Values and Data Collection in Social Research

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In this article, I offer a partial analysis of the role of values in qualitative data collection in social research. The partial analysis shows that nonepistemic values have both required and permissible roles to play during this phase of research. By appeal to the analysis, I reject the ideal of value-free science as applied to qualitative data collection, and I demonstrate why two alternative ideals should likewise be dismissed as standards for values in qualitative data collection. Also, I briefly discuss the extent to which the partial analysis carries over to quantitative data collection in social research.

1. Introduction. Current discussions of the role of values in science tend to take as their starting point, or revolve around, the ideal of value-free science. According to this ideal, nonepistemic values, like moral, social, and political values, should not influence the internal phases of research. In general terms, these phases involve the collection and interpretation of data and the drawing of conclusions on the basis of the data. The phases may also be characterized in relation to more specific forms of research as when the collection of data is equated with observation and experimentation or the drawing of conclusions is identified with determinations as to whether to accept or re-

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ject hypotheses. However specified, the ideal of value-free science has been heavily criticized.¹ Moreover, a number of alternative ideals have been proposed.² The current debate is concerned with the assessment of both the objections to the ideal of value-free science and the alternative ideals for values in science.

In what follows, I take the ideal of value-free science as my starting point too. My focus, however, is different from that adopted in the recent debate: I discuss the ideal of value-free science as applied to qualitative data collection, that is, data collection by means of qualitative methods. In the ongoing debate, the role of values in data collection has received relatively little attention, as the dispute has primarily centered on the role of values in the acceptance or rejection of hypotheses. Likewise, there has been little, if any, scrutiny of the role of values in research based on qualitative methods—methods that are extensively used in social research (i.e., research carried out in the social sciences and humanities). The dispute about the role of values in science has mainly concentrated on natural scientific research.

In keeping with the general debate, I argue that the ideal of value-free science should be dismissed, but because of my distinctive focus, my reasons diverge from those found within the mainstream discussion. There, the preoccupation has first and foremost been with demonstrating that nonepistemic values have legitimate roles to play when hypotheses are accepted or rejected. By contrast, I offer a partial analysis of the role of values in qualitative data collection, showing that nonepistemic values have both required and permissible roles to play during this phase of research. By appeal to this analysis, I reject the ideal of value-free science as applied to qualitative data collection. Also, I briefly show that this conclusion extends to other specifications of the ideal than the one I rely on.

The dismissal of the ideal of value-free science makes it natural to consider alternatives, one of which may well be suited as a standard for values in qualitative data collection. I examine two such ideals recently advanced by Heather Douglas and Daniel Steel respectively. Drawing on the partial analysis of the role of values in qualitative data collection, I demonstrate that neither of them is suitable. Accordingly, I conclude that an ideal for values in qualitative data collection is in need of being developed, while pointing to the partial value analysis as a first step in this direction. Finally, I briefly discuss the extent

1. Contributions to this debate include Longino (1990, 1996), Rooney (1992), Root (1993), Machamer and Douglas (1999), Douglas (2000, 2009), Anderson (2004), Machamer and Wolters (2004), Intemann (2005), Kincaid, Dupré, and Alison (2007), Carrier, Howard, and Kourany (2008), Steel (2010, 2015), Biddle (2013), Diekmann and Peterson (2013), and Rolin (2015).

2. Discussions of alternatives to the ideal of value-free science include Longino (1990), Solomon (2001), Douglas (2009), Kourany (2010), Elliott (2011, 2013), Brown (2012), Rolin (2012), Hicks (2014), and Steel (2015).

to which the partial analysis of the role of values in qualitative data collection carries over to social research that employs quantitative methods.

2. Qualitative Methods Introduced. Within social research, qualitative methods are widely employed to collect data. In what follows, I introduce what are likely the most frequently used qualitative methods (Bryman 2012, 493): participant observation and semi- and unstructured interviews. I will henceforth have these methods in mind when referring to qualitative methods and qualitative research.³

The method of participant observation requires the researcher to take part in the ways of life she studies. Different degrees of participation are possible. For instance, the researcher may participate in the sense of simply hanging around or in the stronger sense of engaging actively in the activities under study. Whatever the extent of her participation, the researcher should try to affect the ways of life she studies as little as possible, as her immediate aim is not to alter but to learn about them. While participating, the researcher should observe, in the broad sense of noticing, what goes on. Finally, participant observation should be carried out over an extended period of time. Previously in the field of anthropology, for example, the researcher was expected to study the research participants for at least a year; today, studies of a shorter duration are also regarded as acceptable.

The methods of semi- and unstructured interviews require the researcher to pose questions to a research participant, who is permitted or encouraged to digress, to expand on her responses, to exemplify her points, to introduce her own concerns, and the like. The difference between the two forms of interview is a matter of degree: in the semistructured interview, the researcher has prepared various questions, and she guides the conversation to a greater degree than in the unstructured interview, which comes very close to an ordinary conversation. Both semi- and unstructured interviews are usually conducted in the settings in which the research participants live their lives. Often, both forms of interview are combined with participant observation (and possibly with further data-gathering methods).

The purpose of all three methods is the same, namely, to produce data that allow the researcher to understand the research participants' perspectives, their experiences, views, and the like. As Malinowski formulates this point in relation to the method of participant observation that he is often credited with having devised: the method makes it possible "to grasp the native's point of view, his relation to life, to realize *his* vision of *his* world" (1922, 25). It

^{3.} The following characterization draws on various discussions of participant observation or semi- and unstructured interviews, i.e., Agar (1980), Spradley (1980), Jorgensen (1989), Bailey (1996), Davies (1999), DeWalt and DeWalt (2002), Hammersley and Atkinson (2003), Bryman (2012), Hammersley and Traianou (2012), and Hammersley (2013).

should be stressed that the researcher is not required to refrain from going beyond and even challenging the research participants' views, perspectives, and so on, in her account of their ways of life. Still, these views, perspectives, and so on, are always, at the very least, the starting point of analysis.

Participant observation and semi- and unstructured interviews have a number of features in common in the manner in which they are typically employed. First, before data collection, the researcher tends to settle on a rather unspecific and open research question. The fact that the question is open means that it has multiple answers that are not prefixed, for instance, "How do refugees cope with their changed economic situations?" or "Why did Danes vote 'no' in the EU referendum in December 2015?" By comparison, closed questions have a prefixed number of answers, as illustrated by the question whether a given hypothesis is correct.

A second feature of qualitative research is that the research question is often changed during data collection. Frequently, the research question is made more precise as the generation of data progresses, but it may also be modified in other ways or be discarded in favor of a different research question. The alteration of a research question is not followed by a new data collection phase in the sense that data collection starts all over again. Rather, ongoing data collection is continued in that data gathered before the adoption of a modified research question may also be drawn upon to answer it.

A third characteristic of qualitative data collection relates to the planning involved or the lack thereof: before setting out to gather her data, the researcher tends to have at most a very rough idea of what data to collect. In this sense, she has an open mind as to what data about the research participants' views, perspectives, and so on, to collect. As Bryman explains, this approach "is supposed to enhance the opportunity of genuinely revealing the perspective of the people you are studying. Also, in the process, aspects of people's social world that are particularly important to them, but that might not even have crossed the mind of a researcher unacquainted with it, are more likely to be forthcoming" (2012, 403).

A final point to note has to do with the researcher's interactions with the research participants. When the researcher generates her data, she typically enters the social world of those participating in her study, and as such she must navigate within their social world. Moreover, and relatedly, Hammersley and Traianou point out that the researcher's relationships with the research participants "are not governed solely by a formalised, relatively standardised research role" (2012, 106). Often, the researcher develops more personal relationships, even friendships, with research participants. Both of these observations explain the commonly noted fact that the researcher draws on her general social skills when using qualitative methods.

These features of qualitative research have important consequences with respect to the legitimate roles that values may play in qualitative data collection. Before looking into this, however, more needs to be said about the ideal of value-free science as applied to qualitative data collection.

3. The Ideal of Value-Free Science as Applied to Qualitative Data Collection. The ideal of value-free science states that nonepistemic values should not influence the internal phases of research, that is, the collection and interpretation of data, and the drawing of conclusions on the basis of the data. Applied to qualitative data collection, the ideal amounts to the claim that nonepistemic values should not influence qualitative data collection. I will henceforth refer to this as the ideal of value-free qualitative data collection. In this section, I introduce the ideal of value-free science and its application to qualitative data gathering. My aim is to present an account that an advocate of the ideal would be likely to endorse.

The ideal of value-free science constrains the decisions made by the researcher during the internal phases of the research process. The phase of qualitative data collection refers to the stage in which the researcher gathers her data by way of qualitative methods. As part of this process, the researcher makes numerous decisions. Two such decisions were noted in the preceding section: the researcher decides how, if at all, to change her initial research question. She also makes a number of choices as to what data to collect, deciding which particular situations to seek out or to not seek out, which particular aspects of situations to focus on or to disregard, whom to interview, what to ask a particular research participant to elaborate on or to illustrate during a semi- or unstructured interview, when to change topics during a particular semi- or unstructured interview, and so on. Other examples of choices made by the researcher concern how to describe the research participants' doings and sayings in her field notes, what to include in the interview transcripts, and how much data to collect. The ideal of value-free science, as applied to qualitative data collection, implies that these sorts of choices, made during the generation of qualitative data, should not be affected by the researcher's nonepistemic values. Should this occur, the researcher fails to live up to the ideal.

The ideal of value-free science rests on a distinction between epistemic and nonepistemic values. Epistemic values are paradigmatically exemplified by predictive accuracy, internal consistency, external consistency, fertility, simplicity, and unifying power. More precisely, these values are regarded as attributes of theories that are desirable from an epistemic viewpoint, that is, from the perspective of generating (scientific) knowledge. Because the debate about values in science has mainly focused on the acceptance and rejection of hypotheses and theories, there is no similar list of epistemic values relating to data collection, let alone data collection by way of qualitative methods. Still, a proponent of the ideal of value-free qualitative data collection might work out such a list. For instance, she might likely suggest that *relevance* is a desirable feature of qualitative data and that *balance* is a desirable feature of a qualitative data set.

To begin with the notion of relevance, data have this feature insofar as they. in combination with factual background assumptions, may contribute to-or are relevant from the perspective of-providing an answer to the research question. As an illustration of this point, consider the research question "What is community C's attitude toward abortion?" On the assumption that its members are actually willing to relate their views on this matter to the researcher, transcripts of semistructured interviews on this topic are relevant data relative to this research question. By contrast, transcripts of semistructured interviews about individuals' food preferences that do not bear on the research question in conjunction with factual background assumptions fail to qualify as relevant data. With respect to the notion of balance, data sets have this feature insofar as they contain relevant data that make it possible to provide an unbiased account in response to the research question. This idea may also be exemplified in relation to the research project on community C's attitude toward abortion. Insofar as the researcher collects data that cover the whole spectrum of views on abortion in the community, the data set is balanced: it may serve as basis for an unbiased answer to the question about the community's attitude toward abortion. By comparison, if the researcher only conducts interviews with proabortion activists while disregarding individuals with different attitudes toward abortion, her data set is unbalanced: the data set does not make it possible to offer an unbiased answer that sheds light on the (whole) community's stand on abortion.⁴ In what follows, I assume that a sensible specification of the epistemic values in qualitative data collection includes the values of relevance and balance. Of course, it is possible to say much more about both values, but for my present purposes, the above characterization will suffice. For now, the important point to note is that the ideal of value-free science goes hand in hand with the claim that epistemic values should affect the internal phases of the research process. Accordingly, the ideal of value-free

4. The notion of relevance is an adaptation of Longino's account of data as providing evidence for hypotheses in conjunction with background assumptions (Longino 1990, 38ff.). The notion of a balanced data set draws on Anderson (1995, 37ff.). Note that inspired by the argument from underdetermination, it might be argued that (*a*) when the researcher determines whether some data are relevant, nonepistemic values may legitimately figure among her background assumptions, these need not be purely factual, and (*b*) the researcher's factual background assumptions may legitimately be justified by reference to nonepistemic values (see, e.g., Longino [1990], Anderson [1995], and Intemann [2005] on the argument from underdetermination). Also, it might be held that nonepistemic values may legitimately inform judgments to the effect that a data set is balanced (for this kind of argument, see Anderson [1995]). These lines of reasoning challenge the ideal of value-free qualitative data collection by pointing to ways in which nonepistemic values may legitimately influence this phase in research. I will not go into a discussion of these objections. For the sake of argument, I will assume that proponents of the ideal may successfully rebut them. I want instead to concentrate on a different way in which to dispute the ideal. qualitative data collection should be supplemented by the contention that epistemic values alone should influence the decisions made during qualitative data collection.

Consider now nonepistemic values, which are expressed in claims such as "traditional family patterns should be adhered to," "democracy is the best political system," "all human beings should be treated with respect," and "obtaining a promotion has high priority." Nonepistemic values are typically identified with social, political, moral, and personal values, but other types of nonepistemic values are occasionally included on the list too. Common to these values is the notion that their influence on various aspects of the research process is regarded as undesirable from the perspective of generating scientific knowledge. It is reasonable to think that a proponent of the ideal of value-free qualitative data collection would want to adopt a conception of nonepistemic values that includes social, political, moral, and personal values. Following the ideal, it is these sorts of values that should not affect the choices made during qualitative data collection.

Insofar as the ideal of value-free science focuses on the internal phases of research, it leaves open the roles of values in the external phases, that is, the phases that precede and follow the internal phases. Commonly, proponents of the ideal of value-free science make claims about these external phases too. Most notably, they maintain that the researcher's choice of research question, before the onset of data collection, may be influenced by both epistemic and nonepistemic values and that the decision to use a certain method should be influenced by research ethical values: its employment should be compatible with treating research participants in ethically acceptable ways. Also, they think that once the researcher has arrived at her conclusion, nonepistemic values may affect decisions about the application of her findings.

For the present purposes, this characterization of the value-free ideal and its application to qualitative data collection will do. I turn next to the task of showing why the ideal of value-free qualitative data collection should be dismissed.

4. A Partial Value Analysis and the Rejection of the Ideal of Value-Free Qualitative Data Collection. In this section, I offer a partial analysis of the role of values in qualitative data collection. The analysis is partial in that I concentrate exclusively on two choices that are part of qualitative data collection: decisions about how, if at all, to change the research question and decisions about what data to collect. For the sake of the argument, the analysis relies on the traditional epistemic/nonepistemic distinction that the ideal of value-free science espouses.⁵ I demonstrate that some nonepistemic values

5. The distinction between epistemic and nonepistemic values has been questioned by, e.g., Rooney (1992), Longino (1996), Machamer and Douglas (1999), and Douglas (2009). At the end of sec. 5, I briefly comment on the fact that my analysis relies on this distinction.

have required roles to play in relation to these two decisions: certain nonepistemic values should influence decision making and hence override other nonepistemic and epistemic values that pull in a different direction. Further, I show that these other nonepistemic values have permissible roles to play: they may affect decision making insofar as this is compatible with the data and the data set possessing, at the end of the data collection phase, features like relevance and balance that are desirable from an epistemic perspective. By reference to the partial value analysis, as I will call it, I contend that the ideal of value-free qualitative data collection should be discarded. Also, I briefly show that alternative specifications of the ideal should likewise be rejected as suitable standards for qualitative data collection.

One kind of nonepistemic value is research ethical values such as the concern not to harm the research participants, to respect their autonomy, and to respect their privacy. It is a matter of consensus that, in general, research of any kind must be carried out in compliance with these sorts of ethical values.⁶ This requirement is consistent with the ideal of value-free science on the assumption that decisions about how to ensure that the research is ethically acceptable are made before the commencement of data collection. When it comes to qualitative research, however, it is impossible to take all the steps needed before data collection begins. It is necessary that research ethical values are also taken into account in decision making that takes place during the data collection phase. I think that this point may be established in relation to all of the above mentioned ethical values. Here though, I confine myself to establishing this contention with regard to the concern not to harm research participants. More precisely, I focus on the concern to ensure that research participants are not harmed in direct consequence of the researcher's datagathering activities (rather than, say, as the result of the publication of her research findings).

In social research, harm may take a variety of forms. Research participants may, say, be harmed psychologically, socially, physically, or materially as a result of taking part in a study (see Hammersley and Traianou 2012, 62). To prevent this, the researcher should, before she starts gathering her data, consider whether her choice of research question and qualitative method(s) is likely to result in the harming of research participants. If this is not the case, she should proceed. As already indicated, this will not do. Before the researcher begins to collect her data, she has at most a rough idea of what data to collect. Consequently, it is not until she determines exactly what data to collect while in the field that she is in a position to make an attempt to foresee whether her collection of data is likely to harm the research participants. She has to

^{6.} The "in general" is meant to signal that there may be cases in which the acquisition of scientific knowledge is deemed so important that research ethical values may, to some extent, be justifiably overridden. Here I will not go into a discussion of this issue.

make these sorts of estimations when she considers, say, whether to seek out a certain situation, whether to ask some research participant for an interview, whether to ask a research participant to elaborate on a point, and so on. Depending on her determinations, she should either proceed or refrain from gathering the data in question.

Furthermore, while in the field generating her data, the researcher may come to realize that a significant number of the research participants are being harmed as a result of her data collection. The researcher must thus modify her research question if that is the only means of preventing harm from accruing. Finally, insofar as the researcher decides to modify her research question (in ways other than by rendering it more precise), she should contemplate whether the study of her new research question is similarly likely to result in the harming of research participants. It is only if she concludes that this is not the case that she should embark upon the research. These observations show that the research ethical concern not to harm research participants should influence decisions, made during the data collection phase, about how, if at all, to change the research question and about what data to generate.

Another kind of nonepistemic value is the concern to follow relevant local norms, that is, relevant norms in the community under study. These may regard, say, how to dress on various occasions, what to offer guests who visit one's home, and how to address people with a social status other than one's own. While the question of the extent to which the researcher should adhere to local norms arises in connection with all social research that involves research participants, it is particularly pressing when qualitative methods are employed. In qualitative research, the researcher enters the research participants' social worlds when generating her data: participant observation requires the researcher to participate in the research participants' ways of life, and interviews often take place in the settings in which they go about their everyday lives. Additionally, the researcher does not only interact with the research participants in her capacity as researcher; she may also assume the role of friend, guest, work companion, and the like. Both these features of qualitative research bring into play research participants' local norms.

It is implicit, if not explicit, in most discussions of qualitative research that the researcher should to some extent abide by the norms of those she studies. The basic idea may be roughly spelled out as follows: the researcher should not follow those local norms that are unacceptable to her on moral or professional grounds or that require her to engage in illegal activities. With respect to the remaining local norms, she should adhere to those that apply to her, and, on a particular occasion, this depends on factors like the activities taking place, the setting in which the activities occur, the researcher's relationships with the research participants, and her social role(s) in the situation. I will refer to these remaining norms that apply to the researcher as the *relevant* local norms. By way of illustration, consider a researcher who has been invited, for the first time, to the house of a research participant who has agreed to be interviewed by her. In this situation, the local norms concerning how to behave as a guest may reasonably be said to apply to the researcher. Accordingly, she should not, say, walk into the bedroom of her host uninvited or check out what is in her host's fridge or cupboards, just as she should not overstay her welcome. It would be inappropriate, disrespectful, or tactless on the part of the researcher if she knowingly violated these local norms considering that the research participant is kindly letting her into her house, is very friendly toward her, is taking time out to be interviewed, and is willing to provide her with information for her research project.⁷

It is clear from these reflections that before the researcher starts gathering her data, she should try to foresee whether her choice of research question and qualitative research method(s) are compatible with following the relevant local norms during data collection. Unless this is the case, she should not proceed. Yet this measure does not suffice: the concern to follow the relevant local norms should also affect decision making once the researcher has begun to generate her data. To see this, consider again that, before data collection begins, the researcher has at most a rough idea of what data she will actually collect. For this reason, it is not until she ascertains, in the field, what data she will effectively gather that she is able to determine whether this coheres with adherence to the relevant local norms.

In some cases, the researcher may come to realize that following the relevant local norms means that she will not be able to gather the data needed in order to answer her research question; hence, she will have to change her research question. Also, whenever she chooses to change her research question (in ways other than by rendering it more precise), she needs to consider whether the investigation required by the new research question is consis-

7. On some occasions, it may even be wrong on ethical grounds not to follow relevant local norms. For instance, assume that a research participant's reputation will be seriously damaged if the researcher intentionally arrives at a formal event in an outfit that is locally regarded as completely inappropriate for the occasion. In this case, the researcher's action will be wrong, given that the research participant will be socially harmed by it. Still, unless an implausibly broad specification of harm is adopted, the researcher will typically not harm or otherwise act unacceptably from a research ethical or, more broadly, moral perspective when she fails to follow the relevant local norms. Mostly, it will merely be inappropriate of her not to follow relevant local norms. It should also be noted that proponents of the value-free ideal are likely to classify the concern to follow relevant local norms as a nonepistemic value that, similarly to research ethical values, deals with how the researcher should act toward research participants. For the sake of argument, I go along with this view. In sec. 5, I discuss the claim that following relevant local norms should instead be regarded as an epistemic value. The main points made in what follows about abiding by relevant local norms are compatible with the view that this sometimes functions as an epistemic value.

tent with abidance to the relevant local norms. In these manners, the concern to follow the relevant local norms should influence decisions made during the collection of qualitative data about how, if at all, to change the research question and about what data to generate.

The discussion so far has brought out that research ethical values, and the concern to follow relevant local norms, have required roles to play during qualitative data collection. Within the constraints set by these two values, other nonepistemic values, as I will refer to them, have a number of permissible roles to play too.

In discussions of the role of values in science, it is widely agreed that the selection of the research question may be influenced by both epistemic and nonepistemic values. This is compatible with formulations of the value-free ideal because it is presumed that the choice of research question occurs in the external phases before data collection without any modifications of the question taking place as part of the data collection phase. Evidently, this depiction of the research process is not accurate when it comes to qualitative research, where the initial research question is frequently modified during the data-gathering phase. It is unclear on what ground a proponent of the ideal of value-free qualitative data collection might maintain that subsequent to data collection commencing, only epistemic values-and not nonepistemic values-should be permitted to affect the choice of research question. As such, it seems correct to maintain that other nonepistemic values should also be permitted to affect the choice of research question during the data collection phase. Note that this choice must be consistent with a regard for research ethical values and with the concern to follow relevant local norms. Moreover, the researcher should ensure that there is ample time and opportunity to generate the data needed to answer the new research question. Still, this leaves plenty of room for other nonepistemic values to influence decisions of this sort.

There are various grounds on which a researcher may choose to abandon her initial research question in the data-gathering phase. Whatever prompts the decision, it may be made before a new research question has been settled on. When the researcher is in between research questions, it makes no sense to require that she aim for relevant data conducive to a balanced data set, because data are only relevant, and a data set only balanced, relative to a research question. Likewise, it is unclear on what ground it may be maintained that other epistemic values alone should affect decisions about what data to collect. Thus, within the constraints set by research ethical values and the concern to follow relevant local norms, other nonepistemic values may also affect the researcher's decisions about what data to collect in this kind of circumstance.

When collecting her data, the researcher may find herself in the situation of having to choose between data that are both equally relevant, or potentially equally relevant, and equally conducive to a balanced data set. Even when taking further epistemic values into account, such as the data set being sufficiently large relative to the research question, it is reasonable to expect that circumstances will arise in which the epistemic values underdetermine particular choices as to what data, among all the available data, to opt for. This is particularly likely to be the case at the beginning of the data collection phase or when the research question is still rather vague. Here, there will be numerous options for data collection, none being preferable from the perspective of their epistemic merits. Additionally, it may well be that the available data are compatible with a concern for research ethical values and the concern to follow relevant local norms. In this sort of situation, nonepistemic values may serve as tiebreakers in determining what data the researcher will ultimately collect.

Occasionally, it may be that the researcher is swayed by other nonepistemic values, such that she decides to generate data that are not relevant or conducive to a balanced data set. For instance, while in the field, the researcher may become so curious about, or outraged by, some phenomenon that she seeks out situations that do not likely offer any opportunity to collect relevant data conducive to a balanced data set. Allowing nonepistemic values to override epistemic values in this manner is permissible if they do so only temporarily, that is, if it constitutes a detour that still leaves the researcher with adequate time to collect the data she needs in order to answer her research question. Alternatively, the researcher may subsequently adjust her research question so that her data become relevant and conducive to a balanced data set.

The preceding analysis may be summarized as follows. During qualitative data collection, research ethical values and the concern to follow relevant local norms should influence decisions about how, if at all, to change the research question, as well as about what data to collect. Moreover, within the constraints set by these nonepistemic values, other nonepistemic values may influence decisions about how, if at all, to change a research question, just as they may affect decisions about what data to collect when (a) the researcher is in between research question may nonetheless be satisfactorily answered or when the research question is subsequently adjusted to align with the collected data. In view of these findings, the ideal of value-free qualitative data collection should not be affected by nonepistemic values. Hence, the ideal should be rejected.

In response to this conclusion, it may be objected that there are alternative specifications of the ideal of value-free science that do not regard decision making about how, if at all, to change the research question and what data to collect as part of the internal phases of research. One way in which to spell out such an alternative version is by holding that the ideal of value-free science rests on an idealized account of how research proceeds according to which both these decisions are solely made during the external phases that precede the (internal) data collection phase. When this ideal states that nonepistemic values should not influence the internal phases of research, it only refers to those decisions that qualify as internal by the lights of the idealized account. An ideal along these lines is not refuted by the partial value analysis: it is compatible with the recognition that, during qualitative data collection, nonepistemic values have required and permissible roles to play in relation to decisions about how, if at all, to change the research question and what data to collect. And the reason is that, following the idealized account of the research process, these decisions are external phase choices.

Obviously, these alternative specifications of the ideal of value-free science do not offer any guidance as to the role of values in choices about how, if at all, to change the research question and what data to collect. Yet both decisions are an integral aspect of qualitative data collection. Moreover, guidance is needed concerning the role that values should play in connection with these choices: it is not the case that anything goes in terms of values. As brought out by the partial value analysis, nonepistemic values have both required and permissible roles to play during qualitative data collection, and a failure to recognize this may have significant epistemic consequences. To mention just one example to this effect, picture a researcher whose political values affect what data she gathers such that she fails to end up with relevant data or a balanced data set. In this situation, the researcher's political values go beyond the permissible roles that nonepistemic values may play, and she will not be able to use her data as the basis for an unbiased answer to her research question. These reflections show that it is important that an ideal for values in qualitative data collection covers decision making about how, if at all, to change the research question and what data to collect. This being the case, the alternative specifications of the ideal of value-free science should be rejected: they are unfit to serve as standards for qualitative data collection.

5. Alternative Ideals for Values in Science. Within the current debate on the role of values in science, the ideal of value-free science has been heavily criticized and a number of alternative ideals for values in science have been set forth. In this section, I examine two such ideals offered by Douglas and Steel respectively and assess whether any of these alternatives is a suitable replacement for the ideal of value-free qualitative data collection. Douglas and Steel both spell out their ideal in relation to research that involves the testing of hypotheses. They do not address the question of whether their ideals, differently specified, are also suitable for qualitative research that is typically concerned with open rather than with closed questions about whether to reject

or accept a hypothesis. By appeal to the partial value analysis, in what follows, I show that their alternative ideals fail to speak to, or do not correctly capture, the role of values in decision making in qualitative data collection regarding how, if at all, to change the research question and what data to collect. This being the case, I maintain, neither of the ideals is fit to serve as a standard for qualitative data collection. Demonstrating this is my sole focus; whatever other objections may be raised to the ideals are beyond the scope of my present concerns.

Douglas's ideal maintains that throughout the research process, values should only play an indirect role in decision making "about which empirical claims to make" (2009, 103). Conversely to the ideal of value-free science, Douglas's proposal does not rest on a distinction between nonepistemic and epistemic values. Instead, her ideal trades on the idea of values being able to play direct and indirect roles. Values play direct roles when "they determine . . . decisions in and of themselves" as exemplified by the researcher who makes a claim because it fits well with her values (96). Values play an indirect role when they are used to assess whether the reasons in support of a decision are sufficient (103). The indirect role is illustrated by the researcher who thinks that the reasons, or evidence, in support of a claim are insufficient on the ground that, should the claim be wrong, this would have terrible social consequences. Finally, note that Douglas's ideal focuses on decisions about which empirical claims to make. These sorts of choices are made, say, when the researcher decides how to describe the evidence or whether to accept or reject a hypothesis.

Consider, then, the question of whether Douglas's ideal is suitable for qualitative data collection. It is quite clear that the ideal does not apply to choices about how, if at all, to change the research question since these are not instances of decisions about which empirical claims to make. With respect to decisions as to what data to collect, one option is to maintain that the ideal does not apply to them either since they are likewise not instances of decisions about which empirical claims to make. The second option is to contend that when the researcher decides what data to collect, she is in fact choosing which empirical claims to make in the sense that she is narrowing down the scope of doings, sayings, and so on, that she will eventually make claims about in her field notes and interview transcripts. On this interpretation, Douglas's ideal would imply that values should only play an indirect role in relation to decisions about what data to gather. As shown by the partial value analysis, however, when it comes to choices about what data to generate, nonepistemic values have a number of required and permissible roles to play that all qualify as direct by Douglas's definition. For instance, the researcher's decisions about what data to collect should be directly affected by research ethical values, as well as by the concern to follow relevant local norms. It follows from these reflections that Douglas's ideal must be found wanting: either

it fails to speak to decisions making about how, if at all, to change the research question and what data to collect, or it applies to the latter decision only, while offering wrong advice on the role of values.

Steel's proposal for the role of values in science states that "non-epistemic values should not conflict with epistemic values in the design or interpretation of scientific research that is practically feasible and ethically permissible" (2015, 178). Steel's ideal rests on a refined distinction between epistemic and nonepistemic values. He defines epistemic values as those values that promote the attainment of truth, while specifying nonepistemic values as those that fail to do so (161ff.). Further, he suggests, among other things, that epistemic values are truth-promoting in nearly all contexts, contingent epistemic values are values that have this attribute in certain contexts only (164). The scope of Steel's ideal is the design and interpretation of research. For the present purposes, it suffices to clarify that the design of research refers to the choices made about the "methods and procedures that generate data" (179).

Similarly to Douglas's ideal, Steel's standard does not speak to decisions about how, if at all, to change the research question. Choices of this sort are not part of what he means by the design (or interpretation) of research. But decisions about what data to collect may reasonably be regarded as choices pertaining to the design of research: they are design decisions that are largely made as part of the data collection phase in qualitative research. Thus, his ideal covers these decisions. It runs, however, into two obstacles.

Steel's standard makes it clear that research must be morally permissible, and hence it allows for research ethical values to conflict with, and override, epistemic and other nonepistemic values. Yet recall that the partial value analysis brought out that qualitative research must also be permissible in the sense that the researcher should act in accordance with relevant local norms. Adherence to these norms is usually not conceived of as a moral requirement in research: when the researcher fails to follow a relevant local norm by, say, presenting herself in an outfit that she knows is out of step with the local dress code, it would typically seem odd to characterize this misstep as a moral wrong. Rather, it is merely inappropriate on her part. Steel's ideal fails to acknowledge that this value (i.e., the concern to follow relevant local norms) should also be permitted to conflict with, and overrule, epistemic and other nonepistemic values.

In response, it might be claimed that, in the analysis so far, the observance of relevant local norms has been regarded as a nonepistemic value. Yet by Steel's definition at least, it becomes apparent that the value qualifies as an epistemic value. Following relevant local norms may be said to promote the attainment of truth by placing the researcher in a better position to acquire relevant data conducive to a balanced data set. Accordingly, the ideal would imply that this value, qua epistemic, should override nonepistemic values within ethically permissible research. Researchers should, for epistemic reasons, follow relevant local norms. This reply has a point: abidance by relevant local norms may promote the attainment of truth. However, the value does not qualify as an epistemic value in all contexts. It is only a contingent epistemic value. There are (many) occasions in which the researcher following relevant local norms means that she should abstain from collecting data that would contribute to the attainment of truth. To see this, consider a researcher who has been invited to the house of a research participant. The researcher abides by the relevant norms about how to behave as a guest, and so she desists from walking uninvited into the host's bedroom and from checking out the contents of the host's fridge and cupboards. As a consequence she fails to collect important data. Furthermore, since this is her last visit, the researcher's observance of the norms is not somehow putting her in a position to acquire these-or other relevant-data on some later occasion. In this scenario, there is no epistemic gain associated with following the norms for guest behavior. Even so the researcher seems right to act as she does: not to adhere to the norms would be inappropriate considering the research participant's hospitality, friendliness, and extensive help with the research project. Steel's ideal does not imply that relevant local norms should also be followed when this value disqualifies as an epistemic value, and for this reason, the objection still stands: the ideal fails to ensure that research must also be permissible from the perspective of the concern to act in accordance with relevant local norms. For the sake of simplicity, I will continue to talk about the concern to follow relevant local norms as a nonepistemic value; the recognition that it sometimes functions as an epistemic value is compatible with the claims, made throughout this article, about its role, qua nonepistemic value, in qualitative data collection.

The second problem with Steel's standard has to do with the fact that during qualitative data collection, the researcher may, under the influence of nonepistemic values (other than research ethical values and the concern to follow relevant local norms), decide to collect data that are not relevant or conducive to a balanced data set. According to the partial value analysis, it is acceptable that other nonepistemic values override epistemic values such as relevance and balance if the conflict is temporary: as noted above, this may constitute a detour that still leaves the researcher with enough time to collect the data she needs in order to answer her research question. Alternatively, the researcher may subsequently adjust her research question so that her data become relevant and conducive to a balanced data set. Steel's ideal fails to accommodate this sort of situation since it states that, in the design of research, nonepistemic values should never conflict with epistemic values. Given these shortcomings, Steel's standard should be discarded as an ideal for qualitative data collection: it fails to cover the decision about how, if at all, to change the research question, and it does not correctly capture the role of values in relation to decisions about what data to collect.

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The upshot of these considerations is that a suitable ideal for values in qualitative data collection is in need of being developed.⁸ The partial value analysis may be regarded as a first step in this direction. The analysis concerns the role of values in decision making about how, if at all, to change the research question and about what data to collect. As a preliminary to the formulation of a new ideal, the role of values in relation to the other decisions made during qualitative data collection should be carefully examined too. Moreover, while the partial value analysis relies on the traditional distinction between epistemic and nonepistemic values, its basic points may well be restated, and possibly developed, drawing instead on Steel's refined version of this distinction or on some other categorization of values in science. It also needs to be determined whether one of these alternative classifications of values is preferable. Once these sorts of steps have been taken, a new ideal for values in qualitative data collection may be advanced.

6. Values and Quantitative Methods. Qualitative methods are often contrasted with quantitative methods. In this section, I briefly discuss whether the partial analysis of the roles of values in qualitative data collection carries over to two quantitative methods employed within social research: questionnaires and data phone apps, that is, phone applications that are data-gathering devices.

The partial analysis of the role of values in qualitative data collection concentrates on decisions about how, if at all, to change the research question and about what data to gather. It is because qualitative data collection involves these two decisions that there is room for nonepistemic (and epistemic) values to affect these choices. Conversely, insofar as these choices are not made as part of the data-gathering process, the same potential role for values does not exist. The issue now to be determined is whether these two decisions are part of data gathering by way of questionnaires and data phone apps.

The questionnaire requires the researcher to work out a list of questions in a suitable format. Data collection begins once the researcher issues the questionnaires to participants, who then return these to the researcher once completed. Data collection ends when the researcher decides no longer to accept completed questionnaires. In using data phone apps, the researcher first sees to it that the app can register, say, the phone user's location, when she talks on the phone, sends text messages, and is active on Facebook. The commencement of data collection is marked by the app having been installed and activated in participants' phones and is terminated once the app is deactivated.

8. Alternative ideals have also been proposed by Longino (1990), Solomon (2001), Kourany (2010), Elliott (2013), and Hicks (2014). Although I cannot take this up here, I think that these ideals likewise run into problems as ideals for qualitative data collection.

Decisions about how, if at all, to change the research question are thus not part of the data-gathering phase when questionnaires and data phone apps are employed. The researcher may well decide to modify her research question while data are being gathered. However, doing so has no consequences for the ongoing data collection (unless it leads to its termination), and as such, any change to the research question is not really part of the collection of data. Similarly, the researcher does not decide, during the collection of data, what data to gather when using either of these methods; this is determined before the collection of data when the questionnaire is formulated and when it is decided what information the data phone app will register. Hence, it appears that the partial analysis of values in qualitative data collection does not carry over to these two forms of quantitative data collection.

However, this conclusion only follows insofar as the gathering of data is identified with what I, for lack of a better term, will refer to as final-data collection, that is, data that may later serve as the basis for establishing the findings of the study. When qualitative methods are employed, all data gathered may later be drawn upon to answer the research question. This is typically not the case with respect to data generated by way of questionnaires and data phone apps, where final-data gathering is typically distinguished from, and sometimes preceded by, what I will call test-data collection. The latter is exemplified by the researcher sending her questionnaire to a few respondents. Upon return, she checks whether the respondents were willing to answer all the questions, whether they tended to skip certain questions, and the like. The researcher may then decide to change the questionnaire, send out a new test version, and so on. Likewise, the researcher may modify her research question as part of this process. The same method of proceeding may be adopted in relation to data phone apps. To the extent that these decisions about how, if at all, to change a research question and about what data to collect are part of test-data collection, the partial analysis of values in qualitative data collection carries over to quantitative test-data collection: in these situations, nonepistemic values have required and permissible roles to play.

In sum, when quantitative methods like questionnaires or data phone apps are employed within social research, the partial analysis of the role of values in qualitative data collection does not carry over to final-data collection, but it does apply to test-data gathering to varying extents.

7. Conclusion. In this article, I have been concerned with the role of values in data collection in social research. First, I introduced data collection by means of qualitative methods, and I presented the ideal of value-free science as applied to qualitative data collection. Next, I offered a partial analysis of the role of values in qualitative data collection, showing that some nonepistemic values have required roles to play, whereas other nonepistemic values have permissible roles to play during this phase of research. By reference to this anal-

ysis, I discarded the ideal of value-free qualitative data collection. Further, I demonstrated that this conclusion extends to other specifications of the ideal than the one I rely on. I continued by examining two alternative ideals for values in science to determine whether one of them might instead be fitting as ideal for qualitative data collection. Drawing on the partial value analysis, I established that neither of them is suited to this task. Hence, I concluded that an ideal for values in qualitative data collection is in need of being developed, while pointing to the partial value analysis as a first step in this direction. By way of ending, I briefly showed that, on some occasions, the partial value analysis carries over to social research by means of quantitative methods. Further work is needed on the role of values in data collection in social research.

REFERENCES

- Agar, Michael H. 1980. *The Professional Stranger: An Informal Introduction to Ethnography*. Orlando, FL: Academic Press.
- Anderson, Elizabeth. 1995. "Knowledge, Human Interests, and Objectivity in Feminist Epistemology." *Philosophical Topics* 23 (2): 27–58.
 - ——. 2004. "Uses of Value Judgments in Science: A General Argument, with Lessons from a Case Study of Feminist Research on Divorce." *Hypatia* 19 (1): 1–24.
- Bailey, Carol A. 1996. A Guide to Field Research. Thousand Oaks, CA: Pine Forge.
- Biddle, Justin. 2013. "State of the Field: Transient Underdetermination and Values in Science." Studies in History and Philosophy of Science 44:124–33.
- Brown, Matthew J. 2012. "The Source and Status of Values for Socially Responsible Science." *Philosophical Studies* 163:67–76.
- Bryman, Alan. 2012. Social Research Methods. 4th ed. Oxford: Oxford University Press.
- Carrier, Martin, Don Howard, and Janet Kourany, eds. 2008. The Challenge of the Social and the Pressure of Practice: Science and Values Revisited. Pittsburgh: University of Pittsburgh Press. Davies, Charlotte A. 1999. Reflexive Ethnography. London: Routledge.
- DeWalt, Kathleen M., and Billie R. DeWalt. 2002. Participant Observation: A Guide for Fieldworkers. Lanham, MD: Altamira.
- Diekmann, Sven, and Martin Peterson. 2013. "The Role of Non-epistemic Values in Engineering Models." Science and Engineering Ethics 19:207–18.
- Douglas, Heather. 2000. "Inductive Risk and Values in Science." Philosophy of Science 67:559–79.

78:303-24.

- —. 2013. "Douglas on Values: From Indirect Roles to Multiple Goals." Studies in History and Philosophy of Science 44:375–83.
- Hammersley, Martyn. 2013. What Is Qualitative Research? London: Bloomsbury.
- Hammersley, Martyn, and Paul Atkinson. 2003. Ethnography. London: Routledge.
- Hammersley, Martyn, and Anna Traianou. 2012. Ethics in Qualitative Research. London: Sage.
- Hicks, Daniel J. 2014. "A New Direction for Science and Values." Synthese 191:3271-95.
- Intemann, Kristen. 2005. "Feminism, Underdetermination, and Values in Science." Philosophy of Science 72:1001–12.
- Jorgensen, Danny L. 1989. Participant Observation. Newbury Park, CA: Sage.
- Kincaid, Harold, John Dupré, and Alison Wylie, eds. 2007. Value-Free Science? Ideals and Illusions. Oxford: Oxford University Press.
- Kourany, Janet A. 2010. Philosophy of Science after Feminism. Oxford: Oxford University Press.
- Longino, Helen E. 1990. Science as Social Knowledge: Values and Objectivity in Scientific Inquiry. Princeton, NJ: Princeton University Press.

— 1996. "Cognitive and Non-cognitive Values in Science: Rethinking the Dichotomy." In Feminism, Science, and the Philosophy of Science, ed. Lynn Hankinson Nelson and Jack Nelson, 39–58. Dordrecht: Kluwer.

- Machamer, Peter, and Heather Douglas. 1999. "Cognitive and Social Values." Science and Education 8:45–54.
- Machamer, Peter, and Gereon Wolters, eds. 2004. Science, Values, and Objectivity. Pittsburgh: University of Pittsburgh Press.

Malinowski, Bronislaw. 1922. Argonauts of the Western Pacific. London: Routledge.

Rolin, Kristina. 2012. "A Feminist Approach to Values in Science." Perspectives on Science 20 (3): 320–30.

——. 2015. "Values in Science: The Case of Scientific Collaboration." *Philosophy of Science* 82:157–77.

Rooney, Phyllis. 1992. "On Values in Science: Is the Epistemic/Non-epistemic Distinction Useful?" In *Proceedings of the 1992 Biennial Meeting of the Philosophy of Science Association*, vol. 2, ed. David Hull, Mickey Forbes, and Kathleen Okruhlik, 13–22. East Lancing, MI: Philosophy of Science Association.

Root, Michael. 1993. Philosophy of Social Science: The Methods, Ideals, and Politics of Social Inquiry. Oxford: Blackwell.

Solomon, Miriam. 2001. Social Empiricism. Cambridge, MA: MIT Press.

Spradley, James P. 1980. Participant Observation. Fort Worth, TX: Harcourt Brace Jovanovich.

Steel, Daniel. 2010. "Epistemic Values and the Argument from Inductive Risk." *Philosophy of Science* 77:14–34.

—. 2015. *Philosophy and the Precautionary Principle: Science, Evidence, and Environmental Policy*. Cambridge: Cambridge University Press.