

The Promise of Universal Design

By Jen Bailey

Should we ditch user personas?

How effective are User Personas in our expanding global community where just about any type of person could have access or find useful the product we are designing? Is Universal Design the answer to meeting this wider audience?

What is Universal Design?

Universal design is also referred to as inclusive design. It is the concept of creating products that are inherently accessible to the broadest audience including people with temporary limitations and or disabilities.

The promise of universal design is that it pushes design further to potentially better solutions that work within the context of limitations and creates the best experience for everyone.

But why would that be necessary since people with disabilities only makes up a small amount of the population?

The definition of disability has traditionally defined people who have permanent limitations. But the World Health Organization has broadened their definition to the interaction between features of a person's body and the features of the environment in which the person is in². This means anyone at anytime can have a disability - temporarily or permanently.

Getting around with just one arm

There were 1,285,000 persons in the US living with limb loss in 1996³. Traditionally it wouldn't make sense designing, for instance, a mobile product specifically for this group. However, what if you take into consideration people who have a broken arm that's in a cast or a new parent who is holding their baby constantly? Just these two segments expands the population of users handling a phone with one hand rather significantly. Designing a product that takes those limitations, temporary or otherwise, into consideration is exactly what good design is all about.

Designing for edge cases — such as people who have limb loss, or who are deaf or who have limited vision can help create a great product that works for a new mother, in a noisy bar or is visible on a sunny day.

An unexpected benefit

Sidewalk curb cuts were a mandate under Title II of the ADA in 1973¹ to assist people in wheelchairs crossing a street from sidewalk to road back to sidewalk. Now people walking with strollers use them. People on bicycles or skateboards use them. The elderly use them. Something that was designed for a very small portion of the population is now used by almost anyone at any given time.

Again — designing for the edge case of people using wheelchairs creates a design that is useful for a wider audience than was ever intended.

The solution can be easy peasy

Sometimes people come up with unexpected ways about how they want to use a product. For example, “Mike” wants to put speakers up in two ceiling corners of his room to create an epic surround sound.

He already has the speakers and now just needs to find some way to mount them to the wall. He figures a tv mount would work great. Mike goes online to search for the correct size TV mounts. He runs into trouble right away. The information details that are provided for the mounts only say what size TV the mounts will work for. They don't give any actual dimensions for the mount itself. However, for Mike's purpose he needs that bit of product detail to know if the mount will work with his speakers which have an 8" width.

After visiting many websites selling tv mounts, Mike was unable to determine if any of them would work for his purposes. He ended up having to get in his car and trek down to his local hardware store with a tape measure in hand to find the mounts suited to his project.

This story illustrates an opportunity to create a better user experience by expanding the intention of the product by simply adding a bit more information that may initially seem erroneous.

If it makes sense to expand your audience to include anyone who might be interested in your product, does that mean we no longer need to determine a target audience? Do we still need to create user personas that represent that target audience?

User Personas - the promise of awesome next to the pit of suck.

Way back in the time before time an engineer would build a product as well as the interface to use the product. It has been described that sometimes these products were incredibly difficult to use and adoption was slow. Alan Cooper, a software developer, wrote in 1998¹ the need to create personas to put a human face to the abstract idea of a customer. This has the benefit of seeing the product not from the stakeholder point of view but the user point of view.

It's not an overstatement to say that this way of thinking has profoundly and successfully impacted the design process. It has helped create products that we simply love because they are easy to use for entertainment, information, and to increase productivity to name a few benefits.

"It's easy to assemble a set of user characteristics and call it a persona, but it's not so easy to create personas that are truly effective design and communication tools."

Kim Goodwin author of Designing for the Digital Age

User personas are only beneficial if they are created carefully and are only one part of the design process. Three troubles that can mess up a user persona:

1. The details to create them comes from a stakeholder meeting rather than from the actual target audience.
2. Personas can get dangerously close to stereotyping based on culture, gender or socioeconomic status which can hinder the design process with generalizations.
3. Teams can get so distracted by their user persona creating more and more details about the person that they lose sight of the actual intended audience.

Create good universal design that works better for your target audience and beyond

User Personas help designers shift from their own self-centeredness to user-centeredness. It forces asking questions, testing, iterating and advocating effectively. These are tools that create a product that works for the user.

Universal design is also a way of stepping out from one's own perspective and looking at a product from another viewpoint. It forces pushing beyond the target audience and seeing a bigger picture for the product. To consider modular, flexible, adaptable solutions.

Universal Design is not a replacement for User Personas but rather a critical expansion of them to help create good design for the next "must-have" product.

Sources:

1 World Health Organization: Definition of "Disability" <http://www.who.int/topics/disabilities/en/>

2 Limb loss statistic <http://www.aboutonehandtyping.com/statistics.html>

3 American Disabilities Act: Curb Ramps and Pedestrian Crossings Under Title II of the ADA
<https://www.ada.gov/pcatoolkit/chap6toolkit.htm>

4 Microsoft Inclusive Design <https://www.microsoft.com/en-us/design/practice>