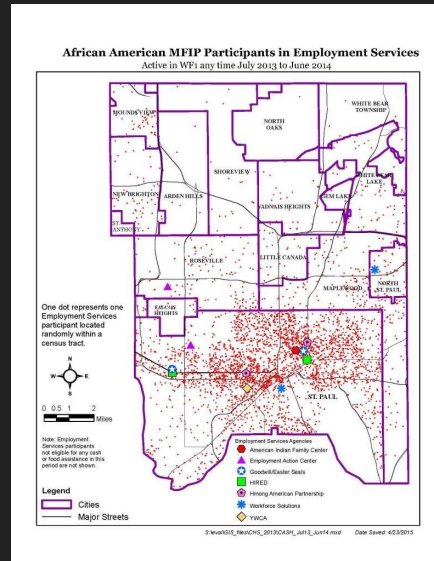
Considerations – Caveats

- Be cognizant about how your design can lighten cognitive load but not offend audiences with stereotypes. Test to decipher.



Considerations – Caveats

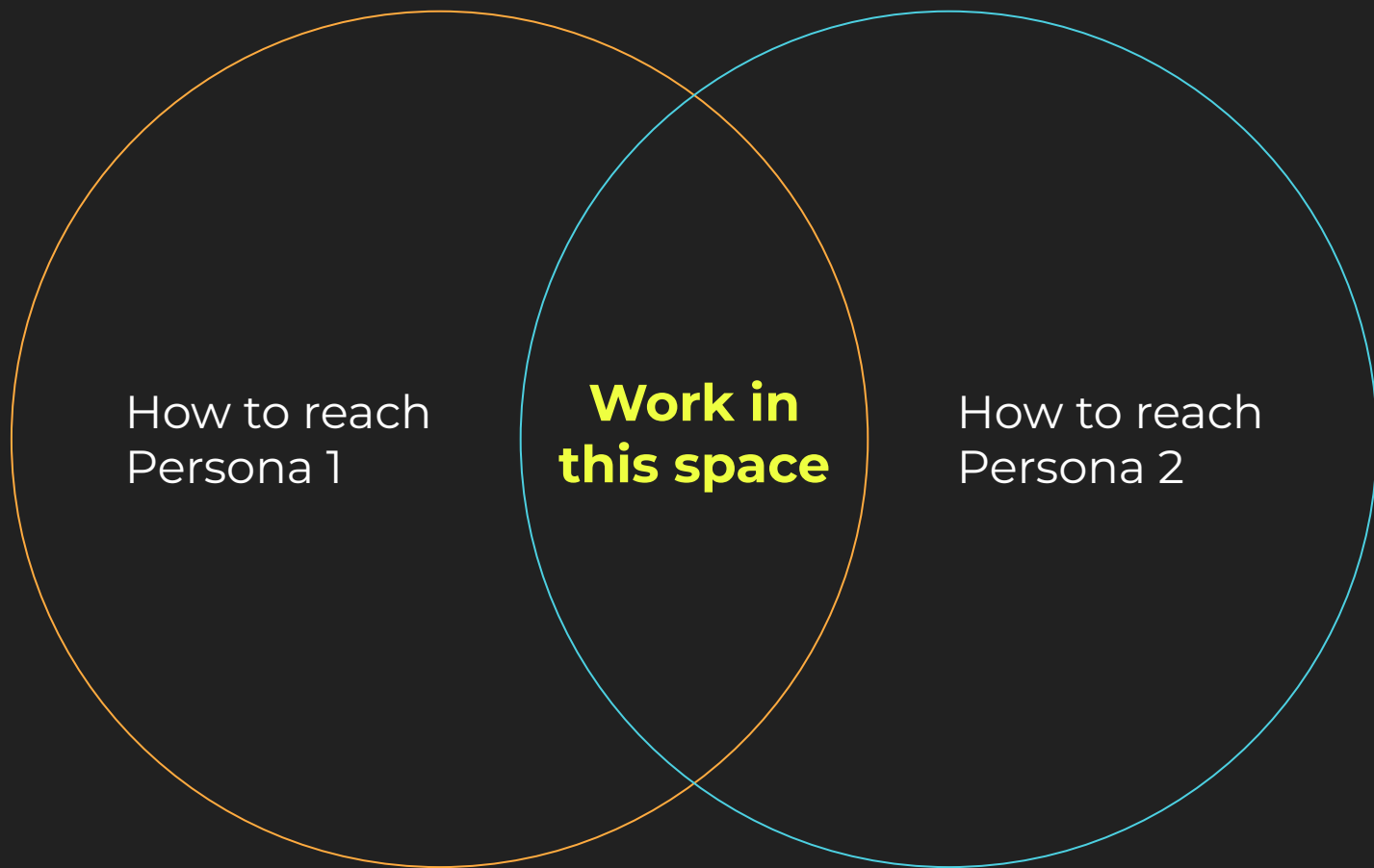
- Consider how color or visualization choice may indicate sensitivities with individual location or overall perception.



How to design for multiple personas?

How to design for multiple personas?

- Identify personas. What makes them different?
- What are the main goals of each persona? Do they align?
- Select a primary persona to drive the design. Test it against secondary personas. Design alternative experiences where needed.
- Leverage universal design elements, eg common interaction patterns, iconography, mental models.
- Test! Iterate! Test again!



Primary persona

**How to
reach
Persona 1**

**Work in
this space**

How to reach
Persona 2

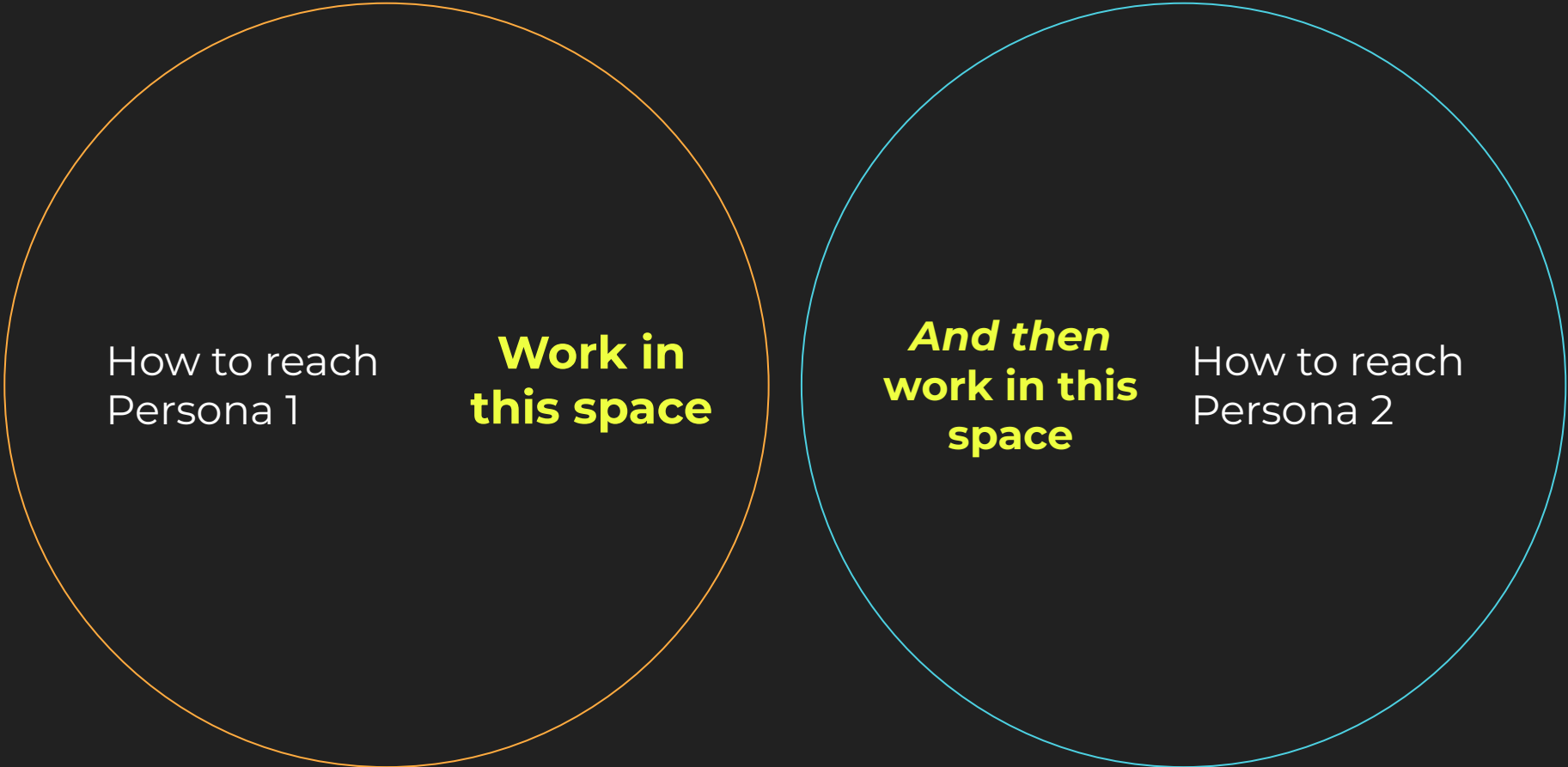


Primary persona

**How to
reach
Persona 1**

How to reach Persona 2

**Work in
this space**



The diagram consists of two large, overlapping circles on a dark background. The left circle has an orange border and contains the text 'How to reach Persona 1' and 'Work in this space'. The right circle has a teal border and contains the text 'And then work in this space' and 'How to reach Persona 2'. The circles overlap in the center.

How to reach
Persona 1

**Work in
this space**

***And then
work in this
space***

How to reach
Persona 2

Break! Return at 9:07

Assignment 3 – Sketching the Story

- Now that you have an understanding of your audience, **persuade each persona on the impact of recycling**. Think about the story angle, content, tone, visuals, and interaction patterns that would resonate with the persona you've chosen. This medium can be anything– **a Powerpoint presentation, a video, an email (with visuals), an Instagram story, a website, infographic, a one pager**.
- Remember, the purpose of this week's assignment is to understand/design for your audience (tone, terminology, language, visual language, context) and demonstrate the value of iterating before the design becomes pixel perfect.

Assignment 3 – Sketching the Story

A. Personas

Summarize what you learned about each person you interviewed

B. Storyboard

Plan out what to include

C. Ideation

Ideation through Sketching

- Your first idea may not always be the best idea!
- Concept ideation allows you to be **iterative (building, refining, improving)** and **reflective activity (evaluation of the potential of solution candidates)** in which design solutions are assessed and evaluated against an emerging understanding of the design problem.
- **Sketching is a skill**, relevant in the arsenal of skills a Designer should have, to iterate and reflect on the content – words, story, visual elements, and eventually, if needed, interactive elements and function.

Storyboarding

- **Storyboarding establishes a structure for your communication**; a visual outline or series of sketches of the content you plan to create.
- It can be **subject to change** as you work through the details – ideation! – but establishing a structure upfront can set you up for success.
- Recommend to **start low-tech** – avoid early attachments to digital artifacts – use post-its (allow for re-arranging), paper or a whiteboard.

In-Class Exercise: Sketch Storyboard for a Shared Persona

- Let's see what ideas the class comes up with for a shared persona.
- What persona should we use?

In-Class Exercise: Sketch Storyboard for a Shared Persona

- 10 minutes to sketch.

In-Class Exercise: Sketch Storyboard for a Shared Persona

- Present ideas!
- Reflect...

In-Class Exercise: Sketch Storyboard for Assignment 3

- 5 minutes to sketch concepts for your persona(s)!

Assignment 3 – Sketching the Story

A. Personas

Summarize what you learned about each person you interviewed

B. Storyboard

Plan out what to include

C. Ideation

D. Storyboard Refinement

Prioritize your best ideas from the ideation session.

Assignment 3 – Sketching the Story

A. Personas

Summarize what you learned about each person you interviewed

B. Storyboard

Plan out what to include

C. Ideation

D. Storyboard Refinement

Prioritize your best ideas from the ideation session.

E. Story

Put together the story in Illustrator or Figma (or other).

Assignment 3 – Sketching the Story

A. Personas

Summarize what you learned about each person you interviewed

B. Storyboard

Plan out what to include

C. Ideation

Try a few versions!

D. Storyboard Refinement

Prioritize your best ideas from the ideation session.

E. Story

Put together the story in Illustrator or Figma (or other).

Reading

- Reading: Don Norman, Design of Everyday Things – Chap. 1

Coming Up

- Interactivity I