

# TUTORIAL on FISCAL TRANSPARENCY PORTALS

A USER-CENTERED DEVELOPMENT

## MODULE.2

Introduction to  
user-centered design  
(UCD)



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## Tutorial on Fiscal Transparency Portals

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Digital projects within governments can be considered as being internal management, service delivery and/or public communication investments. Governments that are focused more on processes than results, however tend to minimize the importance of considering what users want or need. As Romero, de la Mora and Ruiz (2016) state, when faced with a lack of use following the development and launch of a portal, governments are forced to use additional human and financial resources. Sometimes, however, consequent upgrades, or even total redesign processes, are carried out once again without engaging users.

As Benyon (2014) states, in the human-computer interaction field of study, a product has a greater possibility of satisfying the users' expectations when they are engaged during development. The engagement of users not only facilitates an understanding of their needs and capabilities, but also serves as an early alert system for detecting possible positive and negative aspects that the development team may otherwise have overlooked in vital areas such as usability and accessibility.

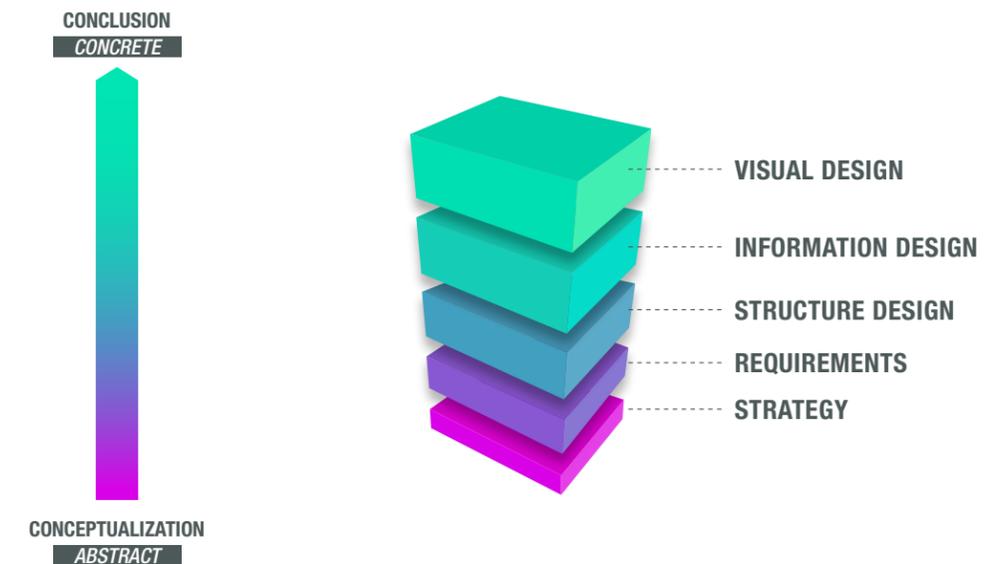
Different problems that occur during and after the development or update of a publication--such as if a government extends the implementation timeframes, thus delaying publication; if the demand is not taken into account in a planned manner to obtain useful feedback; or if requirements are not clear, and consequently the final product does not have the expected specifications for the publication of content--can all be addressed through the appropriate, step-by-step implementation of an iterative process with user engagement.

With regard to government's responsibility to meet the information demands of the population, usability.gov (n.d.) states that by adopting a user-centered approach for developing government portals, government agencies: improve the quality of the information they have by making it more useful and usable, save monetary resources in the long term and increase their credibility by being more transparent during development.

User-centered design (UCD) is a method that focuses completely on addressing the needs of the final users of a product, whether related to editorial design, urban design, architectural design or web design, among others. This iterative design process is not the same as designing by "thinking about the user", because it requires engaging the users that a product is being created for, during development. The goal of UCD is to achieve a positive product user experience allowing users to resolve their specific needs with a high degree of satisfaction, with minimal effort; and developers to evaluate and adjust the design until this result is achieved.

### The five levels of user-centered design

When designing a project using the UCD method, five levels are transited (adaptation of the authors, based on Jesse James Garrett, 2011):



As can be seen in the above chart, the lowest, most abstract level is *Strategy*, that is, the first phase of the project. In terms of fiscal transparency portals and platforms, this level is where the *what for* and *with what* questions steer the project being developed; in other words, this is where the general purpose of the portal or platform is defined, inclusive of its objectives and goals.

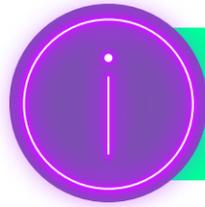
The *Requirements* level is where the portal's scope and content requirements are defined, and where its functional specifications are established. Some of the characteristics--or requirements--that are documented at this level, and that determine specific functionality, could include examples such as when a user interacts with a spending graphic by downloading the open data for a more detailed analysis, or when, as a user analyzes an investment project, they can choose to visualize it on a georeferenced map to get a clearer idea of the possible beneficiaries.

The third level is *Structure Design*, which focuses on the possible navigation paths available to users in order for them to move from one section of published information to another. The types of structures will be discussed later in this tutorial.

The penultimate level is *Information Design*, where proportions and distribution plans for elements—text blocks, buttons, menus, etc.—are developed through the use of a visual hierarchy that helps users easily find what they are looking for.

Finally, the concluding and most concrete level is *Visual Design*, wherein decisions are made concerning the fonts, colors, images and other elements with which users will interact.

As development progresses from one level to the next, the problems to be solved become more concrete and their level of abstraction diminishes; decisions, too, become more specific and detailed. For example, in the Strategy phase, the portal or platform's visual design should not be a concern; instead the focus should be on how it will be inserted as an interface to accomplish the project's general purpose.



Tip: Any portal intended for publication is made for the purpose of reaching users; therefore, it is vital to not only think about users, but to actively engage them in development through a user-centered process.

### Steps to implement user-centered design

As the UCD process requires small repetitive stages or iterations, to carry out this method and transit through the five levels, it is necessary to understand each step in order to implement it. The steps for executing an UCD are **planning, conceptualizing, creating, prototype testing and refining, launching, monitoring,** and finally **evaluating**, which together form an iterative design, and which will be the axis for the following modules of the tutorial.

The first step in an *iterative design* when developing or updating a fiscal transparency portal or platform is **planning**, which is closely linked to the Strategy phase. One of the most common failures when launching a portal is the lack of demand. Although this can be due to a variety of reasons, the most common one is that the simple key questions of *What do we wish to achieve?* and *What are the project's general purpose and objectives?* are not asked until after the first lines of code have been written, and other binding decisions taken concerning for instance what information will be published together with the applicable data sets, and what color palette will be used. These essential elements of planning will be addressed in the following module of the tutorial.

#### PLANNING

The second step, associated with the Requirements phase, is **conceptualizing**. In this step, for the project to be successful, it is not only necessary to think about users, but to engage them, gathering as much information as possible about them, their needs and capabilities. In the module "Identifying and segmenting the audience", various tools are introduced to accomplish this step.

#### PLANNING CONCEPTUALIZING

Once the project is conceptualized with the demand engaged, the next step is **creating** the portal or platform. The three remaining levels of user-centered design--Structure Design, Information Design and Visual Design--come into play at this stage.

#### PLANNING CONCEPTUALIZING CREATING



Tip: This is when, based on the information gathered during conceptualization, the drafting of engagement strategies begins, which will occur simultaneously with the development of communication strategies. These sets of strategies will accompany the portal at and after its launch in order to achieve a comprehensive product. These strategies are further discussed in later modules.

Once a portal prototype is finished, prior to going any further, **testing and refining** it with users is necessary. This is a very important midpoint, where *usability testing* can be implemented using techniques such as observation or focus groups, a topic which will be addressed in a later module. This testing stage will yield information that is valuable throughout the cyclical process of refinement, prior to publication.

#### PLANNING CONCEPTUALIZING CREATING

Prototype testing and refining

When the prototype testing and refining stage is completed and the fiscal transparency portal's programming is finished, it can be taken through to the next step: **launching**. This step of the project must be linked with communication and engagement strategies.

#### PLANNING CONCEPTUALIZING CREATING LAUNCHING

What can be measured can be improved; therefore, the next step is **monitoring**. To measure and understand if the portal or platform is contributing to the fulfillment of the publication's general purpose, it is necessary to gather information post-launch. In the module entitled "Monitoring and evaluation to improve", multiple tools are introduced to accomplish this goal.

#### PLANNING CONCEPTUALIZING CREATING LAUNCHING MONITORING

With the information gathered through monitoring, the developer team can begin **evaluating** the portal or platform against the technological requirements and project's objectives to determine strengths, weaknesses and necessary improvement actions, whether they are related to the portal's conceptualization, processes or impact.

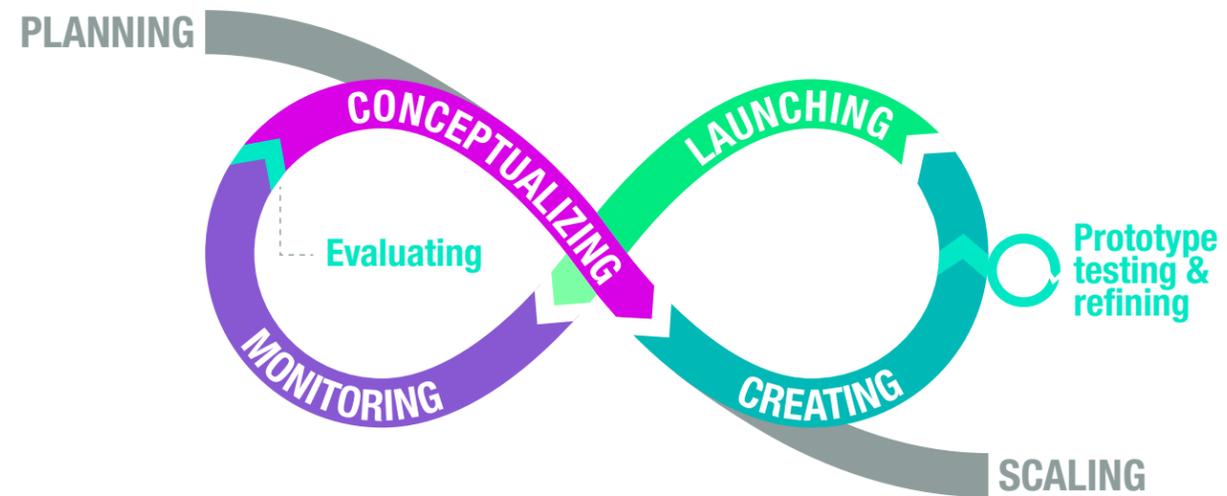
#### PLANNING CONCEPTUALIZING CREATING LAUNCHING MONITORING

Evaluating

Once the evaluation is finalized, a **cycle of iterations** occurs to help further improve the portal or platform.



In some cases, the lessons learned through iteration can allow for **scaling** the portal. An example of this might be the creation of different internal platforms that meet the diverse needs of users from different audiences with respect to specific areas of the budget, such as those related to gender, elementary education, natural disasters, etcetera.



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With this iteration cycle, we close the second introductory module of this tutorial. **Now we can start developing a fiscal transparency portal with user-centered design!**

In the next module, which is linked to planning (the first step of iterative design), discussion topics include the nuances of having a general purpose for publication, accompanying objectives and indicators, together with methods to define them.

