Introduction

In this method toolkit participatory social mapping is considered as an interactive approach using accessible and free-ranging visual methods in an individual or group interview setting to interrogate qualitative research questions.

There is a long history of participatory mapping of places. Most often these methods were used to show researchers specific features of a place using local knowledge, such as which households are affected by disease like malaria or asbestosis, or how environments have changed over time through desertification and deforestation. Other kinds of knowledge have also been mapped using these approaches. Researchers have asked women to map their bodies, for instance. Insights have been gained into the ways in which disease processes are understood and how particular drugs and treatments work. Figure 1 is a participatory mapping of the ways in which women in rural Zimbabwe understand their reproductive tracts and interpret how oral contraception works. These mappings of knowledge, understanding, and interpretation are similar to the way in which participatory social mapping is conceptualised in this methods toolkit.
Research questions

Social maps allow participants to move from description to depiction to theorising the reasons for the ways in which they have represented features on the map through drawing and talking. Research questions should facilitate a process of:

description—elaboration—theorisation

The questions, from our research, outlined below reflect this process of questioning using participatory mapping approaches:

- What makes you feel healthy and unhealthy about living in [this place]; and why do these places / people / things make you feel healthy and unhealthy?
- Who do you collaborate with in this University and beyond to do research on healthy communities; what are the facilitating factors and barriers to building effective relationships with these fellow researchers?
- What is your social network; what do you do on this social network and how do you create / maintain / dissemble these relationships?

Adding to the conventional spoken interview

Participatory mapping techniques complement and add to the conventional verbal interview. The act of drawing allows the participant to focus attention on a particular feature of the map. It also provides the interviewer with a record that can be interrogated as it is being drawn, during its crafting by the participant, and when it is completed.
The tangibility of the map is an important feature. This allows the interviewer and participant to return to features of the map in the interview and subsequent interviews to unfold the process of description—elaboration—thorisation. Figure 2 is an example of a participatory map, where the participant has chosen different colours to represent different categories in the map and mapped out relationships between the individuals and places considered.

Figure 2: A participatory map from research to investigate social networks

Participant: Yeah. Ok. So that would be my main relationship and my boyfriend as well I might just write him down.
Researcher: You’re smiling at that point
Participant: Yeah.
Researcher: Why?
Participant: Cos I love him, very much.
Researcher: And you’ve written him in a different colour.
Participant: Yes. Because he’s not family and he’s not Jesus (CL MI:10)

It should be noted, however, that sometimes participants can not represent particular features of the issue under discussion on a participatory map. In the example below, a participant describes rather than draws complex relationships in his extended family:

“Family has a lot of shades. Every col, it has all the colours and every colour’s in different shades and understanding the family is – I don’t know.” (CL MI:27)

Note that he can not draw these relationships and he does not try. But the mapping provides a visual cue to help him describe his complex family relationships.
Individual and group interviews

Participatory maps can be done with individuals and with groups. There are particular issues to consider with groups. Group maps are best achieved with a homogeneous group. The interviewer must facilitate negotiation among the group members about how the map is drawn. One effective way of achieving this negotiation is to ask the group to nominate a person to draw the map at the outset (see Figure 3). Generally, this is the person considered by the group to be the most artistic. But make sure pens are available for all group members to use, or to hand to the map writer so ownership and interaction is encouraged throughout the mapping for all group members.

Figure 3. A participatory map of what makes five women aged 25-32 and all resident of the area healthy and unhealthy about living in a place.

I So, if you can draw…what makes you healthy and unhealthy about living here.
R1 OK, where shall we start
R3 Give her the pen, she’s the arty one isn’t she
R4 The blue pen, draw a circle to start with, that’s G
All Yes, yes
R1 So that’s St… Road…
(G2000, MI:3)
Recording the mapping

The creation of the map is a record from the interview. But this can not stand alone as it is part of the interview. An audio recording of the interview to be transcribed is also important. In addition, it is useful to have a video recording of the mapping. The video record is particularly useful in the analysis for two reasons. First, to understand the way in which the map was drawn and the sequence of additions to the map. Second, participants often make references to features of the map by pointing at them or describing features—“over here”, “those people”, for instance—these interactions are captured on the video.

When selecting equipment for audio recording an omni-directional boundary effect flat microphone, like the Sony ECM-F01, is most effective. Bear in mind that even in individual interviews participants may want to move around to draw their map. Also test how effective the microphone is when it is covered in several sheets of paper, as can often happen when participants become involved in their drawing.

Video recording is best done on a recorder with a hard-disk. The amount of time available to record the interview can be easily calculated and images can be readily transferred to computers and software analysis packages. Ideally the recorder should be positioned to record only the map and not participants. This makes it easier to anonymise video. A tripod capable of being positioned above people’s heads is the best way to position the camera.

Other practical considerations for the interview

Make arrangements with participants before the interview. Ideally mapping is best done on a table or the floor. Ask participants if this is possible and arrange the venue accordingly.

For the interview you will need:

- A1 paper. Flip chart paper is relatively cheap and easy to transport, although if you intend to keep the maps for a long time this paper will yellow and tear. This can be avoided by plastic laminating the finished maps.
- A selection of coloured marker pens with pointed tips of no more than 2mm. Avoid light colours, yellow in particular, as this is difficult to reproduce in digital photographs, scans, and photocopies.
- Pencil and biro are also difficult to reproduce, but some participants like to use pencil to draft and sketch ideas.
- Post-it notes may be useful, but be aware that these fall off easily so carry a glue stick to attach them firmly at the end of the interview.
- Sticky tape so participants can join sheets of paper together.
- A large plastic bag or portfolio case to transport finished maps safely.
The interview

Talk to the participant or participants about the mapping beforehand. Explain the mapping and interview. This explanation should include the research question and a brief description of what is expected of them. By telling participants a week or so in advance they have time to plan how they will draw the map.

The bullet points below are taken from the interview schedule for a research project investigating social networks (see the last of the research questions outlined on page 2). The capitalised comments in square brackets capture the rationale behind making each of the points discussed in the bullet point.

- **[THE RESEARCH QUESTION]** The aim of this activity is to try to understand the people you are connected to, or to think about the people whom you know. Who they are, how you know them, whether they know each other, and how you maintain contact. We are interested in how you think about the different social contacts you have.
- **[DIRECTIONS FOR DOING THE MAP]** I’ve brought pens, paper, post-it notes etc. with me. The aim is to try to present in some way – whether it’s through drawing, or charts, or whatever – the people you are in contact with.
- **[CONSENT AND CONFIDENTIALITY]** First, though, I want to just tell you a bit about things like confidentiality etc. This is quite important.
- **[obtain informed consent]**
- **[RECORDING THE INTERVIEW]** You can see that I have brought along a video and audio recorder. Do you have any objections to this activity being recorded? (If yes, request permission for audio-only recording). [The participant will have been forewarned about the request to record orally and visually the mapping process]. If at any point you would like the recording equipment to be turned off, this request will be respected.
- **[PARTICIPANT LED EXERCISE]** You can do this in whatever way you think best. There is no correct way to draw the map. Our experience is that everyone has their own way of doing their drawing*.
- **[KEEPING THE INTERVIEW AND MAPPING ON A LOOSE TETHER]** I can prompt you and offer advice, but I am keen that you use your own ideas...I will ask you some questions about what you are doing and the sorts of people you are thinking about and recording, and what the significance and meaning of these relationships are to you.
- **[TIMING]** The mapping exercise is scheduled to last for one hour in the first instance. Then, depending on circumstances – how you feel, whether you have to leave etc., we could continue with the exercise of we could temporally postponed it for another convenient time, or we could finish. If it takes less than one hour to complete, don’t worry!
- **[SUPPORT]** Do you want to ask me any questions before we get started? – You can of course ask me questions as we go along.

**AT THE END OF THE INTERVIEW**

- **[RETURN TO CONSENT / CO-PRODUCTION OF THE MAP AND INTERVIEW]** Are you happy for me to take the map and keep it as a record of this interview? Is there anything you want to add? Is there anything you would rather not have included in the record?

* Of course not everyone can read and write so it is quite acceptable for the participant to direct the researcher to draw and annotate a participatory map for them.
Pacing the interview

It takes time to draw the map. Time should be allowed for this drawing. Some participants like to talk about the map as they draw. Other prefer to sketch out the main elements and then discuss these and provide further elaboration as they talk. If a participant takes this approach then there will be periods of comfortable silence in the interview. It is important to ensure that the interview is responsive to the participants approach to drawing while at the same time allowing for the process of description—elaboration—theorisation to happen.

Ethical considerations

Below is a checklist of ethical considerations

• The name of the participant producing the participatory map will be made anonymous.
• Because of the potential numbers involved, we cannot anonymise the names of all individuals in a participatory map. However, for the purposes of dissemination, publication, and training, the surnames and other clearly identifiable names will be removed or anonymised.
• With the participant’s permission, the production of the social map will be recorded using a digital video recorder and audio recorder. The participant has the right to listen to and watch these recordings at any time following the exercise, up until the end of the research.
• The video will be set so the person’s face will not be seen in the recording.
• The video recording (or, where necessary, audio recording) will be transcribed. And process of anonymisation will take place after transcription, but before formal analysis of transcripts.
• All data will be kept secure, either in a password protected computer or locked filing cabinet.
• If a participant wants to stop the exercise, at any point, s/he is free to do so.
• If a participant mentions something which subsequently they rather they had not disclosed, this will not be used for the purpose of transcription or dissemination.

Analysis and reporting findings

Analysis is done as with any qualitative research interaction through immersion, organising the data, and identifying categories, typologies, and concepts. Researchers reading this toolkit will have their own strategies for analysis. As noted above, participatory maps make explicit the relationship between description, elaboration, and theorisation so it is a worthwhile exercise to organise data to these three conceptual characteristics early in the analysis process. In addition, because there are a range of different media—the participatory map, transcript, and video—available to the analyser, the use of software packages is useful for those who prefer to use these. Both NVivo8 and Atlas TI software claim to support these different media.

Participatory maps must always be analysed and understood with the meanings and explanations given to them by the participants who produced them. They do not stand alone but require the interview transcript and other information that were produced in their making.
I am grateful to Andrew Clark for his comments on an earlier draft of this toolkit. The ideas for Participatory mapping—an innovative sociological method were developed most recently in Connected Lives, a project within the Real Life Methods Node of the ESRC NCRM. The usual disclaimers apply.