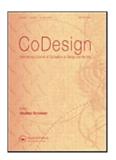
# CoDesign



# Computing and the Common. A case of Participatory Design with think tanks

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# Computing and the Common. A case of Participatory Design with think tanks

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With this paper we contribute to the ongoing discussion on the transformations of Participatory Design to address current societal transformations. We focus on how the implications of the emergence of financialised capitalism could be reduced by the nourishment of the common. In taking this approach, we claim that nourishing the common, which refers to the ensemble of the material and symbolic elements that tie together human beings, would allow a renewal of Participatory Design, reinvigorating its political agenda. We base our reasoning on a project called ThinkDigiTank, the goal of which is the construction of a digital platform supporting a network of Italian organisations aimed at producing political and cultural thinking. In this paper, we theoretically articulate the needs of a PD process nourishing the common and we discuss the empirical case, highlighting the possibilities of a renewal in PD and practical strategies to support *commoning practices*.

**Keywords:** Participatory Design, Common, Politics, Process

#### Introduction

Today, participation is a keyword used in business, public administration, and media production. Initiatives involving people, from time to time labelled as customers, citizens, or fans, are launched almost daily in efforts for better marketing, failure reduction, or cost reduction. It seems like the efforts of Participatory IT Design (PD) to democratise the design and implementation of digital technologies in the workplace has been overcome by the development of a widespread *participatory culture* (Jenkins

2006).

Nevertheless, we argue that such attention to participatory processes is actually hiding what was one of the key elements of PD since its origins: the political economy of technology and labour. As with Greenbaum 20 years ago (1996), we propose how PD can deal with the mutated social context, characterised by the emergence of financialised capitalism in which capital accumulation happens by dispossession (Harvey, 2014), extracting value from social cooperation and even from life itself (Morini and Fumagalli 2010). To do that, we elaborate on the concept of the common, an expression used to refer to the ensemble of the symbolic and material elements that tie together human beings. The common is the raw material and the outcome of social cooperation (Dardot and Laval 2014), independent of how social cooperation itself is organized and what differentiates social practices is their relation with the common itself: the common can be nourished, through initiatives making it grow sustainably over time (Hardt & Negri, 2009), or dispossessed, as capital does (Harvey, 2014). The contemporary accent on participation could be read as entrenched in dynamics, like the one of social media (van Dijck, 2013) or platform capitalism (Srnicek 2016), that are actually dispossessing the common more than nourishing it.

To describe and discuss our theoretical proposal, we suggest practical strategies PDers can rely upon in the changed societal landscape, drawing upon a PD process oriented toward nourishing the common (Teli et al., 2016), in alliance with highly skilled precarious workers (Teli, 2015). Specifically, we will discuss the ThinkDigiTank project that involves the design and construction of a digital platform supporting the work of a network of Italian think tanks. The project has been participatory in two different ways. On the one hand we, the designers, have been involved in an initiative of our "participants", acting both as facilitators and as part of the working group. On the

other hand, the participants themselves have been involved in a process that provided them with the methodological skills to carry out the design work.

#### PD nourishing the common

Our aim is to reinvigorate the political orientation of PD through the accent on nourishing the common. This is particularly significant in a period in which participation can be used to support the elite, transforming participation into a conservative practice while depicting it as a progressive one (Palmås and Busch 2015). Moreover, the widespread narratives on participatory cultures (Jenkins, 2006), prosumers (Toffler 1980) or produsers (Bruns 2007), are now sided by more critical understanding of how contemporary computing, social media in particular, are extracting value from social collaboration (Arvidsson and Colleoni 2012; Fuchs 2014). Therefore, when narratives of participation become so widespread and rhetorically triumphant, the political economy of digital technologies is turning over the social and political ambitions characterising PD in its origins. In fact, the seminal work in PD was entrenched of political positioning, referring to the context of industrial relations, like the UTOPIA project (UTOPIA Project Group 1981), and to the quality of work (Ehn 1989). Nevertheless, recent literature reviews (Halskov and Hansen 2015) or relevant contributions like Simonsen and Robertson's (2012) introduction to the recent International Handbook of Participatory Design, have stressed or endorsed the recent downscaling of the political ambition of PD toward the participation of people in influencing the technologies they will be using. The need to return to conceptualizing power and dominance in PD is not new (Beck 2002) and the issue of power is coming back to the fore (Bratteteig and Wagner 2014) as well as the possibility of renewing the attention PD devotes to politics (Karasti 2010). This renewed attention appears in different ways, from the need to support people in influencing the mediating structures

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in which they are immersed (Light and Akama 2014) to the attention given to the formation of publics (DiSalvo, Clement, and Pipek 2012; DiSalvo et al. 2014), potentially adversarial to dominant centers of power (DiSalvo 2012). What we argue is that given the centrality of digital technologies in transforming the political economy of contemporary societies, a renewed political agenda should find a way to think about political economy without discarding the wealth of existing PD research (Teli et al., 2016).

To do so, the common perspective extends Light and Akama's perspective on "bringing people into the design of the invisible mediating structures around them" (2014, p. 153) to more general narratives, able to discuss the societal changes in financialised capitalism and to suggest possible directions for design. Our reference to the common is grounded in Autonomous Marxism (AM), which focuses on the anthropological priority of freedom over institutionalised power, the social priority of the multitude of the poor, and the affective priority of love over hate (Hardt & Negri, 2009, summarized with regards to the field of computing by Hakken, Teli, and Andrews 2016; Teli 2015). That implies that conflicts in social life are characterised by the trials of institutionalised power, the rich and hate, to contain and discipline freedom, the multitude, and love (itself) (Hardt and Negri 2001; Hardt and Negri 2009). A convergence between PD and the critical analysis of current societies could benefit scholars, activists, and practitioners who could collaborate in building future social relations through a becoming with approach, reconsidering the pre-existing conditions through a mutual and reflective process (Akama 2015).

Our proposal of a common perspective avoids the risk of PD becoming excessively focused on the local dimension, focusing on the details of a specific project losing sight of wider social phenomena (Sabiescu et al. 2014). Indeed, contemporary PD has

focused on the commons (Ostrom 1990) - with a final "s" and distinct from the singular "common" - that are defined as institutionalized forms of collaborative management of shared resources, with examples like pastures and fisheries or Wikipedia and Free Software projects (Hess and Ostrom 2007). In this reading, the accent has been placed on the practices of commoning (Marttila, Botero, and Saad-Sulonen 2014) and on the commons as a way of opening production (Marttila, Nilsson, and Seravalli 2014). With practices of commoning we refer, following Marttila et al. (2014 a) and Linebaugh (2008), to a vision of commons as the results of activities and not just as resources. Moreover, it has been stressed how such practices could be articulated in three subsets, owning in common, producing in common, and organizing in common (Bresnihan and Byrne 2015), and how such practices could constitute a renewal of society (Esteva 2014). In fact, we agree with the idea of the commons as a relevant organisational and institutional arrangement to be included in the design of digital technologies (Teli, 2015). However, its potentially localistic accent calls for a more general concept, like the common we propose to adopt (Teli et al., 2015). As stated above, the common can be seen as an ensemble of different material and symbolic elements, and practices of commoning that nourish the common are the practices that not only nurture the local resources or social relations but also the wider ensemble.

It is possible to argue, as we do in this paper, that PD is a practice of commoning in itself, especially in reference to producing and organizing in common. In this line of thought, we identified four strategies for a reading of PD projects as nourishing the common (Teli, Di Fiore, and D'Andrea 2016). First, PDers should identify an arena of action that is consistent with the possibility to promote societal transformations (Gartner and Wagner 1996), oriented toward nourishing the common. Second, they should clarify what the social groups are and how they are connected to nourishing the

common (Teli, 2015). Third, they should promote an open ended design process in which participation is ready to be overtaken by other actors (Andersen et al. 2015). Finally, PDers should find a way to discuss and evaluate how the condition of the participants gets improved, what Bossen at al. defined as *user gains* (2010), being aware of the complexity of evaluating participation (Gerrard and Sosa 2014).

#### ThinkDigiTank and the common

ThinkDigiTank is a project aiming to create a collaborative platform for a network of Italian leftist think tanks (organisations devoted to political and cultural production). The network is composed of eight organisations, reputed for being the most influential leftist think tanks in Italy, which decided to consolidate their relationships in order to better face the reduction of financial resources and the changing political landscape.

In 2013 two concurrent phenomena started to marginalise the role of think tanks: the rise of Prime Minister Renzi and the success of the Five Star Movement, a new political formation which drastically changed the Italian parliamentary composition. These changes have pushed the think tanks toward rethinking their role and, at the end of 2014, ThinkDigiTank was formed as part of this effort. A network of existing social relations, among ourselves (as designers) and six researchers working for one or more of these think tanks, has been the basis of the project's existence. In our perspective on PD as nourishing the common, we consider this network of social relations as the first relevant common: allowing for the emergence of the project while also supported by it.

The institutional conditions around ThinkDigiTank has been based on sharing an interest for the conducted activities and nothing more (financial compensation was out of scope for both the designers -us- and the participants). The six researchers, besides being "participants", worked as "participatory designers" with our training, guidance

and collaboration. They conducted interviews, analysed them, wrote personas and scenarios. We achieved two competing results in terms of nourishing the common: increased academic knowledge on PD and favour networking among think tanks.

A third view of nourishing the common in connection with ThinkDigiTank, is that since think tanks deal with political and cultural elaboration, our project was indeed connecting the local, organisational level, with the societal level. In addition, ThinkDigiTank was conceived as an open ended process, creating the conditions for the project to be taken over by other entities.

### ThinkDigiTank: the process

The project started with the intent of defining a new technological platform supporting a network of leftist think tanks. More specifically, we were mainly involved in facilitating a process of construction of personas and scenarios, intended as representative of the requirements the technological platform should satisfy. The decision-making that characterizes PD (Bratteteig and Wagner 2014) was therefore at the point of identifying the technological needs of the network of think tanks. However, as we will show, the design process also achieved the consolidation of novel forms of collaboration and the establishment of a mutual understanding between the think tanks.

Initially, the process was expected to last approximately nine months, for research and implementation of the first prototype. Indeed, the actual process unfolded more slowly than expected: two years have gone by and the implementation is still ongoing. The process has been slow in order to accommodate participants' needs and institutional conditions, allowing for the setting of their common goals and creating the relational bases to build and adopt a collective platform based on collaboration and sharing. In this way, the nourishment of the common has been conceived as a condition inscribed in the

CoDesign Page 8 of 24

technology to be.

The project started within a **public presentation** (1) (see Figure 1 for a summary of the phases) held in December, 2014 in which many members of Italian think tanks participated. The outcome was the proposal for a collective platform, to foster communication and information sharing among the members of the think tanks. In this meeting we delivered a talk, introducing PD as an approach to promote social relations among the Italian leftist organisations. At the end of the meeting a **working group** was created, which was formed by 6 researchers working for the 8 think tanks, in order to collaborate with us on the PD process.

Because of the physical distance (600km) between the headquarters of the think tanks in Rome, and our workplace at the University of Trento, the process **planning** (2) envisioned intensive and intermittent face to face meetings in Rome and a longitudinal remote support.

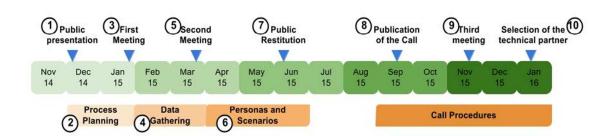


Figure 1: The ten phases of the ThinkDigiTank project.

The project officially started in January 2015 with a **first** two-day intensive **meeting** (3). We focused on the basics and the rationale of PD, introducing the role of interviews, scenario and personas. Some members of the ThinkDigiTank group had previous experiences of interviews, and we chose to leverage their existing knowledge. Then the ThinkDigiTank group worked on **data gathering** (4) activities, conducting

interviews and transcribing them. We provided remote support via email and Skype, discussing the modification of the interview outline and backing their activities.

In March 2015, we had a **second meeting** (5), in which we ran a data analysis session at their headquarters in Rome. Using thematic analysis, we asked them to underline the most important sentences in the transcriptions of the interviews, and identify the emerging categories. Codes were then printed, cut, and recombined using a billboard, creating second level concepts and third level categories. Our participants renamed this activity *confetti* because of the cutting of the printouts. This session allowed the members of the group to have a different perspective on their network, discovering new dynamics, rationales, and roles in their organisations. It also created attachment towards the project, associating the term *confetti* with the deep meaning of the project for the group.

In March and April, the ThinkDigiTank group, with our remote support, carried out data analysis and developed **personas and scenarios** (6). During the data analysis phase, the group participated in the most important Italian conference related to the public sector and citizenship (*ForumPA*), presenting the project as a form of **public restitution** (7). The project outcomes and the adoption of a PD approach generated interest from several organisations and NGOs, willing to join the project.

At the end of September 2015, the ThinkDigiTank group **published a call** (8) in order to recruit the technical partner for the development of the digital platform. The large number of responses (twelve) was quite gratifying for the ThinkDigiTank group.

In November 2015 we had a **third meeting** (9) with the ThinkDigiTank group: we conducted a focus group with them in order to assess the process. After that meeting we supported them in the **selection** of the candidates for the **technical partner** (10) which

took place between January and March 2016. While we write this paper, the think tanks are starting to use the first release of the platform, implementing a first set of the functionalities.

#### The empirical results

This section presents the data used in this paper and the outcomes of our analysis. The outcomes of our study come from the adoption of qualitative data, such as: interviews (14), mind maps (18), personas (11), scenarios (13), and one focus group interview.

The interviews were conducted by the think tank members involved in the ThinkDigiTank project with members of the think tanks. The outline of the interview was focused on collecting data on the organisations, in relation to organisational and cultural issues, and internal/external relations.

The transcriptions of the interviews have been collectively analysed during the *confetti* activity by the think tank members involved in the ThinkDigiTank project with the supports of the designers. This led to the creation of mind maps: one for each macrotopic identified during the analysis that cover the activities, current changes and open dilemmas among the think tanks.

The personas and scenarios have been developed by the think tank members, working on the outcomes of the interviews. They created personas starting from the protagonists that emerged within the interviews (for example: the researcher; the web editor; the archivist; the computer scientist). Then, they created scenarios, working on the outcomes of the mind maps.

The focus group interview was conducted by us among the ThinkDigiTank group at the end of 2015. The moderator's guide has been developed to push the think tank members

involved in the ThinkDigiTank project to reflect on their condition, on their organisations, and on the ongoing design process. The interviews and the focus group have been analysed using thematic analysis.

## Outlining new collective futures

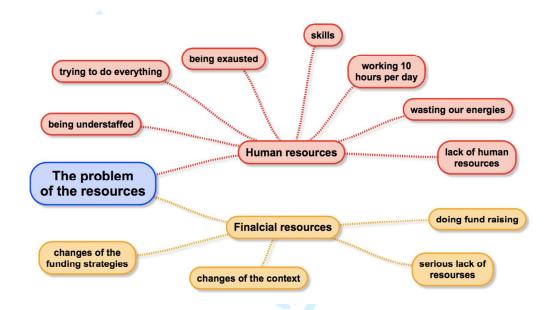


Figure 2: Resources problem mind map.

The changes in the Italian political scenario, have impacted on the perception of think tanks' possible agency in the future. Indeed, the 2013 elections were a turning point in the relation between think tanks and established political parties.

«After the 2013, some sort of depression kicked in, because until then we were the insight behind the political agenda of the Democratic Party.»

«Before (2013), our relationship with the party was strongly consolidated and continuous, and now it is falling apart. » (Focus Group)

The process has helped them to reflect on the impact of these changes in the Italian political scenario. They chose to remain independent and to outline a new role in the Italian political and cultural milieu. In doing so, the development of a collective

platform and the PD process itself has been understood as a bridge between the past and the future trajectories of the leftist think tanks.

Funding (see fig. 2) has a central role in this historical phase of Italian leftist think tanks, granting autonomy and independence in trying to remain core actors in the political scenario. This new configuration is leading the think tanks to look for new forms of funding, including the European Commission funding for research. In fact, before the changes in the political landscape, the funding strategy of the think tanks was based on a strong relation with their respective party of reference, through a variety of means such as research grants.

# Framing the enacted changes

Today, the think tanks are dealing with the changes of the Italian political milieu. Two actors are confronting these challenges: an individual subject, represented by the personal experience of the precarious workers; and an organisational subject dealing with contextual settings that are changing the political landscape.

The precarious researcher is a central actor in the think tanks, since these organisations are usually understaffed and the workers are often overworked precarious researchers.

«Leonardo is a young researcher that holds a Ph.D. He and his colleagues, face daily difficulties as temporary researchers. He doesn't find research grants because he is not bonded to a full professor.» (Personas: the researcher)

The time and work constraints are perceived as a factor hindering the effectiveness of the think tanks. In this scenario, a collective platform within the ThinkDigiTank project is perceived as an important resource that could foster a novel collaboration and mutual support among the precarious workers.

The organisational subject of this change is engaged in negotiating a new political identity for the think tanks in the Italian context. The previous organisational setting was reasonably well structured and hierarchical and was defined by the ThinkDigiTank group as *in line with the president* (of the think tanks). Today, the older generation is passing the baton on and the think tanks are working on new collaborations, rethinking their identity as laboratories of culture and politics.

#### Transforming their organisations



Figure 3: Mind map on future organisational strategies.

This PD process produced two different types of outcomes, both technological and organisational. The *confetti* sessions cleared the daze around the project, addressing the organisational and the technological outcomes of the process. The materiality of the *confetti* gave tangibility to the data, allowing mutual understanding and awareness among the ThinkDigiTank work group.

«We gleaned from our personal experiences, from the subjectivity of the person that was writing the personas. We put a vital breath in the confetti. Writing the personas, we turn the confetti into simulacrum of human being.»

CoDesign Page 14 of 24

«We reflected individually and collectively on our condition. »

«After the *confetti* session, we attached the maps to the walls, and these maps are still there! The maps have been a way to communicate to the others that we were not doing only the new website of the think tank. In doing so... the initial scepticism among the PD process was turned into expectation! » (Focus group)

The mind maps (see fig.3) had a restitutive role within the project, by communicating the results of the process and the current challenges for the think tanks. These activities opened a new phase for the project, characterised by a strong openness. During the process, the need for planning and transforming the organisation emerged among the members of the ThinkDigiTank group. In particular, they wished that the new platform could bring a new organisational culture, also supporting the long term planning and the bookkeeping, as both aspects were undervalued at the time according to the participants of the project.

The categories that emerged within the interviews have been translated by the ThinkDigiTank group into strategies to reach a desired future, answering both to collective and individual needs. On the one hand the strategies outlined the rationale of the platform, giving materiality to the future technology. On the other hand, they provided an overview of the organisational issues among the think tanks. The PD process activated changes in the organisational practices of the think tanks, triggering new forms of collaboration. The ThinkDigiTank group started working collectively, facing their problems together and not in isolation. During the process, they used shared repositories and experimented with forms of collective writing, consolidating collaboration in their daily work practices.

The PD process enhanced collaborative practices, giving the opportunity to work

together, testing a new research method. The participants recognised that the process consolidated the relationships between the precarious workers, reducing the alienation and isolation caused by overworking.

«It has been significant also for the human level. »

«Working together was not contemplated as a practice. » (Focus Group)

The process gave also organisational know-how, since the participants acquired an awareness of the inner workings of the organisations, providing new resources in managing the generational change of the think tanks.

«We put down in black and white how our organisations are structured. Before the ThinkDigiTank project we had this sort of presidential monarchy, where some people took decisions and the others just conform. » (Focus Group)

The process accompanied the think tanks in this phase of radical change, reinforcing their relationships and providing hints to foster their collective agenda.

#### Discussion and conclusion

In the initial part of this paper, we articulated a reading of PD as nourishing the common based on four main strategies: the identification of a relevant social arena; the clarification of the social groups involved; the enactment of an open ended design process; and the capability to evaluate the improvement of the participants' conditions.

We claimed that this kind of process could renew PD, reinvigorating the attention to politics and elaborating novel strategies to build projects in contemporary capitalism. It is our conviction that the case study of ThinkDigiTank enriches our understanding on how to nourish the common. The project emerged from the transformations affecting the social arena of Italian think tanks, with a shortage of financial resources. This

shortage is in line with the contemporary austerity policies, which is one of the elements that characterise contemporary forms of accumulation by dispossession (Harvey 2014). The hierarchical and discontinuous relation with policy makers has been seen by our participants as a problem to be addressed through the search for autonomy from parliamentary politics. The enacted process contributed to such a search for autonomy in two different ways. On one hand, the construction of novel alliances between think tanks, universities, and technical partners is enlarging the networks these actors can rely upon. On the other hand, being exposed to new techniques and approaches has improved the organisational awareness and skills of our participants. Such construction of an area of autonomy from institutionalised power, even for organizations that were tightly coupled with parliamentary politics before testifying to a weakening of such ties, could be read as aligned to the basic tenets of Autonomous Marxism, mainly focusing on the autonomy of the working class (Hardt & Negri, 2009) - knowledge workers in this case.

The project was endorsed by the think tanks' management, but it was conducted by precarious workers, and the condition of the participants was characterised by limited access to continuous income and by working activities conducted almost individually. The participation in ThinkDigiTank was recognised as promoting new collaborative practices, exemplified by the reference to technologies like shared repositories or by the idea of collective writing, consistent with previous studies on user gains (Bossen, Dindler, and Iversen 2010). Moreover, the work done has empowered them in the process of choosing the new president and director of one of the think tanks. Therefore, the design process acted as a *practice of commoning* (Marttila et al., 2014 a) and the produced material became an element for the development of the organisation. These *commoning practices* helped the members of the think tanks to reflect on their

condition, the available resources, and the need for organisational transformation.

Three elements of the participatory method contributed to democratising the outcome of the project. First, the sample of the interviews gave voice, not only to the management of the diverse organisations, but to people in different areas of the structure's hierarchy. Second, the data analysis, in particular the *confetti* session was done by the participants and not by the management. This made the knowledge of our precarious participants more relevant than the one of management in making decisions. Third, the privilege to the participants' knowledge was strengthened in the process of writing personas and scenarios: the personal contribution of the people involved was a key point in that. In this way, the final list of early requirements has been deeply connected to our participants' subjectivity. This is indeed not new in PD; it connects to the concept of empowerment (Ertner, Kragelund, and Malmborg 2010; Storni 2014) reaffirming the need to choose PD's social allies carefully (Dearden, Walker, and Watts 2005; Teli 2015).

This process has not only highlighted the relevance of the precarious workers' subjective conditions, but also how their subjective conditions have been strengthened in re-thinking their organisation. Moreover, the issues that are dealt with by the think tanks are the ones that allow for the capability of reaching a new audience and potential supporters. This suggests that, at least in the case of think tanks, the formation of publics and the issues at stake go together.

The problem of public formation (Le Dantec and DiSalvo 2013) was visible also in the way through which the inter-organisational relations developed among the different actors in relation to the project. While at the beginning the focus was on associating different think tanks in the design process, the development of the process made some

of them central. That did not mean that there were no other organisations involved but that the kind of organisations involved changed over time. As our focus group data shows, that has been interpreted by the participants as connected to the changing character of the technological artefact, obscure at the beginning and then becoming more and more visible. This visibility should be discussed, as what became publicly known in the dissemination activities was more the characteristics of the process and, later, the personas and scenarios, not the digital artefact that, indeed, doesn't exist yet.

The process itself has become central more than the technological artefact. The artefact played a role as a technology-to-be in the open design process (Ehn 2008), as shown by our focus group, and only recently it started to be an actual gain for the participants. Indeed, acquiring a better comprehension of the functioning of their organisation, more digital skills, and an understanding of the shared working conditions, have been more relevant gains for our participants. That involved, including the wider societal conditions in which the participant activities are taking place, the elaboration of an agenda for increased autonomy, the privileged point of view in shaping the outcomes of the project, and the focus on the new relations and alliances that, through the project, they could build.

If we look back at the four characteristics that we outlined for a PD process nourishing the common, the process described and discussed here suggests some significant practical strategies for contemporary PD promoting *commoning practices*. First, the need to adapt a process to the actual conditions of the political economy (e.g. austerity), levering a convergence of interests, resources and available skills. Second, the importance of supporting the growth of the participants' autonomy, both as new forms of collaboration and as situated interventions. Third, to empower the participants in the process, in making decisions, and as subjects. Fourth, to be aware of the issue of public

formation in terms of reaching new audiences, new alliances, and changing interorganisational relations. Fifth, to conceptualise the digital artefact as changing and blurred, whose boundaries and details evolve as long as the political structuring of social relations evolves.

In conclusion, as all these activities are characterised by the growth of ties among human beings, both materially through the unexpected use of the material produced by the project, or symbolically through the construction of a new agenda for the future development of the think tank and of collaboration, all these elements could be seen as part of the wider goal of nourishing the common.

In our vision, this goal is the way in which PD has the possibility to influence societal transformations, accepting the role of design as part of democratic political processes that structure social relations. The common is what can be sustained and fostered by PD. In our account of the ThinkDigiTank project, despite the peculiarities of the context, we tried to show how reading a design process through a political lens can improve both the result, the process, and the life of involved participants.

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