HANDLING QUALITATIVE DATA
A PRACTICAL GUIDE
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This chapter is about starting out sure-footed. It advises on ways of specifying what you are setting out to do, why, and how you will do it. It urges that in setting up you should be usefully reflecting on your research question, whether it requires qualitative research and the data needed to answer it well. How might you acquire such data and what are the ethical implications of doing this? These are all questions that should be asked before you start even planning to acquire data. It proposes as first steps clarifying your own relationship to the topic and the intended data, and declaring the assumptions you bring with you.

Starting can be the hardest part of any new task. In any social research project, putting off starting is easy because of the risks of starting unprepared. If you change your approach once you have entered the research field, you may not get a second attempt. This is particularly salient if you are intending to do a qualitative project, which is likely to be focusing closely on a fairly identifiable group of people. Moreover, there is a special challenge for the qualitative researcher; rarely can a project be specified in advance. If you are working qualitatively it’s because you don’t know what you will find. Even riskier than putting off starting is starting too soon, by making data without clear goals and procedures in mind. The risks are ethical and practical. Ethical risks are huge. If you have not reflected on what you wish to do and its impact on those involved, you may harm those you wish to study, impact their lives and damage your own reputation and chances of constructive research. And if you have not reflected on your relationship to the question, the people involved and the data, you may skew the study irreparably, and seriously damage those relationships. Practically, if you have not organized your project, considered the design, the data needed and the ways they will be handled, you will find yourself swamped by a flood of complex, contradictory accounts of experiences that are only partially relevant to your question.
So start by thinking first. The first stage is to frame your project – placing it in context, forming it, fitting the parts together, constructing them into a plausible, doable whole, so you can see it before you start. This opening stage of a project is undoubtedly the most under-emphasized and indeed often overlooked stage in qualitative work. Far too often, novice researchers just start, assuming the project will just happen, as they enter (or blunder into!) the research field. The practical and ethical challenges of beginning that way are massive, and projects can be doomed from the start if they are not framed at the start.

PLACING THE PROJECT IN CONTEXT

For most new researchers the early stages of proposing and starting a project are fraught by regulation. All these regulations have purposes. (Many are designed to rescue you and/or those you propose to study from your own lack of preparation, or from approaches that are unthinking or ill-informed), but they may appear as barriers to getting going, and are often resented. Treat those requirements as positive steps, helping you to do a thorough job of framing your project, reporting on its ethical implications and presenting a design.

The Literature as Context

For most research, a first essential step will be to find out what’s already known, and what sorts of studies have been done, in the area. This comes early not just because a committee requires it before you get approval, but because your own project must be informed by other studies, your own question by the answers to others’ questions and, importantly, your own research design by what has been done, what it offered, and especially, what’s not yet known. There is a substantial literature on doing a literature review! (See references at the end of this chapter, and, as for any topic, do a web search for new ones.) But novices often lack advice on how to approach it, and regrettably it’s too often seen as a necessary chore, and a hurdle to get over before the study can commence. Resist that attitude! This is a precious chance to locate your project. Consider approaching the task this way:

- Literature reviewing is a qualitative data task. You are seeking to understand unstructured text documents, to distil the important themes in them, to come up with your own account of what they offer. So treat it as a starter project, exploring tools for coding and analysis.
- Literature reviewing (like qualitative research) is detective work – you are seeking the explanation of priorities, the story of how things are seen. Don’t allow your review to become merely descriptive, a list of who said what when. Make it critical, incisive, new. Aim to say something surprising about what isn’t known and how you could help. Aim to become the new authority in this field.
- Literature reviews, like qualitative projects, are ongoing. Don’t get trapped into seeing your review as a once-off exercise prior to starting. Once you start, you’ll see that paper you overlooked as
suddenly significant, you’ll understand why other studies omitted this major issue, you’ll need to seek out what’s known in areas you didn’t see as mattering.

- Literature reviewing is a task generously supported by a variety of computer tools (Paulus et al., 2014). Find bibliographic software, use web searches, chase discussion groups and blogs around important themes.
- If you are intending to use a qualitative software package, consider putting your literature review into a project in that package. It offers a safe container for your reflections and explorations. Seek out current papers or workshops on the use of your chosen qualitative software in this way. (Jump to Chapter 5 for discussion of coding. If you code the material in the literature, or your interpretative notes, you’ll be starting a category system that will point to the things you will later look for in your own data.)

The Social Context

All social research occurs somewhere. Before you start, consider where you will place your project, both geographically and socially. Where will you need to go and do you have the resources to do this? If you can’t physically go there, will online data suffice? And socially, will you be acceptable and accepted where you wish to go, and adequately informed about the context?

- Is there a location that is accessible, practically, socially and (in both regards) ethically, for your purposes? Simply asking this question may cause you to reframe the project!
- If on the other hand you already know where you are heading, because you are there, do some hard thinking about whether this is the best place. Researchers often propose a project where they are already – studying an issue or process in their place of work, or a community they belong to, a problem they face or an experience they share. These proposals may be admirable – you know a problem that needs to be solved or strongly feel for those dealing with an issue and want to help. They may also be practical – you are accepted in the area and known, people will talk with you, indeed have already offered to do so. But beware the assumption that the location is advantageous because you know the context! See Chapter 2 for more on the relationship of you to your data.

PURPOSE, GOAL AND OUTCOME

At the early stages of project proposal, it is easy to confuse the purpose of your project with its specific goals, and easy to leave out of consideration what sort of an outcome is required. These are three very different aspects of the ‘results’ you are aiming for. A first step towards design is to put yourself into the picture. What are your purposes, your goals and what outcome do you seek?

- **Purpose:** Why this study? Will it help ameliorate some societal problem? Will it inform the literature? Will it drive policy making and decision making? Is it more generally to add to our understanding of the social world? Or – be careful here – is its purpose to justify some action or back
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Some Proposal You Are Committed To? Clear Answers Are Needed Here, To Set The Context, To Establish Clearly Where You Stand, And To Justify The Enquiry, The Intrusion On People’s Lives And The Time And Money It Will Involve. Here’s A Possible Answer For An (Imaginary) Project.

**Our Purpose Is To Assist The Health Authority To Improve Child Health Delivery In The Community.**

- **Goal:** What Question Are You Going To Try To Answer? What Would Be Involved In Answering It, And What Shape Do You Think The Answer Might Have? This Is A Different Question From Your Purpose. (The Purpose Of A Game May Be Winning, Achieving Team Spirit Or Fitness. A Goal Can Be Kicked At.) Your Purpose May In Fact Require Multiple Outcomes.

We Are Investigating For The Health Authority Whether And How Parents Bypass Health Authority Instructions For Their Children’s Health. We Expect To Provide An Explanation Of Why Some Parents Ignore Advice, In Terms Of Parental Attitudes, Ideologies And Beliefs.

- **Outcome:** What Sort Of An Outcome Would Achieve That Purpose, And That Goal? Are You Producing A Report For An Action Group Or A Client, A Thesis For A Supervisor Or A String Of Papers For A Journal Or Perhaps All Three? What Do These (Possibly Diverse) Recipients Expect, So How Will You Shape Your Results Into Reports, Presentations, Papers, Etc.?

The Health Authority Is Concerned That There Seem To Be Inefficiencies And Poor Targeting In This Area Of Its Health Budget, And Wants A Brief Report With A Half-Hour Audio-Visual Presentation For Senior Planners On Practicalities. The Doctoral Programme Requires A Dissertation, In An Appropriate Theoretical Context. And You Want To Make A Real Contribution To What Seems To You To Be A Most Unsatisfactory Literature In This Area, So Others May Use Your Theories.


**Thinking It Through**

If You Don’t Know The Purpose Of Your Project, Ask Seriously, Why Are You Doing This? The Question Is An Entirely Practical One. (I Don’t Mean ‘How Dare You Do This?’, Though I Have Been Tempted To Say That To Researchers Using Intrusive Methods In Highly Sensitive Areas When There Is No Apparently Useful Purpose.) Practically, You Are Less Likely To Succeed If You Don’t Know Why You Are Starting. You Will Need A Purpose To Drive Your Project, And It Will Need To Be Better Than ‘To Get Through This Course’.


**Think Ethics**

The Ethical Challenges Come From The First Conception Of A Project And Appear Until The Final Report – And Often For Some Time After. From The Framing Of Purpose And Goal, Get Into The Habit Of Constantly Asking ‘Is It Ethical?’
In most research contexts, before you commence doing a project, you will have to gain what is usually termed approval or clearance from an ethics committee. This is not a mere irritation and the task of preparing an ethics report is not simply an obstacle to getting started. Rather, it’s a necessary first step. Thinking about the ethical implications of your purpose, your goals and your intended outcomes should come first. It should also inform the entire project. Having your proposal approved gives you no clearance from concern about the ethical implications of situations that will arise in the future.

Qualitative researchers are far more likely to impact and impede people’s lives than are researchers whose data are collected impersonally and recorded numerically. Their questions are more intimate, and their methods more intrusive. Training qualitative interviewers, I was always aware that I was teaching them how to get people to say things they would not normally say to a stranger.

And the outcomes of qualitative research are more likely to risk harm or exposure than are reports that are less personal, less contextualized and detailed, more easily anonymized. So qualitative researchers must start by thinking about the ethics of what they are proposing, design the project in that context and reflect on the ethical implications of everything they report and conclude. You will need constant awareness of the ethical challenges of asking this question, probing this way, for this purpose, and doing your best to report fully and vividly what you learn. That awareness will define for you the limitations to your enquiry, where you can’t or shouldn’t go and what you can’t or shouldn’t ask or report, as well as what you must achieve.

If these issues are new to you, pause to read detailed discussions that will alert you to risks for your own work. (See references at the end of the Chapter.)

Think Outcomes

Now, importantly, what do you intend and expect to offer as an outcome? Ideally:

- It should offer something more than the participants in your research could have reported. (Otherwise, you’ve wasted their time and yours.)
- It should present conclusions that account for your data in terms of the project’s goals. This has to be an adequate account, so you will be able to claim that it ‘makes sense’ of what’s going on in the data. (This is your overall duty as a researcher.)

It should also, if possible, be usable; you or others should be able to do something with the outcome. (Otherwise, why do the project? This is an ethical, not merely a practical, question.) You can’t at this stage predict how the project outcome will in fact be used, but you can aim from the start to make it usable. If it is well informed by the literature, perhaps it will be used to improve existing approaches and theories, or to compare with other studies. If the scope of your study is sufficient, and the data sufficiently rich and well analysed, maybe it will find a practical use. But
your study will be better and your motivation maintained, your demands on those you are studying more justifiable and your explanations to them more acceptable if you are intending to produce something usable.

It is very helpful at this earliest stage to write about the outcome you aim for. In many ways this will inform your design. The outcome wanted will indicate the scope of data needed for representing all the views on a problem; for example, you may need to seek data on contrasting types of cases (e.g. institutes of technical education as well as academic education). The desired outcome will also set requirements for the coding needed (Chapter 5) in order to ask the questions demanding answers (Chapter 8). Is it only the working-class parents who bypass diet education programmes? How differently do working-class and middle-class parents see the relevance of these programmes?

Just Checking: Is This Best Done as a Qualitative Project?

Isn’t it a bit late to ask that? No, it’s never too late. Indeed, it’s worth asking throughout your project, whether each part of it requires the ways of making and handling data that this book is about.

In the Introduction, I defined qualitative methods as ways of studying people and their social worlds by going there, observing them closely, in their natural setting, and learning how they understand their situations and account for their behaviour. This is a challenging task. Qualitative research should never be regarded as the default, the best or the ‘normal’ way of finding out. It sounds ‘normal’ that if you want to know something, you should just go and ask, and then look in detail at what people tell you. But as I argued above, to do so is by far the most intrusive and ethically charged of social research approaches. And qualitative data are also the most time-consuming to acquire and challenging to analyse.

It’s not too late to wonder if some or all of your project can be conducted by other means. Take a simple example: most interview projects require that the researcher records ‘base data’ like participants’ age and where they were born. It’s unlikely you need to record that in their own words, transcribe the dialogue and then code and analyse it. Why not save their time and yours by giving them a simple sheet of questions to fill in before or after you start the interview? This will be easier for them, and, importantly, less embarrassing, and save time and money for you. What will be lost are hesitations and thoughts that the questions trigger. Should you ensure these are caught by your method? Only if your question requires it. If this were a study of refugees or of people with memory loss, those questions would be the core ones for eliciting their accounts of their origins. But your study probably isn’t.

So should it be qualitative? The first answer is ‘It depends on what you are asking’. Research purpose may require qualitative method. A study of the experience of memory loss would require listening to the varied stories of those who have that condition, and seeking to understand their experience as they
talk about what they feel and how they deal with it, the meanings they put on place and time and lost knowledge. Recording fixed answers to predetermined questions about what you see as significant life events would give little of that understanding. You don’t just want to know where and when they were born, or even whether they know their date or place of birth; what matters is how they tell not knowing.

The purpose of your present study probably does not so clearly require a qualitative approach. Most don’t. So think through your goals and your intended outcome. Suppose this is a study of health advice given to parents: the purpose is to assist the health authority to improve child health delivery, and the goal is to explain why some parents ignore advice. You could approach this by a survey. The health authority may indeed already have the data, from questionnaires given out to clients, about clients’ regularity of attendance and their evaluation of advice. Better check if that data exists! Now, why have the authorities not had their answer from their own data? Maybe they just didn’t have the time or skills to analyse it — this will be your first task. Perhaps it tells you and them two things – the unsurprising fact that non-attenders don’t see available advice as useful, but also the more interesting result that those who most regularly attend are the least likely to tick ‘very useful’ in the evaluation box. Those survey results provided an outcome — you can now tell the authorities that just upping attendance won’t solve the problem. (This will be your first report.) But is that the outcome you were seeking? Check out your statement of goals. We are investigating for the health authority whether and how parents bypass health authority instructions for their children’s health. We expect to provide an explanation of why some parents ignore advice, in terms of parental attitudes, ideologies and beliefs. To provide this outcome would require you to listen to the parents’ own accounts of how they see their children’s health, indeed health in general, and their stories of their interactions with the health professionals. Right, you now need a qualitative approach.

So the more adequate answer to ‘Should it be qualitative?’ is yes, if the question requires it, the goals won’t be met otherwise, and the outcome will need a qualitative analysis. I’ve taught hundreds of highly competent quantitative researchers who never intended a qualitative project, but were dragged to it by honest recognition that they could not meet their goals or provide the required outcome by other methods. (This is why qualitative research is now so widely used across epidemiology. If you really want to know why people aren’t taking available life-preserving drugs or using the mosquito nets provided by aid organizations, you’d better ask them, and listen to how they see these aid offerings and their health risks.)

There is also a second answer – it should be qualitative if the data demand it. Researchers may happen on data not by design but by good luck or, more often, by the nature of the question. Perhaps you simply asked, ‘How often do you attend the clinic?’ but the answer took 20 minutes. For this distraught mother the question brought out all her fears about her child’s declining health, her ignorance of
health issues and her relationship with the child’s father, who opposes interference by authorities. If you recorded her story, instead of merely ticking the box for ‘less than once a month’ (and yes, you should have done so!), you have data that require handling by the methods this book is about.

So, returning to your own project, it’s good advice at this stage to revisit why you are proposing a qualitative project. There is nothing morally superior about qualitative work, and it is certainly neither easier nor quicker than quantitative research and certainly more ethically challenging. For many purposes, and to achieve many goals, the outcome required may be a strong conclusion backed by robust statistical analysis of a large sample. So ask early: why are you proposing a qualitative project, and should you? (For more on possible good and bad answers, see Readme First, Chapter 2.)

If the answer is yes, please take this seriously. You are making a commitment to designing and conducting a project that is adequate to the task, and then to doing justice to the data you will be creating, and to the experiences people will share with you. You are setting out deliberately to acquire understanding you don’t yet have, and to construct a complex account of rich data that deserve rigorous analysis.

**DESIGNING THE PROJECT**

Setting up a qualitative project need not be daunting if it is designed. In qualitative research, you do not have to be able to specify everything the research task will involve. You are aiming to learn from the data, and this means that you may shift emphasis to a new question, or divert to interview other people who prove significant. So, qualitative enquiry is fluid and flexible. But starting well does require thinking about where you are starting and why, and where you, the ‘researcher’, stand in this scheme.

Setting up a project is a process of getting ready, not a commitment to a conclusion. Qualitative researchers, like surgeons and chefs, set up carefully to be ready for whatever reasonably may be expected. Like the surgeon or chef, you should be able to describe what you aim to do, to say what it is likely to involve and what the expected outcome will be. You should specify how you will go about doing it competently, and be ready with the tools you may need, though you normally will not assume that you can see at this stage exactly how the project will end.

Design is essential for qualitative research. Very often, novices are given the contrary message that qualitative research can start, even finish, without being designed. But this is unacceptable, for ethical and practical reasons. When projects ‘just happen’, the researchers will rarely have adequately considered the impacts on those they are studying, and the data will rarely offer an adequate answer to the research question.

If you are planning to work with qualitative method, it is probably because you are trying to learn something new, rather than test something that is known.
This may require studying people’s accounts, or your observations, of their sometimes private thoughts and behaviour. Could you not answer your question with more publicly available data, such as the analysis of documents? Are you handling the situation sensitively and the data respectfully? An ethics committee will demand answers to such questions in most research situations. But if they don’t, you should.

Practically, you can’t start without thinking through where you want to go and what data you will need. Ethically, you must not start without considering the implications of your intentions and proposals for those you intend to talk with and propose to report on.

This early design need not be fixed or rigid. Qualitative designs can and usually should be revisited and reconsidered at each stage of the project, considering what has been done and why, revisiting methods if they prove intrusive or harmful, building on what you are learning, working out what you are asking and what sort of data will be necessary to answer that question. But you need to start with a plan.

This should not be a secret plan! Tell it to everyone who will listen – and listen to their responses. If appropriate, talk it out with the people involved – not just those who are funding the research or expecting a report, but those who will, with you, be creating the data. Think ahead, to when you will be telling the project to an audience: who are you trying to convince, and how would they be convinced? What would you need to apologize for? Adjust the design to cover these risks. In scoping your project and designing the data records, design for a sufficiently broad base to ensure that you would know if you had arrived at a partial picture.

This should also be an honest, open plan. You will not be helped by dodging problems or avoiding discussion of obstacles to entry into the field, or your own uncertain acquisition of skills. With increasing surveillance by research ethics committees, researchers are tempted to evade issues of known or feared challenges and puzzles in what they propose. Better to face these now than meet them when your data are distorted or inadequate.

If you are working in a team, present the ethical challenges, and then each stage of design, for debate. Draw it or write it up, and discuss it with as many colleagues as possible.

The Core Design Questions

The discussion below offers a minimal checklist of things to answer in order to set up the design of your project. Many aspects of your project cannot be designed ‘up front’, but the following three questions must at least be asked:

(Continued)
What Are You Asking?

This is no simple question. Many researchers fail to define what they are asking because they propose the project only at one level, either a very general interest or a very specific topic. Try to embrace both. To do this well, you need to work like an eagle, soaring over the landscape, locating something small that can be captured, diving in to take it and then making sure it’s not dropped!

Getting to the Goals

It is often hard to get your grip on something ask-able. If you have this problem, work down through funnelling questions:

1. What is your broad research area?
2. Within that area, what questions in the literature, or the society, are still being asked? What gaps in knowledge can you identify?
3. Within that focus, what is your topic?
4. And within that topic, what is the question being asked?
5. Within that general question, what researchable question could you attempt to answer – given your resources and skills?
6. And now consider the relation between you and that question: socially, ethically and practically where do you stand?

Note that these questions are at different levels, and they take you right down into the project. If you are new to this process of refining what you are asking, talk it out, diving down from a broad interest to a specific question that you can research.

In a team project it is especially important to work through these layers of questions, so there is clear understanding of purpose or purposes. Don’t try to impose agreement on the same researchable question for everyone. The members of a multidisciplinary or mixed skills team will of course have different questions, and the design may represent these. But if there are differences, they do need to
be discussed. If some colleagues really don’t know what you are asking, or worse don’t think it’s worth asking and suspect that your work is subverting theirs, the team will be in trouble.

Working with the questions above, the design will expand.

**Down to the Researchable Question**

1. Ask: where are you working, and what are you interested in? Young people’s health.
2. What are the interesting or important questions of that area? What questions are being asked? What others should be? What questions do the practitioners want asked? We’re pouring resources into health programmes, but does anyone know if they are completely wasted? It seems that at least some of the parents bypass them.
3. Next, what do you want to know? Locate a topic. Influencing parent perceptions and control over children’s diet. Why do you want to know about this? Anecdotal evidence suggests this might make programmes more effective.
4. Now, in discussion with colleagues, or using reading, arrive at a research question that needs to be answered. Why are diet education programmes for parents so varied in effectiveness? Spend some time checking that it doesn’t have an answer yet. (Review literature, search websites, talk about it.) Wonder whether it’s worth answering, worth the time and effort and the contributions you are going to be requiring from participants.
5. Now, is it a question you are able to answer? This is what I call a researchable question. Focus on questions that can be asked and answered by you with the resources available to you. How do parents perceive health programmes, in this town, and how do they portray them to their children? What sort of a researcher and resources are needed to answer this? Are you that sort of researcher? And are there any ethical as well as practical issues that would stop you doing it well?
6. Where do you stand in relation to this question? Design is particularly important where the researcher is studying a situation they belong to. You are the health promotion officer whose task is to promote healthy programmes in schools. On your home ground, already accepted as a visitor in the schools, it would seem that your project is already half-completed! Everyone will talk to you; observation is already underway. Beware! The very ease of making data is a warning of the need for design. Ask in particular: Will your question be adequately answered by interviews conducted by an insider? What sort of data will result from a health promotion officer talking to parents whose work patterns do not permit supervision of children at home?

You are ready to proceed with a very careful research design.

**How Are You Asking It?**

If you haven’t done so already, you need to locate your project methodologically. Studies conducted in an academic context are expected to be appropriately located in one of a variety of qualitative methodologies; that is, ways of reflecting
on and studying situations and seeking and interpreting our understanding of social phenomena. There is a substantial literature on each of many qualitative methods and each has its own way of approaching a question, each seeks a specific sort of data, and each carries an armory of techniques for analysis. An ethnographic study, for example, will ask very different sorts of questions, in very different ways, from a phenomenological study, and of course they will then analyse the data differently and present quite different outcomes. But importantly, in each case, the question, the sort of data, the way of analysing and the outcome will fit together. A strong methodology is coherent. It frames, provides the context for a study, guiding you to the appropriate ways of addressing your question.

Comparison of specific methods is not a task for this book. For a detailed account of what different methods offer, and the ways each provides a fit of question, data and mode of analysis, see Readme First.

In an academic context, you need a confident choice of a method that will give you the appropriate fit between question, data and analysis. Locating your project in such a method is a major first step. Think of the method, then, as a vehicle that will carry your study forward in the direction needed to answer the research question well. If, however, you are one of the high proportion of qualitative researchers working outside the methodological literature, can you avoid locating your project in a method? Many researchers see this as irrelevant – they are simply required, by their funders, their supervisors or their own motivation, to get the best possible understanding of a situation, a group or a problem. But if this is your situation, you still need a clear idea of how you will drive this project. How are you asking your research question? Is that the appropriate way of asking it and what different results would you gain by asking in other ways? Which combination of data, from which methods of enquiry, will allow you to answer it well? And how will you work with that data?

So whatever your context, and whatever you call it, your study needs a method, and one which offers a fit between the question being asked, the sort of data needed to answer, the techniques being used to make and analyse the data, and the outcome you are seeking.

If you use focus groups conducted with the parents, what will you learn and what questions might you answer with such data? How different would your study be if based on a year’s work in the district as a health visitor?

The ten projects on the website offer a wide range of research methods, and each method selected is appropriate to the question being asked. For each project, there is a page on setting up. Skim these now to get a feel for the examples provided, and the variety of research designs represented.
Finding a Fit Between Question, Data and Method

1. How are you asking your question? Is that the only way of asking it and what different results would you gain by asking it in other ways?
2. Read about different qualitative methods, and learn to discriminate between them. Then carefully select the one that fits your study.
3. Reflecting on these differences, and on your own skills, design your own project to gain the sort of understanding its question needs.

Team projects have a special requirement here: if the team already exists, the design should, if possible, consider and plan to use the distribution of members’ skills and experience.

4. Whatever the context, keep asking how the project’s question and approach will shape the data. Ask often: might there be other ways of doing this, with what likely outcomes? And always ask: is the question pushing me to seeking data in ways that are ethically questionable?

If you are aware that you are asking your question one way, and that other ways would provide different answers, you will be better prepared to organize and interpret your data. This is particularly important if the data you are handling were created or acquired by someone else. Researchers brought into an ongoing project or relegated to a lowly assistant role can acquire data without participating in design. If that’s your situation, it is especially important to understand why (and by whom) you have been provided with (only) these records of these research events or processes.

The literature on qualitative methodologies may seem to have little relevance to large research projects designed to combine qualitative with quantitative data. Rich accounts from field research are very unlike open-ended responses to a survey with large numbers of respondents. But the study still requires a fit of question, data and method. If your intention is to handle the open-ended responses as qualitative data, reflect on the question to be answered, the ways these responses are being elicited and the context required to interpret them well. In such projects, design may be necessarily rigid. The requirement for consistency in a survey, for example, will mean that the researcher will be unable to return to redesign questions. So it is especially important to design and test questions that seek the needed balance of information, from the start.

What Data Will You Need to Provide a Good Answer?

The next questions for research design are about data, and there are always three different sorts of questions. Two are fairly obvious. Firstly, what data are needed to
cover your topic area adequately, and secondly, what are the types of data needed to answer your question? Then comes a question that is huge: what is your relationship with this body of ‘data’?

In designing data for qualitative research, it helps to think in terms of how well the data will reach across the topic. You will want to be sure that the data have adequate scope, rather than that they representatively sample a given universe.

And then you need to ask about the sorts of data needed to do justice to this topic. This is a different question from ‘What data will I need to test this theory?’ You are seeking data that will allow you to ask a question, maybe challenge your assumptions, and arrive at a new understanding.

### Designing Your Data

1. **What is the scope of this project?** What variety and scale of data are required by your question?
   - What are all the settings that you need to explore? Qualitative research is rarely restricted to only one.
   - Within the selected setting(s), what types of cases (for example, of people, institutions or places) do you need represented? (And what won’t be needed?)
   - If your question contains comparison, or linking of qualitative and quantitative data, pay particular attention to the data scope and the types of cases you seek.

   As you scope the project, sternly ask the relevance and usefulness of each area of data you consider seeking.

2. **What is the nature of the data required?** The next chapters discuss the nature of qualitative data created by different techniques of enquiry. At this stage, you need to address in the most general terms the representations you will be seeking of the situation studied:
   - What sorts of data are needed? Does your chosen method require, for example, that you record the words people use to tell their perceptions of their worlds, or that you record your own observations of their behaviour? (Again, what won’t be required?)
   - Return to your literature review. What sort of data have other studies used, and can you see ways that those studies were limited by their data? Design to do better!
   - Take particular care that your design attends to ethical considerations. If the question doesn’t need intimate accounts of people’s experiences, to seek these is inappropriate.

**How much data?** Noticeably absent from the answers above is ‘the sample should be big enough’. That’s because size of data records is never, alone, a relevant criterion for a good outcome. Numbers of cases needed for a comparative
setting up your project

study may be decided in advance, or numbers of interviews set for a survey. But completion of a qualitative project ideally happens when the question is answered, and projects evolve as researchers come to understand their data and need to ask new questions. Nevertheless you are very likely to be working within a time and money budget, so you have to come up with a satisfactory answer at this design stage.

Perhaps the most common question from novice qualitative researchers is, ‘How many [interviews, cases, visits, etc.] should I do?’ There is only one situation in which a firm number can be given – when the research question or commission specifies a given number of cases. (And then you will still not know how many times you will need to interview these people.) Otherwise, the only safe answer is, ‘I’ll know when I have the data needed to answer my research question and all subsequent pertinent questions arising from the data’. You may be required by research grants bodies or committees more familiar with quantitative research to specify in advance a number of visits or interviews. Of course you must do so if required, but it is advisable to explain that the method requires that you revisit your design during the project once informed by the early analysis. Always design a stage of data expansion within the project. Useful in explaining this requirement is the term ‘theoretical sampling’, which refers to later sampling directed by the discoveries and concepts developed (there is more on this process in Chapter 7). The term, used in grounded theory projects, is now recognized outside that context as a label for this reviewing and revisiting process.

Too much data? Well-designed qualitative research projects are usually small, the data detailed and the techniques designed to discover meaning through fine attention to content of texts or images. These techniques take time and do not need large samples. To confront even a little of such data is challenging. Most researchers go through a period where they feel they have too much data, often very early in a project when they have hardly started. But from there, if the project was designed to make the data which the question needed, they go on to learn to handle those data skilfully and assess accurately how much is needed. There is of course no simple numerical answer to ‘how much is too much?’ It depends, as has been argued above, on your question. But a qualitative project will normally have relatively few data records, certainly not many hundreds.

In some situations the researcher has little control over the volume of data, or there is a very good reason for there being very large quantities of data. It is no help to these researchers to tell them they should not be in this situation. No qualitative technique assumes projects with bulk data and many simply won't work if they are applied to very large numbers of cases or volumes of text. But some techniques can be adapted to use by the researcher across a bigger project or by carefully partitioning it. Such advice is provided where appropriate throughout the following chapters.
A variety of data? A note on triangulation

It is common for qualitative project design to include the use of multiple sources of data or ‘views’, with the aim of bringing many perspectives to bear on the question.

‘Triangulation’ is a term widely used for such designs, the most common form being combinations of qualitative and quantitative data. Designing a project to address the same question with a variety of data is challenging. Simply juxtaposing different data sources or types is unlikely to provide comparable data. Such a design must ensure that the same question will be addressed by each of the types of data or approaches. So very careful planning is required for ‘triangulation’ that is useful. If you are considering such a design, the different sub-projects must be very carefully scoped, and the focus of the data carefully planned. (See suggested readings at the end of this chapter.) And the outcomes of even a well-planned ‘triangulated’ project require very careful interpretation. If you are proposing this design as a means of confirming or validating your findings, jump now to the discussion of ways of establishing validity of results in Chapter 7.

YOU AND YOUR DATA

Now, return to the big question about your project and data: what is your relationship to this stuff you are calling ‘data’?

Whose World Are You Studying?

This enters an area of textbook discussion that often is the main barrier to researchers starting out. There is an ongoing debate about the philosophical basis for qualitative research – in philosophical terms about ontology (what’s real) and epistemology (what we know and think we know about it).

The debate is centuries old, but the forms it has taken in social studies in recent decades are new. In the 1980s these issues became dominant in social science academic discourse with often hostile dichotomies claimed. Researchers working with assumptions that social life could be studied by fact-gathering methods were labelled ‘positivist’ and ‘empiricist’. These labels were attached to any quantitative approach and associated with biological and physical sciences. If you are researching in an academic context, you will need to locate your work in these debates. But they also matter if you are researching outside academia, because these issues are the context of your research.

At its simplest, the justification for working qualitatively is that many, perhaps most, social behaviour can’t be understood by collecting apparently ‘real’ facts like date of birth. The census can tell us (if people accurately reported) how many babies were born in each year. But if we wish to understand why the birth rate
is falling, we need to know about a different sort of ‘reality’; how people see the society they live in, what having children means to them, their perception of their future and their present priorities. This is a socially constructed reality, created collaboratively with others as we live out our lives. And it is that understood version of the social world that will help us understand behaviour.

There is an obvious methodological message in this. If we are trying to understand people’s socially constructed understanding of their worlds, we can’t know in advance what to ask – or what to expect. We need methods that will access their accounts of their lives, in their words, not ours. And we need to analyse this data using methods that take us up from the broad, messy picture to seek linkages, patterns, theories or explanations that make sense of all that variety. This sort of ‘bottom-up’ research, typical of qualitative work, is termed ‘inductive’ and is usually contrasted with ‘deductive’ reasoning, where the researcher starts ‘top down’ with a theory and tests it on data collected for that purpose.

But pause before you declare your opposition to ‘empiricist’ research. There will usually be several sorts of data relevant for any social study and any qualitative study will need to seek ‘facts’ like the attendance at the clinic or birth of the child. When social researchers are tackling topics rather than academic debates, they usually work with many sorts of data. (So, too, by the way, do researchers in biological and physical sciences, who are often greatly puzzled by the hostile dichotomies that social researchers debate!) There are not two types of people, those who are qualitative researchers and those who are not. All good researchers can create data records and analyse them by a range of methods, as appropriate. But all good researchers are also aware of the nature of the reality that they are trying to explore.

It follows that good qualitative researchers are also uncomfortably aware that they are not external to that reality, but part of it.

Where Are You in That Study?

Qualitative researchers find it hard to avoid that question. This is because the data you work with are collaboratively constructed by you and those you are studying. If you are working qualitatively, it is usually because you are seeking understanding of people’s situation via their own accounts of their perceptions. These are not normally provided as neat heaps of facts, easily collected and summarized. You attempt to enter the world of those you study (and they more or less allow you to); you watch, ask and listen; they give you one of many possible accounts of their experience; you interpret, select and record. You are hardly an innocent bystander in this process of data making.

In many research approaches and reports, this complicated collaborative relationship of researcher and researched is simply not recognized. The methodological approach may not direct attention to the ways we as researchers construct
data. Or the relation may seem very clear and be presented as uncomplicated – as when the researcher is handling data created and archived by someone else. But it is important to reflect on the ways in which you enter and affect a situation, and create and use ‘data’ from that situation. This is so even (perhaps especially) if your relation to your data seems unproblematic.

How to do this? You will find in the next chapter discussion of how you can handle the relationship between you and your data as data. Reflecting on this relationship and analysing it is a process that carries the term *reflexivity*, a theme throughout later chapters.

In this context, you can get an early feel for the varieties of projects reported on the ‘Methods in Practice’ part of the website. For one researcher, himself ‘inside’ his study of *Inside Companionship*, the research was understood in the context of reflections on the construction of data. Two other ethnographic studies offer accounts of challenges in entering the research field as participant: *Elderly Survivors of the Hanshin Earthquake* and *Youth Offender Program Evaluation*. Compare with projects where the challenges described are those of locating and then being accepted by people to be interviewed: *Mapping Caregiving*, the *Sexuality–Spirituality* project, *Handling Sexual Attraction* and *Wedding Work*. By contrast, the project on *Leading Improvement in Primary Care Practices* was hosted via recognized research channels and two projects handled data provided from earlier projects (*REMS* and *Harassment Complaints*).

**Designing for Feedback**

Are you planning to take your interpretation ‘back’ to the ‘respondents’? This is often a very useful, pleasant and helpful act (so long as that interpretation is not damaging to them and is understandable to laypersons). But note how those terms carry assumptions about data making. Building into your design that ‘their’ response will be sought for ‘validation’ of your interpretation is highly problematic.

It may be very important to your purpose (or even required by clients or funders) that those you are studying will be consulted prior to publishing your report, especially when they are also recipients of the outcome of your research. It can be hugely exciting to have enthusiastic feedback. But feedback must be considered as more data, and handled, like all your data, as a collaborative construct. You and ‘they’ are together making an account of something. So the consultation process takes time and is never uncomplicated. As you plan the stages of your project, plan in any feedback process. Beware of planning for final-moment respondent consultation!

Where the analysis is not addressing a ‘lay’ audience, for example where the purpose is to inform a theoretical debate, it may still be important to explain to
participants what you are doing with their words, but you will be unlikely to seek feedback from them on your analysis.

Different methods use different terms for the feedback process, the most common being ‘respondent validation’ and ‘member checking’. Both those terms warn of issues you must consider if feedback is part of your design. Can (any) respondent validate your analysis? Won’t they just see another reality? And does it make sense to check with a member of your sample what you, as researcher, are seeing? Some of these issues are related to those raised by ‘triangulation’, discussed above: these are reviewed in Chapter 7.

Declaring the Ideas You Are Taking in

You may have been told that qualitative researchers start with empty minds, no prior theories or concepts. If so, perhaps you wondered what to do with the ideas buzzing in your head about your topic. Now is the time to deal with them.

Start by reflecting on ‘bias’. Qualitative researchers recently avoid this term, since it has been given very specific meanings and warnings in the context of quantitative sampling and error estimation. But ‘bias’ is one of many good English words whose usual, dictionary meanings were distorted by their use in quantitative research. The noun means a diagonal line or stretch across woven cloth. Cut or hung on bias, the cloth will be slanting. A badly cut garment will hang awkwardly, pulled by an unrecognized bias. But haute couture uses skilful bias-cut all the time, to achieve a perfect drape. All cloth has bias – you can either control for it by cutting straight, or you can use it well, by careful design. Similarly, all social research has bias, because researchers always take in assumptions and experience. So bias is there in all social research (qualitative or quantitative). The task is to use it honestly and intelligently, as you craft the account of your data.

Your concern is with the bad nutrition of the poorer kids, and your anger is about the inability of health education to help them. Low-education parents just don’t seem to care about healthy diet. If you have that concern, and a hypothesis about cause is hidden there, take it out and examine it. Now, build into your project genuine enquiry into the knot of factors that link education and eating. The study will be different, biased to examining those factors, but it will be stronger for your concerns and for your directly addressing them.

The goal of most qualitative research is to learn from the data. But researchers don’t have empty minds, and are likely to have strong values and commitment to their topic. So good research design will always take into account what’s known already, and will build into the design the ways this knowledge can and will be used and tested.

Think of the first stage of this process as declaring what is in your baggage, as you do on arrival at an international airport. If you don’t declare it, you will take
in, surreptitiously, assumptions or expectations that will colour what you see and how you see it. Throughout the research, aim to maximize the usefulness, and ensure the testing, of those ideas.

**Declaring Your Ideas**

The most constructive way of separating out your prior knowledge and preconceptions is to document them.

- Return now to your literature review. If no review is required by your research context, set yourself the task of assessing the different approaches in books, media, professional groups, etc., to the situation you want to study. Carefully and critically account for the different interpretations of this phenomenon. Why did some writers see a particular aspect? Why were some questions not asked? And where are you in that picture?
- Write a very honest and personal paper about what you expect to find when you go to study this situation. How do you expect to feel about what you learn? What do you think will be the important factors in the answer to your research question? Revisit that paper during the project.
- After your first ‘entry’ to the field, the first contacts or first interviews, write out your experiences in detail. Assess your effect on the situation.
- Make a first collection of ideas about the topic, listing the categories that have been used in others’ accounts, the concepts that seem to matter, and the ideas and hunches you yourself are bringing in.
- **Draw a model** – simply a sketch on paper – of what you think, at this stage, are the main issues or factors involved in your study, and how you think they relate to each other and to the questions you are asking. Keep that model to revisit and develop as the project proceeds. As you get started in software, you might develop the model on computer, linked to your data (more on modelling in Chapter 9).

None of these activities is intended to ‘cleanse’ your mind of preconceptions, or remove bias. By doing them, you have acknowledged the ideas you bring into this study and set yourself the task of using and testing them. Your method may require you to ‘bracket’ these prior ideas, and approach the research data not with an empty mind but with a deliberately open one. Or you may set out explicitly to design a project that will address them. But you won’t sneak them in.

With this documentation, you have produced data records. Your experience and your views are data, to be explored, reviewed and analysed as the project proceeds. You will find in the next chapters discussion of how to keep these records of your ideas alongside what is more traditionally regarded as the project’s data – records you make of your enquiry into other people’s ideas and perceptions.

You’ve started!
To Do

Getting started requires many steps, and these may of course be taken separately over some time. But each of these four major tasks is required for you to move on.

1. The ten projects on the website offer a wide range of research methods selected by the researcher as appropriate to the question being asked. For each project there is a page on setting up. Read one project’s story and consider how it would have progressed had a different method been chosen.

2. Outline a literature review for your topic. What is it asking, what literature needs to be explored, what issues will you be raising, what conclusions do you seek?

3. Design your own project, following the steps in this chapter:
   (a) What are your purpose, your goal and your intended outcome?
   (b) What is your researchable question? Follow, and document, the steps:
      - What is your broad research area?
      - Within that area, what is your topic?
      - And within that topic, what is the question being asked?
      - What researchable question could you attempt to answer – given your resources and skills?
      - How does it contribute, fill a gap or address a problem?
   (c) How are you asking it?
      - Are there several ways it could have been asked?
      - Which have you chosen and why?
   (d) What data will you need to provide a good answer?
      - What is the scope of this project?
      - What is the nature of the data required? What sorts of data are needed?

4. Declare the ideas you are taking in, in a three-part report containing the following:
   - a very brief summary of the usable ideas and explanations you found in the literature on your topic area;
   - a very honest account of the values and expectations you are personally taking into your project – “Me and my topic”;
   - a model of what you expect to be finding.

Suggestions for Further Reading

For issues of methodological fit, a sketch map of the choices of methodologies and detail on research design, and the complex issues of ethics in qualitative research, see Readme First (Richards and Morse, 2013) Part 1 and Chapter 11. If your work is not already located within the literature of a method, and even if you think this is not necessary in your context, go there for an understanding of the range of methods available and how you can design your project.
so question, data and methods fit, and for literature specific to a method. For other recent
texts introducing different approaches, see Cresswell (2013), Punch (2014) Chapter 2, Silverman

On ethics in qualitative research, there is now a considerable literature. Start with Chapter 3
of Lichtman (2014). For a range of feminist perspectives on ethics, see Miller and Birch (eds)
(2012). On the special ethical issues involved with online data and computer projects, see
Paulus et al. (2014).

For advice on literature reviewing, there are chapters in several recent texts, for example
Lichtman (2014), and many books, for example Machi and McEvoy (2012) and Ridley (2012).

On qualitative research design, there are several focused texts (see especially Creswell,
2013; Maxwell, 2013; Marshall and Rossman, 1999) and most of the general texts and collections
have chapters (for example, Flick, 2014; Lincoln and Guba, 1985; Mason, 2002). Seek reading on
design in your discipline or research area, as the criteria for good design vary: for example, in
specific advice on research design for using qualitative software, see Di Gregorio and Davidson
(2008) and Bazeley (2013).