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Data Article

Citizen science at public libraries: Data on librarians and users perceptions of participating in a citizen science project in Catalunya, Spain

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ABSTRACT

As libraries struggle to keep pace with the changing societal landscape, emerging practices such as citizen science (CS) initiatives are being incorporated to reinforce the idea of public libraries as gathering, meeting, and collaboration spaces within the context of shared community and shared learning resources. However, there is little empirical evidence of whether the most open and participatory ways that CS puts forward can converge with and be nurtured by the essence of public libraries. Also, the roles of librarians and users in the 'next generation public library' have been underdeveloped. As the number of CS initiatives at public libraries grows, so does the need to collect evidence on the impact and the capacity of assimilation of CS practices. The data describes librarians and users' perceptions of participating in a citizen science project. Two hands-on activities for librarians of the Barcelona Network of Public Libraries were implemented. One was a training course for 30 librarians from

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24 libraries which allowed them to envisage citizen science implementation in each library. The second activity consisted in the co-creation of a citizen social science project. 40 library users, 7 librarians from 3 different cities, and professional scientists, were involved. The data on librarians and users' perception was collected through participant observation, surveys, and a focus group to identify strengths and challenges of implementing citizen science at public libraries. The data covers librarians and users attitudes towards citizen science, their motivations to participate, their perceived ability to implement a citizen science project (as for librarians) or to contribute to science (as for library users), and the participants intention to keep engaged with citizen science, drawing on the Theory of Planned Behavior. Responses to closed-ended survey questions are analyzed at a descriptive level. The qualitative feedback from the focus group and the open-ended survey question on motivations is subjected to a thematic analysis. The data offers interesting insights to identify opportunities and challenges of implementing citizen science at public libraries, contributing to the debate over the public library's mission as local community hub.

Specifications Table

Subject	Social Sciences
Specific subject area	Engagement in Citizen Science
Type of data	Table Figure
How data were acquired	Data was gathered through paper-based questionnaires, participant observation and a focus group. The questionnaires and the focus group guide is provided as a supplementary file.
Data format	Raw and Analyzed
Parameters for data collection	The paper-based questionnaires were administered to all 30 librarians from 24 libraries of the Barcelona Network of Public Libraries (Catalunya - Spain) who participated in the training course on citizen science. The focus group discussion was conducted with 7 librarians who participated in the cocreation of a citizen science project at their libraries with their communities of users and local associations. The paper-based questionnaires were also administered to the library users who participated in the cocreation of a citizen science project at their library.
Description of data collection	The paper-based questionnaires were administered at the beginning and at the end of the project in situ. The data collected was then manually digitized for the analysis. The focus group discussion was administered at the end of the project in situ, it was audio recorded, transcribed verbatim and anonymized.
Data source location	Barcelona (Catalunya - Spain). Granollers (Catalunya - Spain). Olesa de Montserrat (Catalunya - Spain).
Data accessibility	[1] A. Cigarini, I. Bonhoure, J. Vicens, J. Perelló, (2021). Citizen Science in Action: Data on librarians and users perceptions of participating in a citizen science project [Data set]. Zenodo. http://doi.org/10.5281/zenodo.4964386
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Value of the Data

- The data offers novel insights on the opportunities and challenges of implementing citizen science at public libraries. In particular, it provides for the first time information on librarians and users perceptions (namely attitudes, motivations, self-efficacy and intentions) of participating and keeping engaged with citizen science.
- The data may serve citizen science practitioners, researchers, librarians or policy makers to identify the conditions required to introduce citizen science at public libraries within the broader Open Science movement.
- Future research may draw on the data to discuss the potential and on the impact of co-creation in citizen science, on the conditions required for embedding citizen science at public libraries and in the European landscape, or to compare the results to other geographical locations.

1. Data Description

The data covers the relationship between librarians and library users' attitudes towards citizen science, their motivations to participate in a citizen science project, their perceived ability to implement a citizen science project (as for librarians) or to contribute to science (as for library users), and the participants intention to keep engaged with citizen science [1]. Raw data of librarians and users' responses is provided as 5 separate .csv files:

- Librarians_pre.csv: data on librarians profiles, attitudes towards citizen science, expected impact of the project and self-efficacy collected at the beginning of the Citizen Science Lab.
- Librarians_post.csv: data on librarians profiles, attitudes towards citizen science, perceived impact of the project and self-efficacy collected at the end of the Citizen Science Lab.
- Users_first_phase.csv: data on users profiles, motivation, attitudes towards the library, confidence to perform scientific tasks and self-efficacy collected at the beginning of the Science and Citizen Action.
- Users_second_phase.csv: data on users profiles and motivation collected at the middle of the Science and Citizen Action.
- Users_last_phase.csv: data on users profiles, attitudes towards the library, confidence to perform scientific tasks and perceived impact of the project collected at the end of the Science and Citizen Action.

The dataset therefore includes librarians' responses to the questionnaires administered at the beginning ('Librarians_pre') and at the end ('Librarians_post') of the training course on citizen science. It also includes users' responses to the questionnaires administered at the beginning ('Users_first_phase'), middle ('Users_second_phase') and end ('Users_last_phase') of the co-created citizen science project. The survey questions administered to librarians and users, and the focus group guide which was organized with the librarians, are provided in the Supplementary Material file, where all abbreviations which appear in the dataset are explained in detail. Alternatively one can find this description in the data set available in Zenodo [1].

Due to research design limitations, however, it was not possible to assign a unique identifier to the participants, and thus follow up on individual-level responses. Yet, the data provides a snapshot of librarians and users perceptions (namely attitudes, motivations, self-efficacy and intentions) at the beginning, at the middle (for users only) and at the end of the activities. While it is not possible to identify a causal relationship or trends over time, the data allows for a descriptive or exploratory analysis that sets out to describe the measured constructs at given moments in the project development process, and relate them to participants profiles.

The reduced sample size might be possibly due to the great time and commitment required from the participants throughout the project (collective training and co-creation sessions of two-hours each, plus individual or community work). Meaning that the number of participants was

Table 1
Sociodemographics of librarians participating to the Citizen Science Lab.

	Pre (n=25)*	Post (n=22)*
How long have you been working at the library?		
2 or less	4% (n=1)	4.5% (n=1)
3 to 5 years	4% (n=1)	9.1% (n=2)
6 to 10 years	12% (n=3)	13.6% (n=3)
11 to 20 years	60% (n=15)	63.6% (n=14)
more than 20 years	20% (n=5)	9.1% (n=2)
Do you have a scientific background?		
yes	4% (n=1)	14.3% (n=3)
Have you heard already about citizen science?		
yes	56% (n=14)	-
Have you already participated in a citizen science project?		
yes	8% (n=2)	-

Note: *valid answers.

limited but their contribution significant in terms of degree of involvement. The information collected through the survey data can thus be used as a baseline position and be complemented by other data collection methodologies (i.e. focus groups in our case) to follow-up and draw conclusions on participants engagement in a citizen science project. This sort of studies are becoming more and more necessary to improve citizen science practices [2].

Finally, despite the limitations of not providing the focus group transcriptions (for ethical reasons), the data may help researchers and practitioners who are considering (research or public) libraries as possible sites to cultivate citizen science communities of practice. The novelty of the effort provides data and information which can be used as a reference point for addressing the same (or similar) questions and conditions required to introduce citizen science at public (or research) libraries.

2. Experimental Design, Materials and Methods

The experimental design builds on the one-year project (2018-2019) Citizen Science in Action promoted by the Barcelona Network of Public Libraries (Catalunya - Spain), that coordinates 225 libraries and 2,7M users. The project implemented was part of the Bibliolab programme whose broad aim is to experiment new forms of open and creative collaborations with citizenry. The project was structured along two interdependent and hands-on activities offered to librarians as part of their life-long training. These activities were: the Citizen Science Lab, and the Science and Citizen Action.

The Citizen Science Lab consisted of an introductory course of 5 two-hours capacitation sessions about CS addressed to 30 librarians from 24 different libraries of Barcelona Metropolitan Area (about 5.6M inhabitants in a 7726 km^2 area). See Table 1 for the sociodemographics profile. As shown in Fig. 1 (top) the librarians were first presented with a general overview about CS (session I), they were then asked to test CS projects at their library (session II), and they were then asked to discuss the opportunities and challenges that CS could offer to library users, and the aspects that are to be addressed when implementing a CS project at the library (session III). Based on both theoretical and practical activities, the librarians learned about CS practices, they tested and eventually implemented existing CS projects at their library. Throughout this effort they collectively discussed the opportunities and challenges that CS could offer to library users, and the aspects that are to be addressed when implementing a CS project at the library. As a result, the librarians' recommendation took the form of a collective toolkit for library users

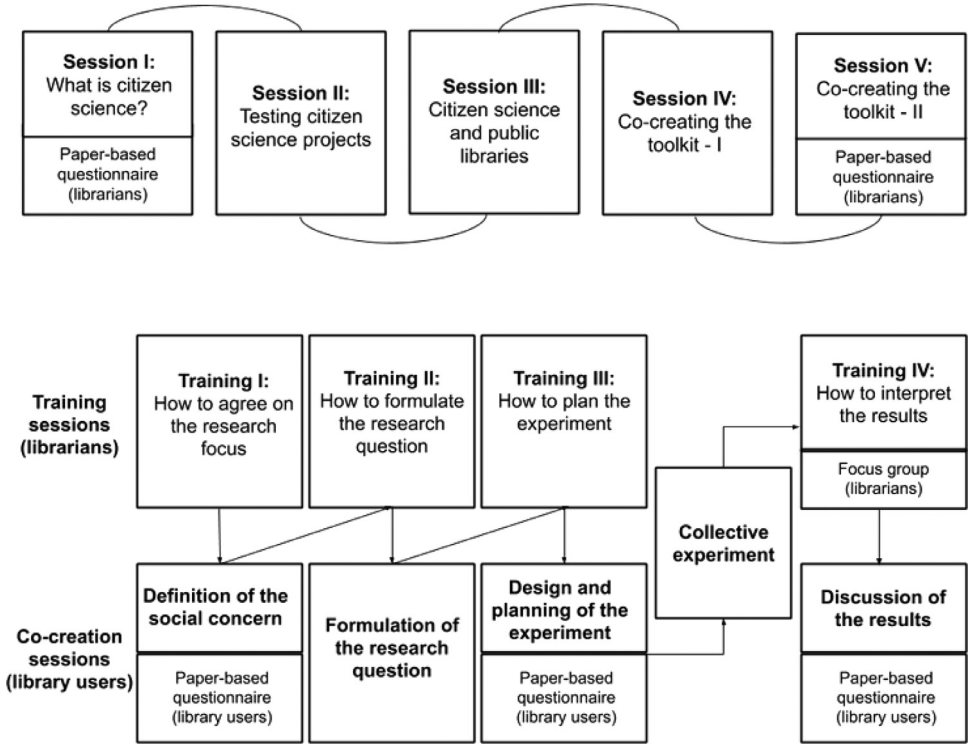

Fig. 1. The Citizen Science Lab (top) and the Science and Action (bottom) timelines.

and other librarians on how to turn on citizen science projects at libraries [4] whose drafting started in session IV and session V. Librarians selected 10 CS projects to be implemented in their libraries, and proposed a series of parallel activities for their own libraries.

At a higher level of engagement, the activity Science and Citizen Action involved 7 library professionals also participating in the Citizen Science Lab, from three municipalities of the Barcelona Metropolitan Area (Fort Pienc - Barcelona, Granollers and Olesa de Montserrat), ranging from 24,000 to 1.5M inhabitants. See Table 2 for the sociodemographics profile. After being specifically trained and in close collaboration with professional researchers, a community generated ad-hoc for the project co-created and ran a public behavioral experiment [5]. Groups formed by library users and local associations were created, according to diversity and inclusion principles. The activity was based on co-creation methodologies to align scientific goals and citizen social concerns. The librarians were trained on co-creation and dynamic learning [6] following the methodology developed in [7]. Fig. 1 (bottom) represents the objectives and content of the 4 two-hours sessions: how to agree on the research focus, how to formulate the research question, how to plan the experiment, and how to interpret the results. As shown in Fig. 1 (bottom), after each session, the librarians were asked to put the knowledge into practice by replicating the session within their community. In these sessions, they took the role of facilitators, with the support of researchers. Each following session, the librarians discussed the output of their community's work with other librarians. By the end of the third session, they together came up with a unique research design agreed for all three municipalities that addressed a common social concern: access to housing. A related public behavioral experiment was run in the public space to bring libraries and librarians to the streets with 358 participants. Framed as 'citizen social science' [8], the activity was thus putting the accent on the civic facet of CS practices. Behavioral data was collected by means of simulations of the housing market imple-

Table 2
Sociodemographics of users participating to the Science and Citizen Action activity.

	Pre (n=54)	Mid (n=32)	Post (n=23)
Gender			
Woman	61% (n=33)	56% (n=18)	70% (n=16)
NA	5% (n=3)	6% (n=2)	-
Age			
18-25	9% (n=5)	9% (n=3)	9% (n=2)
26-35	11% (n=6)	7% (n=2)	22%(n=5)
36-45	26% (n=14)	25% (n=8)	39% (n=9)
46-55	22% (n=12)	31% (n=10)	26% (n=6)
56-65	15% (n=8)	9% (n=3)	-
66+	17% (n=9)	19% (n=6)	4% (n=1)
NA	-	-	-
Profile			
Library user or technician	30% (n=16)	28% (n=9)	26% (n=6)
Local association	50% (n=27)	66% (n=21)	43% (n=10)
Public administration	14% (n=7)	6% (n=2)	18% (n=4)
Private sector	4% (n=2)	-	13% (n=3)
NA	4% (n=2)	-	-

mented on the Citizen Social Lab platform [9] and following a game theoretical paradigm on strategic decision-making [10].

We present the main results and the main description of our datasets in Tables 3-13. For the activity Citizen Science Lab, the data were collected through paper-based questionnaires, at the beginning and at the end of the activity. The paper-based questionnaires were handed at the beginning of session I (which covered a general overview about citizen science), and at the end of session V (after finalizing the toolkit). The closed-ended questions covered librarians' familiarity with CS, their expectations regarding user engagement, their perceived efficacy to recommend a CS project and to implement it at their library, the perceived impact of the activity and their overall satisfaction. Overall, 25 responses were collected in the first paper-based questionnaire, and 22 responses at the end of the course. The majority of librarians (60%, n=15) had been working at the library for 11 to 20 years and only 4% (n=1) had a scientific background. Further details are provided in the Supplementary Information document.

For the activity Science and Citizens Action, data on librarians engagement with CS was collected through a focus group at the end of the project. The focus group addressed each element of the TPB model. To uncover attitudes, the librarians were asked about what they considered to be positive and negative outcomes of participating in the activity. Subjective norms were identified by asking questions about the returns for users and participants after taking part in the activity. Self-efficacy came from questions regarding librarians' perceived ability to lead the activity. Behavioral intention was explored by asking librarians about their intention to keep engaged with CS and implement a CS project the following year. Overall, 7 librarians participated in the focus group, all but one were women, one was director and the others were library technicians.

To complement librarians' perspectives, data was further collected on library users' perceptions. More specifically, a paper-based questionnaire was handed to library users after the first session ("Definition of a social concern"), after the third session ("Design and planning of the experiment", and after the fourth session ("Discussion of the results"). The questions covered library users' motivation to participate, their perception of the library, their perceived ability to contribute to different scientific tasks, the perceived impact of the activity, and their overall satisfaction and motivation to keep engaged with CS. Overall, 54 users' answers were collected in the first paper-based questionnaire and 23 valid answers in the last paper-based questionnaire. On average, 40 library users, across libraries, participated in each of the 4 sessions. The majority of participants were women, in the age range 36-55 years old, and were part or representatives of local community associations. Further details are provided in the Supplementary Information.

Table 3
Librarians statements and coding on the perceived barriers to users engagement.

Original statement	Translation	Code
"Temps, implicació continuada"	"Time, continuous commitment"	time
"Falta de motivació, desconeixement"	"Lack of motivation, unawareness"	motivation, unawareness
"Compatibilitat de la vida familiar/laboral amb el projecte, pensar que això de la ciència no és per la gent d'apeu"	"Consonance of family/work life with the project, note that science is not for ordinary people"	understanding of science, time
"Com qualsevol activitat a la biblioteca: l'assistència"	"As whatever library activity: assistance"	commitment
"La implicació segons temàtica. Dificultat per vincular la gent en continuïtat"	"Commitment varying with the project scope. Hardship involved in retaining people overtime"	commitment, retention
"La manca d'implicació de la majoria de gent en projectes col•lectius (societat molt individualista...)"	"Lack of commitment by the majority of people around collective projects (individualistic society..)"	commitment
"Als usuaris adults els costa més participar. Hem de busca projectes motivadors"	"For adults users it is harder to get involved. We are to find motivating projects"	motivation
"Que els arribi bé en què consisteix i que el tema proposat els engresqui"	"That they understand clearly what it is about, and that the attractivity of the project scope"	communication, motivation
"Falta de recolzament institucional (Ajuntament)"	"Lack of institutional support (local administration)"	lack of institutional support
"Poca participació en general en activitats i propostes diverses"	"Little participation in general, and heterogeneity of activities offered"	commitment, activity abundance
"Desconèixer matèria, inversió temps d'oci"	"Unawareness, leisure time investment"	unawareness, time
"Hi ha molta oferta d'activitats al municipi"	"There's abundance of activities offered in the municipality"	activity abundance
"La falta de coneixement dels projectes de ciència ciutadana"	"Unawareness of citizen science projects"	unawareness
"Desconeixement, falta de compromís en processos de disseny cocreatiu"	"Unawareness, lack of commitment in processes of cocreation design"	unawareness, commitment

Responses to closed-ended survey questions were analyzed at a descriptive level because the reduced sample size did not allow for statistical significance testing. The qualitative feedback from the focus group and the open-ended survey question on motivations was subjected to a thematic analysis [11]. This is a widely used method for identifying, analyzing, and reporting patterns (or themes) within data inductively.

Table 4
Code frequency of barriers to user's engagement.

Code	n
Commitment	5
Unawareness	4
Time	3
Motivation	3
Activity abundance	2
Communication	1
Lack of institutional support	1
Retention	1
Understanding of science	1

Note: Code frequency of librarians statements (n=21, valid answers) regarding barriers to user's engagement.

Table 5
Clustering of the projects selected by librarians participating to the Citizen Science Lab.

Project name	Research field	Level of participation [3]	Digital infrastructure	Site
Eyewire	Neuroscience	Distributed intelligence	Web platform	Indoor
300.000km/s	Urban planning	Crowdsourcing	Mobile App	Outdoor
Ancient Lives	History	Distributed Intelligence	Web platform	Outdoor
Battling Birds	Ornithology	Distributed Intelligence	Web platform	Indoor
Mosquito Alert	Epidemiology	Crowdsourcing	Mobile App	Outdoor
Old Weather	History	Distributed Intelligence	Web platform	Indoor
Public Lab	Environmental Science	Extreme Citizen Science	DIY sensor	Outdoor
Openlittermap	Environmental Science	Crowdsourcing	Mobile App	Outdoor
Beepath	Human Mobility	Participatory Science	Mobile App	Outdoor
Cadáveres Inmobiliarios	Urban Planning	Crowdsourcing	Web Platform	Outdoor
Citi-Sense-BCN	Air Quality	Crowdsourcing	Sensor	Outdoor
Milmots	Linguistics	Crowdsourcing	Web platform	Indoor
MonuMai	Architecture	Crowdsourcing	Mobile App	Outdoor
Arbres Monumentals de Catalunya	Environmental Sciences	Crowdsourcing	Mobile App	Outdoor
Bioblitz	Environmental Sciences	Crowdsourcing	Mobile App	Outdoor
Catalan Butterfly Monitoring Scheme	Environmental Sciences	Crowdsourcing	Web Platform	Outdoor
Observatori ciutadà de la biodiversitat de papallones a la ciutat	Environmental Sciences	Crowdsourcing	Web Platform	Outdoor
Jocs pel Canvi Social	Human Behavior	Participatory Science	Electronic tablet	Outdoor
Liquencity	Environmental Sciences	Crowdsourcing	Mobile App	Outdoor
Natusfera	Environmental Sciences	Crowdsourcing	Mobile App	Outdoor
Observadors del Mar	Marine Biology	Crowdsourcing	Web Platform	Outdoor
Ocells dels Jardins	Environmental Sciences	Crowdsourcing	Web Platform	Outdoor
Plant•tes	Environmental Sciences	Crowdsourcing	Mobile App	Outdoor
Riu.Net	Hydrology	Crowdsourcing	Mobile App	Outdoor
Pluviómetros Ciudadanos	Hydrology	Crowdsourcing	Sensor	Outdoor
Ground Truth 2.0	Environmental Sciences	Crowdsourcing	Web Platform	Outdoor

Note: The librarians participating in the Citizen Science Lab activity were asked to select one or two citizen science projects that they believe could be implemented at their library, familiarize themselves with the project(s) and imagine how they could be implemented.

Table 6
Clustering of the projects selected (Citizen Science Lab).

	Distributed Intelligence	Crowdsourcing	Participatory Science	Extreme Citizen Science
Indoor	3	1	-	-
Outdoor	1	18	2	1

Note: Clustering of the projects selected by librarians participating in the Citizen Science Lab according to Haklay's categories [2]. The set of projects was manually clustered through the web analysis of projects' description.

Table 7
Perceived ability of librarians to recommend citizen science projects to their users at the beginning and at the end of the Citizen Science Lab.

Right now, do you feel able to recommend any citizen science project to library users?	Yes	No
Beginning of Citizen Science Lab (n=25)	68% (n=17)	32% (n=8)
End of Citizen Science Lab (n=22)	100% (n=22)	-

Table 8
Perceived ability of librarians to implement citizen science projects at the library, at the beginning and at the end of the Citizen Science Lab.

Right now, do you feel able to implement yourself and lead a citizen science project?	Totally	To a large extent	To a little extent	Not at all	NA
Beginning of Citizen Science Lab (n=25)	8% (n=2)	8% (n=2)	64% (n=16)	12% (n=3)	8% (n=2)
End of Citizen Science Lab (n=22)	4% (n=1)	32% (n=7)	50% (n=11)	-	14% (n=3)

Table 9
Main themes, associated text content and quotes from users statements on motivations to participate in the Science and Citizen Action activity.

Theme	% (n)	Text content	Quote
Personal motives	42.9 (30)	curiosity personal interest concern science	"The curiosity to discover a new way of doing, and willingness to engage in a collective project" "They proposed and it seemed of interest to me" "To find answers to my concerns and to have them recognized" "Mainly for its connection with science which is one of my passions"
Social networks	24.3 (17)	invitation library trust	"The library engagement" "I've been asked by the librarians and I fully trust whatever initiative they carry out"
Advocacy	18.6 (13)	neighborhood try change	"Get more involved in the neighborhood and try to do something that can improve life quality" "The willingness to study a social issue and try to develop proposals for social transformation" "What pushed me to participate was the idea of collectively exploring and analyzing a common problem and try to change it" "The idea of contributing to social cohesion and a more proactive city"
Socialization	12.9 (9)	meet know collaborate	"The opportunity to meet other people in the city who come from different areas with a common objective" "Listening and knowing other's experiences" "Engage and collaborate with community activities"

Table 10
Users' perceptions of the library's responsiveness to community needs at the beginning of the Science and Citizen Action activity.

	Totally	To a great extent	To a little extent	Not at all	NA
Library responsiveness (n=54)	57% (n=31)	35% (n=12)	2% (n=1)	2% (n=1)	4% (n=2)

Table 11
Users' perceptions of the library's ability to face local challenges through the active participation of its users at the beginning of the Science and Citizen Action activity.

	Totally	To a great extent	Nor agree or disagree	To a little extent	Not at all	NA
Library ability to innovate (n=54)	31% (n=17)	57% (n=31)	6% (n=3)	4% (n=2)	-	2% (n=1)

Table 12
Users rating of the positive effect of the public behavioral experiment on their perception of the library after the experiment in the Science and Citizens Action activity.

	Totally	To a great extent	Nor agree or disagree	To a little extent	Not at all	NA
Positive effect of the experiment on library perception (n=23)	26% (n=6)	35% (n=8)	26% (n=6)	9% (n=2)	-	4% (n=1)

Table 13
Quotes of librarians from the focus group at the end of the Science and Citizen Action activity.

Attitudes		
Learning and socialization	"Avui en dia la ciència té molts camps, des de les humanitats i tal, i tot s'integra. I això és molt xulo. El vostre grup és molt integrador. Hi ha gent de diferents perfils que no tenen res a veure i que s'integren en un equip. Això és veritat, es complementen els perfils. cada perfil té unes coses bones i uns tal i...es van complementant. Llavors és això que fem interdisciplinar tot"	"Today science presents many fields, from the humanities and so on, and everything is complementary. And that's really cool. Your [research] group is very complementary. There are people from different profiles which have nothing to do with each other and that are integrated into a team. That's true, such profiles complement each other. Each profile has some good things and so on, they complement each other. That's what we are doing, making it interdisciplinary"
	"Ens va arribar molta gent nova. Una oportunitat doncs de atreure a nous usuaris i noves aliances a nivell municipal. Perquè a vegades coneixes altra gent que ja veus que tenen predisposició per activitats socials i que sempre estan a totes, però que no coneixem mai a nivell de projecte. I això és una oportunitat per engrescar"	"We met many new people. [It was] an opportunity to attract new users and to create new alliances at the municipal level. Because sometimes you know people that you see they might be willing to engage in social activities because they are always there. But you never really get to know them within a given activity. And this is an opportunity to get to know each other "
	"També per les grands ciutats hi ha una solitud no volguda..I el tema de fer ciència ciutadana pero de la banda social [...] permet que [...] puguis conèixer, tenir uns moments que hi ha altra gent, i puguis fer altres contactes. És lo més important. La ciència ciutadana pot ser una bona excusa també, perquè la gent realment li preocupa el barri on viu des d'aquest vessant social"	"Within big cities people are unwillingly lonely. And the fact of doing citizen science, in its social focus, allows you to get to know each other, share few moments with are other people, and make new contacts. That's the most important. Citizen science can be a good excuse, because people really care about the neighborhood where they live, from this social point of view. "

(*continued on next page*)

Table 13 (*continued*)

Complexity of collaboration	"És molt participatiu però sí que és veritat que s'ha d'encarrilar. Perquè vosaltres ho sabeu molt bé quin son els interessos del grup de recerca i tal.. I l'heu d'encaminar, encara que sigui molt participatiu. I bueno sí que es notaba que de moments a moments s'havia d'encarrilar, i ho encarrilaveu vosaltres. Pero bueno es que molts actors han participat: la universitat, els municipis, OpenSystems. Llavors clar tot això s'ha de tenir en compte"	"It's very participatory. Yet, it's true that you have to get on track. Because you know very well what the interests of the research group are, and so on. And you have to direct it, even if it is to be participatory. And well, you could notice that, from time to time, you had to redirect it, and put it on track again. But it's good that many actors participated: the university, municipalities, OpenSystems. So, of course, you have to take it all into account"
	"I el tema al final és un cost-benefici. I suposo que això també [...] He vist que, clar, sis mesos! Es que en sis mesos en tu vida pasan muchas cosas! Clar..Al gener vam fer una, després fins al març..I després l'altra, clar ja a la segona ens va faltar gent..I l'altra…"	"The point, at the end, lies in the cost-benefit balance. Part of the cost benefit is time, I think. I've seen that, of course, six months! It's just that in six months many things happen in your life! Of course..In January we did one, then until March..And then the other, of course in the second we lacked people..And the other… "
	"Sisi ha sortit. Ha sortit de la bases no? Perquè al final surt de les bases, lo que pasa es que si al final ja surt d'entrada amb unes bases potser es mes facil. Perquè no ho has de reconduir. Lo primer: xino. Buuff. Lo intentamos. Pero dices: esto, no, no se puede"	"It simply came to our notice then. It's out of the basics right? Because in the end it leaves the bases, what happens is that if in the end it already leaves with some bases it is perhaps easier. Because you don't have to redirect it. The first: Chinese. Buuff. We tried. But you say, this, no, you can't"
Subjective norms		
Commitment	"Bueno i perquè la gent ara encara no està habituada a trobar-se en aquests processos. Ara comencen, et sonen..Cada procés també és diferent..Però quan estàs ficat es: "Ah pues no m'ho imaginava així.." Algú ho comentava del nostre grup. Sembla que tot sigui molt lliure. Però després.."	"Well, because people are not yet used to being in these processes. Now they start, they sound to you..Each process is also different..But when you're stuck it is: "Oh well I didn't imagine it that way .." Someone commented on it from our group. It seems like everything is very free. But then .. "
	"I planificar això fa que hi hagi un compromís, que la gent es compromet, i sap a què es compromet, i sap que l'implicarà d'hores, per exemple. A nivell per exemple de saber: la sessió durarà dues hores. Si ho haguessim sapigut podríem haver iniciat abans de les 7, doncs quedant abans. I clar aquesta incertesa fa que no vulguis quedar malament o tampoc que et sap greu que la gent passada una certa hora et planta mala cara"	"And planning this makes for a commitment, for people to commit, and they know what they are committed to, and they know it will involve them for hours, for example. At the level of for example knowing: the session will last two hours. If we had known we could have started before 7, so staying ahead. And of course this uncertainty makes you not want to look bad or that you are sorry that people after a certain time put a bad face on you"
Inclusivity	"La comprensió lectora...Es una mica difícil per segons quin perfil..T'havies de posar molt amb la manera de pensar. I llavors és veritat que hi havia gent que directament no ho entenia...Nosaltres teníem gent que no entenia directament. També és veritat això"	"Reading comprehension ... It's a bit difficult depending on which profile ... You had to put a lot of effort into your way of thinking. And then it is true that there were people who did not directly understand ... We had people who did not understand directly. This is also true."

(*continued on next page*)

Table 13 (*continued*)

Perceived behavioral control		
Workload	”hi havien moltes coses d’aquella ja que se’ns escapaven i que tampoc venien de nosaltres de la biblioteca...Que ja venia marcat i llavors era com...a més, si...era més complicada.”	“There were a lot of things like that because they escaped us and they didn’t come from us from the library either ... It was already marked and then it was like ... besides, yes ... it was more complicated.”
	“ens ha comportat moltíssima feina. Un esforç, un esforç personal gran, dins i fora de la biblioteca”	“It simply came to our notice then. An effort, a great personal effort, inside and outside the library
	“I a nivell de biblio crec també que és la forma que nosaltres ens omplim la boca amb que la biblio ideal és la que surt al carrer, i en el fons abans ens costa sortir de la nostra zona de confort. I fa molta ràbia. Però aquesta activitat o coses que fem habitualment no arriben al 90 per cent dels usuaris.. I potser no ho comuniquen bé perquè són autònoms o simplement la fan servir com un lloc on trobar llibres i preguntar coses...Però està bé aquesta implicació més gran amb la comunitat”	“And at the level of a bible, I also think that this is the way we fill our mouths with the fact that the ideal bible is the one that goes out on the street, and deep down it is difficult for us to get out of our comfort zone. And it makes me very angry. But this activity or things we do usually do not reach 90 percent of users .. And maybe they do not communicate well because they are autonomous or just use it as a place to find books and ask things ... But it is good this involvement more great with the community ”
Training and support	“Vull dir, no sé si hi hauria una forma per simplificar-ho per un futur o algo... Vull dir si estem amb el vostre suport està clar que això funciona, però...o mes o menys ha funcionat. Però jo crec que sense el vostre suport així darrera, no.. crec que és impossible.”	“I mean, I don’t know if there would be a way to simplify it for the future or something ... I mean if we’re with your support it’s clear that this works, but ... or more or less it has worked. But I think without your support like that, no ... I think it’s impossible.”
	“i que es faci més formació si això..De fet també la formació que rebem moltes vegades es una mica més obsoleta i que no va cap a el estavem dient de ser més...de tenir més habilitats comunicatives...Encara que et comuniques bé, saber cap a on vas no? De fer més eines..De saber parlar també lo que dèiem amb la tele, amb els mitjans..perquè al final. Dius el que et sembla i... I ja està. Però clar.. No tenim més guió..”	“And that more training is done if this..In fact also the training that we receive many times is a little more obsolete and that does not go towards it we were saying to be more ... to have more communicative abilities ... Although you communicate well, know where you are going right? To make more tools..To know how to speak also what we say with the TV, with the media..because in the end. You say what you think and ... And that’s it. But of course .. We don’t have any more script .. ”
	“Però això ells que.. perquè saben, i perquè tenen experiència. Perquè clar, ja quan has portat no sé quants grups ja sé per on...Sino clar, lo que deia ella...podem estar aquí fins…”	“But that’s because ... they know, and because they have experience. Because of course, when you brought it I don’t know how many groups I know where ... But of course, what she said ... we can be here until… ”
	“Això ho sabem que ho podem fer. I que tindrem doncs tot aquell llistat d’aplicacions, i podem fer cosetes..més senzilles. Pero d’aquesta la cosa guapa de juntar gent, i..si que ens podem portar a Joan Solé a fer fotos de plantes..Pero repetir una cosa així jo penso que serà difícil”	“It simply came to our notice then. And then we will have all that list of applications, and we can do things .. simpler. But that’s the nice thing about bringing people together, and..if we can get Joan Solé to take pictures of plants..But to repeat something like that I think will be difficult”

Ethics Statement

The project was approved by the Ethics Committee of Universitat de Barcelona on May 17th 2017 (IRB: 00003099). All respondents were thoroughly informed about the content and the scope of the study before participation. This study is based on voluntary surveys where the responses were fully anonymous. Similarly, the participation to the focus group was completely voluntary and, in the transcriptions all personal identifiable information of respondents were excluded. We confirm that informed consent of all participants has been obtained.

CRediT Author Statement

Anna Cigarini: Conceptualization, Methodology, Formal Analysis, Investigation, Data Curation, Writing – original draft, Writing – review & editing; **Isabelle Bonhoure:** Conceptualization, Resources, Writing – review & editing, Project administration, Funding acquisition; **Julián Vicens:** Formal Analysis, Investigation, Data Curation, Writing – Review & editing, Visualization; **Josep Perelló:** Conceptualization, Methodology, Writing – Review & editing, Supervision, Project administration, Funding acquisition.

Declaration of Competing Interest

The authors declare that they have no known competing financial interests or personal relationships which have or could be perceived to have influenced the work reported in this article.

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Supplementary Materials

Supplementary material associated with this article can be found in the online version at doi:10.1016/j.dib.2021.107713.

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