



Discrimination(s) Grid & DEI Compass

**A Service and System Design Integrative Perspective of How We Consume and
Stop Consuming Structural Discrimination(s)**

by

Isadora Koike

A Dissertation

Submitted to PSSD

Politecnico di Milano

In Partial Fulfillment of the Requirements
for the Double Degree Master in PSSD and ME

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Acknowledgements

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Abstract

Defining discrimination from listing the bases upon which it hinders the individual human rights, so as a practice of differentiating and excluding people due to their “... race, colour, sex, language, religion, political or other opinion, national or social origin, property, birth or other status.” (OHCHR, 1948), suggests that a fragmented checklist of problems become acknowledged. Although all these dimensions are partially identifying persons and peoples, they share common grounds.

Race and gender, for instance, become interdependent and modified when composing a real-life social identity. These more-than-two characteristics of a black woman, for example, illustrate how discrimination connects to and into an individual, illustrate intersectionality. (Crenshaw, 1989)

In addition, the oppressive and hierarchical experiences that a system imposes to its participants built and reinforces values of difference and gaps of inequality. This far from personal structures of our globalized contemporary society, flowing different forms of power, also connect the practice of discrimination as a consequence of a historical phenomenon: European Colonization and subjected to a cyclic World Order. (Fisher, 2015; Dalio, 2021)

Given the potential integration of discrimination in both micro and macro human interactions, this thesis sets itself to research and map this system. In parallel the anti-discriminatory efforts, under the classification of DEI, are also mapped with the objective of visually grasping how these initiatives differ from and compare to each other.

In order to properly apply and/or practice design, this paper tries to answer two main questions: ‘can design approach such issues?’ and ‘how can design approach them?’.

The results of this research are presented in a theoretical table connecting the overall literature review and the authors insights as well as in a prototyped artifact, both suggested as a guideline and template to map discriminating and anti-discriminating journeys.

Concluding this thesis, a set of insights and future investigations unfold and discuss the main realization: a new global structure of change must be purposefully designed in order to effectively match the systematic strength of the discriminatory world we live in.

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List of abbreviations

<i>ECHR</i>	European Commission on Human Rights
<i>COFOG</i>	Classification of the Functions of Government
<i>OECD</i>	Organisation for Economic Co-operation and Development
<i>OHCHR</i>	Office of the United Nations High Commissioner for Human Rights
<i>MVP</i>	Minimum Viable Product
<i>SD</i>	Service Design
<i>SDG</i>	Sustainable Development Goal

Discrimination(s) Grid & DEIB Compass - A Service and System Design Integrative Perspective of How We Consume and Stop Consuming Structural Discriminations

Introduction

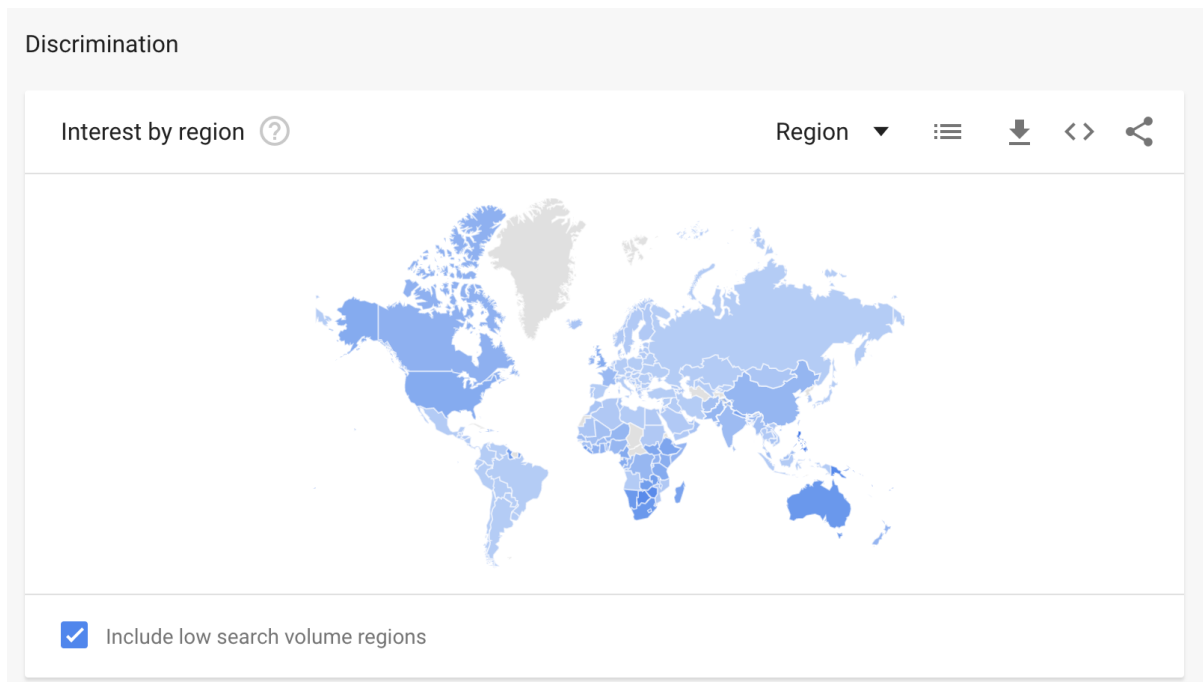
According to the article two of the Universal Declaration of Human Rights (OHCHR, 1948):

Everyone is entitled to all the rights and freedoms set forth in this Declaration, without distinction of any kind, such as race, colour, sex, language, religion, political or other opinion, national or social origin, property, birth or other status. Furthermore, no distinction shall be made on the basis of the political, jurisdictional or international status of the country or territory to which a person belongs, whether it be independent, trust, non-self-governing or under any other limitation of sovereignty. (OHCHR, 1948)

Conversely, discrimination, the action that constrains and/or hinders the former described right, has become the keyword and subject of controversy, discussion and, according to Google Trends (2022), research term of increasing interest during the last 5 years. The following maps, Figures 1 to 9 (Google Trends, 2022), better illustrate the presence and popularity of the web search of the term 'discrimination' translated in the first ten most spoken languages according to Ghosh (2020).

Figure 1

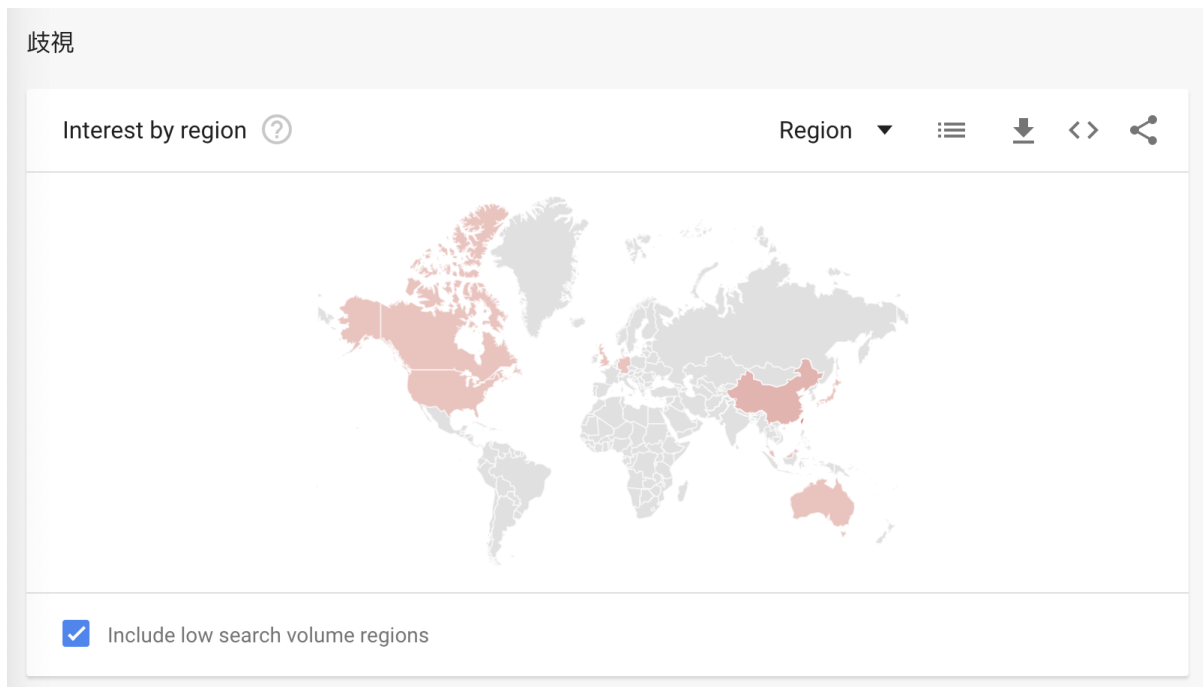
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in English and French)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, Samoa, Vanuatu, Philippines, Solomon Islands and American Samoa. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 2

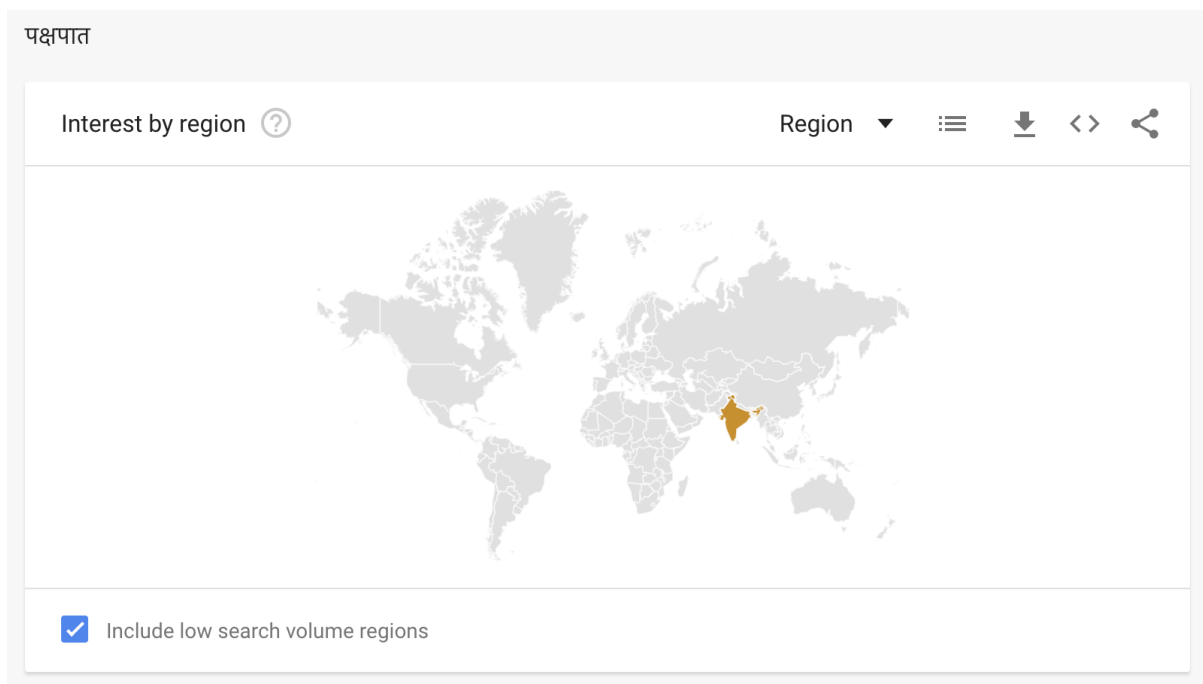
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Mandarin)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, Hong Kong, Taiwan, Macao, China and Malaysia. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 3

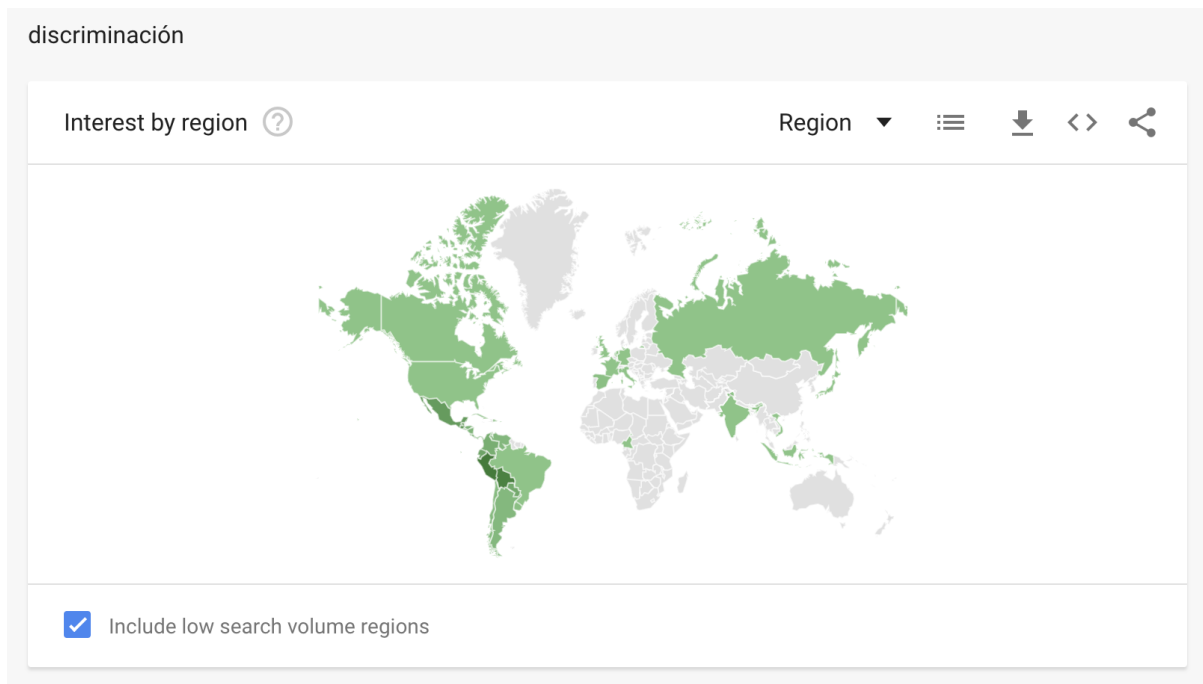
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Hindi)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The only location according to the dataset list was India. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 4

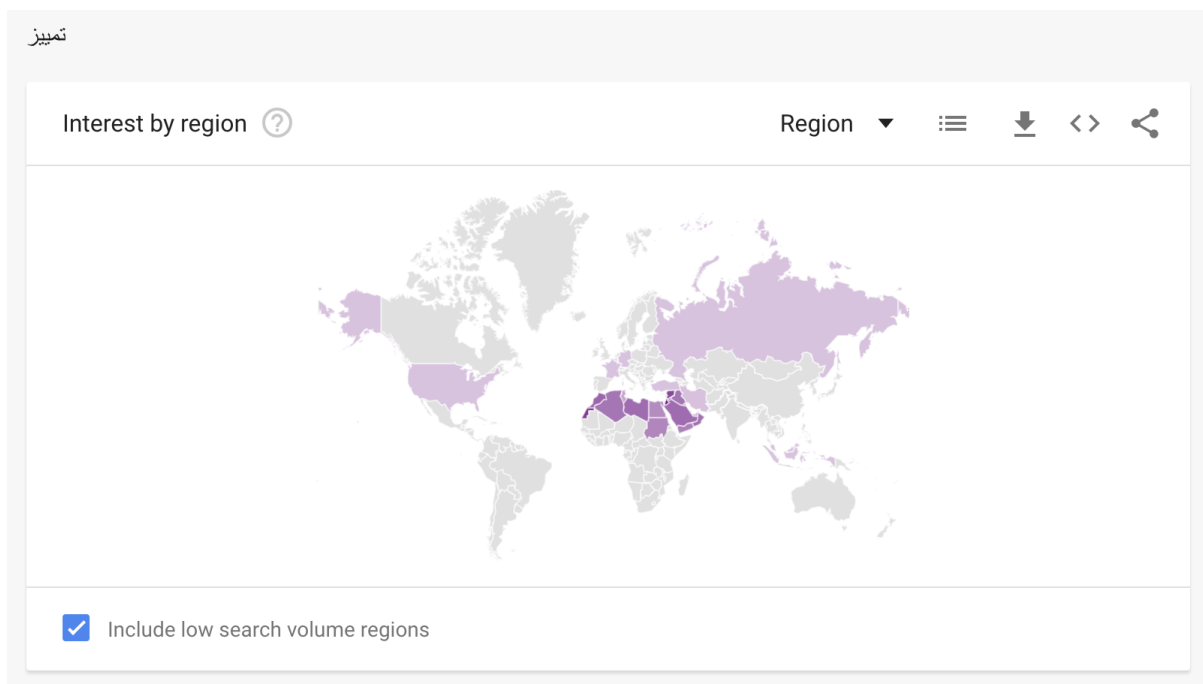
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Spanish)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, Peru, Bolivia, Guatemala, Mexico and Ecuador. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 5

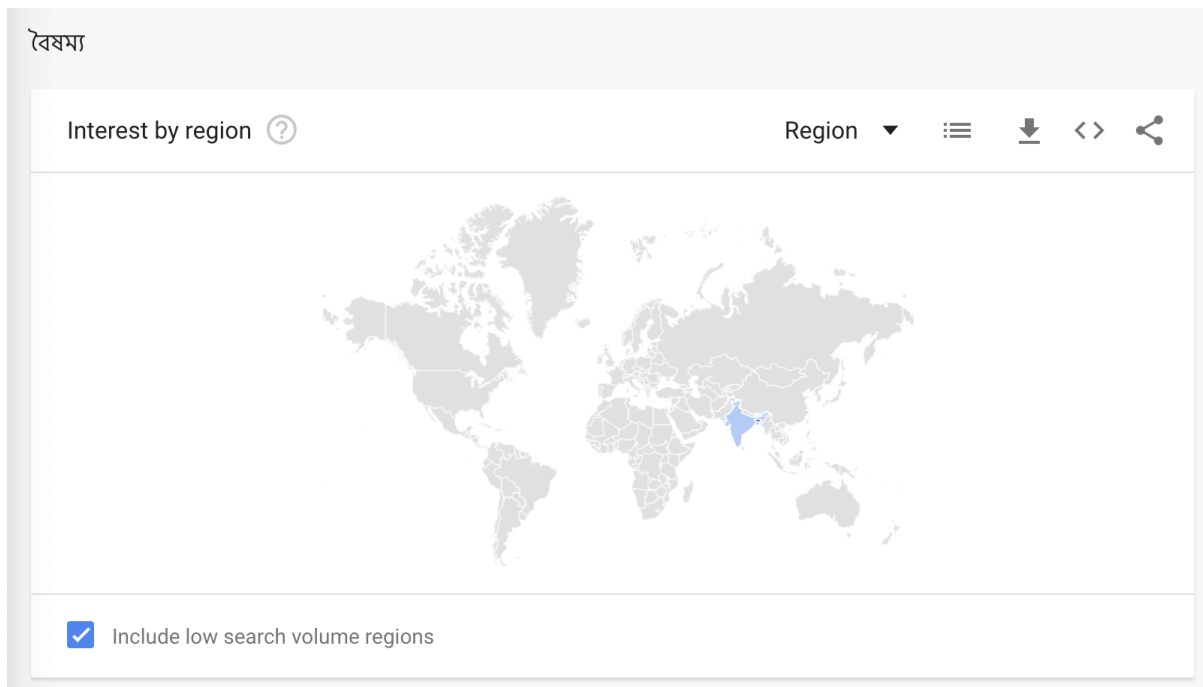
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Arabic)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, Jordan, Western Sahara, Syria, Palestine and Morocco. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 6

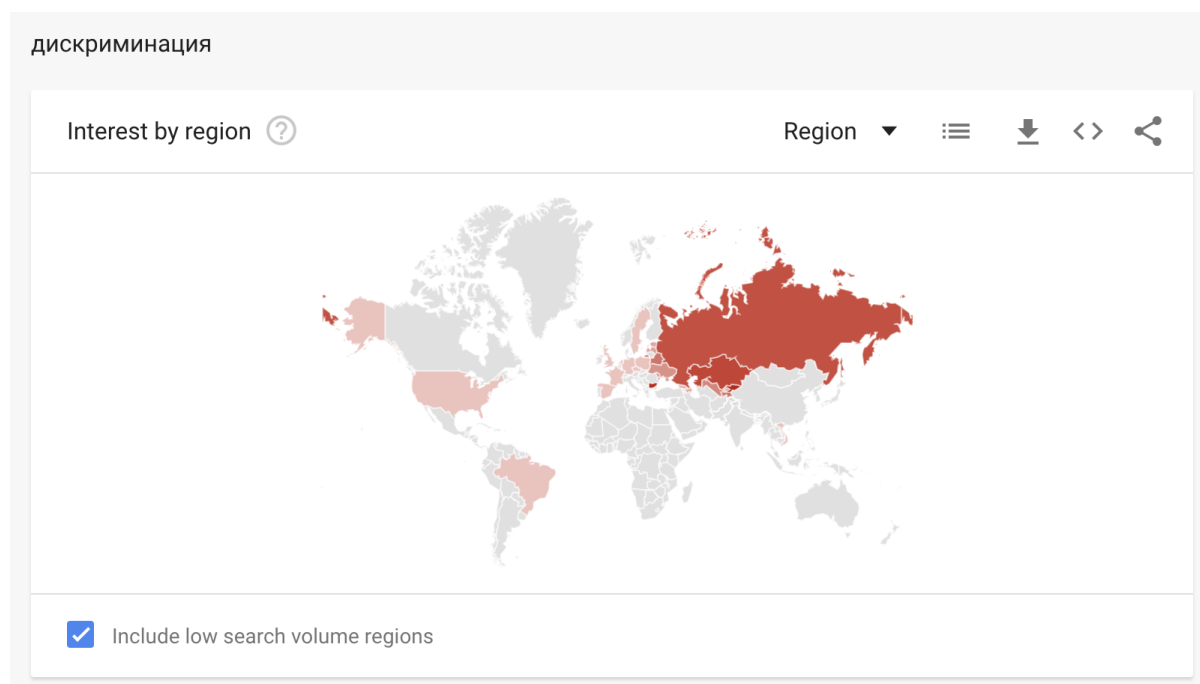
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Bengali)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first and only two locations according to the dataset list were, from the highest, Bangladesh and India. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 7

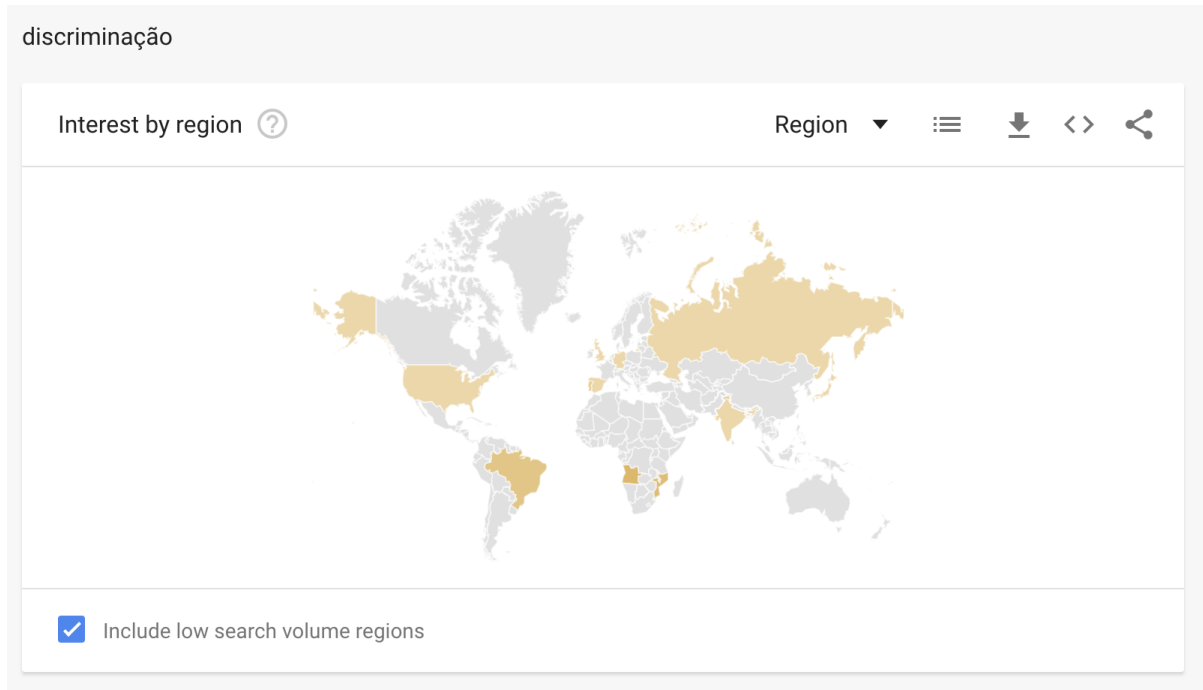
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Russian)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, Kyrgyzstan, Bulgaria, Kazakhstan, Russia and Tajikistan. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 8

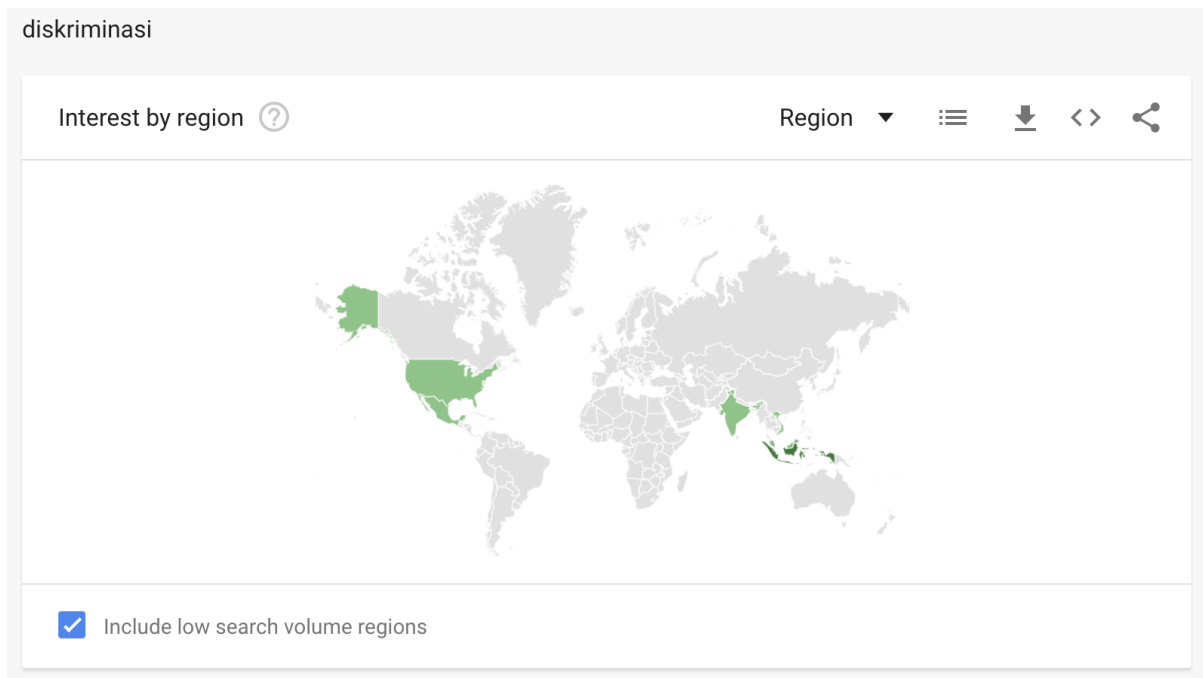
Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Portuguese)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, São Tomé & Príncipe, Angola, Mozambique, Cape Verde, Brazil. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

Figure 9

Map of interest by region, worldwide, of the past 5 years of the web search of the term 'discrimination' (in Indonesian)



Note. The map shows in which location(s) the term was most popular during the specified time frame. The first five locations according to the dataset list were, from the highest, Indonesia, Timor-Leste, Malaysia, Brunei and Singapore. Values are calculated on a scale from 0 to 100, where 100 is the location with the most popularity as a fraction of total searches in that location, a value of 50 indicates a location which is half as popular. A value of 0 indicates a location where there was not enough data for this term. The values translate to the color intensity highlighted on the map, the higher the value, the darker the color. A higher value means a higher proportion of all queries, not a higher absolute query count. So a tiny country where 80% of the queries are for 'bananas' will get twice the score of a giant country where only 40% of the queries are for 'bananas'. Retrieved from Google Trends, 2022 (<https://www.google.com/trends>).

The demonstrated interest in the term is shared by the author and guides this research to investigate, define and map discrimination in particular contexts, through particular literature and under a service and system design perspective and framework(s).

Other drivers for this thesis subject choice lay on the understanding that discrimination, according to the United Nations (2020), even though is reportedly

experienced by around two in ten people, is discussed as a fundamental piece of global inequality and dimensioned when stated that “Global inequality affects us all, no matter who we are or where we are from.”. Also, beyond its absolute range in terms of people impacted, it is pointed out as a practice intertwined into today’s societal structures as the same report stands that the “oldest democracies still wrestle with racism, homophobia and transphobia, and religious intolerance.”. (United Nations, 2020, p. 2)

A comprehensive part of the richness and depth of the concept of discrimination are explored in the first chapters of this thesis where the literature review aims at clarifying which kind, which levels and why these choices of discrimination are the ones targeted to be mapped in parallel to the initiatives of counter-acting them.

From investigating discrimination and documenting the topic’s vastness and fragmentation, two connections emerge amongst its legal and frequently attributed stems of race, ethnicity, classism, gender, religion, sexuality, ableism, etc.. The integrative concepts present opposing directions in a spectrum of macro and micro and they are ‘identity’ and ‘societal system’.

Firstly, in the micro end of the spectrum, identity connects the discriminatory experience when, according to Crenshaw (1989) and other papers explored, the intersectionality present in black women often lacks the understanding that shapes their experience as they become “marginalized in the interface between antidiscrimination law and race and gender hierarchies”. (Crenshaw, 1989, p. 151)

Secondly, now in the macro end of the spectrum, the societal system present and/or influencing our present-day global civilization has been heavily shaped by the European colonialism in the era that lasted from the end of the fifteenth century until around late 1960s as “just about every corner of the globe was colonized outright or was dominated under various designations like ‘protectorate’ or ‘mandate,’”. (Fisher, 2015). Under this scale and typologies of domination, racism (a stem of discrimination) became a fundamental practice heavily present in the literature as a “principle of social domination by which a group seen as inferior or different in alleged biological characteristics is exploited, controlled and oppressed socially and psychologically by a superordinate group” (Blauner, 1972, p. 84, as cited in Burawoy, 1992; Fisher, 2015).

The fact that today’s racism and classism have been clearly characterized as caused by, and far beyond correlated to, the designed and purposeful implemented colonial system,

integrate different forms of discrimination in the structural realm.

Furthermore, the first chapters of this research are intentionally scattered throughout different areas of knowledge and resources in the attempt to follow a research approach that can properly, or at least widely feed, according to Vink and Koskela-Huotari (2021), temporal, material and relational modes of reflexivity enabled by Service Design. (Vink & Koskela-Huotari, 2021, p. 7)

Moving into chapter four, it becomes possible to describe service design, strategic design and other design practices approaching intangible interactions as outputs of blueprinting social structures and trying to answer calls such as the ones proposed by Fisk et al. (2018) when argued that “service exclusion can be significantly reduced by designing service solutions that respond to human diversity and by making resources available to consumers that facilitate access to services.” (Fisk et al., 2018, p. 841)

Following links between the anti-discrimination efforts and emerging design practices, the literature review aims to answer the first main research question of this thesis: ‘can service design counter discrimination?’.

In the last chapter of the literature review the research revises and reports methodologies and frameworks that point design practices towards approaching social problems with the intention of partially answering the second main research question of this paper: ‘how service design can counter discrimination?’.

Finally, the artifact is presented as the result of this work as well as the complementary answer to the previously mentioned research question. The discussion follows describing and justifying the choices made and the potential improvements foreseen.

The author conclusion can be summarized as the assessed and recommended exercise of service design to address and endeavour into the complexities of social structures with the potential to impact for the better.

1. Discrimination

This chapter of the research aims at clarifying, mainly through philosophy, history and sociology, the debates that support the author's arguments and critic perception of the fragmentation of the subject of discrimination.

It becomes imperative to highlight that, although comprehensive and intentionally diverse, the literature review is under the scrutiny and limitations of biases and perspectives that the author chooses to acknowledge as an attempt to enforce principles of trauma responsive design suggested by Rachael Dietkus when noted that "our identities as designers (and the attachments we have to certain ways of doing design) play a huge role in both how and why we design." (Dietkus & Service Design Network, 2021)

More on the means of applying the mentioned principles will be discussed in the section dedicated to this thesis methodology and design, but for now, the author's awareness of being a marginalized identity as well as enjoying some social privileges are important to be explicated.

From this chapter, the need and partial parameters of how discrimination is understood and structured in this thesis will rise to accommodate and guide the following literature review.

1.1. Discrimination, definition

According to Wouter Vandenhoele (2005, p. 33, as cited in Altman, 2020) "[t]here is no universally accepted definition of discrimination" outlawed in the international treaties. Altman moves into reinforcing the statement by saying that "the core human rights documents fail to define discrimination at all, simply providing non-exhaustive lists of the grounds on which discrimination is to be prohibited." (Altman, 2020).

Still, according to Altman (2020), a consensus is possible in the terms of discrimination being the combination of attitudes, practices and/or policies that, in a given logic, are exercised by a group that is socially perceived and self-perceived as "salient in that they structure interaction in important social contexts", towards and against another. (cf. Lippert-Rasmussen 2006: 169, and Holroyd 2018: 384, as cited in Altman, 2020).

Exemplifying, Altman (2020) says that "Thus, groups based on race, religion and

gender qualify as potential grounds of discrimination in any modern society, but groups based on the length of a person's toenails would typically not qualify."

The concept of the discrimination approached in this thesis, should, therefore, according to Altman (2020), be defined as the moralized concept, by which it is:

... properly applied to acts, practices or policies that meet two conditions: a) they wrongfully impose a relative disadvantage or deprivation on persons based on their membership in some salient social group, and b) the wrongfulness rests (in part) on the fact that the imposition of the disadvantage is on account of the group membership of the victims. (Altman, 2020)

Given the practical definition clarification, it becomes important to argue also on the nature of such behaviours. The agent of discrimination can exercise it consciously and uncsciously, as "It is plausible to think that in many societies, unconscious prejudice is a factor in a significant range of discriminatory behavior, and a viable understanding of the concept of discrimination must be able to accommodate the possibility." (Altman, 2020).

In addition, intentionality and awareness are also set apart by the literature when claimed that "even the intention to disadvantage persons on account of their group affiliation can be unconscious" (Wax, 2008, as cited in Altman, 2020).

An important distinction is made in this realm as, more specifically defining racial biases and discrimination, according to DiAngelo (2021), the lack of intentionality does not imply absence of responsibility neither of practicing racism. This piece of literature explores 'white fragility' and, in the chapter that defines color blindness, DiAngelo (2021) states, as a self-identified white woman that:

We might think of conscious racial awareness as the tip of an iceberg, the superficial aspects of our racial socialization: our intentions (always good!) and what we are supposed to acknowledge seeing (nothing!). Meanwhile, under the surface is the massive depth of racist socialization: messages, beliefs, images, associations, internalized superiority and entitlement, perceptions, and emotions. (DiAngelo, 2021, p. 41)

DiAngelo (2021) further defines this unconscious and unintentional but still practice of racial discrimination throughout the unspoken maintenance of racism as the status quo, when not addressing and/or confronting the racist socialization we are all subjected to, mentioning that:

Racial bias is largely unconscious, and herein lies the deepest challenge—the defensiveness that ensues upon any suggestion of racial bias. This defensiveness is classic white fragility because it protects our racial bias while simultaneously affirming our identities as open-minded. Yes, it’s uncomfortable to be confronted with an aspect of ourselves that we don’t like, but we can’t change what we refuse to see. (DiAngelo, 2021, p. 42).

To summarize, the definition of discrimination approached in this thesis is, according to Altman (2020) “an act that imposes a disproportionate disadvantage on the members of a certain group (...), even though the agent has no intention to disadvantage the members of the group and no other objectionable mental state, such as indifference or bias, motivating the act.”

The last considerations to be made around definition is that the discriminated entity will be referred to as marginalized, as it is disadvantaged not necessarily due to population minority in regards to a majority, but because of the just mentioned accumulation of structures, institutions and norms present in the societies that they navigate and to which they try to belong. A practical example is that in Brazil the majority of the population self-identify as black or mixed raced and yet their access to public services and socio-economic position is disadvantaged and kept so under a great deal of discrimination, being not a minority but still a marginalized discriminated group.

1.2. Levels

This thesis definition of discrimination already comprises the moralized, possibly unconscious and unintentional characteristics of this practice. It is now important to clarify the author’s chosen taxonomies, as “Legal thinkers and legal systems have distinguished among a bewildering array of types of discrimination: direct and indirect, disparate treatment and disparate impact, intentional and institutional, individual and structural.”. (Altman, 2020)

First, from the “disparate treatment and disparate impact”, it became understood that at least two entities should be investigated in a scenario of discrimination. Being one entity the responsible for performing the discriminatory action and the other, the entity receiving the discriminatory action. (Altman, 2020)

Second, from “individual and structural” and the frequent attribution of

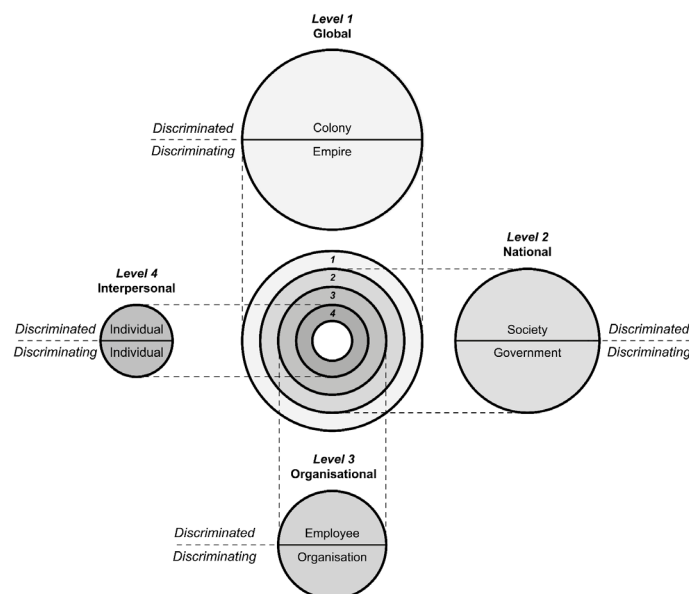
discrimination to systems and structures present in the literature review, mainly on the bases of race, gender and class, directed this research to define which structures should be looked into and led the individual dimension to be the first one defined.

Thirdly, and moving to the mentioned structures, the ones surrounding the human identities of current societies (2022) are at least under influence of an organization (whether private or public), a sovereign nation and its governance (whether chosen or imposed), and a global order which can be understood as the human civilization.

Therefore, the author has defined the following four levels of approaching the subject of discrimination, illustrated in Figure 10 (The author, 2022), each level being characterized by two entities (a discriminating and a discriminated one): the interpersonal (between two individuals), the organizational (between an organization and a subordinated member of this organization), the national (between the government and its society) and the global (between an empire - characterized by having become the world's reserve currency - and its colonies - in the broad definition of colonies supported by the research). (Altman, 2020; American Historical Association & Shoemaker, 2015; Better, 2008; Dalio, 2021; DiAngelo, 2021; Fisher, 2015)

Figure 10

Levels and entities of discrimination



Note. The author, 2022.

1.2.1. Interpersonal

Clarified by definition, the interpersonal discrimination underlies, in this thesis, the discriminatory action between individuals.

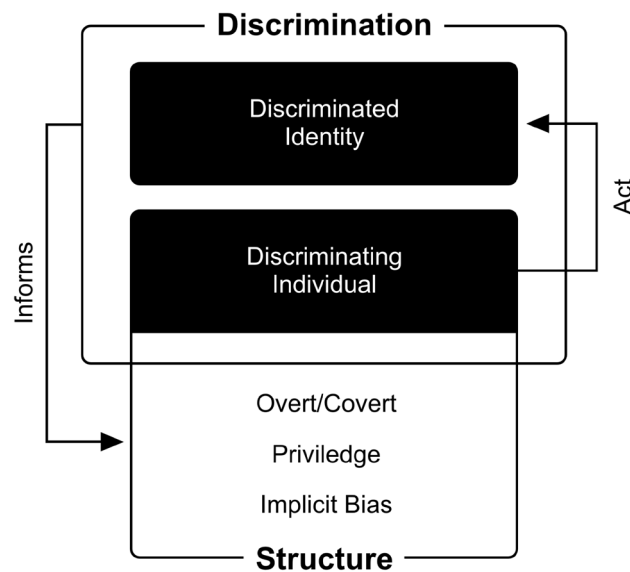
Such actions, according to Altman (2020), can be exercised in a direct form and an indirect one. The direct form is characterized by an interaction without intermediaries in which, consciously or not, someone explicitly disadvantages another person. While the indirect one is explained by being an action that does not explicitly targets a marginalized identity but still imposes a disproportional disadvantage to them in comparison to another. (Altman, 2020)

Once again, on the basis of racial discrimination, the literature review clarifies the covert and overt racism that the author considers to be a parallel between direct and indirect discrimination and that takes further the concept of both practices being intertwined and damaging. According to Coates (2007), “covert racism, twin born with overt racism, has just as long a lineage and, hence, its development has been just as pervasive.” (Coates, 2007, p. 5)

In regards to consciousness and unconsciousness, it became clear throughout the literature that implicit bias, therefore unconscious one, played an important and persistent role in feeding individual discriminatory actions, but that, contrary to intuition, combating its stereotyping capabilities was not effective. Better defined by Williams (2021, p. 26), “...changing behavior doesn’t necessarily hinge on changing implicit biases.”. The silver lining pointed out by the same literature is that acknowledging biases existence, and the mechanisms through which it becomes possible to interrupt, prevents individuals of acting upon these same biases and consequently their discriminatory nature. (Williams, 2021)

Moreover, implicit bias became an important component of what the author chose to name as the individual structure of the interpersonal discrimination. An important understanding of interpersonal discrimination also came from the research on whiteness and privilege where DiAngelo (2021) highlights that the defensiveness of white people as a mechanism for disengaging from racial discussion that should be interpreted as a maintenance of the status quo, and also as a form of bullying. More on her research will be better laid out in the chapter where intersectionality is discussed and then, finally, journeys of discrimination will take shape.

In summary, interpersonal discrimination has been interpreted and portrayed as a two-entity journey of different, interdependent and self-reinforcing actions that are supported by an individual structure of covert and overt discriminatory behaviour, and that inform individual implicit bias. See Figure 11 (The author, 2022).

Figure 11*Interpersonal discrimination*

Note. The author.

1.2.2. Organizational

The organizational level, defined by Altman (2020), is outlined when stated that:

In many cases, acts of discrimination are attributed to collective agents, rather than to natural persons acting in their individual capacities. Accordingly, corporations, universities, government agencies, religious bodies, and other collective agents can act in discriminatory ways. This kind of discrimination can be called ‘organizational,’ and it cuts across the direct-indirect distinction. (Altman, 2020)

From the supported and clarified statement that organizations can and do exercise discrimination, the next step became clarifying how this practice is most harmful and impactful to societies.

Although understood by the author that organizations provide products and services directly to societies, and that their perhaps more evident responsibility and object of analyses could come into this particular interface, discrimination is portrayed, once again, to be consequential from a structure and its systems.

Therefore, Williams (2021) argues in her book on the subject of mainly interrupting racial, gender and class biases in the workplace, that effective intervention comes from not

just supporting the discriminated persons, and that is illustrated in the following statement:

“In the wake of Black Lives Matter and the national reckoning with racism in the United States, we are finally beginning to understand that, to address systemic racism, you have to change systems. That’s the only way to fix policing. It’s the only way to fix companies, too.” (Williams, 2021, p. 11)

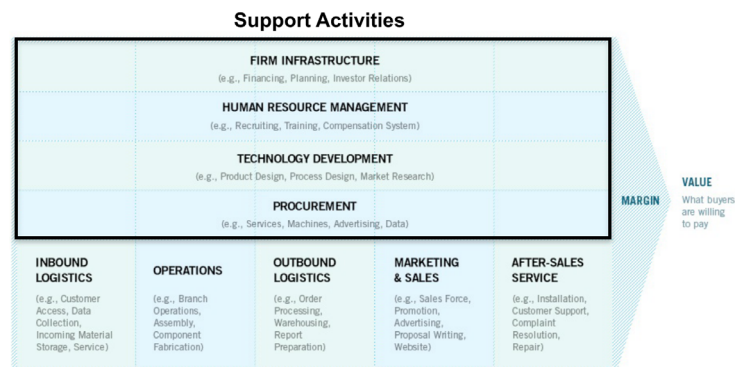
As a result of her decade-long eighteen-thousand respondents of a fourteen-study compilation, she identified five clusters of biases that describe discrimination in the playing field and that are fundamentally informing what the author defined as the organizational journey of discrimination.

Alongside the latter, Meyerson (2001) research pointed out a typology of discriminated identities in the workplace, in this case on the bases of race and ethnicity, sexual orientation, and gender, that were interpreted as agents of incremental change and described their journeys as tempered radicals.

Meyerson (2001, p. 18) mentions an important piece of how ‘tempered radicals’ were interpreted in leadership, saying that “Tempered-radical-as-leader is a more inclusive, realistic, and inspiring way to think about leadership - and life - than are images of leadership found in fairy tales and the popular business press.”. This author’s storytelling description of four different kinds and degrees of change sparked by the discriminated identities describes more in depth and from the perspective of the marginalized identities themselves, the journeys inside organizations.

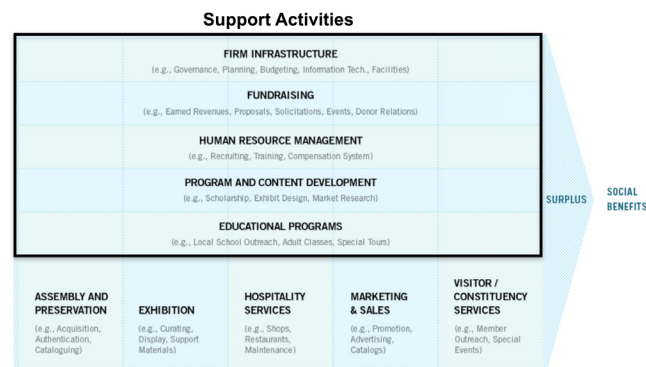
Given potential parallels of journeys of discrimination and discriminated, the author organizational level could become mostly informed.

The next step, given the already mentioned fundamental role of the system supporting and perpetuating the discriminatory practice, a standard end-to-end structure should be defined and mapped, as a fundamental element of the organizational level discrimination. Porter’s (n.d.-a) value chains support activities, for both private organizations, universities and non-profit organizations, see Figure 12 and 13 (Porter & Harvard Business School, n.d.-a), have been the starting point to offer a standardized structure of analysis in this level.

Figure 12*The Value Chain Support Activities in Private Organizations*

Note. The diagram informs the standard support functions and primary activities of a private company that, according to Porter (n.d.-a) create value throughout a private organization.

^aThe highlighted area is the set of activities the author believes are important to have analysed as they support the overall value chain. Adapted from Porter, M. & Harvard Business School. (n.d.-a). The Value Chain - Institute For Strategy And Competitiveness - Harvard Business School. Harvard Business School. Copyright © President & Fellows of Harvard College

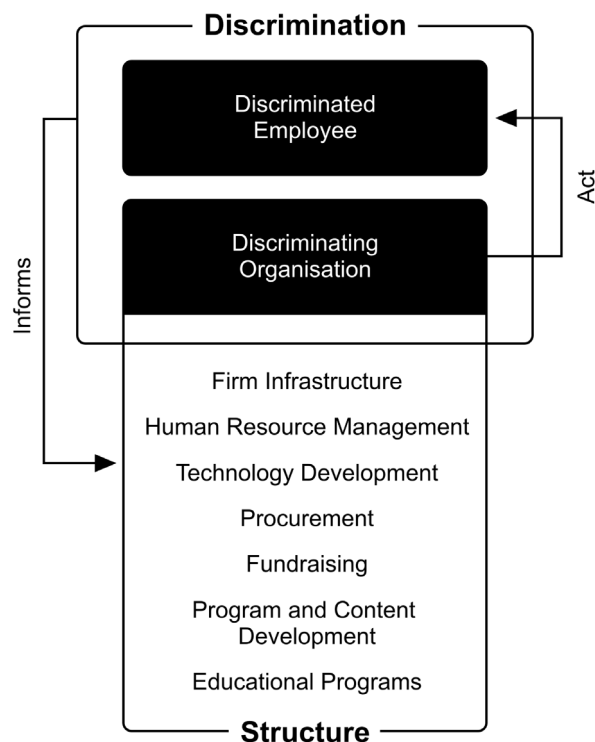
Figure 13*The Value Chain Support Activities in Universities and Non-Profit Organizations*

Note. The diagram informs the standard support functions and primary activities of a private company that, according to Porter (n.d.-a) create value throughout an university and/or non-profit organization. ^aThe highlighted area is the set of activities the author believe are important to have analysed as they support the overall value chain. Adapted from Porter, M. & Harvard Business School. (n.d.-a). Strategy for Universities & Nonprofits - Institute For Strategy And Competitiveness - Harvard Business School. Harvard Business School. Copyright © President & Fellows of Harvard College

In conclusion, organizational discrimination has been interpreted and portrayed as a two-entity journey of different, interdependent and self-reinforcing actions that are the result of the organizational support activities of value creation that collectively present disadvantages to its own members, and that allow and propagate the discriminatory behaviours built on implicit biases. See Figure 14 (the author, 2022).

Figure 14

Organizational discrimination



Note. The author, 2022.

1.2.3. National

According to the literature, “Structural discrimination—sometimes called “institutional”—should be distinguished from organizational: the structural form concerns the rules that constitute and regulate the major sectors of life such as family relations, property ownership and exchange, political powers and responsibilities, and so on.” (Ture and Hamilton, 1992 [1967], Pogge 2008, as cited in Altman, 2020)

In the realm of structures, this thesis defined the sovereign nation as the first societal level to be mapped. It is promptly clear for the author that sovereign nations in

their diversity are far from presenting a uniform structure and governmental standard functions and, although appreciated and acknowledged, government structures that do not match the standard COFOG presented by OECD (2019) might encounter limitations and/or incompatibility with these maps.

Nevertheless, Table 1 (OECD, 2019) lays a reference of the levels of democratic government functions which are present in thirty two countries of the OECD. These functions were this thesis bases to understand and map institutional discrimination.

Given the structure, Better (2008, p. 42) argues that “Institutional racism can function without much active individual assistance; a person need only follow the established racist policies and practices.”. Relying mainly on this work to define journeys and episodes that are primarily racial and ethnic discriminations, institutional discrimination intends to make evident practices, legislations and scientific discourses that supported and continue to support a societal stratification.

An interesting example that highlights institutional indirect discrimination is given when Better (2008, p. 42-43) describes the United States fire departments that until 1970s had a regulation that only accepted a certain height and that consequently excluded a number of latinos and asian-americans from the duty. This practice could not be criminalized as it did not declare openly that these marginalised identities were impeded of applying for the job, only that physical characteristics were necessary for such job. The author then proceeds to highlight how Hong Kong and a whole set of countries in Latin America operate perfectly functional and effective fire brigades.

Education, science and healthcare, heavily informed by eugenics are also important examples of indirect institutional discrimination that inform up to now, problematic denominations and attributions of diseases to races, and that justified sterilization based on people’s disabilities and ethnicity. (Lira & Minna, 2022)

Table 1*Institutional Classification of the Functions of Government (COFOG)*

First-level ^a	Second-level ^b
General public services	Executive and legislative organs, financial and fiscal affairs, external affairs Foreign economic aid General services Basic research R&D general public services General public services n.e.c. Public debt transactions Transfers of a general character between different levels of government
Defence	Military defence Civil defence Foreign military aid R&D defence Defence n.e.c.
Public order and safety	Police services Fire-protection services Law courts Prisons R&D public order and safety Public order and safety n.e.c.
Economic affairs	General economic, commercial and labour affairs Agriculture, forestry, fishing and hunting Fuel and energy Mining, manufacturing and construction Transport Communication Other industries R&D economic affairs Economic affairs n.e.c.
Environmental protection	Waste management Waste water management Pollution abatement Protection of biodiversity and landscape R&D environmental protection Environmental protection n.e.c.
Housing and community amenities	Housing development Community development Water supply Street lighting R&D housing and community amenities Housing and community amenities n.e.c.
Health	Medical products, appliances and equipment Outpatient services Hospital services Public health services R&D health Health n.e.c.

Note. (continued)

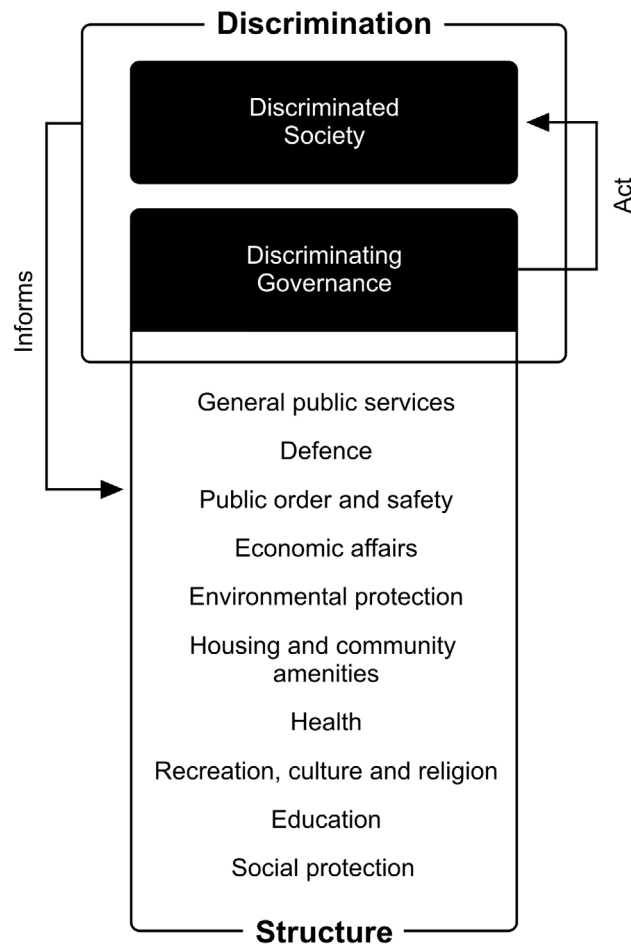
Table 1 (continued)*Institutional Classification of the Functions of Government (COFOG)*

First-level ^a	Second-level ^b
Recreation, culture and religion	Recreational and sporting services Cultural services Broadcasting and publishing services Religious and other community services R&D recreation, culture and religion Recreation, culture and religion n.e.c.
Education	Pre-primary and primary education Secondary education Post-secondary non-tertiary education Tertiary education Education not definable by level Subsidiary services to education R&D education Education n.e.c.
Social protection	Sickness and disability Old age Survivors Family and children Unemployment Housing Social exclusion n.e.c. R&D social protection Social protection n.e.c.

Note. n.e.c.: “not elsewhere classified”

^a First-level COFOG expenditures data are not available for Canada, Chile and Mexico. Until recently, second level COFOG data were available in some national statistical offices, but were not collected by international organisations.

^b The second level was not used in this thesis but is available for reference.

Figure 15*National discrimination*

Note. The author, 2022.

1.2.4. Global

From the understanding that “Matters are different in today’s globalized world, where an individual’s disadvantage in access to education relative to persons who live in other countries could pose a threat of oppression.” (Altman, 2020), the last level of discrimination points out to a structure that encompasses the overall human society.

Although individuals are the ultimate target of discrimination, the entities that were portrayed in this level are nations.

The author’s interpretation of this level is supported by two main perspectives of the last five centuries of the human society: the four European empires followed by the United States world order and their colonization of almost the totality of the current territories of the globe.

Before moving into the integrative chapters of this research, it is already possible due to the continuous references connecting discrimination and the colonial system and structure, to advance the entities of the global level of discrimination as colonies and empires.

Exemplified by Better (2008, p.10) when she defines “Neocolonialism is the economic and political policies by which a more powerful country or entity indirectly maintains or extends influence over other countries, areas, or people.”, this literature follows arguing that the United States are under an internal colonialism. She says the country operates as such “through its economic and political domination of ethnic enclaves: ghettos, Indian reservations, barrios, and Chinatowns.” (Blauner, 2004, as cited in Better, 2008, p. 10).

Also highlighted by DiAngelo (2021, p. 28) “White supremacy is especially relevant in countries that have a history of colonialism by Western nations.”.

Finally reinforced by the analysis of Fatouros (1965, p. 705) on Sartre’s pieces about colonialism and decolonization:

(...) the economic relationships established by the end of the nineteenth century between the colonial powers and their overseas territories led ‘necessarily’ - that is to say, through the automatic operation of impersonal market forces - to a redistribution of power and material resources to the profit of the metropolitan powers and the detriment of the colonies, to the cumulative enrichment of the former and the consequent cumulative impoverishment of the latter. Once the system is established, it tends to move in this direction automatically, with no need for conscious malevolent decisions, or conspiracies, on the part of the persons involved. (Fatouros, 1965, p. 705)

Given consistent and enough evidence of either today’s inequality and discrimination being connected to the European colonization, it becomes reasonable to argue that among countries and regions, discrimination also implicates in subjugating, hindering and/or devalueing entire territories.

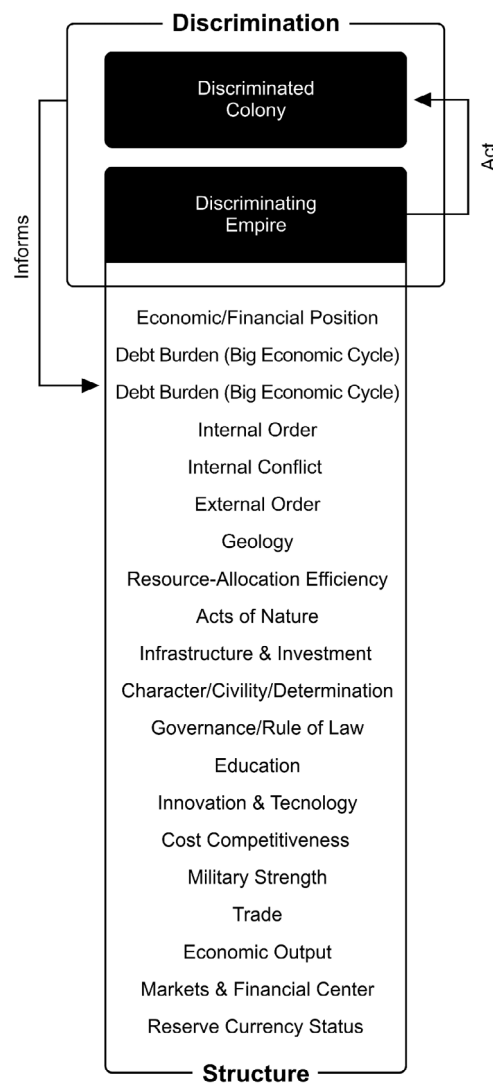
Adding to the dynamic of discriminated countries, an additional entity, the discriminating one needs to be clarified as having a structure that supports such superiority. Dalio (2021), when describing the cyclic and standardized rise and fall of the last five empires, is able to set key determinants present in all of them. He suggests that “... we

can look at each case and see what happened (the effect) and what made it happen (its determinants). Or we can look at the determinants to see the effects they had to make up the various cases.” (Dalio, 2021, p. 62).

Following this logic, the last structure behind the last level mapped in this thesis will be a direct mention to Dalio’s (2021) determinants. Discrimination in the global level has been interpreted and portrayed as a two-entity journey of different, interdependent and self-reinforcing actions that are the result of a global dynamic between empires and colonies. See Figure 16 (The author, 2022).

Figure 16

Global discrimination



Note. The author, 2022.

2. The Integration

The first chapter of literature review of this thesis defined discrimination as a phenomenon that emerges from structures and establishes itself as a self-reinforcing system of subjugation of entities, in which the discriminatory practice informs the structure to, again act in a discriminatory way, and so on, repeating the cycle.

The described dynamic can be framed in different levels of the human organizations, and can be spotted and understood in a variety of degrees of detail, as well as target a variety of identities (among the already defined marginalized ones).

This thesis purpose of integrating the portrayal of discrimination also applies in recognizing in the literature the concepts that align with this objective.

The first and most prominent connection among the structures that supports discrimination emerged from the literature review as the historical era of European colonialism.

The second link that stood up against looking at discriminatory practices as a list of problems to address, and instead shift the focus to the reality of lived experiences was intersectionality.

This chapter is dedicated to describe and reason on the integrative concepts that informed the maps of discrimination from one macro level to one micro level, and, in the end to present the how these concepts oriented the discrimination map structure.

2.1. The System(s) - Macro

The research on European colonialism and the World Orders intends to clarify which structure and which entities were the ones feeding what this thesis consider the initial form of today's discriminatory dynamics.

2.1.1. Colonialism, its impacts and post-colonial remains

European colonialism, also known as the Age of Discovery, lasted from the 15th century until around the mid 1970s. Under the rationale of having the "... legal and religious obligation to take over the land and culture of indigenous peoples", the colonial powers subjugated and controlled vast amounts of territories and among many debated impacts, they brought upon their colonies "environmental degradation, the spread of disease,

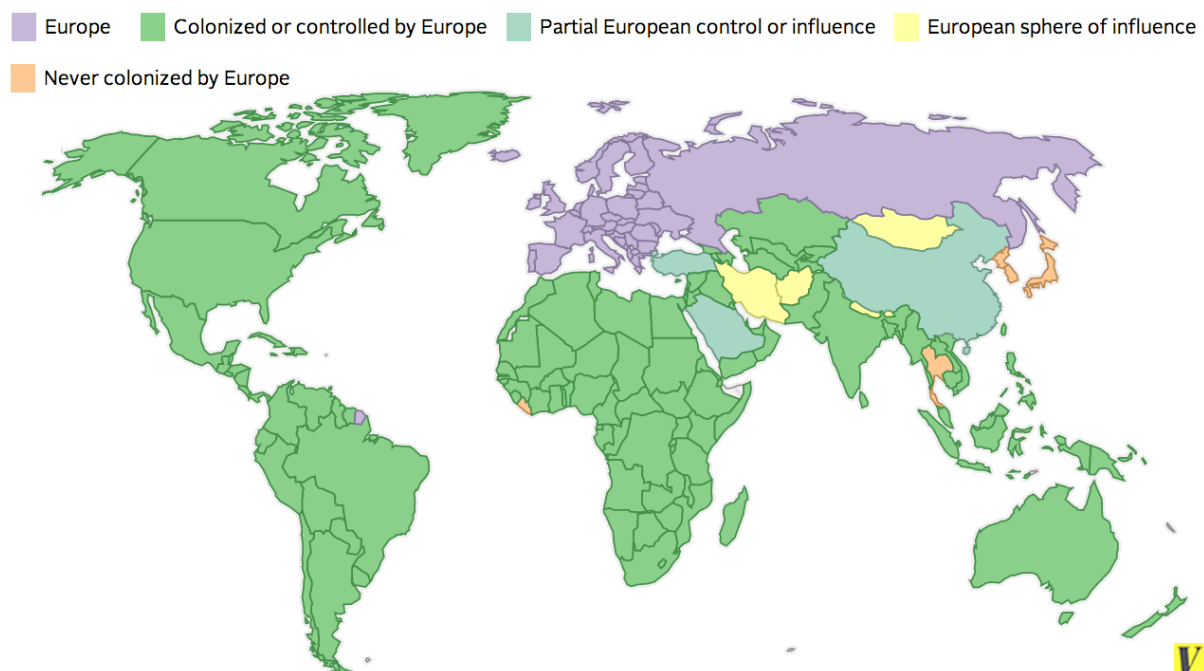
economic instability, ethnic rivalries, and human rights violations—issues that can long outlast one group’s colonial rule.” (Blakemore, 2019)

The dimension of what is called by Fischer (2015) as colonial project is easierly appreciated in the following map, Figure 17 (Fisher, 2015):

Figure 17

Countries that have been under European control

Countries that have been under European control



Note. “Partial European control or influence” refers to dominations designated “protectorate” or “mandate”, while “European sphere of influence” meant that “the European powers owned exclusive rights to countries raw material and resources such as oil, for example”. Retrieved from Fisher, M. (2015, February 24). Map: European colonialism conquered every country in the world but these five. Vox. <https://www.vox.com/2014/6/24/5835320/map-in-the-whole-world-only-these-five-countries-escaped-european>

Given the proportion of European colonialism and the lasting of its period, many motivations came into play to justify and/or initiate these endeavours, from the perspective of the colonizers. According to Shoemaker (2015), these motivations made possible the

suggestion of a typology defining the “foreign intrusion or dominations”. Shoemaker’s (2015) description of “Settler Colonialism, Planter Colonialism, Extractive Colonialism, Trade Colonialism, Transport Colonialism, Imperial Power Colonialism, Not-in-My-Backyard Colonialism, Legal Colonialism, Rogue Colonialism, Missionary Colonialism, Romantic Colonialism and Postcolonial Colonialism” informed the many ways through which colonialism impacted its colonies.

Shoemaker’s (2015) argument of describing former officially declared colonies that still present economic dependency and imprints such as “multiethnic, multilingual citizenry” as “postcolonial colonialism”, oriented this thesis to portray and consider some phases after the sovereignty of countries as included in their colonization journey, so as part of the discriminated cycle of a nation.

On the other hand, according to Ziltener & Kunzler (2013, p. 293), colonialism ended when “the vast majority of the autochthonous population regained full sovereignty over internal and foreign affairs, with or without the participation of foreign settlers.” and the period after this control is considered a post-colonial impact.

Ziltener & Kunzler (2013) described political, social and economic influences of the African and Asia colonialism as one of many factors intervening in the current state of development of this countries but, nevertheless, there is a clear consensus on the previous “absence of traditional state-and empire-building” of the mentioned territories (Ziltener & Kunzler, 2013, p. 306) and further intentions of understanding a colonial legacy.

Another important insight emerging from the literature on colonialism was the understanding of a designed territory that, according to Branch (2011) was the result of reflecting the practice of first and foremost determining the boundaries of a land to them claim it. Branch (2011) argued that this enforcement of “geometry” on colonial territory, that disconsidered the inhabitants of such lands, was then applied back into the central powers of colonizers, constituting a reflection of “designing” countries and suggesting that this was the process that originated current sovereign statehood.

The literature on postcolonial remains (Young, 2012) stated its own relevance by pointing out that the resistance to continuing to perform and recognize these studies. Young (2012) mentions that:

The dissolution of postcolonial theory does not mean that poverty, inequality, exploitation, and oppression in the world have come to an end, only that some

people in the U.S. and French academies have decided they do not want to have to think about such things any longer and do not want to be reminded of those distant invisible contexts which continue to prompt the transformative energies of the postcolonial. (Young, 2012, p. 19-20)

From the combative nature of the Young's (2012) article and the explicit statements of echoes of colonialism in today's society, this thesis has imported the relevance of portraying such process as the core of the discrimination map, as it states that today, aside from the "formal colonizer-colonized relation", we have:

... just those countless individuals in so many societies, who are surplus to economic requirements, redundant, remaindered, condemned to the surplusage of lives full of holes, waiting for a future that may never come, forced into the desperate decision to migrate illegally across whole continents in order to survive.

(Young, 2012, p. 27)

Even though the conceptual connection between colonialism and today's discrimination have been made clear, it is important to say, once again, that the author's perspective and background lies on the design field and that what has been drawn from this literature review is not a scientifically rigorous informed consensus over the real extent of colonialism impact or influence in today's discrimination and marginalization.

What has been concluded from this section is that this period presents unquestionable implications on today's societies and that it influenced the overall contemporary human organization under the already described logic of domination happening in dissonant but parallel journeys of at least two entities. Therefore it should be included in the map of discrimination.

This sub-chapter also informed this thesis when, in a global level, it named the dominating entity an empire and the dominated one a colony. In addition, it informed that this relationship has been established through power and that it takes form in a cyclic dynamic.

2.1.2. World Order

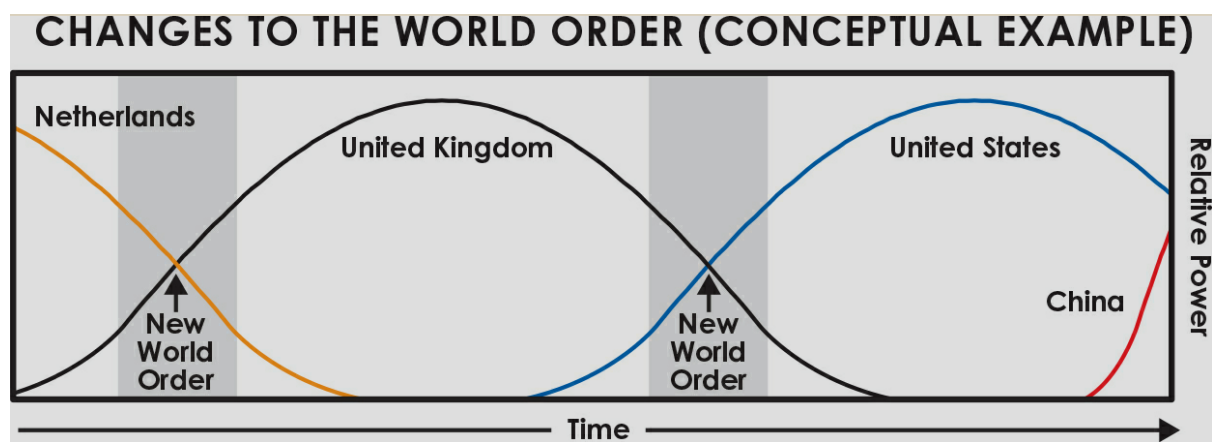
From the indication of dominating empires and cyclic dynamics establishing a logic of discrimination to be echoed in other levels of human organization, this research was propelled to find a supporting material to determine and design a standardized map of such cycles.

Relying on Dalio's (2021) extensive research describing the rise and fall of the last five centuries of empires, it was possible to point out steps, phases and key determinants behind the progression of nations as world orders.

This global cyclic trajectory of having a world order, according to Dalio (2021), is replaced by another cycle of another world order and, until now, these world orders have been established by imperial countries, as demonstrated in Figure 18 (Dalio, 2021).

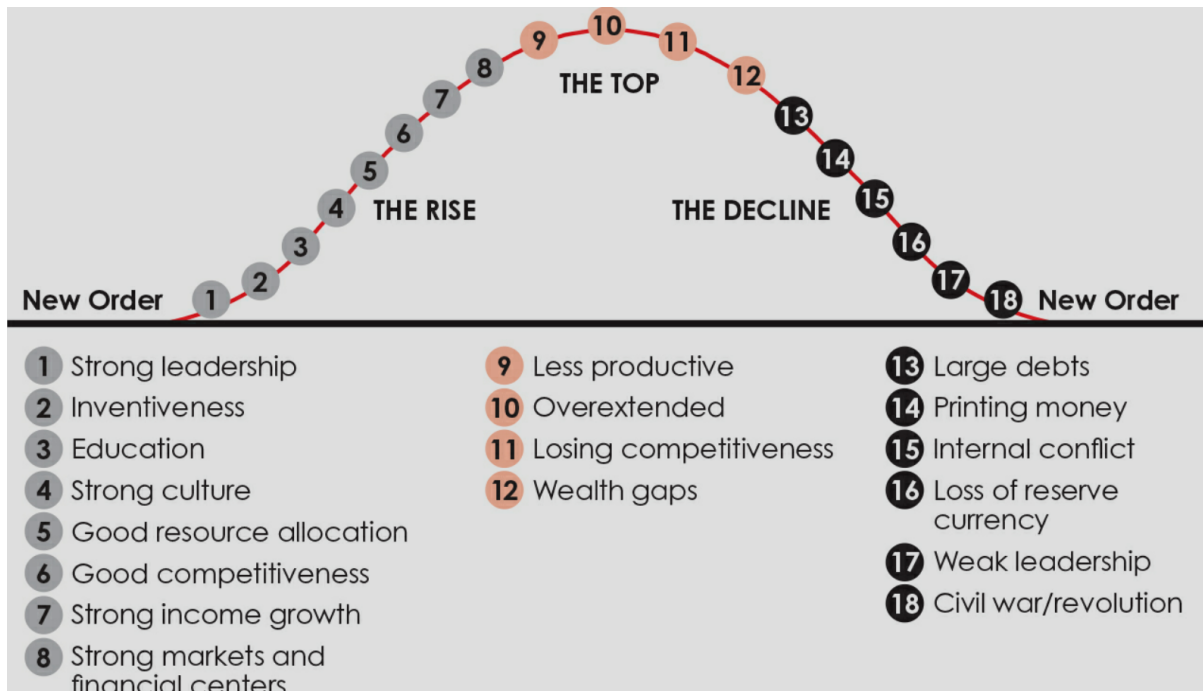
Figure 18

Changes to the World Order (Conceptual example)



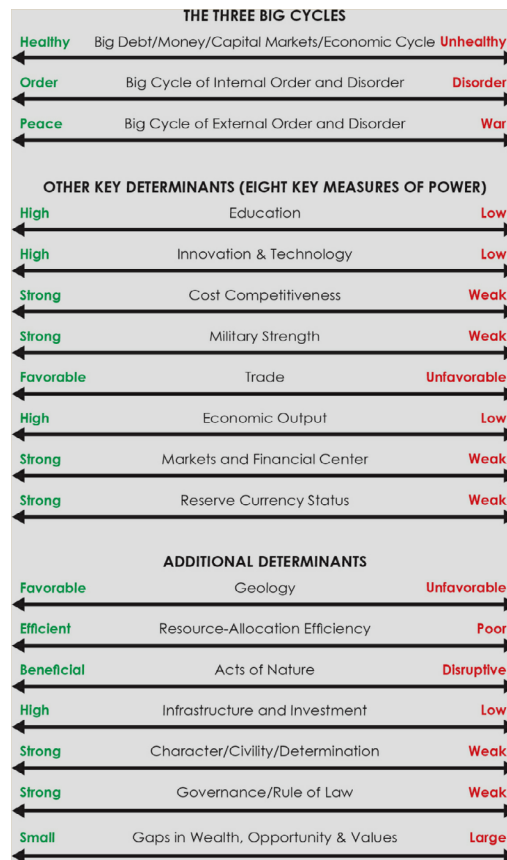
Note. Retrieved from Dalio, 2021, p. 55.

Standardized sequences of events emerged from this literature and a journey of a world order was possible to be described under Dalio's (2021) denomination. The progression of this events can be seen in Figure 19 (Dalio, 2021, p. 51)

Figure 19*Typical progression of an Empire*

Note. Retrieved from Dalio, 2021, p. 51.

Behind each step of the New World Order progression, a set of key determinants were indicated by Dalio (2021, p. 65) when stated that “Though none of these determinants is determinative on its own, I think you will find that when considered together they paint a pretty clear picture of which part of its life cycle a country is in and the direction it is headed in.”. The determinants to which Dalio (2021) is referring to can be seen in Figure 20 (Dalio, 2021, p. 63)

Figure 20*Determinants of progression as a World Order*

Note. Retrieved from Dalio, 2021, p. 63.

For the sake of simplicity and of clarity towards the focus of this research, the classifications of the subgroups of determinants (“The Three Big Cycles”, “Other Determinants [Eight Key Measures of Power]” and “Additional Determinants”) was not transcribed to the map. (Dalio, 2021)

Lastly, from this research, this thesis was able to support even further the idea of dominating entities as the ones dictating the dynamic of discriminating, because, according to Dalio (2021), in the global level, among nations of today:

When individual countries have more power than the collectives of countries, the more powerful individual countries rule. For example, if the US, China, or other countries have more power than the United Nations, then the US, China, or other countries will determine how things go rather than the United Nations. That is because power prevails, and wealth and power among equals is rarely given up without a fight. (Dalio, 2021, p. 194)

2.2. Power dynamics

According to Liu (2017), “Power is the ability to make others do what you would have them do.”.

From Dalio’s (2021) statements about power being a strong indicator of potential imperialism and self-establishment of World Orders, a simplification of power definitions and sources is made in this subchapter with the objective of standardizing a power mapping in all levels of global, national, organizational and interpersonal discriminations.

Power has been defined by Liu (2017), in the civic arena, as originating from six main sources: physical force and the capacity for violence, wealth, state action, social norms, ideas and numbers.

According to Liu (2017), power functions in a constant flow, it either accumulates or decays, indicating that “if you aren’t taking action, you’re being acted upon.”, and it compounds, meaning that “Power begets more power, and so does powerlessness.”.

The power flows and sources mapped in this project have been better defined in the Table 2. (The author, 2022)

Table 2

Power sources definition by level

Sources of Power (Liu, 2017)	Global Level	National Level	Organizational Level	Interpersonal Level
Physical force or capacity for violence	Military strength	Military strenght	Private security and/or access to public security	Physical force or capacity for violence
Wealth	Natural resources Labor capacity Productivity	Taxes Labor capacity Productivity	Money	Money
State Action	Diplomatic structure Contact with foreign peoples	Rule of law	Access to read and change regulations	Having authority in the given context
Social Norms	Social Norms	Social Norms	Social Norms	Social Norms
Ideas	Technology	Information	Information	Knowledge
Numbers	Population	Population	Population	Persons

Note. More specifically, in each level of the discrimination maps, which are the power sources are being identified. The author, 2022.

2.3. Reality of Identities and Lived Experiences - Micro

“All the Women Are White; All the Blacks Are Men, But Some of Us are Brave” is the book title that, according to Crenshaw, illustrates the invisibility of interseccional marginalized identities such as black women, in this case. (Hull, 1982, as cited in Crenshaw, 1989, p. 139)

This section is dedicated to explore and understand how discriminatory practices affect persons. By doing so, this chapter intends to clarify the integrative concept of discrimination in the micro level, the discriminated individual, the lived experience of a person that carries in themselves different marginalized social identities and the specific challenges that come from these selves.

2.3.1. Intersectionality

The term coined by Crenshaw (1989) rose from the following analogy:

Discrimination, like traffic through an intersection, may flow in one direction, and it may flow in another. If an accident happens in an intersection, it can be caused by cars traveling from any number of directions and, sometimes, from all of them. Similarly, if a Black woman is harmed because she is in the intersection, her injury could result from sex discrimination or race discrimination. (Crenshaw, 1989, p. 149)

On the understanding that a lived experience may identify with multiple marginalized identities and that the overlap of these identities might impose specific challenges that would not exist outside of this overlap, this section of the research aims to clarify, according to Crenshaw (2021), the potential exclusions that a one-dimensional perspective of discrimination can cause.

Describing legal cases of companies that were able to argue in court inclusivity of race and gender when hiring black men and white women, as well as cases in which discriminated women’s complains were heard only in the realm of white women’s complains, Crenshaw (2021) exemplifies that black women were kept marginalized and unattended by the legal system and the organizations they participated in.

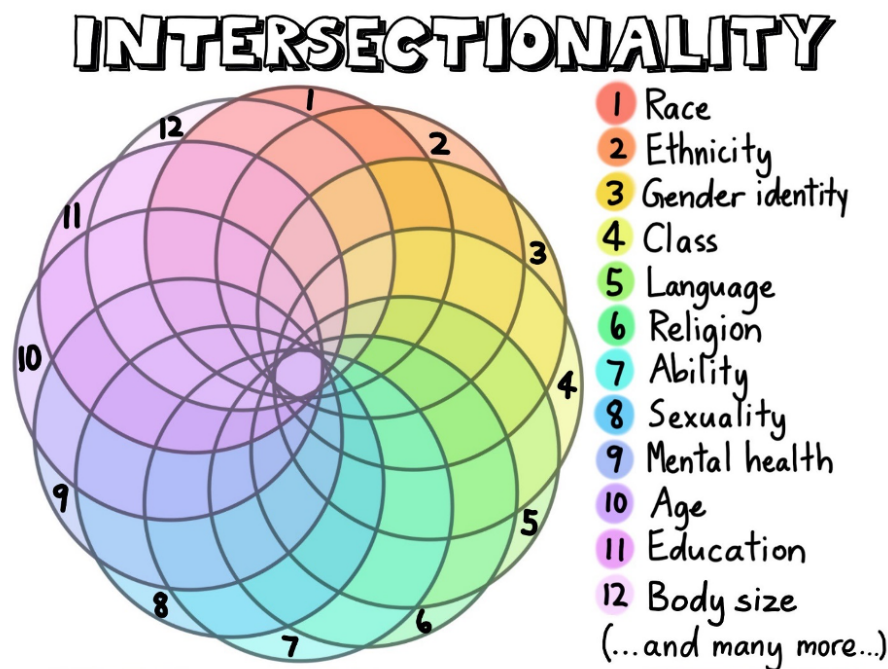
The relevance of the discussion and framework of looking at how the overlap of marginalized identities is still fundamental in current days (2022), is exemplified in the many news that mention refugees from the Ukraine war being denied shelter or impeded

from fleeing the country for being black (Bruno, 2022; Dovi, 2022). This case demonstrates that refugees marginalization was only mitigated when race was not accounted for. But the intersection of race and national status is not yet worthy of matter and assistance.

Two illustrations of how identities overlap a number of social constructs, Figure 21 (Duckworth, 2020), and which marginalized ones are peripheral to which normative ones, Figure 22 (Duckworth, 2020), demonstrate the discriminated identities envisioned in the journeys and informed the attempt of phrasing those journeys to describe potential discriminatory steps for all these possibilities.

Figure 21

Intersectionality



Intersectionality is a lens through which you can see where power comes and collides, where it locks and intersects. It is the acknowledgement that everyone has their own unique experiences of discrimination and privilege.

- Kimberlé Crenshaw -

@sylvia_duckworth

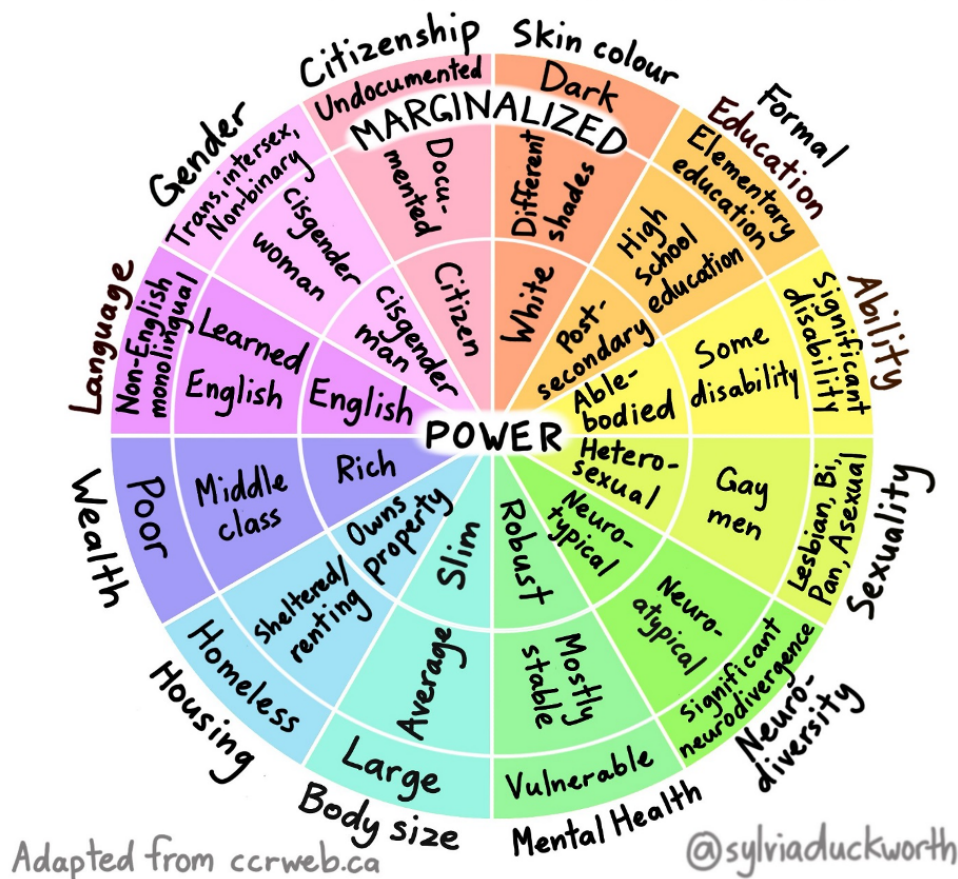
Note. In the graphic above, Sylvia Duckworth uses a Spirograph to illustrate the multitude of ways that social identities might intersect. The Spirograph is split into 12 overlapping circles, each numbered, connected to a specific social identity, and assigned a unique colour. To illustrate the intersections of the different social identities, where each circle intersects, a new shade of the original colour is visible (as would happen when mixing paint colours

together). At a glance the graphic shows all colours of the rainbow in different shades. The 12 social identities listed are: race, ethnicity, gender identity, class, language, religion, ability, sexuality, mental health, age, education, and body size. A quote from Kimberlé Crenshaw appears beneath the spirograph that reads “Intersectionality is a lens through which you can see where power comes and collides, where it locks and intersects. It is the acknowledgement that everyone has their own unique experiences of discrimination and privilege.”

Figure 22

Wheel of Power/Privilege

WHEEL OF POWER/PRIVILEGE



Note. Sylvia Duckworth’s Wheel of Power/Privilege organizes the various identities of a person on a wheel with the identities that hold the most power in our society placed at the center, and the identities that hold the least power in our society on the outskirts. The wheel is sectioned off into 12 categories, each marked by their own unique colour. In order of most powerful to least powerful, the text on image reads:

- Citizenship: citizen, documented, undocumented

- Skin colour: white, different shades, dark
- Formal education: post-secondary, high school, elementary
- Ability: able-bodied, some disability, significant disability
- Sexuality: heterosexual; gay men; lesbian, bi, pan, asexual
- Neurodiversity: neurotypical, neuroatypical, significant neurodivergence
- Mental health: robust, mostly stable, vulnerable
- Body size: slim, average, large
- Housing: owns property, sheltered/renting, homeless
- Wealth: rich, middle class, poor
- Language: English, Learned English, non-English monolingual
- Gender: cisgender man; cisgender woman; trans, intersex, nonbinary

Retrieved from ccrweb.ca

Given the author's acknowledgement of place of speech, where my own privileges and social identity are definitely preventing me from understanding deeper and more detailed steps of interpersonal discrimination, the resulting project is proposed as an initial draft of what a discriminated journey could be and stands as an open invitation for enrichment from volunteers that are willing to share more information or particular experiences.

2.3.2. *White Fragility*

According to DiAngelo (2021) we perceive differences and are taught and trained into the meaning of those differences. Stating that "We know that to be viewed as old is different from being viewed as young, rich is different from poor, able-bodied different from having a disability, gay different from heterosexual, and so on.", the literature argues on our nature of collectively building identities through comparison being conflicting with current days (2022) values of individuality and "unskilled at reflecting on our group membership". (DiAngelo, 2021, p. 10)

From DiAngelo's (2021) work it was possible to draw a series of often unintentional but still racist based attitudes that white people exercise under the frame of "White Fragility".

The research makes an important invitation for white people when saying that "Exploring our collective racial identity interrupts a key privilege of dominance—the ability

to see oneself only as an individual. We need to discuss white people as a group—even if doing so jars us—in order to disrupt our unracialized identities. (DiAngelo, 2021, p.89)

Still under the integrative objective of conceptualizing discrimination in the micro, whiteness became an important illustration of an umbrella to define and explain the discriminating entity commonality.

More specifically, the privileged characteristic of benefiting and holding power to transform the discrimination into legislation, for example, embedding it in systems, is the integrative definition of individual discriminating people.

According to DiAngelo (2021, p. 22):

Whites hold the social and institutional positions in society to infuse their racial prejudice into the laws, policies, practices, and norms of society in a way that people of color do not. A person of color may refuse to wait on me if I enter a shop, but people of color cannot pass legislation that prohibits me and everyone like me from buying a home in a certain neighborhood. (DiAngelo, 2021, p.22)

2.4. Journeys of discrimination

In this chapter it becomes possible to compile Table 3 (the author, 2022) that connects the elements of the discrimination system map to all the previously mentioned references.

Table 3

Main references informing the elements of Discrimination as a Service

Elements	Global Level	National Level	Organizational Level	Interpersonal Level
Cyclic Structure	Dalio (2021); Fatouros (1965)	United Nations (2020)	Williams (2021)	DiAngelo (2021)
Structure	Dalio (2021)	OECD (2019)	Porter (n.d.)	Coates (2007); DiAngelo (2021)
Discriminating Journeys	Dalio (2021)	Better (2008)	Williams (2021)	DiAngelo (2021);
Discriminated Journeys	Branch (2011); Burawoy (1992); Shoemaker (2015); Young (2012); Ziltener & Kunzler (2013)	Better (2008)	Williams (2021); Meyerson (2001)	Saterfield & Whitly & Kite (2006); Sue (2010)

Note. The author, 2022.

3. DEIB

Diversity, Equity, Inclusion and Belonging are combined in a variety of acronyms “D&I, DIB and DEI” that, according to Boden (2020), establish:

(...) a shared understanding of common vocabulary to facilitate difficult conversations, and support the work we all must do to create a world that works for everyone, regardless of race, gender, country of origin, ability, gender identity, sexual orientation, or any other classification that today renders us ‘other.’ (Boden, 2020)

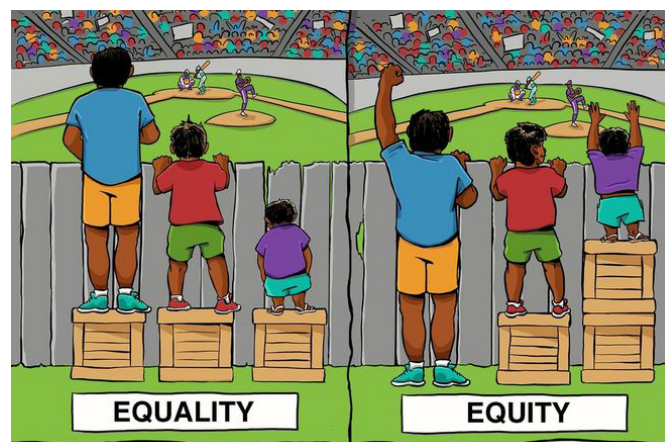
The continuous and interchangeable combination of these elements reflect the current society’s evolution in understanding these issues. Boden (2020) clarifies the concept of each element as follows:

Diversity refers to anything that sets one individual apart from another, including the full spectrum of human demographic differences as well as the different ideas, backgrounds, and opinions people bring. (Boden, 2020)

Equity is defined by “the fair treatment for all, while striving to identify and eliminate inequities and barriers.”. The differentiation of equity and equality was exemplified by the literature stating that “if I am helping all employees reach the top shelf of the supply room, I would give everyone access to the same height ladder, regardless of how tall they are.” (Boden, 2020). Another effective explanation of the concept and the difference between equity and equality can be seen in Figure 23 (A. & Interaction Institute for Social Change, n.d.).

Figure 23

Equality, Equity



Note. Retrieved from © Interaction Institute for Social Change | Artist: Angus Maguire

“Inclusion implies a cultural and environmental feeling of belonging and sense of uniqueness. It represents the extent to which employees feel valued, respected, encouraged to fully participate, and able to be their authentic selves.” (Boden, 2020)

And finally, belonging is described as “the experience of being treated and feeling like a full member of a larger community where you can thrive.” (Boden, 2020)

Given the clarifications, it can be understood that the four concepts described, diversity, inclusion, equity and belonging, are practices that oppose this thesis definition of discrimination, in different forms.

An important note from Boden (2020) is that “You can have diversity of representation without inclusion and inclusion without creating an environment in which everyone feels they actually belong.”; which exemplifies that DEIB are also independent concepts and practices.

The author’s understanding of DEI and belonging, drawn from the informed definitions, is that they suggest a path, a sequence that starts with a diverse perspective and goal, moves to an equitable relationship accommodating and responding to the acknowledged and fostered diversity, and finally includes this multitude in the core structure of the human organization.

In addition, the author states that only as a sequence of combined practices, DEI can achieve the goal of countering discrimination, and that belonging is the end result of that path.

This chapter is dedicated to, based on the shared perspective, organize study cases and initiatives that self-denominate DEI or variations into Table 4 (the author, 2022), displaying a critical review on how and what actions are being suggested as diverse, equitable and inclusive.

The following Tables 5 (the author, 2022) also indicates what level(s) of the human organization, among the ones defined in the first chapter of this thesis, are intentionally and directly impacted by the initiatives.

Table 4*Diverse, Equity, Inclusion and Belonging Initiatives Analysis*

Initiative	Summary	How does the initiative suggests that (1/2/3/4) should be addressed?			
		(1)Diversity	(2)Equity	(3)Inclusion	(4)Belonging
Microsoft Persona Spectrum (Microsoft Inclusive Design, 2018)	A toolkit and a methodology to drive DEI mainly combatting and addressing the racial and gender discriminations	By focusing and designing with/for people with disabilities	Define the diversity of people's abilities as something to respond to with proper and specific design that will provide these people with conditions to perform their full potential. Also, the argument is that doing so is better design, it's useful for other situational disabilities	Inclusion of people's diverse abilities into consideration from the beginning of the process and not only as final consumers	NA
BCG DEI (Diversity, Equity, and Inclusion, n.d.)	A toolkit and a methodology "to create better, more inclusive services for everyone"	By "Attracting a strong pipeline of candidates from groups that have been historically underrepresented, such as women or minorities, is critical—especially in industries that have struggled retaining such groups"	By shifting the historically offered benefits and policies to working mothers to reach a much broader segment of the workforce, redefining diversity to target caregivers—individuals (including men and nonbirth parents) caring for children, an elderly parent, or an ailing spouse."	By, "Systematically create high-impact, holistic solutions that address employees' underlying needs"	NA
Ontario Inclusive Design Toolkit (Inclusive Design Toolkit, n.d.)	A tool to diagnose and understand contrast and color mismatches between web content and diifferent visual abilities	By acknowledging responsibility (job roles) and typical exclusions (marginalized identities), by gaining insight, deeper understanding, on particular exclusionist stories, by self-informing on legislation around accomodations	Through respectful interactions. Guidelines were suggested to provide different accomodations to different conditions of typically excluded identities and abilities	Through choices and behaviours. Guidelines were suggested to provide different attitudes and choices to include different conditions of typically excluded identities and abilities	NA
WebAIM: Contrast and Color Accessibility (WebAIM, 2021)	NA	By acknowledging and informing about different degrees of visual abilities	By providing a tool to diagnose and mitigate the mismatch between a color contrast and the user's ability	"By ""providing services and training to organizations and individuals; developing accessibility evaluation tools; creating instructional materials and resources fostering an active online community; engaging in research, and participating in policy dialogues and processes.""	NA
Wave Web Accessibility evaluation tool (Site-wide WAVE Tools, 2001)	A tool to diagnose and obtain an Automated Accessibility Score based on WAVE data, and a Manual Accessibility Impact Score based on expert manual testing.	By acknowledging and informing about different degrees of visual abilities	By providing a tool to diagnose and mitigate many mismatches between visual elements of a webpage and the user's ability to navigate them	By being made available as a free community service by WebAIM at Utah State University.	NA
Inclusive Design Toolkit (IDT Home, 2017)	A toolkit and a methodology to reduce exclusion of people with disabilities	By acknowledging and informing about different degrees of physical and mental abilities	By suggesting that designed solutions should address the exclusions calculated by the tool	By suggesting that considerations of potential exclusions should be made prior to implement a design solution	NA
The Equity Lab (The Equity Lab, n.d.)	"The Equity Lab works with organizations and individuals who are committed to engaging in the serious, difficult, and deeply necessary work of antiracism."	"By developing an understanding of identity and historical and cultural contexts, our partners are empowered to become agents of progress in their personal and professional spheres."	They "support individuals and institutions as they take on our most intractable race, equity, diversity, and inclusion (REDI) problems, accelerating transition towards a more liberatory, community-centered society that values the gifts and potential of all of its members."	Through "engagements, fellowships, institutes, and open-source materials," they "build individual and collective will, skill, knowledge, and courage to interrupt racial inequities."	NA
Global Decolonization Initiative (Sarkar, 2020)	"The Global Decolonization Initiative promotes the study of decolonisation as an ongoing social, cultural, political, and intellectual process to understand in specific ways how colonialism and empire have shaped our contemporary economic and social worlds."	E.g.: In 2021 they "hosted a series of online workshops with Indigenous students of Nuclear Princeton, to discuss disenfranchisement and dispossession created by nuclear sites across the world."	By "Fostering collaborative student research", "especially encouraging undergraduate students towards publications and seminar presentations."	By giving visibility to indigineous communities issues	NA
Accenture ID&E initiatives (The Culture Makers, n.d.)	Consulting services that "combine ID&E and industry expertise with advanced analytics to help organizations advance inclusion, diversity & equity." "(...)areas of focus include gender, ethnicity, LGBTQ+, religion, persons with disabilities and cross-cultural diversity."	By "Identifying new talent pools, to skill, advance, and retain a diverse workforce."	"Providing fair and supportive career pathways to give all people equal access to opportunities.", Pay equity internal programs.	"Innovating through inclusive and accessible design, enabling more to engage and prosper." Accenture's Accomodation Support Tool for employee's with disabilities	"Instilling mindsets and behaviors into an organization's DNA that cultivate an environment where all people belong, are valued, and empowered."
The Algorithmic Justice League (Algorithmic Justice League - Unmasking AI Harms and Biases, n.d.)	"An organization that combines art and research to illuminate the social implications and harms of artificial intelligence." Focused on how "AI systems can perpetuate racism, sexism, ableism, and other harmful forms of discrimination, therefore, presenting significant threats to our society - from healthcare, to economic opportunity, to our criminal justice system."	By "highlighting critical issues in commercial systems" that perpetuate and/or enhance mainly racial and gender bias in AI and being a diverse team	By generating "awareness about the harms in AI, and amplify the voice of marginalized communities in today's AI ecosystem." through art and research	"focused on shifting industry practices among those creating and commercializing today's systems."	NA

Note. The content available in this table was also pre-selected based on an overall criteria of initiatives that approached a variety of exclusions, but not necessarily all the ones pointed out as marginalized identities.

Table 5*Diverse, Equity, Inclusion and Belonging Initiatives in Different Levels of Human Organizations*

Initiative	Summary	Does this initiative directly informs the intention to change the dynamic of discriminating in the (a/b/c/d) level?			
		Global Level(a)	National Level(b)	Organizational Level(c)	Interpersonal Level(d)
Microsoft Persona Spectrum (Microsoft Inclusive Design, 2018)	A toolkit and a methodology to drive DEI mainly combatting and addressing the racial and gender discriminations	NA	NA	Partially, as people with disabilities are described as essential to be involved in the development of the product/service but doesn't orient specifically how to design with these people.	Yes. It informs that addressing the mismatches between disabilities and the products and services designed is fundamental to give people with disabilities an equitable access to the entire world of information, and educates fully abled people on how to look at this social construct
BCG DEI (Diversity, Equity, and Inclusion, n.d.)	A toolkit and a methodology "to create better, more inclusive services for everyone"	NA	Partially, through the sub-initiative of supplier diversity. "BCG's supplier diversity consulting team works with organizations to build inclusive strategies for advancing supplier diversity, to strengthen their competitive position, and to use their business to address inequity."	Yes. It is focused on measuring and frameworking organizational culture to support diversity, equity and inclusion.	Yes. Contextualized in the workplace it guides leadership to address, include and continue to push the diversity in the workforce and career advancement.
Ontario Inclusive Design Toolkit (Inclusive Design Toolkit, n.d.)	A tool to diagnose and understand contrast and color mismatches between web content and different visual abilities	Partially. Although immigrants were acknowledged as potentially and typically excluded people, there are no guidelines on how the interaction among countries should be, to address this.	Yes. The guidelines suggested include considerations in the societal realm of verifying and complying to legislation	Partially. It is suggesting and orienting organizational practices to support diversity, equity and inclusion between organizations and their consumers, but not inside organizations	Yes. It is focused on giving actionable guidelines on how to behave properly to accommodate diverse and typically excluded identities and degrees of abilities
WebAIM: Contrast and Color Accessibility (WebAIM, 2021)	NA	Partially. There's a clear statement on addressing web accessibility internationally, but not addressing the differences of the accessibility itself among nations and/or other discrimination between countries	Yes. The affiliations with universities and the National Center on Disability and Access to Education suggest that this mismatch within the society and between the society and government becomes addressed	Yes. The services provided include training and technical assistance and consulting for organizations to achieve accessibility goals internally	NA
Wave Web Accessibility evaluation tool (Site-wide WAVE Tools, 2001)	A tool to diagnose and obtain an Automated Accessibility Score based on WAVE data, and a Manual Accessibility Impact Score based on expert manual testing.	NA	Partially. From the societal perspective, yes. But it is also mentioning disassociation of government "The contents of this tool do not necessarily represent the policy of the Department of Education, and you should not assume endorsement by the Federal Government."	Partially. It is suggesting and orienting organizational practices to support diversity, equity and inclusion between organizations and their consumers, but not inside organizations	NA
Inclusive Design Toolkit (IDT Home, 2017)	A toolkit and a methodology to reduce exclusion of people with disabilities	NA	Partially, it indicates exclusions in the national level but it does not indicate governmental actions to be taken	Partially. It is suggesting and orienting organizational practices to support diversity, equity and inclusion between organizations and their consumers, but not inside organizations	NA
The Equity Lab (The Equity Lab, n.d.)	"The Equity Lab works with organizations and individuals who are committed to engaging in the serious, difficult, and deeply necessary work of antiracism."	NA	"We're taking on the nation's biggest challenges of individual, institutional, and systemic inequity."		
Global Decolonization Initiative (Sarkar, 2020)	"The Global Decolonization Initiative promotes the study of decolonisation as an ongoing social, cultural, political, and intellectual process to understand in specific ways how colonialism and empire have shaped our contemporary economic and social worlds."	Yes.	Yes.	NA	NA
Accenture ID&E initiatives (The Culture Makers, n.d.)	Consulting services that "combine ID&E and industry expertise with advanced analytics to help organizations advance inclusion, diversity & equity." "(...)areas of focus include gender, ethnicity, LGBTQ+, religion, persons with disabilities and cross-cultural diversity."	Partially. There's global range, mention of tailoring compensation to the markets where people work and live, but no mention of addressing inequalities between countries.	Yes. Co-creating purpose-driven solutions that strengthen communities and build a more inclusive, equitable society.	Yes. "Inclusive workplace & business process. Designing business practices and policies that provide employees and partners with the access and opportunities to succeed."	"Instilling mindsets and behaviors into an organization's DNA that cultivate an environment where all people belong, are valued, and empowered."
The Algorithmic Justice League (Algorithmic Justice League - Unmasking AI Harms and Biases, n.d.)	"An organization that combines art and research to illuminate the social implications and harms of artificial intelligence." Focused on how "AI systems can perpetuate racism, sexism, ableism, and other harmful forms of discrimination, therefore, presenting significant threats to our society - from healthcare, to economic opportunity, to our criminal justice system."	Partially. There's global impact intention, but no mention of addressing inequalities between countries.	Yes. "galvanize researchers, policymakers, and industry practitioners to mitigate AI bias and harms."		NA

Note. The content available in this table was also pre-selected based on an overall criteria of initiatives that approached a variety of exclusions, but not necessarily all the ones pointed out as marginalized identities.

Based on the formerly presented tables, the author can reinforce this thesis argument that anti-discriminatory initiatives are fragmented efforts in the sense of either focusing on some marginalized identities or some levels of the human organization.

This argument does not intend to criticize neither invalidate any of the mentioned initiatives. On the contrary, their existence is fundamental and inspiring to understand societal efforts of acknowledging its exclusions and counteract them.

The insight that emerges from this part of the research is that a higher-level overview of whom the initiatives are focusing on to demarginalize and which level of the human organizations they intend to impact is missing. The mentioned overview could guide our decision making about which intersectionalities and which levels are getting more attention or none at all.

4. Service Design

The tools chosen to communicate the intended integrative perspective and approach of discriminatory and anti-discriminatory efforts, described in the former chapters, belong to the field of Service Design.

Fisk et al. (2018, p. 835) stated that the field of service design, along with its methods' and tools' evolution and complexity, have improved its ability to address the unfairness provided by services and labelled by the same paper as "service exclusions".

In addition, according to Holmlid, Wetter-Edman, and Edvardsson (2017) and Sangiorgi (2011) (as cited in Vink & Koskela-Huotari, 2021, p. 2), there has been an increase in academic acknowledgment of service design as a "transformational force within social systems".

Nevertheless, when looking at the design field anti-discriminationary efforts, the literature presents important critiques. For instance, about the endeavours around design and decolonisation, which multi-disciplinarily focuses on reversing or opposing effects of the European colonisation, Ansari (2020, p. 1) questions in their sense:

(...) that much of what passes for 'decolonising design(s)' would either not qualify as such, or, perhaps as problematic, make ontological, epistemic, political and praxical claims of decolonisation that are incommensurable in their generalization and application across different contexts across the globe, and may therefore actually undo the work of decolonisation in those contexts. (Ansari, 2020, p. 1)

The research also points out a needed accountability to the field of design by highlighting Lindsay Cochran's statement of how "social workers see the impact of bad design and bad policies." (as cited in Dietkus & Service Design Network, n.d.).

In addition, Vink & Koskela-Huotari (2021) state that service design methods achieve their potential for transformation partially due to their ability to improve reflexivity in people. Consequently, it is emphasized that the reflexivity enabled by service design is fundamental to foster its transformative potential.

Therefore, this chapter investigates in its first section, papers that advocate both to the use and to the caution needed in order to employ service design towards inclusive practices and social impact responsibility. Afterwards, it identifies the foundational framework of the resulting project and introduces its methodology.

4.1. Can Service Design Approach such problems?

As already stated in the first and second chapters of this thesis, the “such problems” mentioned in this title are an integrative service and system design overview of structural discriminations and anti-discriminatory actions in human organizations.

This sub-chapter collects, through a purposely diverse set of literature, perspectives from the design field in general, that discuss, highlight and criticize design’s endeavours and capabilities in tackling social issues.

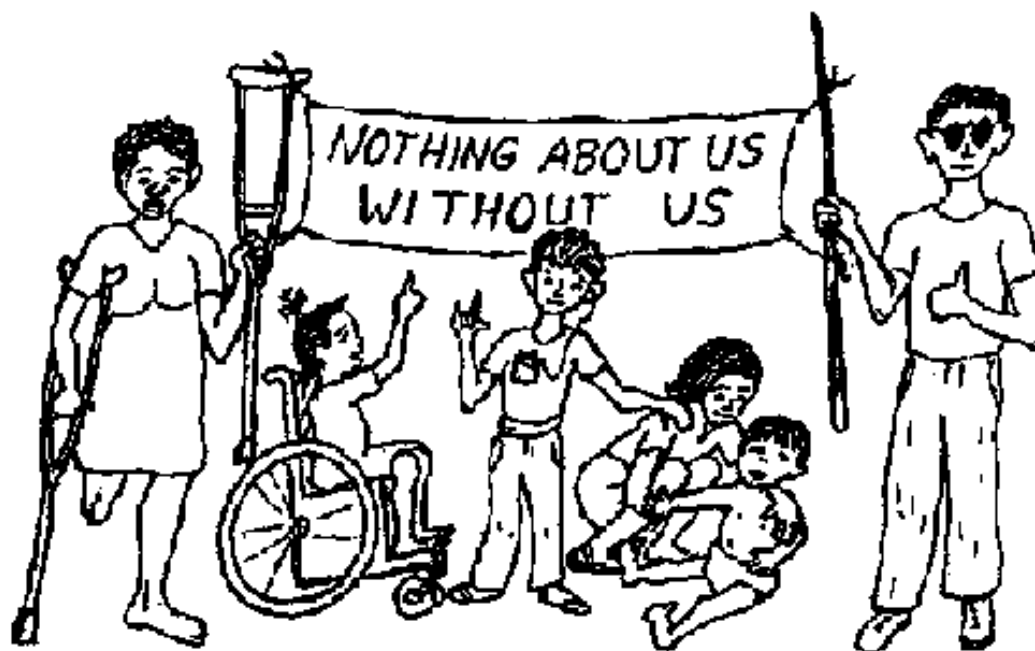
Starting from Fisk et al. (2018), the acknowledgement and acceptance of a history of unfairness in services, labelled by the authors as “service exclusion”, “occurs when services (service providers or service systems) deliberately or unintentionally fail to include or to adequately serve customers in a fair manner.” (Fisk et al., 2018, p. 835).

The problems related to service provision were outlined numerically by Fisk et al. (2018, p. 835) when the research mentions that “With more than 7bn humans on our planet, there are far too many unmet human needs associated with services and service systems.”; and have been qualitatively indicated by Ansari (2020, p. 1), in regards to knowledge production around decolonisation, when the literature mentions a lack of “questioning who, who for, and where from, writes and speaks”.

In addition to that, design and its product development cycles fail to include the very diversity they try to serve and, by doing so, they too often fall into the category of consequence of a discriminatory system. This understanding of “Nothing about Us without Us” (Werner, 1998, as cited in Costanza-Chock, 2020, p. 69) as a design practice, illustrated in Figure 24 (Werner, 1998), is the base upon which the design justice initiative and many co-design methodologies find reason and purpose. (Costanza-Chock, 2020)

Figure 24

Nothing About Us Without Us: Developing Innovative Technologies. For, By and With Disabled Persons



Note. Retrieved from MaguireCover illustration for “Nothing About Us Without Us: Developing Innovative Technologies. For, By and With Disabled Persons” by David Werner, 1998, <https://www.dinf.ne.jp/doc/english/global/david/dwe001/dwe00101.html>

Further into the discourse around diversity, whether in the identities of designers employed as professionals and/or in the identities of lead and end users of designed products, Costanza-Chock (2020, p. 99-101) recommends and stands for a multiple front action.

Firstly, one in which they call for design firms to continue or “develop inclusive hiring and retention plans, publicize specific targets and dates for staff, leadership, and board diversity, adopt best practices in accountable community partnerships, and share profits and credit with community partners.” (Costanza-Chock 2020, p. 99)

Secondly and further, it advocates for accountability from the designers and design teams to understand themselves at service of communities and not the other way around. This matter translates to perceive, direct and actively give control to the people with the lived experience that is being changed. The same issue also stands on practising the numerous and aligned approaches such as “human-centered design, participatory design, and codesign, among others.” (Costanza-Chock 2020, p. 100)

Finally, according to Costanza-Chock (2020) and relying on Dubois (1932, as cited in Costanza-Chock, 2020, p. 208) the educational goal of Black designers, as exemplified, but design in general, as contextualized, should focus more on the question of whether its ultimate object is to make people good professionals, or to make professionals good people. In conclusion, both were described and hoped for and possible, arguing that “design pedagogies that promote critical thinking are not incompatible with the development of practical design skills.” (Costanza-Chock, 2020, p. 209)

Expanding the discussion to the realm of global discrimination, according to Ansari (2020), decolonising design is described in the referred publication as having a “near-total Anglo-European hegemony over global design discourse and knowledge production and dissemination at this time.” (Ansari, 2020, p. 1)

The latter statement advances Ansari’s (2020) fears of a potential premature definition of decoloniality made by the academia’s haste into answering to its issues without properly considering the plurality of the question and, consequently “actively undermining them across different contexts around the world.” (Ansari, 2020, p. 2)

Beyond the concepts, Ansari (2020) also alerts to the fact that the designer’s claims of being able to speak for and to their marginalised cultural heritage community, materialise it, but not necessarily share its context. The marginalisation itself imposes a dangerous and falsely homogeneous idea that denies how “multiple, plural, and situated decolonial politics and praxis could be” (Ansari, 2020, p.3).

Another interesting point raised by Ansari (2020) is the paradox of acknowledging European colonialism in the very attempt to dismantle its remains and, by doing so, reinforcing or highlighting the narrative of a World History in which this event and storytelling of this period was the singular and most important one.

To the former and in summary, Ansari (2020) partially describes the History of India’s decolonization and throughout comparisons and philosophical addressing of subaltern’s possibility of historicising, the study concludes by stating that:

What then becomes possible is a true decolonisation of thought and action enabled by a double reflexivity, one that does not glorify or aspire to Anglo-Eurocentric coloniality, but also does not fall into the tendency to glorify or aspire to a romanticized past. What becomes possible is an awareness that decolonisation is, at the end of the day, messy work, unclear, fraught with pitfalls and traps that

can only be avoided with a careful attentiveness to one's own subject position in relation to the people and places it speaks for. (Ansari, 2020, p. 12)

It is then understood by the author, that such “messy work”, mentioned by Ansari (2020, p.12), might not necessarily translate to what design practice have become known for: its material outputs. In order to discourse on what these outputs have become, when design addresses societal structures, the sub-field named Strategic Design, defined by Hill (2012), is described to be:

(...) focused on the systemic redesign of cultures of decision-making at the individual and institutional levels, and particularly as applied to what we can think of as the primary problems of the 21st century — health-care, education, social services, the broader notion of the welfare state, climate change, sustainability and resilience, steady state economic development, fiscal policy, income equality and poverty, social mobility and equality, immigration and diversity, democratic representation and so on. (Hill, 2012, p. 9-10)

From the established focus, a different product of the design practice rises, but one which, according to Hill (2012), is still classifiable as “matter”, and that only became abstract, as the moment of conclusion of consultancy projects and deliverable reports, which are similar to a building being the product to the architecture.

But Hill (2012) discusses an additional design production, one that he names “dark matter” and that is fundamental and yet undermined. Through a case study of renewing Newcastle, Hill (2012) points out to the fact that designing a transformation did not require physical infrastructure but legislative adjustment towards a potential new economy. And that this previous “immaterial” moment of a project that had its deliverables, is indeed and in addition, a valuable and real product of design practice. In Hill's (2012, p. 43) words, “A tweak to the soft infrastructure, the dark matter, surrounding the physical reality of Newcastle had unlocked the latent possibilities in the city centre.”. (Hill, 2012, p. 43)

After situating matter and dark matter as both fundamental and interchangeable starting points to design and transformation, Hill (2012) suggests that designers who are familiar with systems, such as landscape designers, industrial designers and service designers, are possibly best equipped with “systems thinking”, “a core skillset, a core requirement”. (Hill, 2012, p. 45)

It is then, after analysing and discussing design positionality in regards to contexts and

advocating throughout design's ability and purpose of working in between observable matter and dark matter from within cultures, that Hill (2012) mentions the integrative property of design.

Relying on Hill's (2012) argument and conclusion that strategic design is able, interested and in need to deep-dive into decision-making cultures across the globe, once again it becomes understood that this discipline can and should address social change challenges such as the one in this research.

Also in the design field, but now narrowing down to the specific discourse about service design's possibility to tackle this thesis' research theme, the sub-discipline's description from Morelli et al. (2021) established three logical levels presented as the result of the evolution of the service design.

The description of Morelli et al. (2021) provide, when mentioning services in different levels of human organizations, an additional theoretical base that can support this thesis argument that service design is able to address the invisibility of discriminatory practices and their complexity:

1. Service as interaction between two or more people, characterised by unbalanced roles between server(s) and served (e.g. a nurse and a patient).
2. Service as an infrastructure that supports a certain kind of (service) activities (e.g. the hospital in which the interaction happens and its related organisation).
3. Service as a systemic institution (e.g. the institutional system of healthcare laws, the organisation of the healthcare system and the related scientific, technical and organisational knowledge) that organises the activities and processes.

(Morelli et al., 2021, p. 12)

The three levels described above also connect with this research's interpretation of levels that originated in the literature review on discrimination and reinforce the parallel between service design's understanding of social structures and systems being in its scope of action as well as in the reach of it's capabilities.

On that note, Vink & Koskela-Huotari (2021) warn that "The mere adoption of methods, without understanding the underlying principles that guide their use, cannot produce the transformative outcomes for which they were developed initially." (Vink & Koskela-Huotari, 2021, p. 1). Therefore, the following section discourses on how service design can approach such problems.

4.2. How can service design approach such problems?

This sub-chapter collects service design best practices that self-declare involved and with the aim of addressing societal

Fisk et al. (2018) argue that four pillars constitute service inclusion and are key

to achieve it: “enabling opportunities, offering choice, relieving suffering and fostering happiness.” (Fisk et al., 2018, p. 843)

The literature presents and highlights practical applications of such principles in the service offer and, in Table 6 (Fisk et al., 2018), from which it is possible to relate these fundamental concepts to real-life applications. (Fisk et al., 2018, p. 844)

Table 6

Definitions and examples of the four pillars of service inclusion

Pillar	Definition	Inclusive Practice Example
Enabling opportunities	Empowering people by providing access to services and the ability to receive and co-create valued services	Kiron University based in Germany gives refugees access and the ability to use higher education. To do so, it partners with other universities that produce online courses. It also provides an online social and professional network where refugees can meet others facing similar challenges (Heilpern, 2015)
Offering choice	Providing people with viable choices between different service offerings, along with giving people the choice to opt out of services should they desire	Pure Gym, a multi-site gymnasium in the UK, is a low-cost gym that does not lock consumers in via contract (Williams-Grut, 2018), an exclusionary practice that is common in the fitness industry
Relieving suffering	Providing fair access to essential services that fulfill basic human needs (e.g. the need for water, food, and shelter) in diverse service contexts (Nasr and Fisk, 2018)	Global healthcare firm Vestergaard is devoted to improving the health of vulnerable people mostly living in developing countries; for example, by ensuring that all people have access to clean, safe drinking water. This is vital for the 780m people who do not have access to reliable drinking water, leaving them at risk of diarrheal disease, which kills over 1.5m people annually (Vestergaard, 2014)
Fostering happiness	Encouraging people to experience the pleasure that services can provide (hedonic well-being). This includes cocreating “happy” service interactions by welcoming and accommodating all consumers within a positive environment	Zoos Victoria (2015) in Australia provides fully accessible public toilets with change tables and hoists for people with severe or profound disability. This gives all people a chance to enjoy a day out at the zoo

Note. Retrieved from “Design for service inclusion: creating inclusive service systems by 2050”, by Fisk, R. P., Dean, A. M., (née Nasr), L. A., Joubert, A., Previte, J., Robertson, N., & Rosenbaum, M. S., 2018, *Journal of Service Management*, 29(5), p. 844.

Furthermore, it is recommended by Fisk et al. (2018) that the approach towards service inclusion relies on a multi-level method and/or tool that draws a service system in three levels: “service concept, service system and service encounter” (Fisk et al., 2018, p. 846); the former advice is also accompanied by the indication that applying the mentioned methodology allows a more comprehensive and higher understanding of the systems and interactions of/around services. (Fisk et al., 2018)

There is then, in the literature, the mention of the hierarchical levels in which, firstly and being the highest level, the “service concept” is determined through its context, the position of the service in regards to the context, and the network value it consequently presents. Secondly, it is said that from the concept, firms develop the “service system” that entails a “configuration of people, technologies and other resources” (Patrício et al., 2011, as cited in Fisk et. al, 2018) deployed through decision making by the firm and affecting the consumers’ possibilities and choices. Thirdly and lowest, the service encounter consists of the moments in which the final consumer, the beneficiary, interacts directly with the service providers through the touchpoints offered, details of settings and participants roles. (Fisk et al., 2018, p. 846-847)

Lastly, Fisk et al. (2018) loop back to the “nation-state service systems” reminding that “On a broad level, nation-state service systems constitute the basis of any consumer’s value constellation (the networks, relationships and resources), that determines the extent to which the four pillars of service inclusion can be realized.” (Fisk et al., 2018, p. 848)

By casting a light to the economic institutions of a nation, Acemoglu and Robinson (2012, as cited in Fisk et al., 2018) acknowledge extractive and inclusive forms of the national economic institutions to operate and, discoursing on the effects of each form, it is explained that “The fundamental reason that nations fail is because their economic and political systems are designed for extraction.”. (Fisk et al., 2018, p. 848)

Fisk et al. (2018) then, emphasizes governmental responsibility of designing or transforming current service systems and the impact that national level services have onto the goal of service inclusion, and, beyond that, highlights the importance of service research in understanding how to move to the mentioned scale. (Fisk et al., 2018, p. 848)

Further along, arguing that service design adoption, although positively widespread as a driver for transformation in both organizational and academic realms, risks to become ineffective if not fueled by reflexivity, and even harmful as it might “impose one dominant culture on others”, Vink & Koskela-Huotari (2021, p.1) present a framework that exhibits service design methods as materials to support change into institutionalized social structures. (Vink & Koskela-Huotari, 2021)

Categorizing the modes of reflexivity into six, the research follows through with its own objective of providing clarification of service context. In addition, Table 7 (Vink & Koskela-Huotari, 2021, p. 8-9) in the literature connects the main enabler of the referred reflexivities to their respective features, limitations, examples of service design tools and literature insights. (Vink & Koskela-Huotari, 2021, p. 7)

Table 7*Modes of Reflexivity Leveraged by Service Design Methods*

Mode of reflexivity	Description	Core enabler	Key constraints	Supportive service design methods (examples)	Key References ^a	Related insights
Temporal	Awareness of social structures through experience of duration between events	Contextual changes over time	Too little time to show contextual change	Customer Journey	Suddaby and Foster (2017)	Reflexivity can be aided by studying the history of institutionalized practices and ideas
				Horizon scanning Diary study Scenarios	Berger and Luckmann (1967)	Social structures are historically constituted
Material	Discernment of social structures through engagement with visuals and physical artifacts	Physical artifacts that prompt reflection on tacit knowledge	Too much focus on structure and deliverables	Make tools	Meyer et al. (2018)	Verbal and visual text have important roles in the institutionalization of social structures
				Mood board Desktop walkthrough Card sort	Raviola and Norbäck (2013)	Instantiations of social structures or artifacts can be used for people to develop their reflexivity
Corporeal	Perception of social structures through individual bodily experiences and emotions	Sensory experiences in an individual body that challenge habits or assumptions	Too much discomfort to meaningfully participate	Bodystorming	Creed, Taylor, and Hudson (2020)	Humans evaluate social structures through their sensory and embodied ways of encountering the world
				Observation	Ruebottom and Auster (2018)	Reflexivity involves overcoming emotional attachments to institutionalized social structures
				Empathy tools Service staging	Creed et al. (2014)	Shame plays a strong role in people's reflexivity
Relational	Appreciation of social structures through interactions of people	People's interactions that enable learning about personal differences	Power dynamics between people are too extreme	If I were you/ advocate	Hardy and Phillips (1999)	Communicative practices have an important role in reflexivity
				Personas	Suddaby, Viale, and Gendron (2016)	Relative positions of power between people influence the level of their reflexivity
				Dot voting Cocreation workshop	Archer (2013), Burkitt (2016)	Reflexivity occurs intermittently though emergent relational properties, joint actions, and interactive situations

Note. (continued)

Table 7 (continued)*Modes of Reflexivity Leveraged by Service Design Methods*

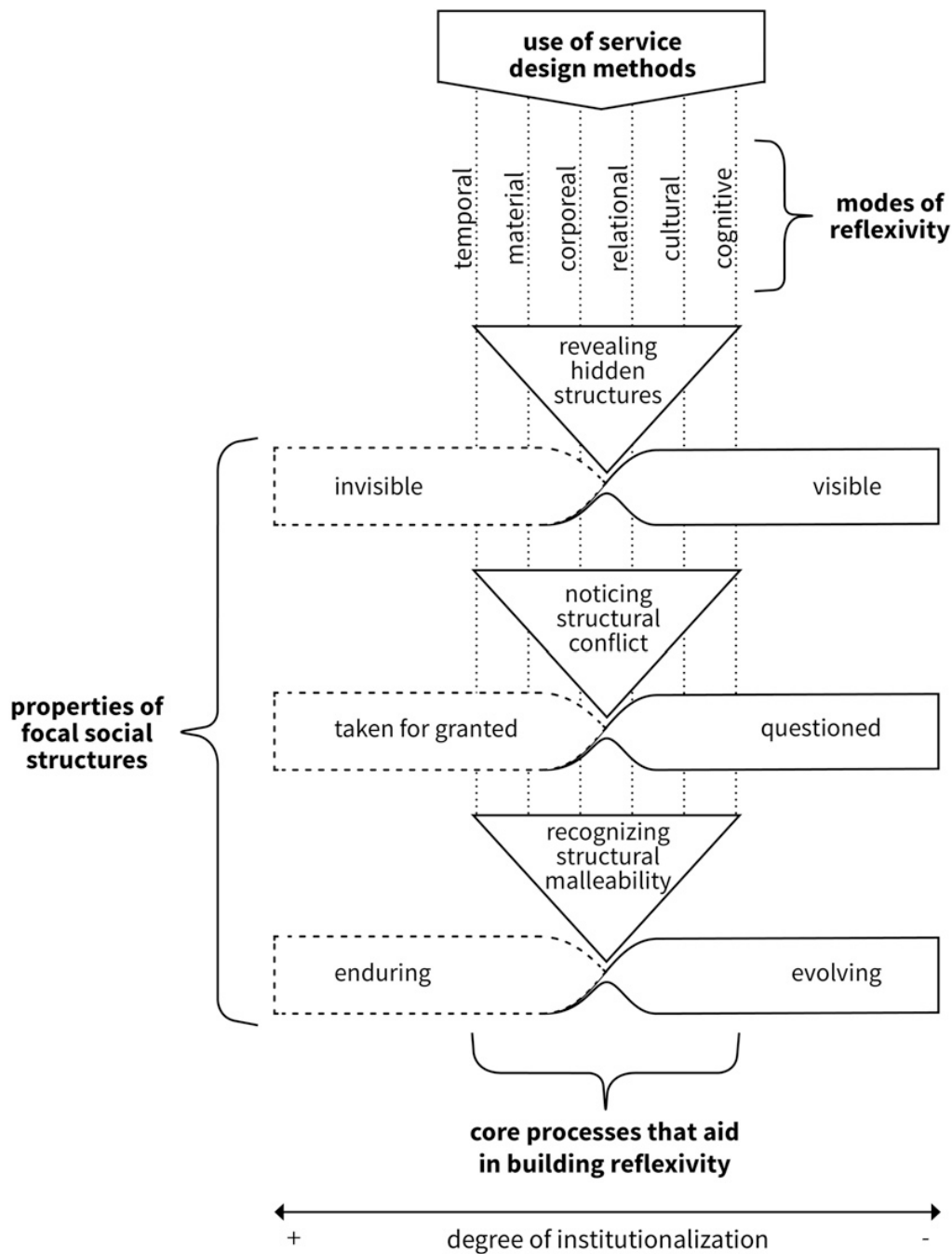
Mode of reflexivity	Description	Core enabler	Key constraints	Supportive service design methods (examples)	Key References ^a	Related insights
Cultural	Interpretation of social structures through customs and social behaviors of a particular group of people	Difference in group culture	Lack of culturally appropriate methods	Ethnography	Thornton and Ocasio (2008)	Multiple institutional logics offer prescriptions for people and awareness of multiple action toolkits
				Service blueprint	Donati (2011)	Reflexivity is part of cultural collectives of differentiated subsystems or spheres of society, such as the family, state, and market
				Day in the life Cultural probe	Mouzelis (2010)	Different cultural contexts offer distinct ways of being reflexive
Cognitive	Comprehension of social structures through reflections on inner thoughts	People's thoughts that challenge or conflict	Ideas too abstract or too complex to grasp	Metaphors and analogies Brainstorming Six thinking hats	Suddaby, Viale, and Gendron (2016)	People's cognition is essential to understanding how they overcome the constraints of embedded agency through reflexivity
				Five whys	Voronov and Yorks (2015)	Individual mindsets evolve, influencing how people comprehend the existence of social structures
					Mutch (2007)	Internal conversations can lead to awareness of conflicts with existing social structures

Note. a. As cited in Vink, J., & Koskela-Huotari, K. (2021). Retrieved from Vink, J., & Koskela-Huotari, K. (2021). Building Reflexivity Using Service Design Methods. *Journal of Service Research*, 109467052110350., p-7. <https://doi.org/10.1177/10946705211035004>

Consequent to the described reflexivity modes, Vink & Koskela-Huotari (2021) state that one, all or any combination of these modes can become the leverage used by service design to support the “core processes” that are the “means to erode institutional property” and consequently transform them. In Figure 25 (Vink & Koskela-Huotari, 2021, p. 6), Vink & Koskela-Huotari (2021) illustrate the framework proposed.

Figure 25

Integrative framework of the use of service design methods to build reflexivity



Note. Retrieved from Vink, J., & Koskela-Huotari, K. (2021). Building Reflexivity Using Service Design Methods. *Journal of Service Research*, 109467052110350., p-6. <https://doi.org/10.1177/10946705211035004>

Regarding the mentioned processes and their correspondent means to erode institutional property, “Revealing Hidden Structures”, the process of casting light and

consciousness to social structures, that “would otherwise remain tacit or unperceived”, explicits their unacknowledged existence and aid into realising their influence. Likewise, “Noticing structural conflict”, defined by recognising the social structures’ superposition and suggesting counter-actions to them, supports perception and recognition of multiple and conflicting social structures. The last and equally significant aspect of the mentioned erosion is “Appreciating structural malleability”, the process of understanding “social structures as impermanent and susceptible to change, allows the understanding of limits to apply such structures and make possible to interpret them as open and responsive to change. (Vink & Koskela-Huotari, 2021, p. 10)

Concluding the article, Vink, J., & Koskela-Huotari, K. (2021) significantly describe the potential and invitation for this framework to be questioned in different settings and logics from the one that produced it, the primarily Western Euro-centric one. Other key-points raised have been whether the context of building such reflexivity should be expanded and generalized or specified, and whether this starting point could base design methods that aim at challenging the reproduction of inequitable social structures. (Vink & Koskela-Huotari, 2021, p. 16)

In parallel to this discussion, Dietkus & Service Design Network (2021) approach a trauma-based model for change that reminds designers that “identities as designers (and the attachments we have to certain ways of doing design) play a huge role in both how and why we design.”. On the same matter the lecturer establishes that inner work to understand, as a professional, the means to research and produce experiences, is fundamental to build knowledgeable but careful partnerships, as well as transform experiences in the same manner. (Dietkus, 2022)

To the mentioned end, Dietkus (2021) warns that, for example, the design practice of performing interviews that might trigger traumatic experiences onto our partners, interviewed people, presents an ethical call and challenge for the design community to build knowledge around trauma responsibility. Sequentially, designers are advised to, in turn, build clarity around their personal values and purpose, combining both into a recommended “practice advocate” role. (Dietkus, 2021)

In addition, summarizing the indications to practice trauma-informed design, the lecture presents the following two sets of guides in Figure 26 (Dietkus, 2022) and Figure 27 (Infographic: 6 Guiding Principles to a Trauma-Informed Approach | CDC, 2020).

Figure 26

Values and Purpose that constitute Advocating Practices

Values + Purpose = Practice

SOCIAL WORKERS WHO DESIGN



Note. Retrieved from Dietkus, R. (2022, October 10). *SDN | Trauma-Responsive Design Research: A New Model for Change*. SDN. <https://www.service-design-network.org/chapters/new-york/headlines/trauma-responsive-design-research-a-new-model-for-change>

Figure 27

Infographic: 6 Guiding Principles To A Trauma-Informed Approach

6 GUIDING PRINCIPLES TO A TRAUMA-INFORMED APPROACH

The CDC's [Center for Preparedness and Response \(CPR\)](#), in collaboration with SAMHSA's [National Center for Trauma-Informed Care \(NCTIC\)](#), developed and led a new training for CPR employees about the role of trauma-informed care during public health emergencies. The training aimed to increase responder awareness of the impact that trauma can have in the communities where they work.

Participants learned SAMHSA'S six principles that guide a trauma-informed approach, including:



Adopting a trauma-informed approach is not accomplished through any single particular technique or checklist. It requires constant attention, caring awareness, sensitivity, and possibly a cultural change at an organizational level. On-going internal organizational assessment and quality improvement, as well as engagement with community stakeholders, will help to imbed this approach which can be augmented with organizational development and practice improvement. The training provided by CPR and NCTIC was the first step for CDC to view emergency preparedness and response through a trauma-informed lens.

Note. Retrieved from *Infographic: 6 Guiding Principles To A Trauma-Informed Approach* | CDC. (2020, September 17). https://www.cdc.gov/cpr/infographics/6_principles_trauma_info.htm

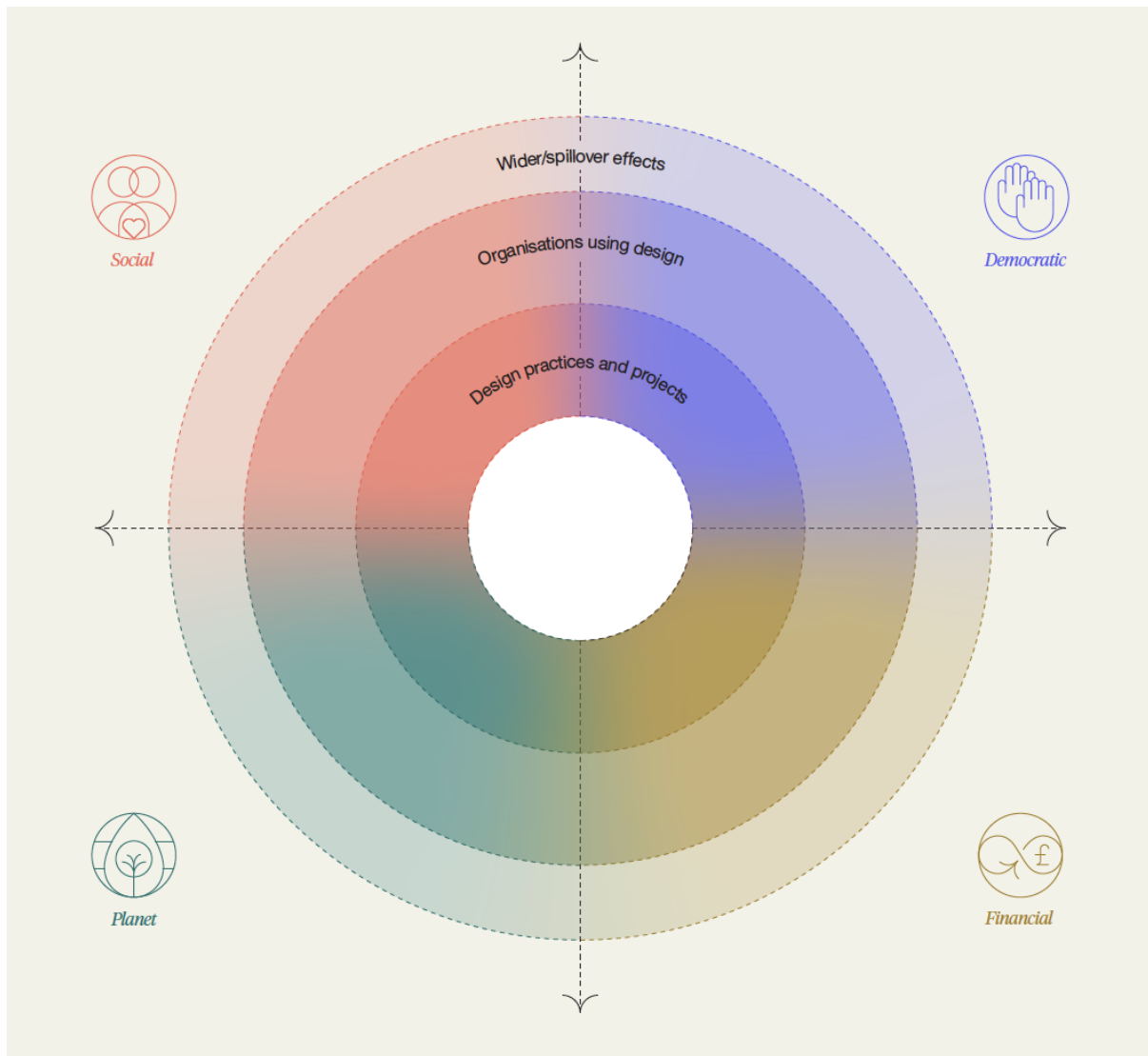
The connection between trauma-informed practices and research and this thesis is made through the understanding that systemic discrimination is a traumatic experience and has been described by the therapist Menakem, R. (n.d., as cited in Dietkus, 2022) as follows:

Trauma is a response to anything that's overwhelming, and that happens too much, too fast, too soon, or too long. It is coupled with a lack of protection or support. It lives in the body, stored as sensation: pain or tension — or is a lack of sensation, like numbness. It does not impact us all in the same way. Context is critically important. (Menakem, R., n.d., as cited in Dietkus, 2022)

Based on this description and the author's (2022) understanding of how fundamental it becomes to respectfully approach the personal experiences of discrimination as "life-long learners" (2022), as well as navigating the often paradoxal and conflicting roads of designing as partially marginalized and for partially marginalized, trauma-responsive practices in design becomes a shared plea to move towards anti-discriminatory action.

Into the realm of value, an equally significant framework has been presented by the Design Council (2021) to make visible, on a different level, and simultaneously steer the focus of design to its contribution and impact onto social, cultural, environmental and democratic domains. (Design Council, 2021)

Structured in a mapping and assessing approach, the framework intends to capture and measure positive and negative values of design projects on the formerly listed human societal domains. The two elements, the map and the table are presented as working prototypes in Figure 28 and Figure 29. (Design Council, 2021, p. 7-8)

Figure 28*Value Map*

Note. Retrieved from Design Council. (2021, p. 6-7). *Design Economy 2021, Scoping Project, Environmental and Social Value of Design*. https://www.designcouncil.org.uk/sites/default/files/asset/document/Design_Economy_2021_Papers_Paper_1.pdf

Figure 29*Value Assessment Table*

Design practices and projects				Organisations using design			
Design	Production	Lifespan	Wider/ spillover effects	Strategy	Operations	Infrastructure	Wider/ Spillover effects
Wider/ spillover effects	Wider impacts created by the design			Wider impacts created by the organisation			

Note. Retrieved from Design Council. (2021, p. 6-7). *Design Economy 2021, Scoping Project, Environmental and Social Value of Design*. https://www.designcouncil.org.uk/sites/default/files/asset/document/Design_Economy_2021_Papers_Paper_1.pdf

According to the Design Council (2021), the focus of past Design Economy reports on financial and economic contributions to assess this practice contribution was not corresponding to the realized value of society post Covid-19. The publication (Design Council, 2021) indicates that the two uses of this framework “build a holistic picture of the design economy’s impact and value.” (Design Council, 2021, p. 8)

Arguing in favor of measuring societal value of design projects and being explicit about aiming at these values, the Design Council (2021,) reinforces that “We need to chart what values we should hold in a more equal, regenerative future, which might be missing or undervalued today.” (Design Council, 2021, p. 11)

Beyond the already presented elements of the Design Value Framework, the three levels of detail of the Value Assessment Table (Figure 29, Design Council, 2021) are explained. The first level is described as the range of “...potential value that design can

create.”, the second is the containment of overarching relevant indicators of the organisation or project, and the third is a set of indicators for each of the Framework’s cells”. (Design Council, 2021, p. 11)

Further along, after presenting indicators for each level of the framework, the Design Council (2021) defines the four domains that emphasize the positive impacts of design.

The social-cultural domain refers to tangible resources and intangible ones, such as “skills, beliefs and relationships” that model the ways of living of a society and must become inclusive, aiming at marginalising no-one. (Design Council, 2021, p. 21)

The democratic domain is described as the set of “narratives, beliefs and actions” that contribute to how equality and mutual respect play out in an organisation, community and/or nation, and exemplifying its indicators, the report presents “the use of inclusive design processes, diversity of an organisation or project team, sense of empowerment in decision-making and degrees of transparency and accountability”. (Design Council, 2021, p. 21)

The Environmental domain communicates renewable and non-renewable resources that belong to the natural environment, for instance “air, climate, fresh water and land, and the way that these are not wasted, but re-cycled, re-used and regenerated through design activities; as well as the habitats that make up the planet’s eco-systems.”, and that can be indicated by carbon footprints, biodiversity net gain and the same nature of indexes. (Design Council, 2021, p. 21)

The Financial domain represents the assets and resources that support financial prosperity and resilience, which can translate into “ethical investment, wealth, employment generation and inclusive growth.”. Some of the respective indicators suggested are “social and environmental investment”, “adoption of alternative business and delivery models”. (Design Council, 2021, p. 21)

After clarifying the framework’s two internal levels and the four quadrants, “domains” in the Design Value Framework, four case studies are presented to discuss the difficulties that revolve predicting, measuring or even directly linking spillovers of one project. Nevertheless a set of categories to be further deepened into indicators were suggest as the following:

- Wider, or spillover outcomes (e.g. thriving communities, a regenerative economy)
- Changes in social practices, behaviours, mindsets and paradigms

- Changes to enabling conditions (e.g. policies or regulations, creating new infrastructure, making new resources available)
- Changes to relationships and dynamics (e.g. goodwill and trust, shift in power). (Design Council, 2021, p. 25)

Later, it is prescribed that businesses and design commissioners use this framework as both a self-assessment tool and a communication device of the respective values and noted that the indicators intend to function as suggestions and not as constraints. In addition it is reminded that the framework is not advised as a substitute for existing and regulatory frameworks. (Design Council, 2021, p. 33)

In conclusion, additional four case studies are presented as possible applications to the map and illustrate how the presented projects and initiatives can communicate their social value. (Design Council, 2021, p. 35-43)

4.3. Conclusion

In conclusion, the first sub-chapter provided an overview and criticism, through the definition of exclusion of Fisk et al. (2018) and Ansari's (2021) questioning of decoloniality, that discussed and answered, through Constanza-Chock (2020), Hill (2012) and Morelli et al. (2021), the first question of this research. Being such answer interpreted by the author as design being not only able but exercising different ways of addressing societal issues and enforcing intentional change towards inclusion.

In addition, the theoretical background presented in the second sub-chapter provided principles through the pillar's of Fisk et al. (2018), values and purpose through Dietkus (2012) trauma responsive call, guidelines and framework of how to exercise the mentioned intentionality of social transformation towards inclusion, through Vink & Koskela-Huotari (2021) and on which directions it should/could focus, through the Design Council (2021) impact assessment.

In the following chapter, the overall thesis methodology will be presented demonstrating this thesis application of this chapter's content.

5. Methodology

This chapter is dedicated to present this thesis' methodology, concluding itself before presenting the probing of solution.

“Creative confidence and Innovation of Meaning”, according to Dell’Era & Magnanini (2020), are understood as the latest stages of the design thinking approach.





Design thinking approach, as the umbrella methodology of the 2000s relied on the double diamond process of convergence and divergence of both the problem space and the solution space. Extremely popularized by IDEO and Tim Brown, the approach focused on a better solution that was the consequence of an equivalent effort and size process, in which analytical and intuitive thinking are applied to ideate and solve problems. (Dell’Era & Magnanini, 2020)

Dell’Era & Magnanini (2020) state that, in comparison and evolution, “sprint execution, creative confidence and innovation of meaning” rose in the last decade to add “executive, engagement and envisioning” to the methodology. (Dell’Era & Magnanini, 2020)

This thesis uses “innovation of meaning” as its main design approach for its problem space. This approach’s goals are, in prioritised order, firstly identifying and formulating a new vision, secondly developing a new product and/or service and thirdly designing new user experiences, Figure 30 (Dell’Era & Magnanini, 2020, p. 41).

Figure 30

Top 3 goals

				
1st relevant Goal	Designing new user experience	Designing new user experience	Increasing collaboration among stakeholders	Identifying and formulating a new vision
[1-7]	(5.9)	(6.0)	(5.4)	(5.9)
2nd relevant Goal	Developing solutions to a specific problem experienced by users	Developing new product and/or service	Engaging and motivating employees	Developing new product and/or service
[1-7]	(5.6)	(5.7)	(5.3)	(5.9)
3rd relevant Goal	Addressing a specific user need	Addressing a specific user need	Designing new user experiences	Designing new user experiences
[1-7]	(5.5)	(5.3)	(5.3)	(5.9)

Sample: 297 consulting projects

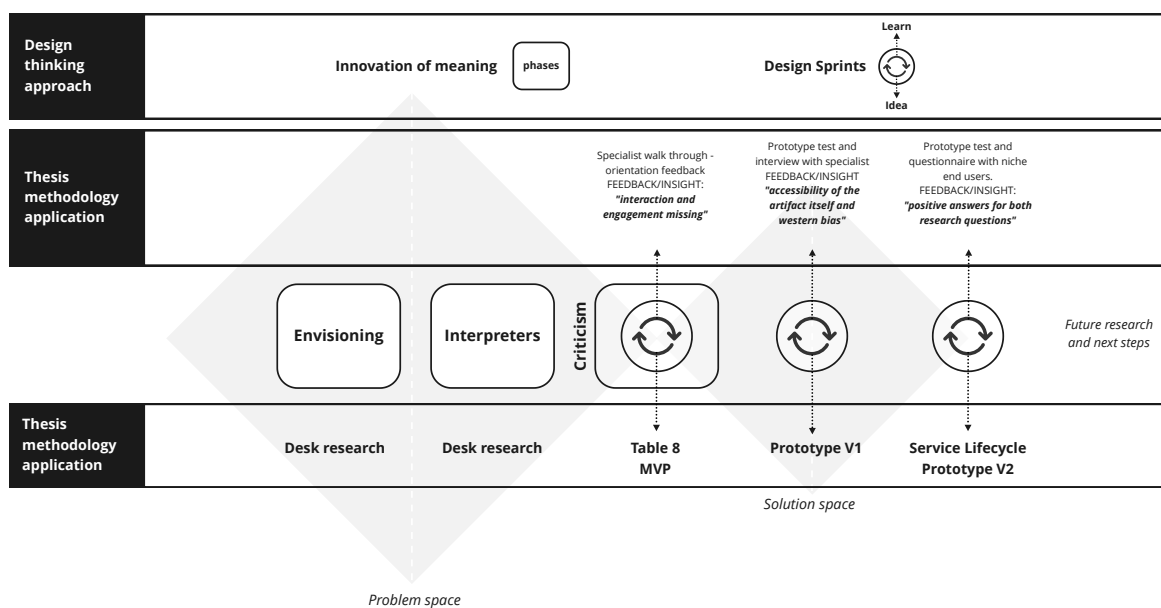
Note. Retrieved from Dell’Era, C., & Magnanini, S. (2020, p. 41). *Transformations of Design*

Thinking - From Creative Problem Solving to Sprint Execution, from Creative Confidence to Innovation of Meanings [Slide show].

As an inside-out process, the design approach starts with and prioritizes “envisioning new directions that aim at proposing meaningful experiences to people” (Roberto Verganti, n.d., as cited in Dell’Era & Magnanini, 2020, p. 4), goes through a criticism phase and then concludes with probing its value via prototype. The last two phases being intertwined and an iteration loop where the probing and the criticism can and should repeat itself. Illustrated in the following diagram, Figure 31 (the author, 2022), the overall process will be discussed in the following sub-chapters.

Figure 31

Methodology application: Design thinking - Innovation of Meaning and Sprint Execution



Note. The author (2020)

5.1. Innovation of meaning, envisioning (problem space divergence)

With the objective of building a meaningful new direction to approach discrimination, this research relied onto literature review to re-interpret the problem of discrimination and inequality.

From the insights gathered when investigating the discrimination issue and overall

concept, the desk research pointed out the fragmented and not yet consensus of the problem, demonstrating throughout the literature that discriminatory practices happen and are reprehended as the already mentioned “non-exhaustive lists of the grounds on which discrimination is to be prohibited.” (Altman, 2020). In addition, the literature revealed the structural nature of the practice of discrimination and multiple levels of human interactions in which it is exercised.

From the latter understanding, the insight of integrating the view of discriminatory practices into levels and into a system emerged, and the second round of desk research took place to finally construct the meaningful vision.

The second research stage investigated the integrative concepts of discrimination, and from the literature it was possible to identify two dimensions in which discriminatory practices connect: the intersectional human experience and the colonialistic structural origin. Based on these insight, it became possible to envision the overarching conceptual reframe of a missing integrative overview of discrimination.

Sequentially, the objective of the third round of desk research was answering the question of whether service and system design was capable of addressing this issue and how, initiating the convergence of the reframe that is described in the next sub-chapter.

5.2. Innovation of meaning, interpreters (problem space conversion)

As the latter mentioned, the desk research focused on understanding if design and, more specifically service design was able to approach such problems and how it could exercise its approach.

Literature diversity, counter-arguments and insights have been gathered to enforce the “interpreter phase” (Dell’Era & Magnanini, 2020, p. 25), although presenting limitations as the methodology of innovation of meaning suggests interpretation from stakeholders, while the nature of this paper is individual.

From the theoretical discussion around if and how service design could approach the integrated overview of the structure of discrimination, insights have been gathered and summarized into Table 8 (the author, 2020) to, aside the first round of research, converge and reframe the problem into the solution space, discussed in the next sub-chapter.

Table 8*Application of theoretical concepts - Conclusion of problem space*

Main theme from Discrimination Literature	Main theme from SD Literature	Key References	Insights	Artifact's application	Verification (test prompts)	Limitations (test prompts)
Structural discrimination	Build cultural reflexivity to unveil hidden structures.	Altman (2020), Vink, & Koskela-Huotari (2021)	Structural discrimination is a hidden social structure that can be portrayed as a service.	Service blueprint method	Has this visualization structure leveraged reflexivity to notice structural conflict and malleability? (Vink & Koskela-Huotari, 2021)	Verify cultural appropriability limitations (Vink & Koskela-Huotari, 2021)
Integrative perspectives stemming discrimination from European colonization to intersectional experiences	Multi-level service system to address inclusion	Shoemaker (2015), Creenshaw (1989), Fisk et al. (2018)	Discrimination can be portrayed in different levels but in the same system	Unified view of discrimination blueprints in different levels	Has this system propelled you to acknowledge systemic exclusion and, therefore the need to include? (Fisk et al., 2018)	Verify increase in ability to envision a larger scale of service effects beyond the isolated service encounter (Fisk et al., 2018)
Post-colonial remains	Build temporal and material reflexivity to unveil hidden structures.	Young (2012), United Nations (2020) Vink, & Koskela-Huotari (2021), Ansari (2020)	Colonialism echoes of domination can be interpreted as discriminatory behaviours among countries	Colonialism as a journey of discrimination among nations in parallel to other levels of Post-colonial remains	Has this visualization structure leveraged reflexivity to notice structural conflict and malleability? Has this visualization allowed the perception of echoes between interpersonal discrimination and colonialism? (Young, 2012)	Verify time versus perception of contextual change ratio and use time dedicated to build a self-journey. (Vink & Koskela-Huotari, 2021) Verify potential to oversimplify colonialism experiences. (Ansari, 2020)
Discernment between Diversity, Equity and Inclusion.	Social and democratic impact of design	Boden (2020), Design Council (2021)	DEI are different elements but the three are needed to constitute an anti-discriminatory practice	DEI compass	Has this visualization added clarity to differentiate the elements? Has this visualization emphasized the need to have all three elements?	Verify risks of inducing tokenistic and/or reverse racism logics
Psychological toll of being discriminated and inevitable biases of identities	Trauma- -informed research calls for responsibility towards participants	Meyerson (2001), Williams (2021), Dietkus (2022)	Traumatic and discriminated experiences have already been portrait in the literature and interviews will not be adequate to this thesis end, as they might objectify lived experiences of marginillised people and, therefore, cause the harm that it is trying to counter.	Literature research as source for discriminated journeys, trigger warnings for the artifact use and transparency on how the artifact was made and might evolve. Full reference list and methodology available.	Have these practices prevented triggers of potentially traumatic experiences?	Verify willingness of co-participation.

Note. The author (2022).

5.3. Design Sprint (solution space)

The design sprint is described by Dell’Era & Magistretti (2021) as an individual ideation and decision approach. The corresponding resources of this thesis along with the recommendations of the design sprint methodology made by Dell’Era & Magistretti (2021, p. 97) led the solution space to be approached as such. The mentioned description of the design sprint execution can be seen in Figure 32 (Dell’Era & Magistretti, 2021, p. 97).

Figure 32

Design Thinking vs. Design Sprint description

	Design Thinking	Design Sprint
Ideation	Team (Brainstorm)	Individual
Decision	Team	Decider
Direction	Outside-in	Inside-out (no outsiders)
Users	Beginning	End
User info	Observation	Interview
Expertise	Naïve mind	Experts
Criticism	No	Yes
Climate	Fun/Crazy	Reflective

Note. Retrieved from Dell’Era, C., & Magistretti, S. (2021, p. 97). *Design Sprint Solving Big Problems in Just Five Days Design Sprint: Principles and Process* [Slide show].

In addition, given the understood high complex nature of the problem, as well as the uncertainty around building and launching conditions and resources, the sprint execution methodology was found to be further compatible to the solution space of this thesis. As illustrated in Figure 33 and 34 (Dell’Era & Magistretti, 2021), the recommendations for this choice became adequate and justifiable.

Figure 33*Recommendations for sprint execution 1*

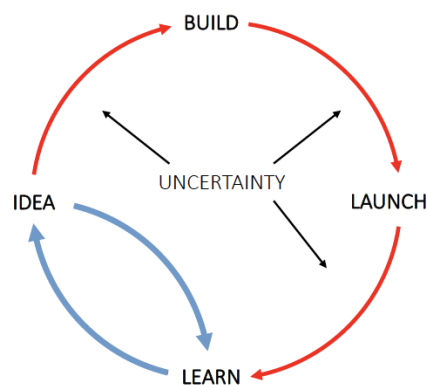
When Sprint Execution?



Note. Retrieved from Dell’Era, C., & Magistretti, S. (2021, p. 94). *Design Sprint Solving Big Problems in Just Five Days Design Sprint: Principles and Process* [Slide show].

Figure 34*Recommendations for sprint execution 2*

Accelerating the innovation process through experimentation



Note. Retrieved from Dell’Era, C., & Magistretti, S. (2021, p. 95). *Design Sprint Solving Big Problems in Just Five Days Design Sprint: Principles and Process* [Slide show].

Regarding the application of the design sprint methodology, it is important to notice that the indications were not fully realised as the one-week period cycle of ideating, prototyping and testing does not match this thesis exercise. (Dell'Era & Magistretti, 2021)

The first solution loop consisted in executing the concept through an Minimum Viable Product, MVP format, in an excel sheet presented in the next chapter in Table 9 (the author, 2022). The MVP content based itself in the desk research. It was then shared with a service design expert, this thesis mentor, and sequentially improved from the feedback of not being engaging enough as it lacked interaction.

The second iteration was the first execution of a semi-functional prototype and a walk-through and interview with a DEI expert. The interview guide and its specific learning purpose is available in Annex 1 (the author, 2022). From this interview, the insights led to the service concept and service lifecycle design, as well as the beginning of the third solution loop.

The third solution loop is presented along with its testing feedback insights and the author's discussion about future improvements.

Concluding this thesis overall methodological approach, the inside-out characteristics of both design thinking methodologies, innovation of meaning and design sprint, have been chosen and mixed to comply with the complex nature of the theme investigated and the resource restriction of the individual research.

6. Platform service

This chapter is dedicated to present the outcomes of the solution space, concluding itself on the learnings that fed the final result of the thesis.

The following sub-chapters correspond to the first and second loop of the methodology. The MVP and criticism being the first loop, and the prototype version and interview with the specialist, the second one.

6.1. Loop #1: Service Concept, MVP and criticism

The concept of developing a supporting tool was ideated firstly into documenting, from the literature review on discrimination, a high level journey of discriminatory experiences between entities in different levels of human organization and, by doing so, understanding its potential to enforce the reflexivity mentioned by Vink & Koskela-Huotari (2021).

The initial goal was to suggest conversation starters that might help navigating the fine line between comfort and privilege that most people should be aware of, in order to counter discrimination.

The content of the given tool, suggested as a starting point for the beneficiary of the platform to acknowledge practices of discrimination in different levels, was informed by the first chapters of the literature review, as summarized in Table 3 (the author, 2022, p. 49).

Drawing from the former statements, an excel table, Figure 35-38 (the author, 2022) and Appendix 4, was presented to a service design specialist and mentor of this thesis, in a minimum viable product format, demonstrated as follows.

For each level, a respective structure that supports the discriminating journey is informed. In the following Figures 36-38 (the author, 2022) the structures will be presented.

In addition, from left to right, you can see the progression of the journey into the assigned phases of discrimination, “before, beginning, middle and end” and a equivalent number of steps to all four levels, that have been intentionally designed to allow the user to try identifying echoes of discrimination among each level.

In Figure 36 (the author, 2022) you can observe in a zoom in, the level one and the before and beginning phases of the discrimination journey describing the steps of how discrimination between nations can occur.

To the left you can observe that a list of determinants of change has been made available and informs what Dalio (2021) described as the standardized key determinants to measure the rise and fall of empires. The blank cells aside these determinants were meant to be filled by the diagnosis of a collective discussion and/or personal reflection on how involved each of the determinants is in the respective step of discrimination.

Figure 36

MVP of Discrimination journeys and structure, zoom in level 1, before and beginning phases

Discrimination as a service									
Level 0	Core phases	BEFORE	BEGINNING						
Level 1	Empires / Colonies								
DETERMINANTS OF CHANGE	Economic/Financial Position								
	Debt Burden (Big Economic Cycle)								
	Expected Growth (Big Economic Cycle)								
	Internal Order								
	Gaps in Wealth, Opportunity & Values								
	Internal Conflict								
	External Order								
	Markets & Financial Center								
	Innovation & Tecnology								
	Military Strength								
	Education								
	Reserve Currency Status								
	Economic Output								
	Trade								
	Cost Competitiveness								
	Resource-Allocation Efficiency								
	Infrastructure & Investment								
Geology									
Character/Determination/Civility									
Governance/Rule of Law									
Acts of Nature									
Steps World Order (Provider) - As an Empire I...		have a strong leadership that wants more power and more wealth	have strong inventiveness and advanced technology	invest in and have strong education	develop a strong civil culture	achive a good resource allocation	achieve good competitiveness	achieve strong income growth	build leading markets and financial centers
Steps Colony (Consumer) - As a Colony I am...		encountered	claimed by the colonizer	designed by the colonizer	settled by the colonizer	explored by the colonizer	depopulated from original peoples (Genocide / Forced Migration)	influxed with enslaved and/or displaced vulnerable foreign peoples to increase productivity	subjugated and deprived from my productivity earnings

Note. The author (2022).

Next, in Figure 37 (the author, 2022) you can observe via another zoom in, the level 2 and the middle phase of the discrimination journey, describing steps of how discrimination inside a nation, i.e. between its government and society, can occur.

To the left you can observe a list of social institutions that refers to the COFOG, classification of functions of governments, informed by the OECD (2019), and that composes the institutional structure of a democratic sovereign nation. The blank cells aside the social institutions were meant to be filled by the diagnosis of a collective discussion and/or personal reflection on how involved each of the social institutions is with the respective steps of discrimination.

Figure 37

MVP of Discrimination journeys and structure, zoom in level 2, middle phase

Discrimination as a service					
Level 0	Core phases	MIDDLE			
Level 2	Sovereign Nations / Societies				
SOCIAL INSTITUTIONS	General public services				
	Defence				
	Public order and safety				
	Economic affairs				
	Environmental protection				
	Housing and community amenities				
	Health				
	Recreation, culture and religion				
	Education				
	Social protection				
Steps of Sovereign Governance (Provider) - As a government I...	estimulate the wealthy	rely on exploitative production	practice a hierarchical assignment of priviledge	enforce value differentiation	
Steps of Sovereign Society (Consumer) - As a society I...	become impaired	work for subsistence	become further divided	lose social mobility	

Note. The author (2022).

In Figure 38 (the author, 2022) you can observe the last zoom in the MVP, the levels 3 and 4, under the end phase of the discrimination journey. Level 3 is describing steps of how discrimination inside an organization, between the organization as a whole and its employees can occur, while level 4 is describing steps of how discrimination between people can occur.

To the left, in level 3, you can observe a list of the organizational support and primary activities that are informed by Porter's (n.d.) value chain, and are responsible for generating value across the organization. The list also informs the variation for non-for-profit and universities' value chain activities, i.e. procurement being a support activity for private organizations while, program and content development being a support activity for non-for-profit and universities. The blank cells aside the Porter's value chain support activities were meant to be filled by the diagnosis of a collective discussion and/or personal reflection on how involved each of these activities is with the respective steps of discrimination.

To the left, in level 4, you can observe a typology of discrimination (e.g. covert and overt) and two possible origins of the individual discrimination. The blank cells aside the individual structure of discrimination were meant to be filled by the diagnosis of a collective discussion and/or personal reflection on the type of discriminatory practice that took place (e.g.: covert/overt) on the respective step and suggest a deeper self-investigation on what motivated the practice (e.g.: implicit bias and/or privilege).

Figure 38

MVP of Discrimination journeys and structure zoom in level 3 and 4, end phase

Discrimination as a service		END				
Level 0	Core phases	END				
Level 3	Organizations / Employee					
Porter's Value Chain Support Activities	Firm Infrastructure					
	Human Resource Management					
	Technology Development/Fundraising					
	Procurement/Program and Content Development					
	Educational Programs					
Steps Employee (Consumer) - As an employee I...	have my career advancement hindered and/or impeded if marginalized and naturalized if privileged	have my contributions invalidated and stolen if I have a marginalized identity and I have my work ethic discouraged if I'm privileged	have my marginalized identity and experience silenced and relativized or I have my privilege concealed	have my career threatened and/or terminated if I have a marginalized identity, and I have my career devalued if I am privileged	lose individuality if I have a marginalized identity and I am blinded if I have a privileged identity	assimilate, internalize, reproduce and normalize social hierarchy and marginalization
Steps Organization (Provider) - As an organization I...	promote disproportionately and unreasonably a specific privileged group	dismiss or miss attribute credit for marginalized identities contributions	deny the existence of social hierarchy and privilege and refuse to perform continuous self-assessments	reprehend and/or dismiss harshly, disproportionately and unreasonably a marginalized group	support professional decisions made upon social identities stereotypes	have a sustained homogeneous and privileged social identity in leadership positions
Level 4	Interpersonal Discrimination					
INDIVIDUAL STRUCTURE	Implicit Bias					
	Privilege					
	Covert					
	Overt					
Steps Discriminating (Provider) - I provide discrimination when I...	assume and combat criminality based on a marginalized social identity	disconsider or ignore a person's opinions and ideas because of their marginalized identities	become defensive, disengage and/or avoid conversations about marginalized identities	refuse to stop commenting and/or talking about marginalized identities in a way that I've learned to be offensive to them	act upon assumptions I have about a marginalized identity without knowing the person	consider a person exotic or objectified a person because of their marginalized identity
Steps Discriminated (Consumer) - I consume discrimination when I...	am profiled, incriminated and/or harassed based on my marginalized social identity	am not paid attention to or heard because of my marginalized identity	am impeded or asked to not talk about my discriminated experiences to avoid privileged people's discomfort	internalize the constant micro-agressions directed to my marginalized identity and change my behaviour	am treated as a marginalized identity first and as a person second	impersonate the exotic or objectified identity attributed to me because of my marginalized identity

Note. The author (2022).

The respective MVP sharing with a service design specialist and this thesis mentor, Daniela Sangiorgi, materialized the conversion of the criticism phase of innovation of meaning and first loop of design sprint.

The feedback from this session firstly revealed the understanding that the format and the complexity and connection between the levels was unclear.

Secondly, the language presented and its compatibility with a broad range of end users was inadequate.

Thirdly, the purpose, scope and experience of using such content in the given format was not connected with the demand of a service designer professional and not directly linked to the service design practice.

In conclusion, the learning from these feedback led to deepening the output format and work in the engagement aspect of the experience: the artifact's interfaces.

The development of such interfaces is documented in the next sub-chapter and initiates the second loop of the design sprints in the solution space.

6.2. Loop #2: artifact prototype V#1 and interview with DEI specialist

The experience of discrimination as a service and a DEI parallel grid was the result of addressing the feedbacks of the first loop of the solution space in this research.

Furthermore, it's intention of mitigating the mentioned fragmented view of discrimination and to function as a respectful, accountable and participatory platform to support the transformative core processes that service design can build through reflexivity were deepened and translated to the user interfaces. (Altman, 2020; Vink & Koskela-Huotari, 2021)

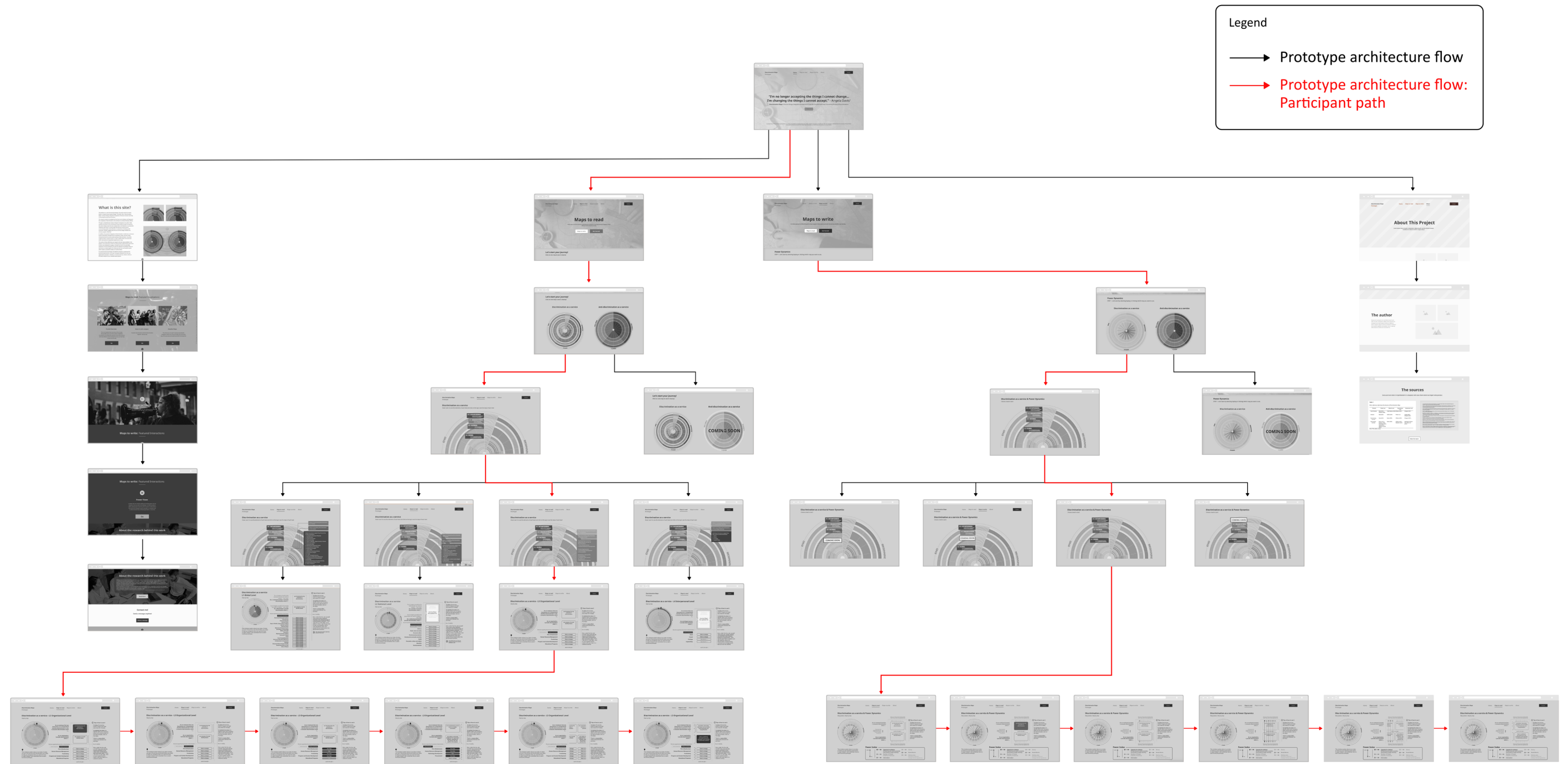
The decision of digitalizing such a platform was made to extend the potential and future access to the content and the intended participation.

Furthermore, the interface design and the guided interactions with the content have been ideated based on the feedback received in the previously mentioned criticism loop.

The following screens, Figure 39-46 (the author, 2022), illustrates the architecture of the prototype and its interfaces.

The architecture of the prototyped platform, illustrated in Figure 39 (the author, 2022) describes the different paths a participant can take through the available interfaces and identifies some interactions available in the respective interfaces.

Figure 39
Prototype V#1 Architecture



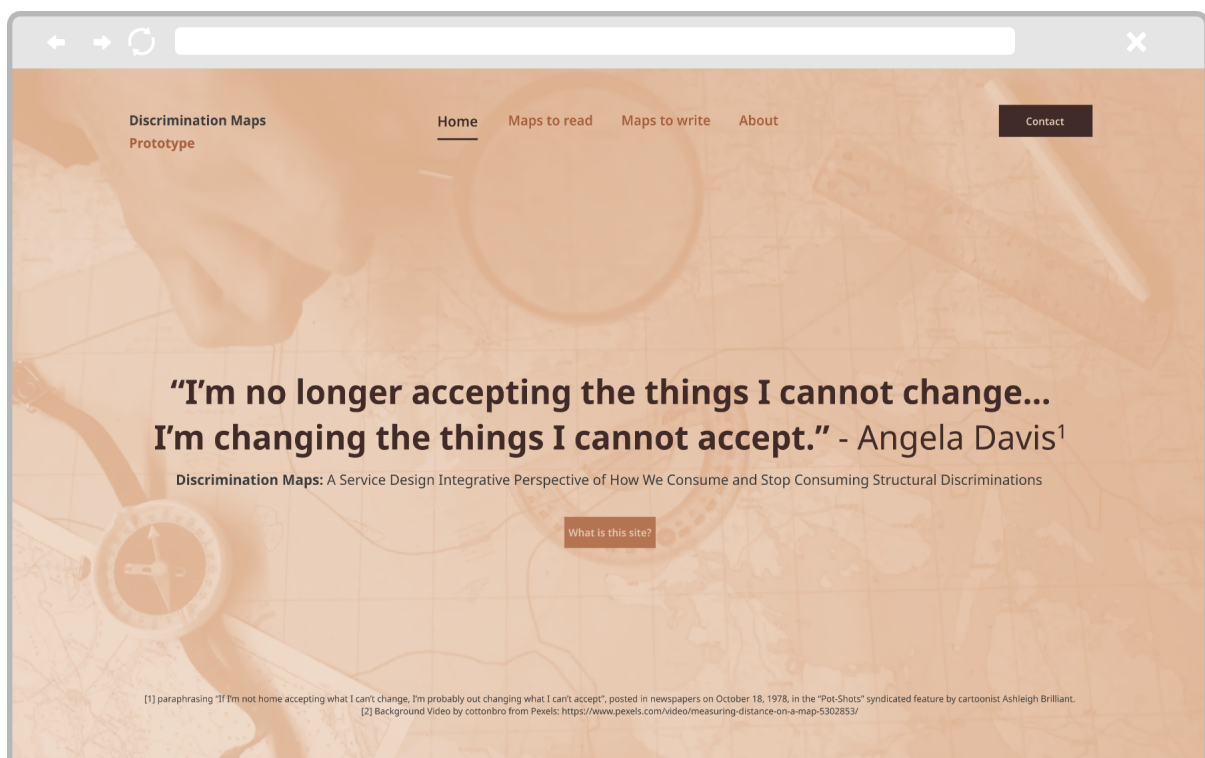
Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

In order to exemplify the navigation flow of the participant's path, indicated in red in Figure 39 (the author, 2022), the respective interfaces are presented in more detail in the following Figures 40-46 (the author, 2022).

The initial interface of the prototype, Figure 40 (the author, 2022), suggests the mindset of the tool usage through the quote, and, in the button, invites the beneficiary to inform themselves more, before moving to the interaction.

Figure 40

Home page, Artifact Interaction Prototype version #1

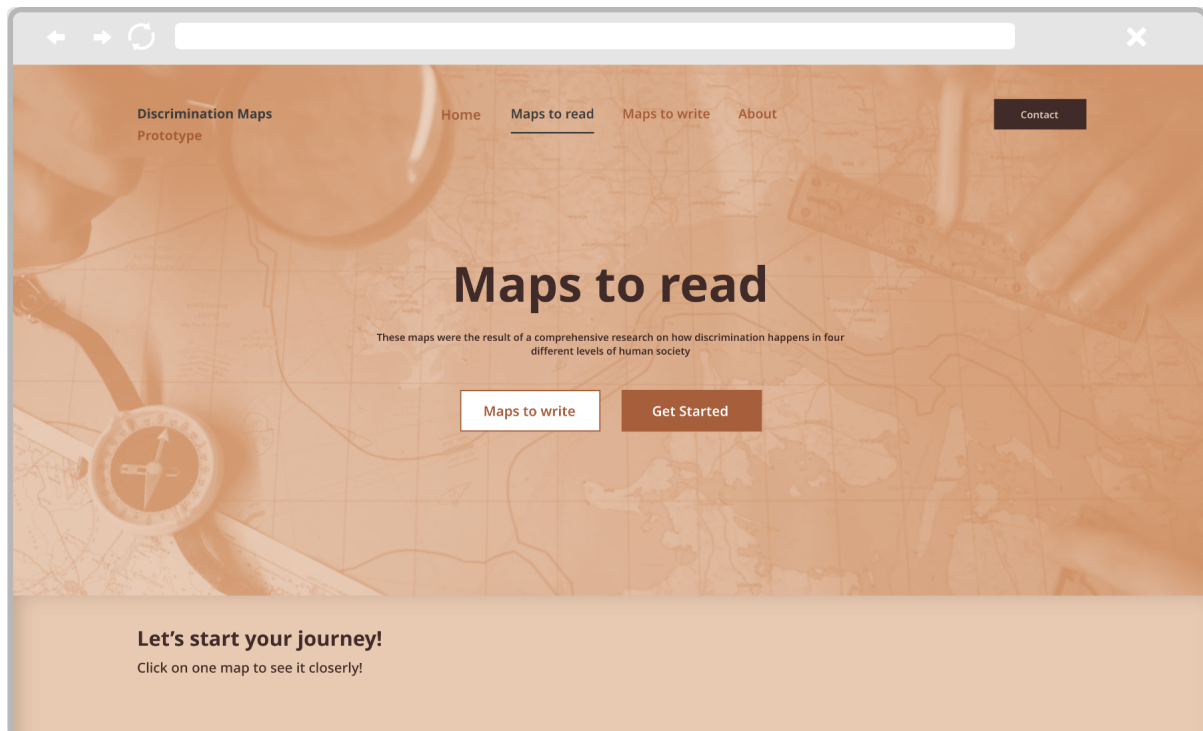


Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

By clicking on the menu, on the top of the page, the participant reaches the following interface of the prototype, Figure 41 (the author, 2022). The title indicates the session of the page and the subtitle is a brief description of how the content available in the next step came to be. The highlighted button, to the right, saying “get started” suggests the interaction to initiate the interactive map experience.

Figure 41

Maps to read, Artifact Interaction Prototype Version #1

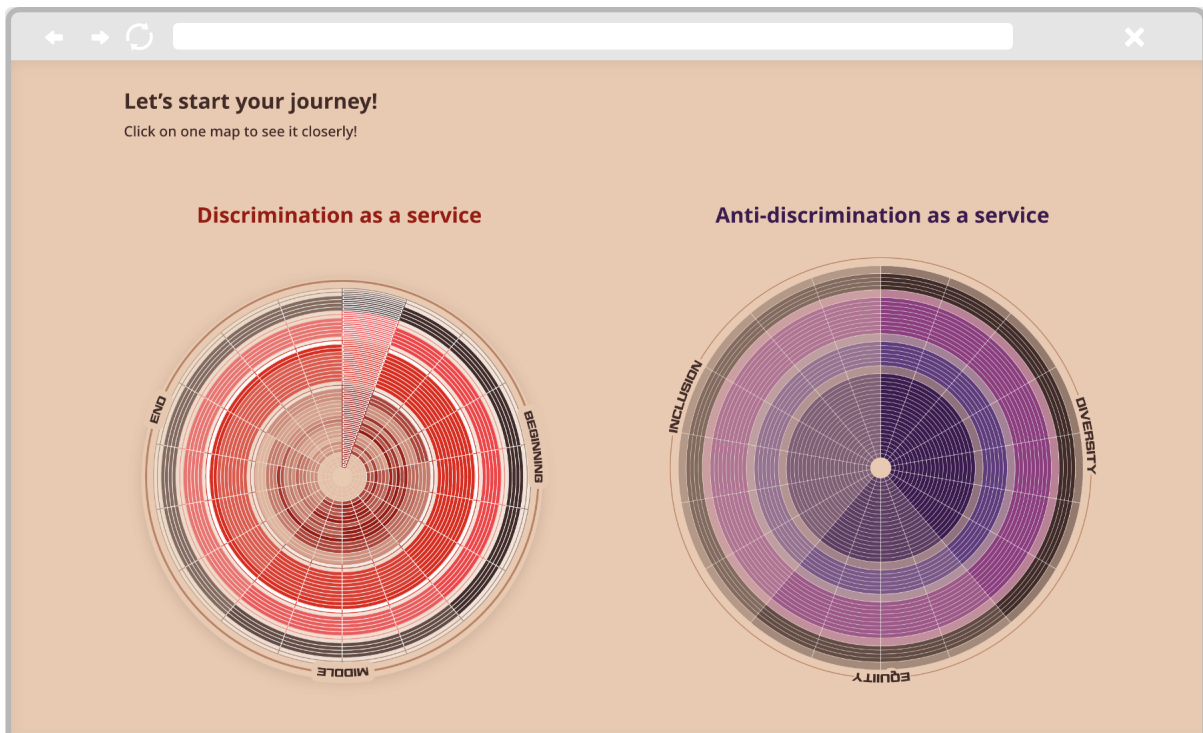


Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

The following interface of the prototype, Figure 42 (the author, 2022), presents the parallel between the discriminatory practices and DEI as the anti-discriminatory practices. Selecting the “discrimination as a service” moves the user to the next step and the interface functions as a sub-menu as well as a conceptual suggestion of discrimination versus anti-discrimination.

Figure 42

Secondary Menu - Parallel Maps, Artifact Interaction Prototype Version #1

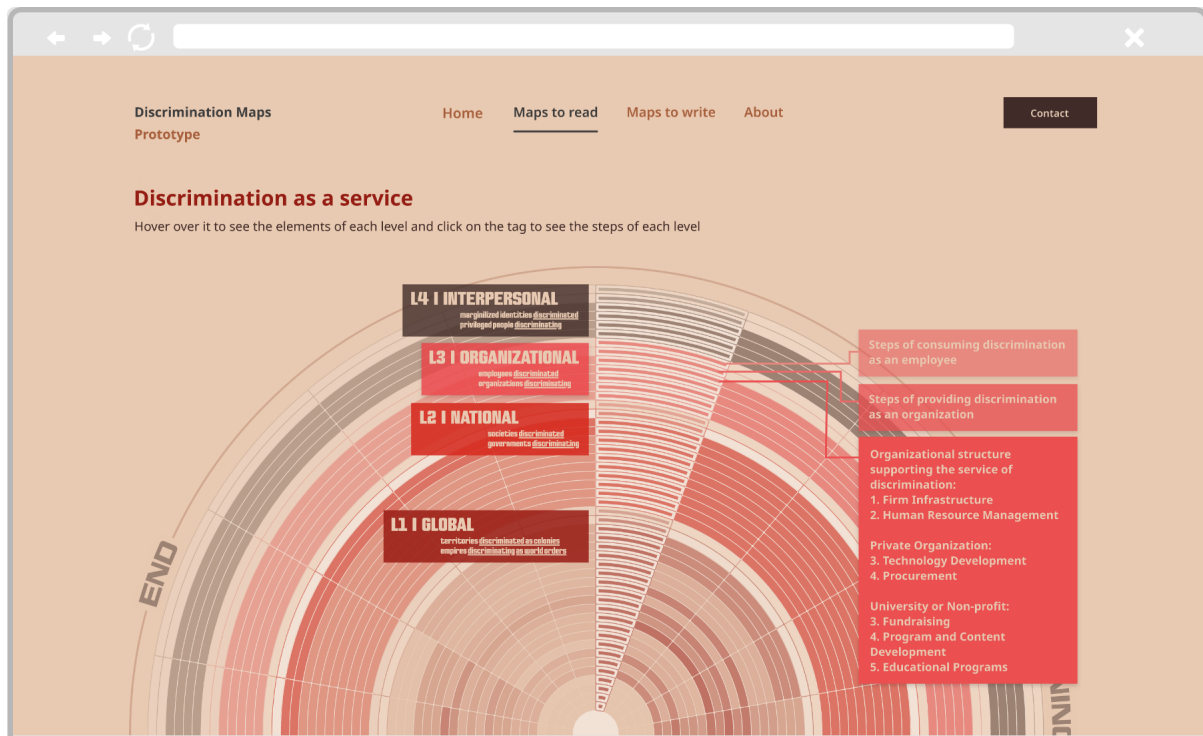


Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-b0f5/?fullscreen&hints=off>

The following interface of the prototype, Figure 43 (the author, 2022), clarifies, through a mouse hover interaction, the elements and structure of each level of the “discrimination as a service” map, and allows the user to foresee the entities and structure of discrimination that will be repeated in the next screen. Figure 43 illustrates one example of the mouse hover of “level 2”. The labels indicating the levels are also buttons to click and access the chosen level to be explored.

Figure 43

Tertiary Menu - Levels, Artifact Interaction Prototype Version #1



Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

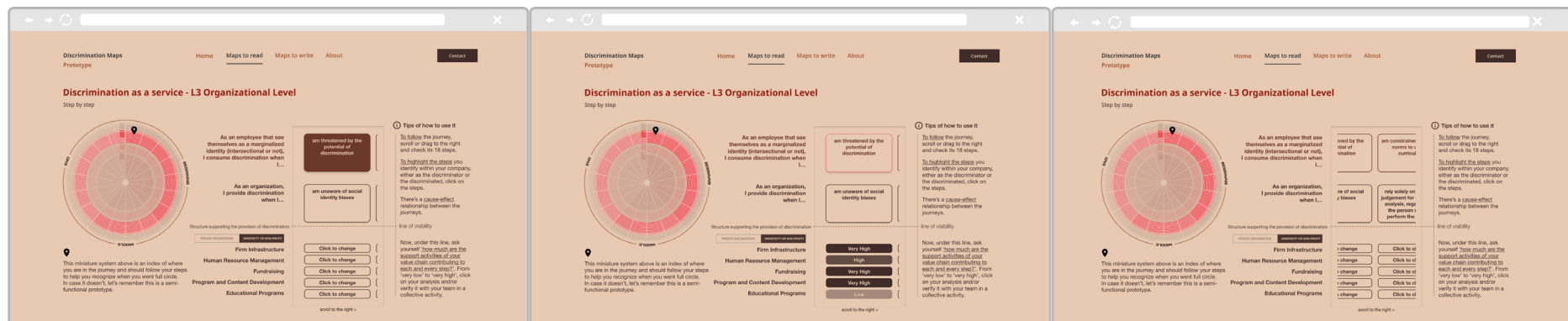
The following interface of the prototype, Figure 44 (the author, 2022), makes available the interaction to visualise the content of the journeys of discrimination, already presented in the MVP.

By scrolling right, over the highlighted area, the user reveals, step by step, both parallel journeys of discriminating and being discriminated. When recognizing themselves in either one of the journeys, the user can highlight the steps they identify with by clicking on them.

Under each step there is another interaction that suggests reflecting on the involvement of the structure of the discriminating entity. By clicking on the buttons made available, the participant can assign from “very low” to “very high”, four different levels of involvement of the elements of the structure in providing the discrimination described on the respective step.

Figure 44

Discrimination as a Service - Level 3 Journey, Artifact Interaction Prototype - Version #1

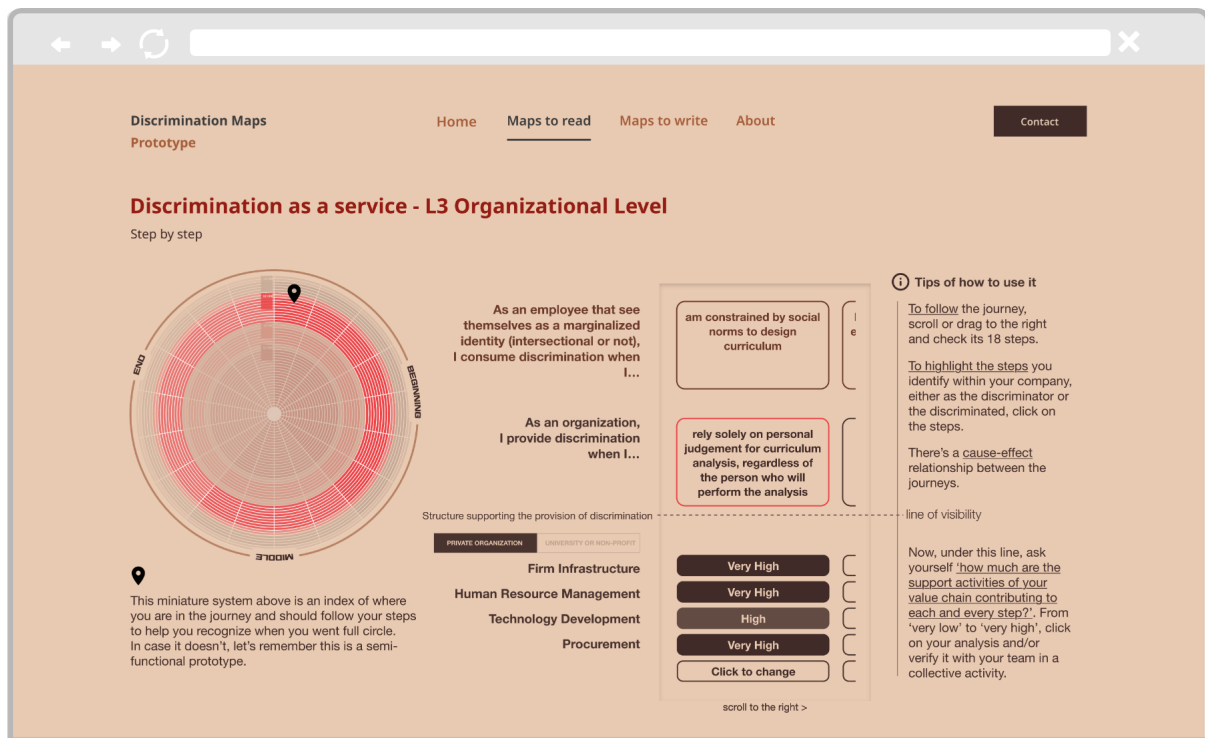
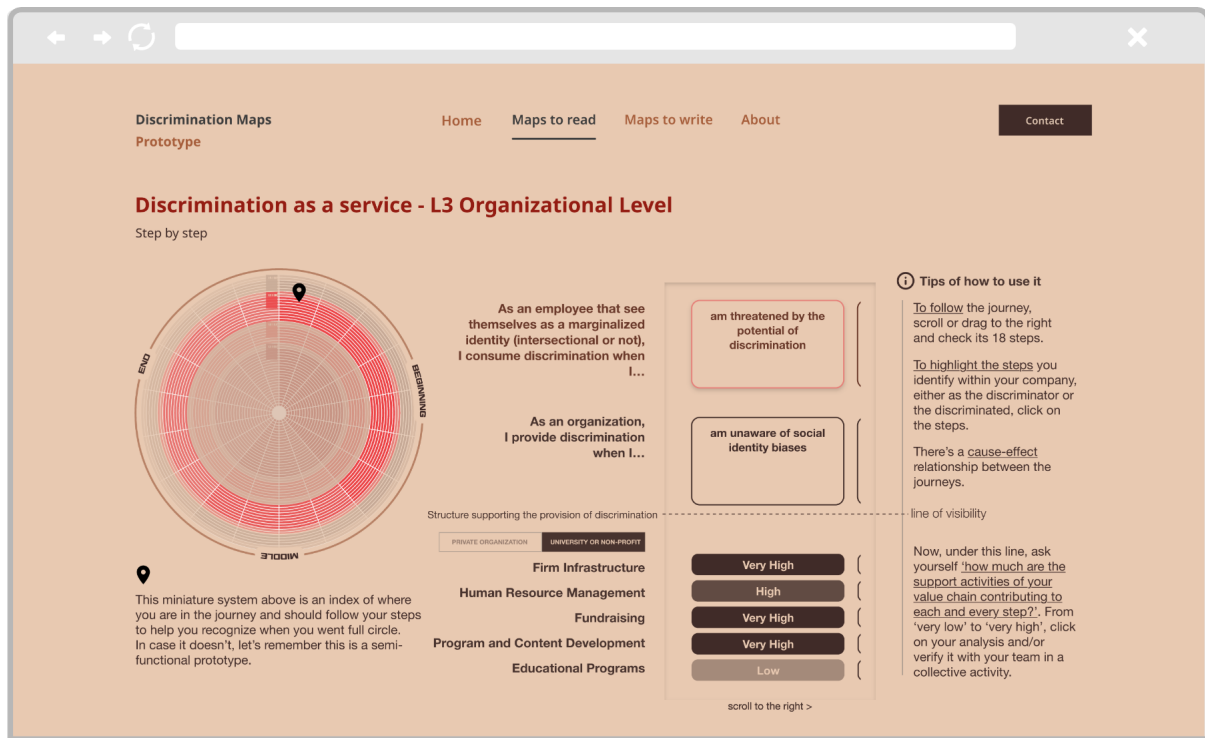


Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

As illustrated in the following Figure 45 (the author, 2022), in this specific level of discrimination, “level 3”, the structure of discrimination is available in two different forms: “university or non-profit” and “private organisation”. By clicking on the option that the participant prefers to analyse, the structure informs different elements. following interface of the prototype.

Figure 45

Discrimination as a Service - Level 3 Structure, Artifact Interaction Prototype - Version #1



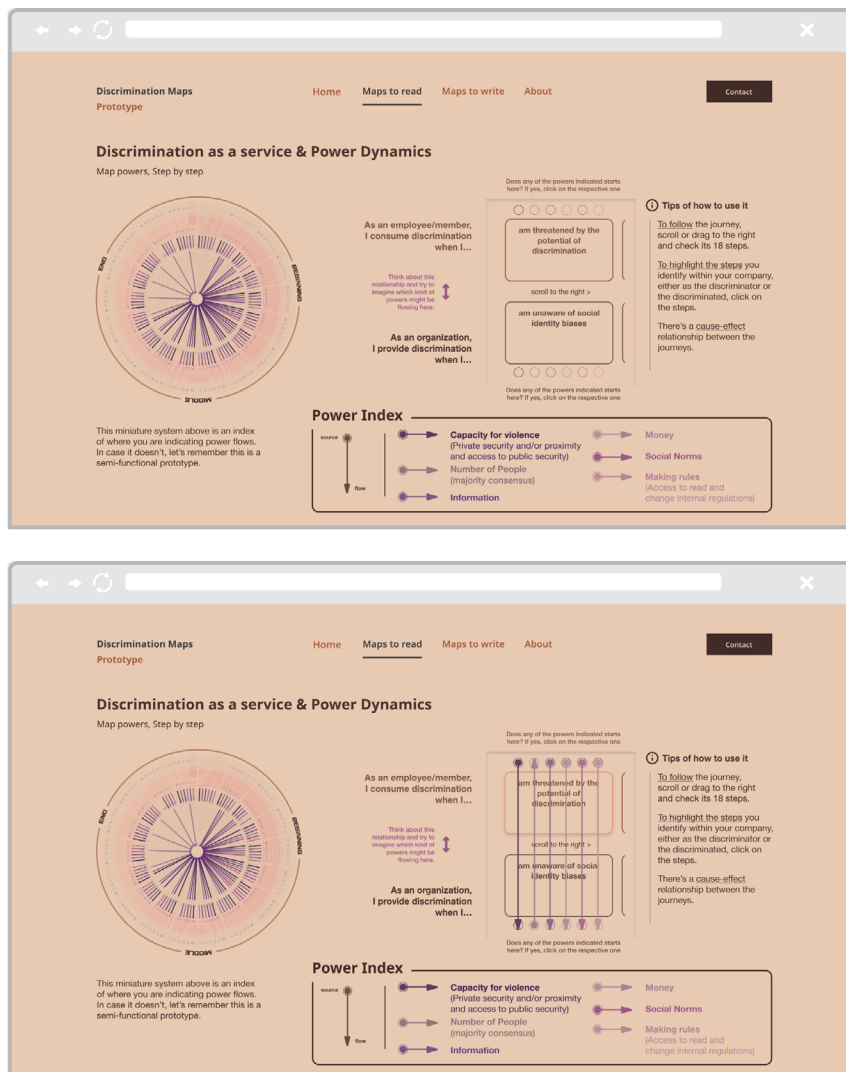
Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

The following and last available interface example of the prototype, Figure 46 (the author, 2022), is the “Power Dynamics” interaction where, over the steps identified by the user, it is suggested yet another reflection upon the powers in place.

The interaction asks the participant to indicate from where to where the powers might be flowing in order to contribute to the described discriminatory step. By clicking on the dots, over the steps of being discriminated or under the steps of discriminating, the participant can indicate the source of one-to-six powers informed in each step.

Figure 46

Power Dynamics, Artifact Interaction Prototype - Version #1



Note. The author, 2022. The semi-functional version can be found, until the end of the year 2022, in the following link: <https://xd.adobe.com/view/e5a604c3-b237-4c41-ab17-1a72c7a5027f-bof5/?fullscreen&hints=off>

The interactions prototyped were materialised firstly to further investigate and determine how this tool manifests the reflexivity modes of service design. (Vink & Koskela-Huotari, 2021)

Secondly, to provide, simultaneously, engagement and support to a relative safe experience of a journey of being discriminated or self-perception of experiencing one of discriminating.

The overall interaction has been evaluated and diagnosed by an inclusive design specialist in a guided interview, Annex 1 (the author, 2022), conducted to obtain insights and learn about improvements and potential effectiveness of this tool towards its goal.

The inclusive design specialist is Antonio Grillo, a designer with 20 years of work experience on product and successful services design, and on design leadership, both at local and international level, as well as holding the 'Inclusive Design' course at the Politecnico di Milano.

The qualitative interview was conducted and a walkthrough of the prototype was observed. From this session, important insights emerged and informed the next step.

Antonio Grillo mentioned, for example that the artifact should be inclusive itself, asking for a printable version, and reminding that designing discrimination in a discriminatory way was a mistake.

Another important note was that, before the direct question was scripted to investigate visibility, the interviewee spontaneously mentioned that this is evident in the artifact.

In addition, there was an analogy of following the discrimination as a service being a reminder of the Bauhaus pedagogy of unlearning by experiencing and/or experimenting.

Lastly and far from least, Grillo warned to be mindful of the western bias.

Sequentially, the interview contributions and feedback led to the platform service lifecycle, journey architecture and blueprint design, in which the unfinished aspect of the prototype became more explicit and the interaction modes could be designed and communicated without the technical restrictions that impeded them to be prototyped and experienced.

Alongside an adjusted prototype and another round of investigation, these results are presented in the next chapter.

7. Discrimination(s) Grid and DEI compass

This chapter is dedicated to present the last loop of the solution space and the results of the overall thesis, which consists of a service lifecycle, journey architecture and blueprint of the platform, together with a second version of the artifact prototype. In addition, closing the loop, the results of the qualitative questionnaire conducted with potential end users is presented as the last learning phase of this project.

Summarizing, the following results implemented the learnings and insights generated from the interview with a specialist. Furthermore, more specifically into the interface of the prototyped platform, the improved guided approach and warnings of potential trigger uses have been added with the objective to fit a trauma-sensitive practice. (Dietkus, 2022)

7.1. Service lifecycle, journey architecture and blueprint design

Figure 47 (the author, 2022) and Appendix 2 (the author, 2022) illustrates the overview of the service lifecycle of this platform, an end-to-end high level service experience.

Under the lifecycle phases and steps, a journey architecture indicates the set of journeys that compose the end-to-end service experience; a total of five journeys of a beneficiary (term chosen by the author's understanding of what a non-for-profit user is) takes place throughout the six phases of the platform service and respective twenty two steps.

It is important to remember that this design is the conceptual and not detailed end-to-end experience of the service, from which each of the five journeys indicated, can and should expand to more detailed steps.

Figure 47

Platform Service Lifecycle, architecture and blueprint design overview



Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=/>

The following Figure 48 (the author, 2022) zooms in the lanes and two initial phases of the service lifecycle: “the curious” (under the phases of before entering the platform), and “the explorer” (the exploration after entering the platform), where the journey number one, “realize value” takes place and illustrates the desired steps of the service.

To the left, in the first column, you can see what each lane of the beneficiary experience is informing. The lanes that assign interaction modes available, emphasize that the accessibility of the platform are an imperative to be provided and, address function's learning point of the interview with the specialist that mentioned the inclusivity of the service itself.

In addition, highlighted inside the purple square, there is the indication of which steps were materialised in the next version of the prototype.

Figure 48

Platform Service Lifecycle, architecture and blueprint design - Curious and Explorer phases - Journey #1

**Service Lifecycle and Journey Architecture
Discrimination Topography and DEI compass - NGO Platform**

Beneficiary					Prototyped Interaction				
LIFECYCLE PHASE	CURIOUS				EXPLORER				
STEPS	Need Arises	Research Alternatives	Compare different alternatives	Decide to try	Enter the platform	Follow instructions	Explore more options	Realize value	
Description	I want to avoid discrimination in the service I'm designing or decision I am making	I search for "How to avoid discrimination in my context?"	I become overwhelmed with the amount of results and read the first three findings	I access the material	I am greeted and configure my interaction modes	I follow the steps indicated by the platform	I go to the about session and/or the DEI compass	I realize that this activities can enrich my practice, decision making and provide me purpose	
Needs	I need to know how, whom to ask, and what to ask for	I need an overview of all types of discrimination	I need access	I need an engaging call to action	I need to feel safe and welcomed	I need to feel engaged and guided	I need my curiosity sparked	I need reassurance and clarity of what I am suppose to obtain from it and invitation for next steps	
Journey's architecture	#1 Realize value								
Touchpoints	...	<ul style="list-style-type: none"> electronic devices (e.g.: computers, smartphones, etc.); published (e.g.: books, magazines, etc.); people (teachers, researchers, friends, etc.) 	<ul style="list-style-type: none"> electronic devices (e.g.: computers, smartphones, etc.); published (e.g.: books, magazines, etc.); people (teachers, researchers, friends, etc.) self (thoughts) 	<ul style="list-style-type: none"> electronic devices (e.g.: computers, smartphones, etc.); people (e.g.: delivery person attendant in a library, etc.) 	<ul style="list-style-type: none"> electronic devices (e.g.: computers, smartphones, etc.) projected version 		<ul style="list-style-type: none"> Self (reflection) 		
Interaction modes	...	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	...	
audio (listening/speaking)	...	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	...	
visual (color/contrast)	...	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	...	
language (reading/writing)	...	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	...	
touch (fine motor skills)	...	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	...	
ORGANIZATIONAL STRUCTURE									

Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=/>

The second journey foreseen by the design, and illustrated in the following Figure 49 (the author, 2022), describes the path followed by the beneficiary towards feeling ownership of the tool and it can only happen once the “explorer” journey is concluded. This journey is not materialised into the prototype interaction but composes the overall concept of the solution.

Figure 49

Platform Service Lifecycle, architecture and blueprint design - journey 2 and participant phase

PARTICIPANT						
Incorporate the activity into workflows	Evaluate edge cases	Want to learn from others	Rely on the tool for key use case	Get value from each interaction	Explore the depth of the product	Happy use and ownership
I decide to use this platform in most of my next project(s)	I become critic of the tool	I reach out for support	I rely on this tool to kick start an important project	I realize that this activity enriches the practice, decision making and provides purpose to everyone I know	I start looking for expanding the use of the product to get more value from it	I consider this tool essential to my work and would be very disappointed if I couldn't use it anymore
I need guidance onto where I should position this tool in my workflow	I need space to criticize and comment on the tool	I need a channel to reach out	I need confidentiality assurances that my data is private	I need feedback from other people that used the tool with me	I need more mediums and freedom to rearrange the information in the tool	I need transparency on how reliable the tool availability is
#2 To internalize use-ownership						
• Work medium (e.g.: computer, whiteboard, etc.)	• electronic devices (e.g.: computers, smartphones, etc.) • post-office	• electronic devices (e.g.: computers, smartphones, etc.) • post-office	• electronic devices (e.g.: computers, smartphones, etc.) • projected version	• electronic devices (e.g.: computers, smartphones, etc.) • people (e.g.: co-workers, community gather, etc.)	• electronic devices (e.g.: computers, smartphones, etc.) • projected version	• electronic devices (e.g.: computers, smartphones, etc.) • projected version
audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)
visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)
language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)
touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)

Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: https://miro.com/app/board/uXjVPAE56-A=

The third journey foreseen by the design, and illustrated in the following Figure 50 (the author, 2022), describes the path followed by the beneficiary towards advocating for the tool/service, and it can only happen once the participant journey is concluded. This journey is also not materialised into the prototyped interaction but composes the overall concept of the solution.

Figure 50

Platform Service Lifecycle, architecture and blueprint design - journey 3 and rippler phase

RIPPLER		
Platform update	Engaged superuser	Recommend and advocate
I dislike the updates and want things back as they were	I have an emotional connection to this platform and would like to contribute to its success	I am proud to be an advocate for this product and would love to tell others about it
I need pre and post clear communication of update(s) as well as update support	I need a nudge to promote the platform	I need to know how and to whom I can promote it
<p>3# To become an advocate</p> <hr/> <ul style="list-style-type: none"> • electronic devices (e.g.: computers, smartphones, etc.) • projected version 		
audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)
visual (color/contrast)	visual (color/contrast)	visual (color/contrast)
language (reading/writing)	language (reading/writing)	language (reading/writing)
touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)

Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: https://miro.com/app/board/uXjVPAE56-A=

The fourth journey foreseen by the design, and illustrated in the following Figure 51 (the author, 2022), describes the path followed by the beneficiary towards becoming a coparticipant of the platform, moving what once was the front end experience of the service to the back end activity. This can only happen once the participant journey is concluded. This journey is also not materialised into the prototype but composes a fundamental concept of the solution.

Figure 51

Platform Service Lifecycle, architecture and blueprint design - journey 4 and co-participant phase

CO-PARTICIPANT	
I decide to add journeys to the platform	Become a stakeholder
I decide to become a co-participant of the content and make public journeys that stemmed from my experience and/or work	I undergo a walk through interview from the moderators and receive an access modality
I need a co-participant profile	I need a subscription access and terms of co-participation
<ul style="list-style-type: none"> • electronic devices (e.g.: computers, smartphones, etc.) • people (platform member) 	<ul style="list-style-type: none"> • electronic devices (e.g.: computers, smartphones, etc.) • people (platform member)
audio (listening/speaking)	audio (listening/speaking)
visual (color/contrast)	visual (color/contrast)
language (reading/writing)	language (reading/writing)
touch (fine motor skills)	touch (fine motor skills)

• **4# To become a stakeholder**

Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: https://miro.com/app/board/uXjVPAE56-A=

The latter mentioned journey, demonstrating the co-participation experience assigned to this service is the design of the service offer to move from a trauma-sensitive approach to a trauma-responsive practice of service design, one in which the potentially traumatic experiences of discrimination of a person have support, anonymity and choice to be shared. It illustrates how sharing and adding experiences to the platform become a different role for the beneficiary, and includes such beneficiary in the structure of the service. (Dietkus, 2022)

To this purpose, illustrated in Figure 52 (the author, 2022), the numerous paths that unfold from the beneficiary’s co-participation are pointing to the structure of the service. Some involve training and co-creation, and others predict that the co-participation can come in different forms of donation, expertise volunteering in departments such as “Information Services” and “Board of Directors”.

Figure 52

Platform Service Lifecycle, architecture and blueprint design - journey 5 and co-participant phase back-end



Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=>

Consequently, the blueprint draft was added to the service lifecycle and architecture, demonstrating and drafting the organizational structure behind the platform and designing the desired final journey of a beneficiary leading to its co-participation and stakeholder position, which in turn, described in Figure 53 (the author, 2022), would generate financial and human resource contribution to be allocated to the provision of devices that would make the platform accessible to marginalised beneficiaries with no access to the internet or information and/or in need of field support.

Figure 53

Platform Service Lifecycle, architecture and blueprint design - blueprint accessibility and support services

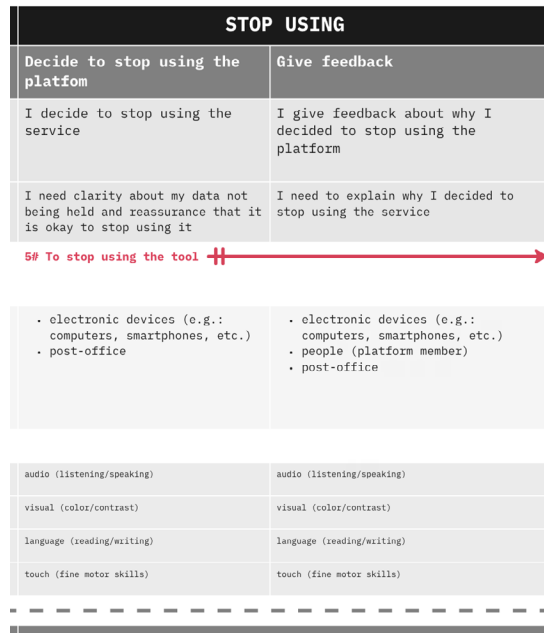
ORGANIZATIONAL STRUCTURE					
Programme & Training					
P&T leadership	Support and attend workshop(s); support overflow	Support workshop(s) if needed; support overflow	Support workshop(s) if needed; support overflow	Support workshop(s) if needed; support overflow	analysis/approval of in person beneficiary support; support overflow; assist virtual chat activities
→ Field support					when requested/approved

Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=/>

The fifth journey foreseen by the design, and illustrated in the following Figure 54 (the author, 2022), describes the path followed by the beneficiary towards stop using the platform, and it can happen as a sequence of all the previously informed journeys. This journey is also not materialised into the prototyped interaction but composes the overall concept of the solution.

Figure 54

Platform Service Lifecycle, architecture and blueprint design - journey 5 and stop using phase

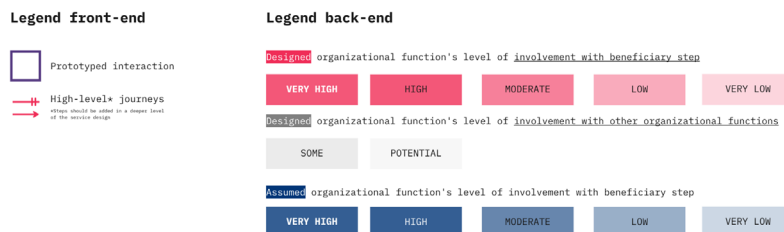


Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=/>

Concluding the second loop of the solution space, the service design of the platform, Figure 47 (the author, 2022) as well as Annex 2, illustrate the high level service lifecycle and architecture of journeys, along with the draft of a non-for-profit blueprint that, added to the last and next prototype version, compose this thesis solution. The validity of this outcome is discussed in chapter 8, but it is communicated in the legend as well, as illustrated by Figure 55 (the author, 2022).

Figure 55

Platform Service Lifecycle, architecture and blueprint design - legend



Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=/>

The overall concept of the service platform is, now, presented as a potential non-for-profit tool, that aims to support the initial phases of service design and decision making, exercising the service design potential of the leveraged reflexivity modes to trigger the “means to erode institutional property” and consequently transform them. (Vink & Koskela-Huotari, 2021, p. 6).

Also as result of the service lifecycle design of the platform, the prototype of the artifact was modified.

Connecting the service lifecycle and journey architecture with the prototyped stages, the highlighted prototype interaction, in Figure 56 (the author, 2022) is presented in the next sub-chapter.

Figure 56

Prototyped Steps of the Service lifecycle

**Service Lifecycle and Journey Architecture
Discrimination Topography and DEI compass - NGO Platform**

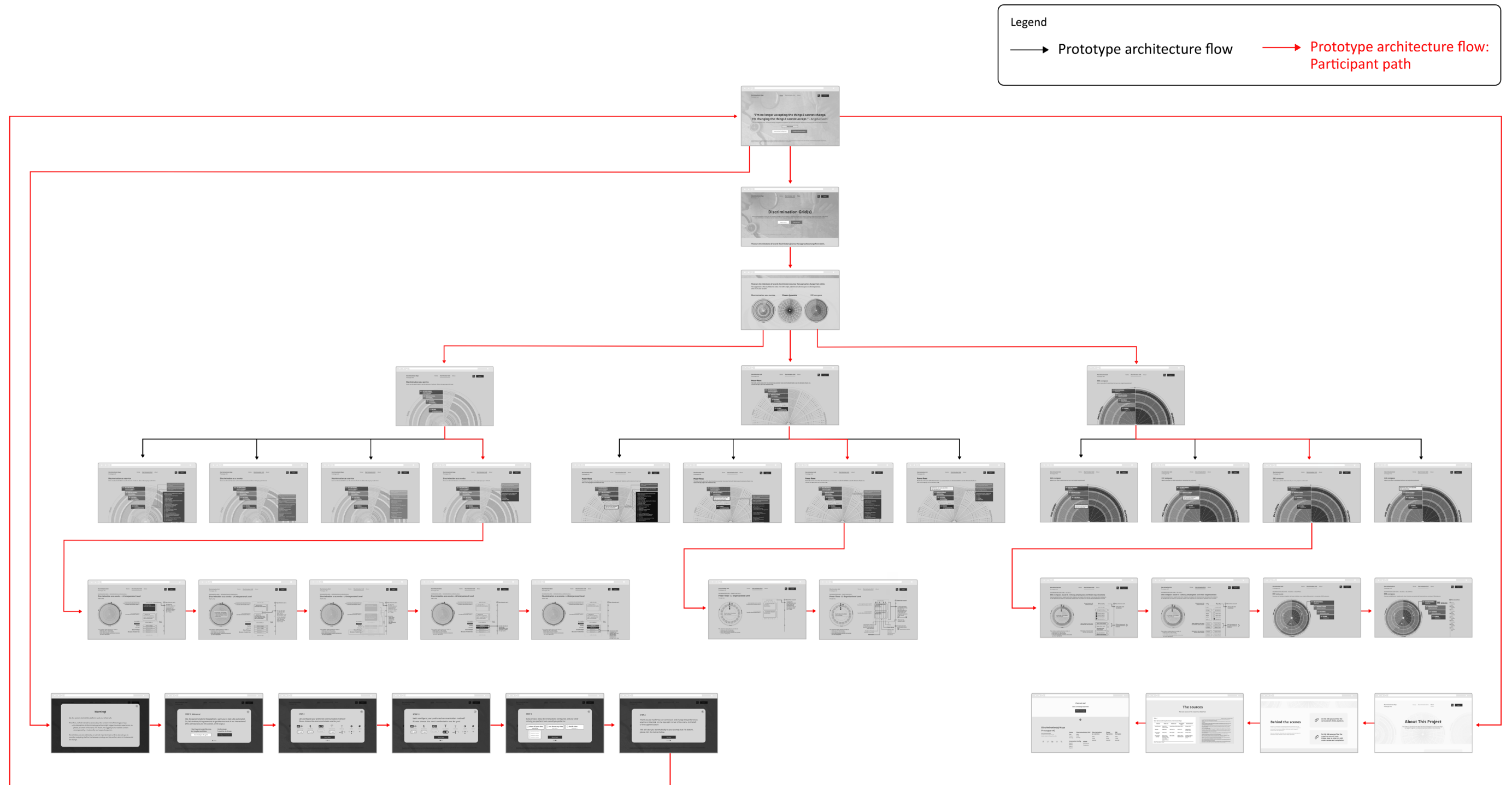
Beneficiary					Prototyped Interaction				
LIFECYCLE PHASE	CURIOUS				EXPLORER				
STEPS	Need Arises	Research Alternatives	Compare different alternatives	Decide to try	Enter the platform	Follow instructions	Explore more options	Realize value	Interact
Description	I want to avoid discrimination in the service I'm designing or decision I am making	I search for "How to avoid discrimination in my context?"	I become overwhelmed with the amount of results and read the first three findings	I access the material	I am greeted and configure my interaction nodes	I follow the steps indicated by the platform	I go to the about session and/or the DEI compass	I realize that this activities can enrich my practice, decision making and provide my purpose	I see
Needs	I need to know how, when to ask, and what to ask for	I need an overview of all types of discrimination	I need access	I need an engaging call to action	I need to feel safe and welcomed	I need to feel engaged and guided	I need my curiosity sparked	I need reassurance and clarity of what I am supposed to obtain from it and invitation for next steps	I see
Journey's architecture	#1 Realize value								
Touchpoints	...	• electronic devices (e.g.: computers, smartphones, etc.) • published (e.g.: books, magazines, etc.) • people (teachers, researchers, friends, etc.)	• electronic devices (e.g.: computers, smartphones, etc.) • published (e.g.: books, magazines, etc.) • people (teachers, researchers, friends, etc.) • self (thoughts)	• electronic devices (e.g.: computers, smartphones, etc.) • people (e.g.: delivery person, attendant in a library, etc.)	• electronic devices (e.g.: computers, smartphones, etc.) • suspected version	• Self (reflection)	I see
Interaction nodes	...	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	audio (listening/speaking)	...	I see
visual (color/contrast)	...	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	visual (color/contrast)	...	I see
language (reading/writing)	...	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	language (reading/writing)	...	I see
touch (fine motor skills)	...	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	touch (fine motor skills)	...	I see
ORGANIZATIONAL STRUCTURE	Programs & Training								

Note. The author, 2022. The full-size miroboard version can be found, until the end of the year 2022, in the following link: <https://miro.com/app/board/uXjVPAE56-A=/>

7.2. Prototyped interaction

The prototyped modifications are mainly consequential to the insights from the last learning phase of design sprint, discussed in the previous chapter.

The overall prototype architecture is presented in Figures 57 (the author, 2022). To add investigative and learning capabilities of the prototype, this version increased its interaction potential and different paths of experience, as demonstrated in Figure 56 (the author, 2022).

Figure 57*Prototype architecture and available interactions*

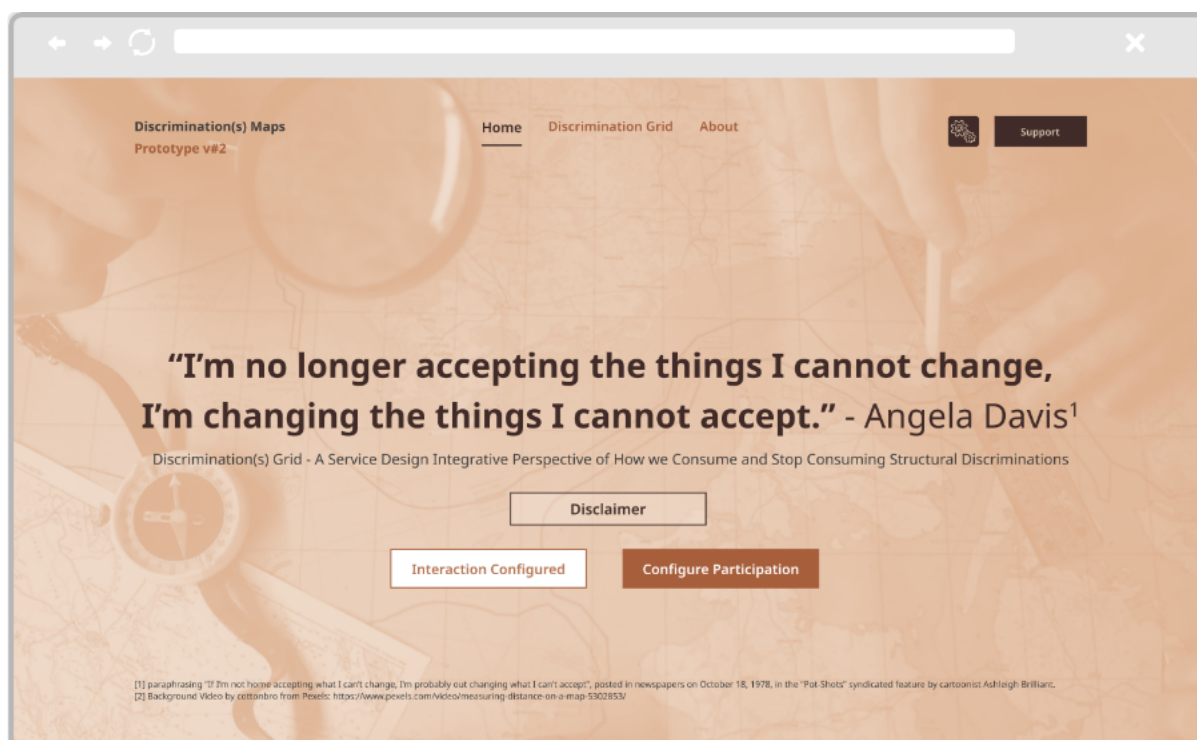
Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

Exemplifying the navigation of the participant path, in Figure 57, the author, 2022), the respective interfaces are presented in more detail in the following Figures 40-XX (the author, 2022).

The welcome page simulated the accessibility of the platform through configuration screens. On the “disclaimer” button, as shown in Figure 58 (the author, 2022), the beneficiary is invited to access a configuration path, Figure 59 (the author, 2022), in which they are oriented to personalise interaction modes that mitigate mismatches between the platform’s layout and the beneficiary’s abilities (e.g.: in the step 2, the option of typeface comfort offers a typeface designed to support people with dyslexia to read more comfortably). The objective of this addition was to address the learnings from the interview with the specialist that advised onto working for inclusion via inclusivity.

Figure 58

Home page, Artifact Interaction Prototype version #2



Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

Figure 59*Configuration of interaction modes, Artifact Interaction Prototype Version #2*

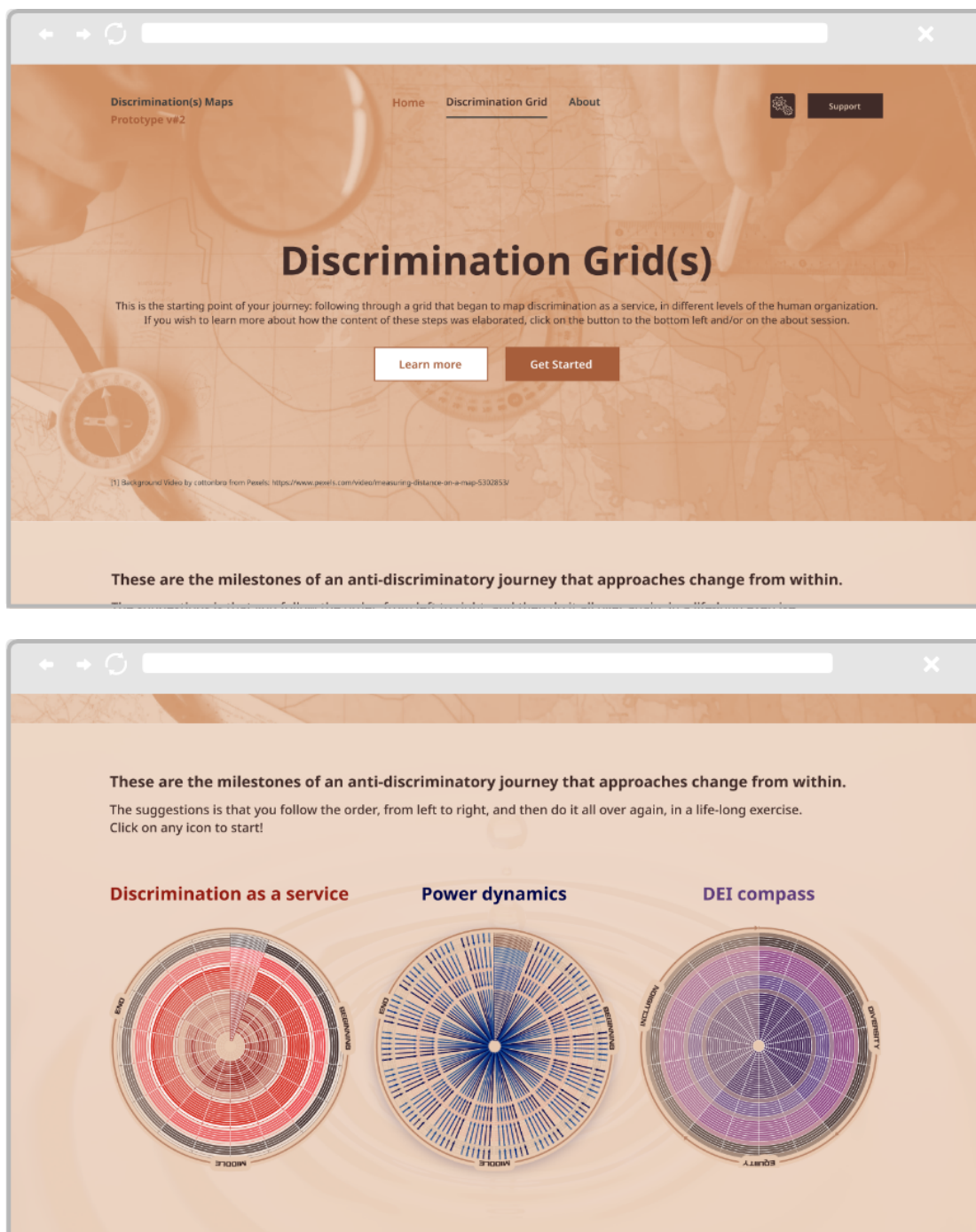
Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

Figure 60 (the author, 2022), suggests a left-to-right access of the three available maps, described in the prototype as the milestones of an experience that intend to generate reflection and change the beneficiary perspective of discrimination from inside-out. In addition, the interface, which was implemented as the result of observing the specialist walkthrough needed for more guidance. Also, the menu available in it adds to the prototype the capability

of allowing the beneficiary to explore more options, as well as this research to understand the different interests of the end user when choosing one grid over the others.

Figure 60

Suggested Journey of Beneficiary, Artifact Interaction Prototype Version #2



Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

This version of the prototype made all levels of the Discrimination as a Service map available to be read by the end-user testing. The following Figure 61 (the author, 2022) illustrates the levels menu and its informations upon mouse hover interaction.

Figure 61

Discrimination as a service, Artifact Interaction Prototype Version #2



Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

Other additions of the prototype that made possible to verify its potential ability to incite the core processes consequent of the reflexivity modes leveraged by service design

were the completion of the four levels of the discrimination as a service and the illustration of self-reinforcing system of discrimination on top of each level. The latter, as well as a more complete instruction of how to use the journeys are illustrated in Figure 62 (the author, 2022).

Figure 62

Discrimination as a service L4 - Tips of How to Use it, Artifact Interaction Prototype

Version #2

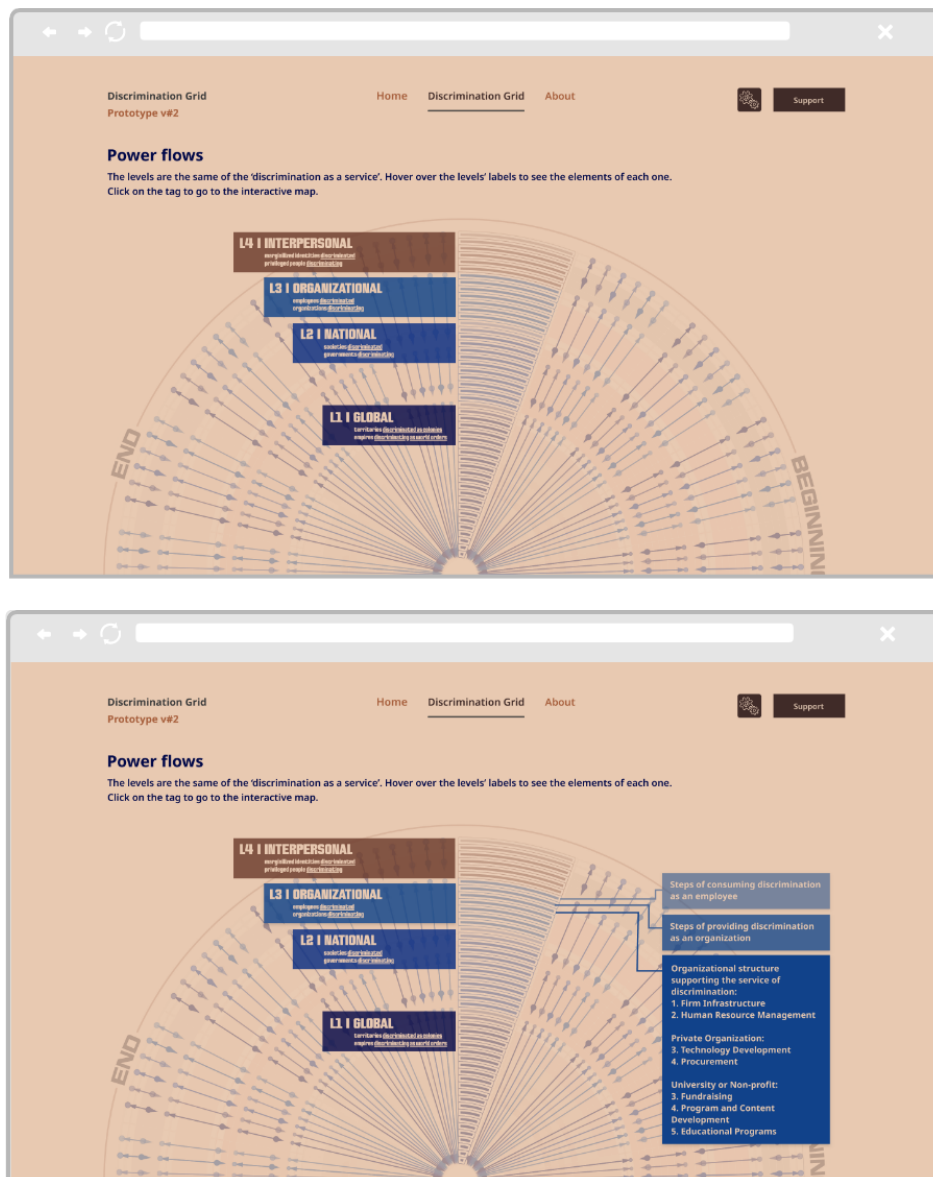


Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

The literature review of this thesis included power as a fundamental aspect of describing discrimination as framed in this research. The power flow visualization was highlighted in this prototype version, as demonstrated in Figure 63 (the author, 2022). The elements of each level are available in the same format of interaction and with the same content as the discrimination maps level.

Figure 63

Power Flows, Artifact Interaction Prototype Version #2



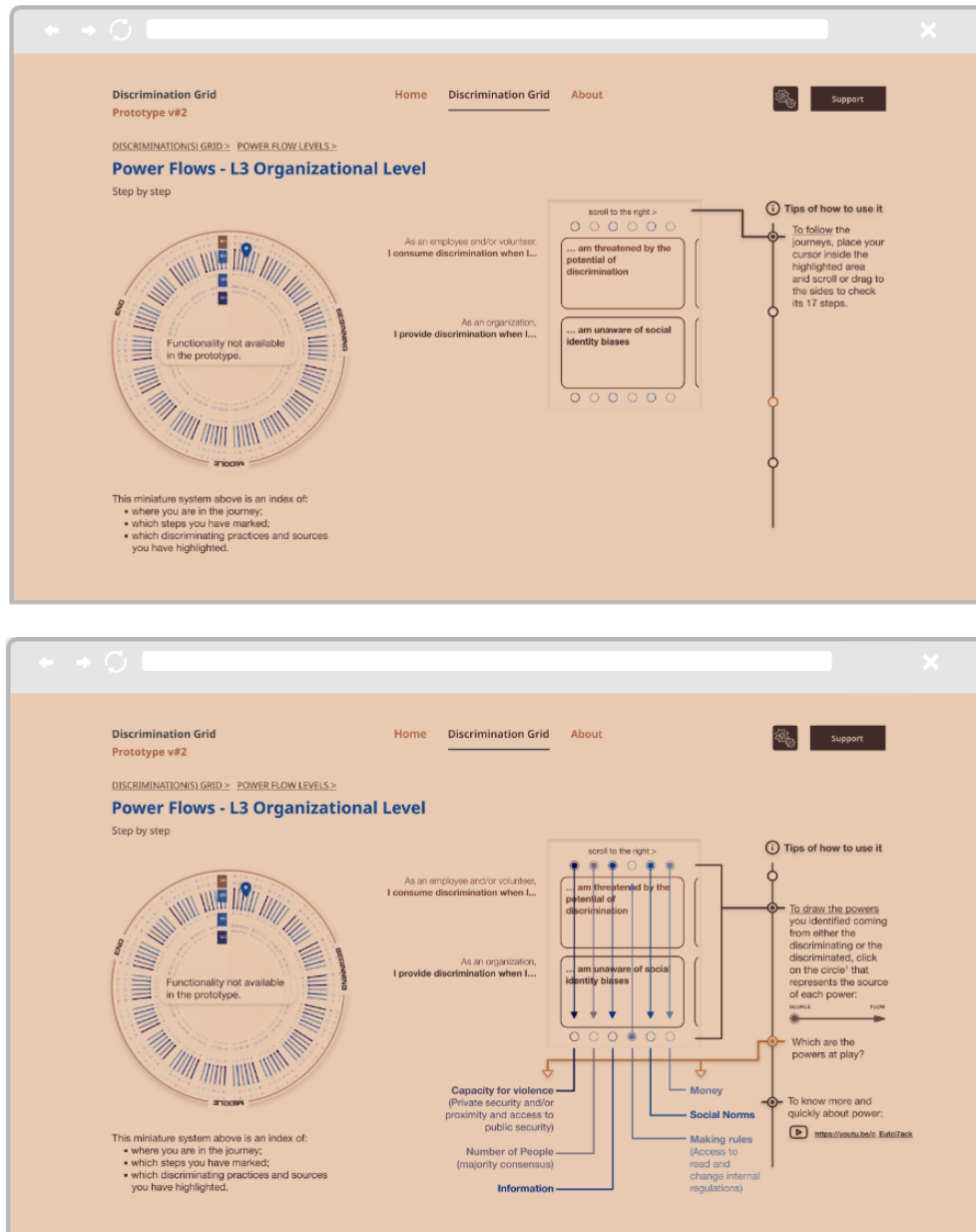
Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

The following interface example of the second version of the prototype, Figure 64 (the author, 2022), illustrates the interactions where, over the steps identified by the user, it is still suggested the reflection upon the powers in place of the last version of the prototype.

To the right, the increased guided instructions have been illustrated.

Figure 64

Power Flows - L3 Journey, Artifact Interaction Prototype Version #2

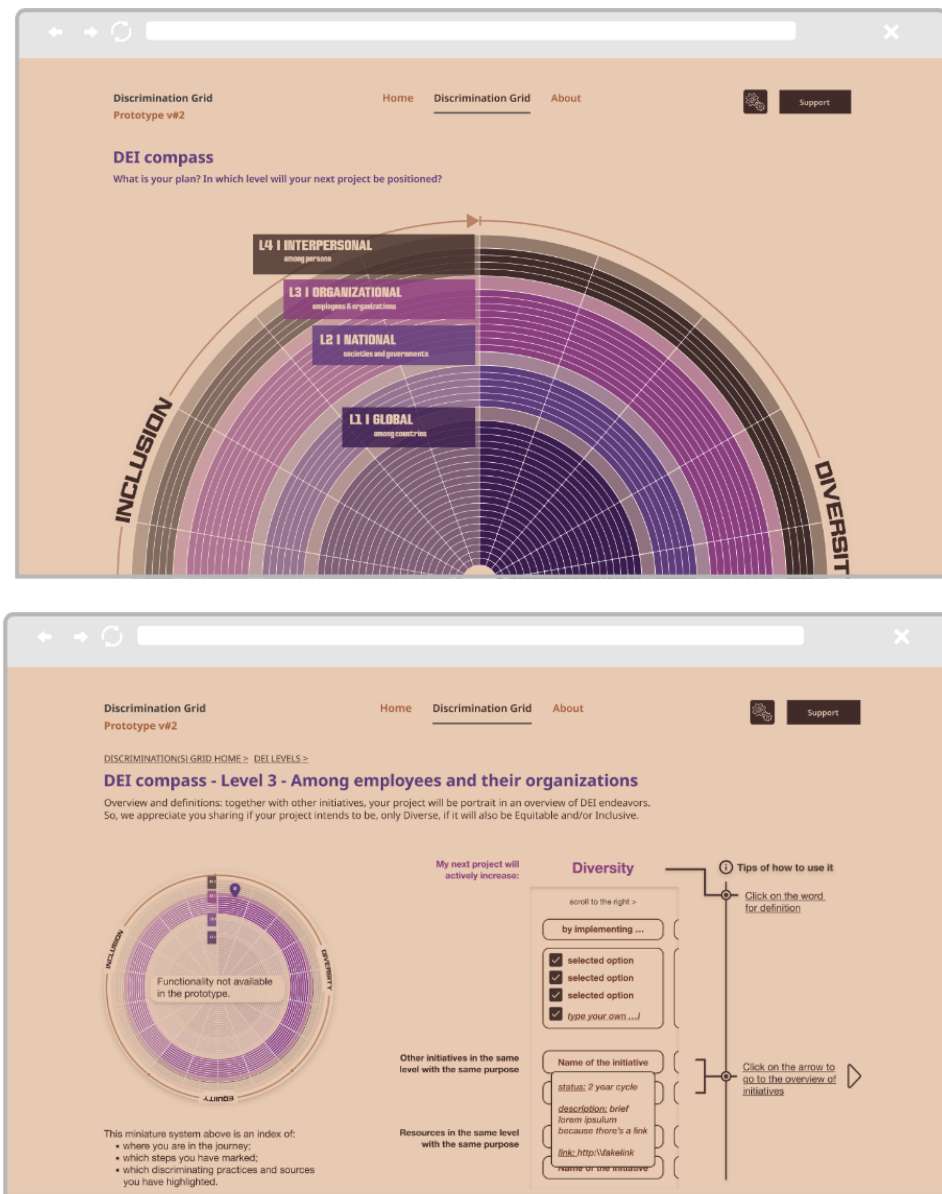


Note. The author, 2022. The interactive version of the prototype is available until the end of 2022 in the following link: <https://xd.adobe.com/view/2ded3f74-fdbd-412b-9f34-455d18c3a401-78be/?fullscreen&hints=off>

To illustrate the last interfaces of this version of the prototype, which anticipates the “realize value” step in the service lifecycle, a DEI compass is suggested as the final interaction and potential compass to understand the initiatives already taken into addressing the issue and to what directions they are focusing, being the combination of Diversity, Equity and Inclusion actions the only anti-discriminatory practice that demonstrates potential to mitigate discrimination and reduce inequalities. Figure 65 (the author, 2022) illustrates the mentioned interfaces.

Figure 65

DEI compass, Artifact Interaction Prototype Version #2



Note. (continued)

being service design experts and/or practitioners, decision makers and having the potential and ability to become future co-participants, as well as presenting the ability match to the interaction mode made available by the prototype, Figure 59 (the author, 2022). The interview guide and the participants professional activity is available in Annex 3 and it has been formulated as both quantitative and qualitative research.

Figure 66

Netnographic questionnaire results

What is your field of practice and your professional activity?

6 responses

Marketing, Graphic Designer

Product designer

Fashion assistant

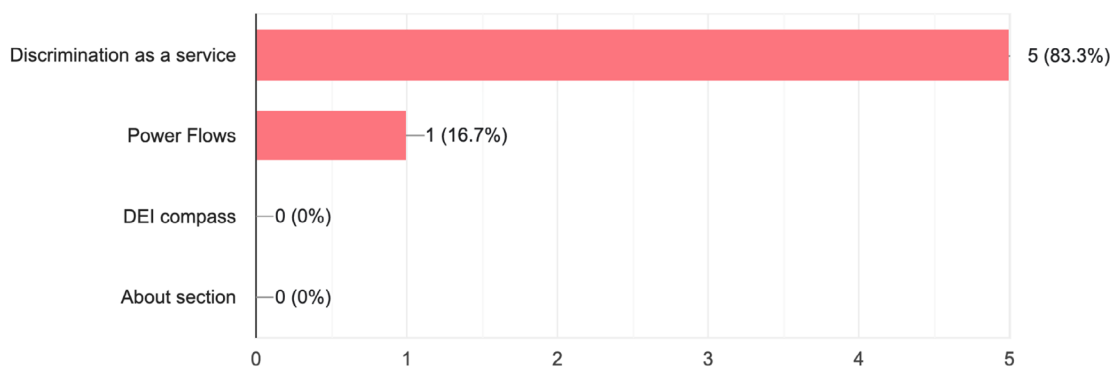
Service design and product manager for a Health care company

Service Design Consultant

Graphic Designer

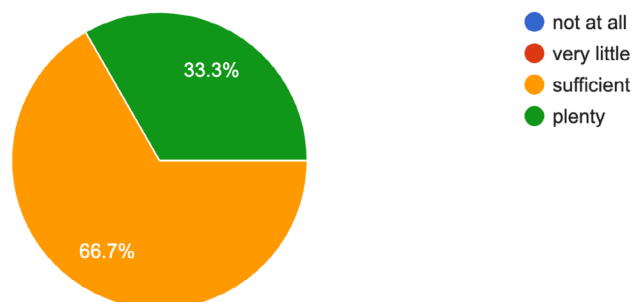
Which sections of the prototype did you explore to the fullest? (e.g.: interacted with and read all content)

6 responses



How much did visualizing these structures and the overall journeys affect your perception about discrimination?

6 responses



If you answered 'sufficient' or 'plenty' to the previous question: can you describe how did visualizing these structures and the overall journeys affect your perception about discrimination?

5 responses

Although considering myself slightly initiated to the thematic, observing it in an organized visualising "tool" has helped me in understanding it better. It also, and furthermore, provided an excellent tool of "comparison" on the theme.

It was interesting to see the levels (interpersonal, organizational, etc) and how much discrimination is disseminated in all these spheres. It was also interesting to see from the perspective of the provider of discrimination (myself identified as a part of a minority group), and how providing discrimination can be present in different (and often subtle) ways.

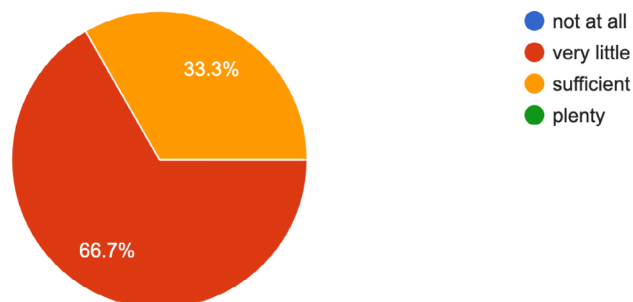
It made the different dynamics more visible did not have the perception before that we could cluster discrimination in that amount of levels

Discrimination can happen at many different levels, in different ways and it is impacted by different structures.

I believe that through these visualizations it was possible to perceive/reflect on how much or how discrimination is present in all interactions and how much it can be subtle, or hidden... imperceptible.

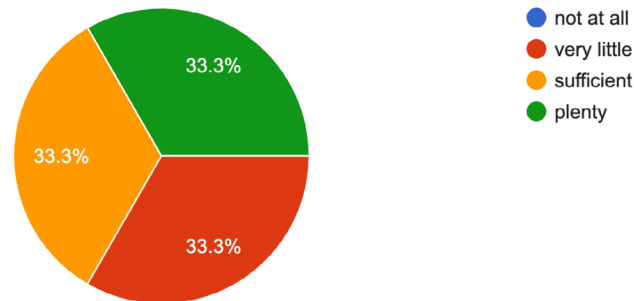
How much did the fact that some of these journeys portrayed a historical period supported your reflexivity?

6 responses



How much did the use of this tool interfere in your understanding of having actionable power over these social structures?

6 responses



How much did this artifact supported your ability to “differentiated subsystems or spheres of society such as the family, state, and market”? (Vink & Koskela-Huotari, 2021)

5 responses

Sufficiently, as the existence of such spheres hardly goes noticed without them being emphasised by an instrument as this.

It helped plenty to see from a micro (interpersonal) to a macro (global) perspective.

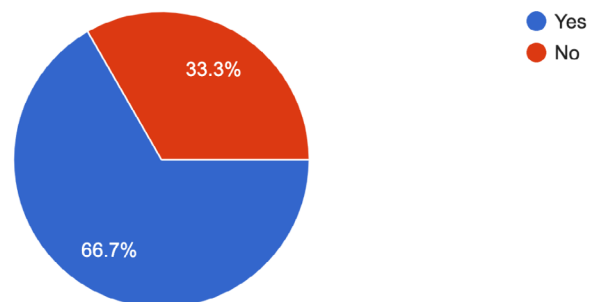
It made it very clear the differentiation

It showed me that there are many different 'zoom' levels that are relevant at different moments of reflection, different phases in a design process.

A lot

Do you, as a participant, feel the need to write or interact in different ways?

6 responses



Which interactions were missing to you and which ones were your least favorite?

5 responses

The prototype is a bit slow, even using a high grade personal computing hardware device. While I explored the material I could all but imagine how incredible it would be to have a printed-out, card game like version of this material. It would provide a great tool for workshops and live discussions, something that could be highly appreciated considering the theme.

It would be helpful to have explanations about some technical terms that I am not aware of (e.g. overtly, covertly).

I prefer the interactions presented in the power dynamics visuals, more simple and direct than the other interactions

I think I would need more time with the tool to fully understand the different use cases and interaction options.

I think this tool made me think that some action can be possible, it's a call-to-action tool in my opinion, so I would like to explore more with my team workers, in a project, maybe with a client...and probably a customized version for it.

Conclusion

Relying on your expertise in SD or decision making, do you think this artifact can assist in any other way beyond what it is intended to (which is to support service designers and decision makers to individual and/or group reflexivity before starting new projects)?

5 responses

As a (non-service) designer, I believe this is a useful tool for mostly anything that involves making choices that affect other people.

Yes, I believe a simplified version of the artifact could be helpful to any person (i.e. non experts) seeking to understand more about discrimination.

I think this can be used by companies, politics and be applied in different parts of our society making it visible that all decisions can make an impact on discrimination

It can assist and be a conversation starter. For it to be really effective I would need to find a way to embed this in existing (project) routines. So that it is not a nice extra thing to do, but an essential step in the project. I would also need it to be more translated to my (work) context.

For me this tool is first and foremost a tool for self reflection, so yes. That's why I see that the potential for transformation is high, I don't believe in real transformation without an internal transformation.

Do you think this platform can or should go beyond researchers and designers?

6 responses

Yes. As previously mentioned it could be an interesting board/card game - few adaptations required.

Yes, definitely, as it covers from a micro to a macro perspective how discrimination is present across many spheres of our lives.

Yes!

Yes, should be something to show in schools and to teach society of how discrimination can impact in so many levels and moments of our life

It would be relevant for everyone that is open/looking for a reflection tool on the topic.

Yes, I think it has educational potential...academic potential as I believe any DEI initiative should be mandatory not optional as we see in most of Academic courses

Last one: is there anything else you want to highlight, suggest or criticize? All feedbacks are welcomed!

5 responses

It's a courageous act to endeavour in exploring a theme as delicate as this and to try to create a "tool" that aims to help on diminishing such problem. Hence I cheer and wish great success for this project, in the hopes it can be used, improved and modified upon in a short future.

This research is extremely important to our society and the level of depth is truly incredible. Wishing the tool will be launched soon and designers can use it to become truly inclusive.

That I would try to spread as much as we can the toolings

The tool and prototype is visually appealing, so inviting users to interact with it. It feels like a very extensive piece of work, that can also be a bit overwhelming upon first view. I think the tool/prototype from a guided introduction (video) that introduced the tool, its intended step by step approach on how to get started to make it accessible for all.

maybe the tool could have reflexivity levels or complexity levels in the future to encourage more people to start using it use of it for

Note. The author, 2022. Questions available in <https://forms.gle/k7emXpJSfLegkciB9>.

Although insufficient to qualify a proper sample, the responses obtained are already suggesting a pattern and will be further discussed and addressed in the conclusion.

Summarizing these results presentation, the prototype and correspondent

investigation were able to partially answer one of its main research questions of how service design can address such problems.

The discussion around validity, emerging patterns perceived and insights will take place in the conclusion of this thesis, in the next chapter.

8. Conclusion and Next Steps

Based on the research questions that guided this thesis, the author's perspective and interpretation of findings and results will feed this chapter with the objective of providing discussions and reflections around validity and next steps.

8.1. Can service design approach such problems?

This sub-section is dedicated to discuss and reflect about the results that sought to answer the first research question of this thesis.

8.1.1. Results Interpretation

Throughout the literature review on the subject of discrimination, the gathered insights and understandings of the concept of being ineffectively countered when addressed as a fragmented set of problems, have established the ground upon which the problem of discrimination became reframed into the the lack of an integrative perspective of such phenomenon. (Altman, 2020)

Next, the research was able to identify in the literature on the matter, sufficient statements about commonalities of the colonialistic origin and structure, as well as convergence into human experience through intersectionality; both describing a potentially common and enforced system. This system was portrayed as the result of conscious and designed choices and, by presenting itself as such, was indicative of being possible to visualize.

Sequentially, service design and design practices were investigated and perceived as practices that have been increasingly aiming at and approaching social structures. Furthermore, the area of study demonstrated attempts to evaluate its own role and exercise to impact these same structures.

Into understanding, more generally, if the design field as a whole was questioning and intentionally shaping societies and norms, a scattered literature review took place to collect mentions of design's exercise towards social issues and documented what the author considered to be a partial answer to this sub-chapter given question.

The partial answer to the former paragraph being 'yes', design can approach such problems, became a better formulated hypothesis when this thesis documented a call to

action, principles, a study on reflexivity modes leveraged by service design and a value assessment tool of design's societal impact. (Design Council, 2021; Dietkus, 2021; Fisk et al., 2018; Vink & Koskela-Huotari, 2021)

8.1.2. Challenges and limitations

Although the desk research being presented as the partial and mostly positive answer to service design's ability to address and mitigate complexities such as the discriminatory system, this thesis challenges were met when paradoxically, it became a biased production consequential of the very problem it was set to address.

The research sources and epistemic privilege of the westernized, eurocentric and american production have been the main theoretical concepts behind this research and, in spite of the fact that the author intentionally attempted to diversify its sources, the final result became fundamentally based on the very structure it is criticizing.

In addition, the global level of decolonization has also been discussed and documented from the perspective of imperialistic production and, once again, while the author's lense might have added a balance into interpreting these optics, the very nature of the research to be descriptive became the second and additional challenge presented.

Finally, the insight of discrimination as a traumatic experience pointed out by Dietkus (2021), should not, in the authors opinion, be interpreted as a challenge but, when in comparison with traditional interviews an co-design sessions' methods, it imposes an important limitation to how discriminated experiences can be known and investigated without objectifying even further persons' and peoples' marginalised experiences.

8.1.3. Reflections

It is also worthy of mention, from the author's perspective, the fact that service design familiarity with intangible resources alongside its potential of generating reflexivity accelerates simultaneously and in the same weight, the subfield's capability and responsibility to address social problems.

The manifestation of such is already evident in the industry exercise, testified by a brief, yet meaningful experience as a service designer apprenticeship. The author stands in favor and support of this direction which is believed to be the only one towards a sustainable future.

8.2. How can service design approach such problems?

Moving into the solution space, this thesis relied on a mix of inside-out design methodologies to propose an output that would answer to the reframed problem and to the second research question of how service design could address the lack of integrative perspective of discrimination.

8.2.1. Results Interpretation

From the initial problem space of desk research about discrimination and design, insights from the theoretical concepts of the first chapters have been presented in Table 8 (the author, 2022) to document and inform this thesis ideation of discrimination as a service.

By extracting, from the literature review of discrimination, journeys described from both the discriminating and discriminated perspectives (Table 3, the author, 2022), and formatting them according to the service blueprint method of service design, the author produced what became the MVP of an artifact, presented in chapter 6 (Figure 35, the author, 2022).

The meta perception from the author of reading and reflecting about the journeys produced, alongside the desk research insights mentioned in the previous paragraph, fed the ideation of an artifact to be used as a reference and guide anti-discriminatory practices.

As a sequence, the criticism phase demanded by the design thinking approach of innovation of meaning was adapted to replace “interpreters as stakeholders”, for this thesis mentorship session, and simultaneously, to be the first iteration loop of a sprint execution methodology.

The first iteration loop, materialized in presenting the MVP of the discrimination as a service to a service design specialist, this thesis mentor, generated learning insights that have been presented in chapter 6, and that led to the production of a medium level and semi-functional interactive interface prototype.

The mentioned prototype test and insights constituted the second iteration loop and became also an instrument to investigate whether the reflexivity modes that service design leverages were indeed being occurrent as expected and if they were, as described by Vink & Koskela-Huotari (2021, p. 6), activating the “core processes” that are the “means to erode institutional property”.

Sparking at least one of the three core processes needed to erode social institutions,

“revealing hidden structures” (Vink & Koskela-Huotari, 2021, p. 6) was noticed and spontaneously mentioned by the DEI specialist and, from additional feedbacks described in chapter 6, a service lifecycle architecture and blueprint draft, together with a second version of the prototype have been designed to address the feedback learnings.

Finally, the third and last loop of this research materialised in the service design lifecycle architecture, the second prototype testing, and the feedback from potential end users.

As described in the previous chapter, the insights of the users informed and anticipated a potential fourth loop to be presented in the recommendations of this chapter.

Overall, the feedback from the last prototype test demonstrated that the materialised artifact is one possible form of how service design can address such problems.

8.2.2. Challenges and limitations

The challenges and limitations of this artifact lie mainly on the fact that the participant selection and the responses of the feedback testing are insufficient to confirm the validity of the insights obtained.

In a qualitative research of the nature of this questionnaire, the expected and recommended minimum of thirty participants has not been achieved. (Morse, 2000)

This limitation is attributed, in the author’s (2022) perspective, mainly to the short time span of the research period as, informally, it was possible to know that the invited participants were not reluctant due to the triggering nature of the exercise.

Another aspect of limitation was the diverse sample of participants being insufficient in geographic terms, restricted to professionals located in Europe and familiarised with as well as self-declared belonging to a western perspective. To this challenge, also raised on the second feedback loop of the interview with a specialist, it is possible to envision a future solution that will be presented in the respective sub-chapter.

8.2.3. Reflections

The intended integrative overview of discrimination has been achieved and, from the questionnaire feedback, it is assumed to also be perceived by potential end users.

Addressing the feedback that suggested a broader context of use, although the service lifecycle architecture foresees a co-participation that would generate a cycle of inclusivity

to improve and validate the presented map(s), the artifact itself does not yet comply with what the author (2022) believes and has researched on co-participation generating truly inclusivity. Therefore, complying with the suggestion would demand other iteration loops.

In addition, the structure of the service is in pending validation as the organizational functions of non-for-profit services were not the focus of this research and have been designed in a high-level insufficient for implementation.

Nevertheless, the demonstrated impact and value realisation of potential end users were satisfactory to support an answer to the second research question being, the artifact and this thesis overall methodology, are one possible materialisation of how service design can address such problems.

8.3. Recommendations

Improvements originated from the comparison between the presented Table 8 (the author, 2022), containing the application of theoretical concepts, the mentorship criticism and the two cycles of prototype testing suggest that another loop of validating the organizational structure of the service and prototyping an end-to-end beneficiary lifecycle, specially focusing on the co-participation stage, are imperative before any consideration of beta launch.

Additionally, it is fundamental that the prototype, as it is, becomes tested in diverse contexts and by diverse service design experiences to acquire a robust and reliable pattern of value perception by the beneficiary, as well as feasibility perspectives.

The recommendations from the second and last test of the prototype also suggest the tool to be adapted to other beneficiaries, beyond service design and decision making, which would imply a modified interface to respond to their demands.

It is then recommended that this prototype does not become a reference of end result but an initial stage reference and mainly an example of a continuous improvement platform iteration.

8.4. Contributions

The concept of discrimination as a service was the starting point of this thesis attempt to map individual journeys that have been importantly and necessarily personified but at the same time complex to be perceived as a potential collective and active movement of change.

The following considerations are descriptive of motivating this research.

Firstly, the author's own experience as a service design apprenticeship and practitioner informed the perception of service design as an impactful and integrative practice that produces artifacts capable of communicating and informing large scale decision making at the organizational level.

Secondly, still in the realm of the author's perspective, having an identity that has been proven and communicated as socially challenging and openly questioned in many contexts informed the author's tacit knowledge of navigating often enough, what the literature stated as a marginalized journey.

Thirdly, the author's willingness to openly and purposefully investigate their own bias which many argue to be inevitable in the design practice, became exercised as an important step of the emerging model of trauma responsive design research (Dietkus & Service Design Network, 2021) and ideated as co-designing services (Costanza-Chock, 2020).

From this place of speech, it is believed that this thesis' main contribution are the production and support of production of service design outputs that answer the call made by Fisk et al. (2018), to design services for inclusion, as well as to produce social value that can hopefully be understood, if placed in the Design Council (2021) Value Map, as a project to reach "wider/spillover effects" in the socio-cultural domain. (Design Council, 2021, p. 6)

In closure, the author stands for better futures to be conceived and designed with and for an entirety and self-respectful humankind.

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Appendix 1: Interview guide with specialist

Introduction

Brief explanation of the thesis

Tour for the artifact and explanation of prototype evaluation: to assess whether the tool provided for service designers and decision makers can support anti-discriminatory practices.

To reflect about discrimination and to motivate the adoption of DEI in a deeper way

Permission to record and share insights

Objective

Verify if the use of the tool triggers the 3 core processes of building reflexivity through service design (Revealing hidden structures, Noticing Structural conflict, Appreciating structural malleability).

Open question - Reflexivity capability

Did visualizing these structures and the overall journeys affect your perception about discrimination? If yes, how?

Did these maps interfere in your understanding of having actionable power over these structures? If yes, how?

Open question - Temporal capability

Did the fact that these journeys portrayed a historical period supported your reflexivity? If yes, how?

How do you feel about the length of these journeys? (too long?/too short?)

About the interactive part of the journey, do you feel that it interfered in your engagement and in your reflexivity?

Observation

Does the participant feel the need to write or interact in different ways? (e.g.: is the blank space more inviting than the selection?)

Open questions

Now, did you reflect on anything else you want to share?

Relying on your expertise in DEI, do you think this artifact can assist in any other way beyond what's intended to?

Also, do you think this platform can or should go beyond researchers and designers?

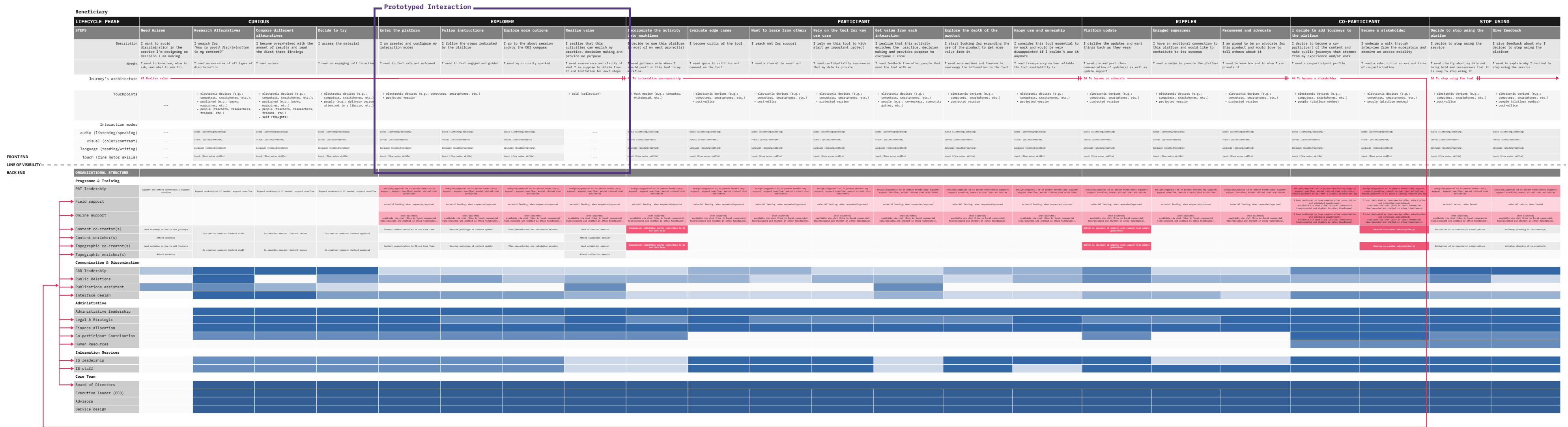
Greetings and transparency

The insights coming from your participation will be accounted for the thesis next steps and anonymity will be preserved if requested.

Appendix 2: Service Lifecycle and architecture prototype

Also available in the following link: <https://miro.com/app/board/uXjVPAE56-A/>

Service Lifecycle and Journey Architecture Discrimination Topography and DEI compass - NGO Platform



Legend front-end

Prototyped interaction

High-level journeys
steps affected by extent of a journey level of the service design

Legend back-end

Designed organizational function's level of involvement with beneficiary step

VERY HIGH HIGH MODERATE LOW VERY LOW

Designed organizational function's level of involvement with other organizational functions

SOME POTENTIAL

Assumed organizational function's level of involvement with beneficiary step

VERY HIGH HIGH MODERATE LOW VERY LOW

Appendix 3: Netnographic research script

Introduction

Brief explanation of the thesis

Artifact description and explanation of prototype evaluation:

- to assess whether the tool provided by service design and for service designers and decision makers can support anti-discriminatory practices.
- to assess whether the use of the tool leveraged reflexivity modes necessary to erode social institutions.
- To reflect about discrimination and to motivate the adoption of DEI in a deeper way
- Permission to record and share insights anonymously or not

Objective

Verify if the use of the tool triggers the 3 core processes of building reflexivity through service design: “revealing hidden structures, noticing structural conflict, appreciating structural malleability” (Vink & Koskela-Huotari, 2021, p. 6).

Closed (not at all, very little, sufficient, plenty) /Open questions - Overall Reflexivity capability

- How much did visualizing these structures and the overall journeys affect your perception about discrimination?
- How much did the use of this tool interfere in your understanding of having actionable power over these structures? If yes, how?

Closed (not at all, very little, sufficient, plenty)/Open question - Temporal and Cultural capability

- How much did the fact that these journeys portrayed a historical period supported your reflexivity?
- How much did this artifact supported your ability to “differentiated subsystems or spheres of society such as the family, state, and market”? (Vink & Koskela-Huotari, 2021, p. 7)

Open questions [optional]

- Do you, as a participant, feel the need to write or interact in different ways? (e.g.: is the blank space more inviting than the selection?)
- Did you reflect on anything else you want to share?
- Relying on your expertise in SD or project management, do you think this artifact can assist in any other way beyond what’s intended to?
- Do you think this platform can or should go beyond researchers and designers?
- Last one: is there anything else you want to highlight, suggest or criticize? All feedbacks are welcomed!

Greetings and transparency

The insights coming from your participation will be accounted for the thesis next steps and anonymity will be preserved, if requested.

Appendix 4: MVP of discrimination as a service

Also available in the following link: <https://docs.google.com/spreadsheets/d/1SrBnZIKxIHYxINHrWNiRUyWM-Igqt-x6tZHFQ87W8/edit?usp=sharing>

Discrimination as a service

Level 0	Core phases	BEFORE	BEGINNING	MIDDLE	END													
Level 1	Empires / Colonies																	
	Economic/Financial Position																	
	Debt Burden (Big Economic Cycle)																	
	Expected Growth (Big Economic Cycle)																	
	Internal Order																	
	Gaps in Wealth, Opportunity & Values																	
	Internal Conflict																	
	External Order																	
	Markets & Financial Center																	
	Innovation & Tecnology																	
	Military Strength																	
	Education																	
	Reserve Currency Status																	
	Economic Output																	
	Trade																	
	Cost Competitiveness																	
	Resource-Allocation Efficiency																	
Infrastructure & Investment																		
Geology																		
Character/Determination/Civility																		
Governance/Rule of Law																		
Acts of Nature																		
Steps World Order (Provider) - As an Empire I...	have a strong leadership that wants more power and more wealth	have strong inventiveness and advanced technology	invest in and have strong education	develop a strong civil culture	achieve a good resource allocation	achieve good competitiveness	achieve strong income growth	build leading markets and financial centers	become less productive	overextend borrowing	lose competitiveness	achieve large wealth gaps	have large debts	print money	have internal conflict(s)	lose status of reserve currency	have a weak leadership	undergo a civil war/ revolution
Steps Colony (Consumer) - As a Colony I am...	encountered	claimed by the colonizer	designed by the colonizer	settled by the colonizer	explored by the colonizer	depopulated from original peoples (Genocide / Forced Migration)	influxed with enslaved and/or displaced vulnerable foreign peoples to increase productivity	subjugated and deprived from my productivity earnings	offered expensive goods in exchange for unequivalent raw material production	territorialized by my colonizer	reflected by my colonizer in my territorial disconnection with its inhabitants	martialized and/or weaponized by my colonizer	indebted due to increase in taxes and/or fees demanded by colonizer	bankrupted by my colonizer	abandoned by my colonizer	recognized as a sovereign state / traded	disregarded as a nation by my colonizer and other nations	marginalized as a nation by my colonizer and other nations
Level 2	Sovereign Nations / Societies																	
	General public services																	
	Defence																	
	Public order and safety																	
	Economic affairs																	
	Environmental protection																	
	Housing and community amenities																	
	Health																	
	Recreation, culture and religion																	
	Education																	
Social protection																		
Steps of Sovereign Governance (Provider) - As a government I...	differentiate peoples	assume supremacy/ superiority	design in group-outgroup norms	stratify and determine civil hierarchy	segregate resource allocation	demand productivity	capitalize lives	comercialize lives	estimulate the wealthy	rely on exploitative production	practice a hierarchical assignment of privilege	enforce value differentiation	legislate social hierarchy	install meritocracy	advertise cultural uniformity and stimulate cultural blindness	penalize crime	propagate stereotypes	marginalize/ exclude less advantaged groups
Steps of Sovereign Society (Consumer) - As a society I...	am diverse	become divergent	assimilate norms	am subordinated	become weakened	am suppressed	dehumanize	become self-exploitative	become impaired	work for subsistence	become further divided	lose social mobility	criminalized by social hierarchy	am implicated by performance	become polarized	become partially incarcerated / murdered	self-segregate	undergo increased inequality
Level 3	Organizations / Employee																	
	Firm Infrastructure																	
	Human Resource Management																	
	Technology Development/Fundraising																	
	Procurement/Program and Content Development																	
	Educational Programs																	
Steps Employee (Consumer) - As an employee I...	am unaware and insecure about an organization's culture	am threatened by the potential of discrimination	am constrained by social norms to design curriculum	have a higher chance of exclusion if I identify with a marginalized group	am submitted to the meritocracy myth, minority models and all discriminatory systems that make a marginalized identity excluded from such institutions	am prevented of social mobility	undertake higher potential of suffering micro-agressions and/or enjoy privileges	my individual privilege or marginalized identity are functionalized	am constrained if marginalized and misguided if privileged	feel overloaded if marginalized and/or overvalued if privileged	lose agency over my personal life which is either censored or outsourced	have my personal improvement compromised	have my career advancement hindered and/or impeded if marginalized and naturalized if privileged	have my contributions invalidated and stolen if I have a marginalized identity and I have my work ethic discouraged if I'm privileged	have my marginalized identity and experience silenced and relativized or I have my privilege concealed	have my career threatened and/or terminated if I have a marginalized identity, and I have my career devalued if I am privileged	lose individuality if I have a marginalized identity and I am blinded if I have a privileged identity	assimilate, internalize, reproduce and normalize social hierarchy and marginalization
Steps Organization (Provider) - As an organization I...	don't have goals/ guidelines to build and manage a diversified workforce	am unaware of social identity biases	rely solely on personal judgement for curriculum analysis, regardless of the person who will perform the analysis	recruit without acknowledging social privileges	pre-select based on elite educational institutions	reject selection based on debt analysis	perform unprepared interviews	consent with homophilic or tokenistic hiring	reward a behaviour from a group and punish the same behaviour from marginalized social identities	demand more results from marginalized social identities	assume limitations or flexibility based on parental status	give less performance feedbacks to marginalized people and/or with less regard	promote disproportionately and unreasonably a specific privileged group	dismiss or miss attribute credit for marginalized identities contributions	deny the existence of social hierarchy and privilege and refuse to perform continuous self-assessments	reprehend and/or dismiss harshly, disproportionately and unreasonably a marginalized group	support professional decisions made upon social identities stereotypes	have a sustained homogeneous and privileged social identity in leadership positions
Level 4	Interpersonal Discrimination																	
	Implicit Bias																	
	Privilege																	
	Covert Overt																	
Steps Discriminating (Provider) - I provide discrimination when I...	perceive social identities	stand by an internalized supremacy and/or superiority linked with a privileged social identity	base my judgement on merit regardless of social identities	self-exempt of responsibility regarding marginalized realities	deny my privilege and practice a self-made success discourse	disconsider or refuse to socialize with a person solely based on a specific marginalized identity	suggest verbally and/or with attitudes that I value less a person with a marginalized identity than a person with a privileged one	assume equality is the status quo	consciously choose my privilege over a marginalized person's loss	ask a marginalized person to assure something that I wouldn't ask a privileged person to assure	state that a person's marginalized identity justifies lower benefits or worse conditions	actively disconsider people with marginalized experiences and/or avoid empathy attempts towards them	assume and combat criminality based on a marginalized social identity	disconsider or ignore a person's opinions and ideas because of their marginalized identities	become defensive, disengage and/or avoid conversations about marginalized identities	refuse to stop commenting and/or talking about marginalized identities in a way that I've learned to be offensive to them	act upon assumptions I have about a marginalized identity without knowing the person	consider a person exotic or objectify a person because of their marginalized identity
Steps Discriminated (Consumer) - I consume discrimination when I...	am perceived as a marginalized social identity	identify with an inferiorized social identity	am evaluated by results and performance regardless of my marginalized experience	hear that my marginalized identity experience is the consequence of my choices	undergo a heavier and/or larger load of challenges than my privileged counterpart to achieve the same goal	am ignored or dismissed based on my marginalized identity	hear or perceive someone diminishing me because of my marginalized identity	internalize the inferiority attributed to my marginalized identity	am deprived of opportunity or choice because of my marginalized identity	realize people suspect me, a marginalized identity, more than my privileged peers	have or receive lower benefits or worse conditions than my privileged peers for the same activities	am isolated because of my marginalized experience	am profiled, incriminated and/or harassed based on my marginalized social identity	am not paid attention to or heard because of my marginalized identity	am impeded or asked to not talk about my discriminated experiences to avoid privileged people's discomfort	internalize the constant micro-agressions directed to my marginalized identity and change my behaviour	am treated as a marginalized identity first and as a person second	impersonate the exotic or objectified identity attributed to me because of my marginalized identity