# 1 A unified framework

Those sciences, created almost in our own days, the object of which is man himself, the direct goal of which is the happiness of man, will enjoy a progress no less sure than that of the physical sciences, and this idea so sweet, that our descendants will surpass us in wisdom as in enlightenment, is no longer an illusion. In meditating on the nature of the moral sciences, one cannot help seeing that, as they are based like physical sciences on the observation of fact, they must follow the same method, acquire a language equally exact and precise, attaining the same degree of certainty.

Nicolas de Condorcet[1]

There is . . . progress in the social sciences, but it is much slower [than in the natural sciences], and not at all animated by the same information flow and optimistic spirit. Cooperation is sluggish at best; even genuine discoveries are often obscured by bitter ideological disputes. For the most part, anthropologists, economists, sociologists, and political scientists fail to understand and encourage one another . . . Split into independent cadres, they stress precision in words within their specialty but seldom speak the same technical language from one specialty to the next. A great many even enjoy the resulting overall atmosphere of chaos, mistaking it for creative ferment.

Edward O. Wilson[2]

The subject of this book is the set of disciplines known as the *social sciences* (which in earlier times would have been referred to as the moral or human sciences). By this is meant a scientific study of human action focusing on elements of thought and behavior that are in some degree social (nonbiological). "The object of the social sciences," writes Hans Morgenthau, "is man, not as a product of nature but as both the creature and the creator of history in and through which his individuality and freedom of choice manifest themselves."[3] Wherever nurture matters more than nature, or where some significant decisional element is involved, we are on the turf of social science. (This does not mean that genetic dispositions are eliminated from consideration;

[1] Condorcet (writing in 1782), quoted in Scott (1998: 91). [2] Wilson (1998: 198).
[3] Morgenthau (1955: 441). See also Almond and Genco ([1977] 1990).

indeed, they comprise an active research agenda in the social sciences today.[4] However, one presumes that any outcome of interest to the social sciences is not entirely biologically determined; there must be a significant component of choice.[5])

At the same time, and in marked contrast to the humanities, most researchers in the social sciences take their moniker seriously. They aspire to science – which is to say, they intend to study human action in a systematic, rigorous, evidence-based, falsifiable, replicable, generalizable, nonsubjective, transparent, skeptical, rational, frequently causal, and cumulative fashion.[6] A fundamental premise of this book is that the social world can be studied in a scientific manner (understood through the foregoing list of attributes). This does not mean that the instruments of science provide the only method of insight into human behavior. The claim, rather, is that science offers *a* valid approach to explanation and understanding and that this approach is properly located within the academic disciplines known as the social sciences (Chapter 14).

Social science thus takes its cues from its component terms, *social* and *science*. While these terms often seem to be in tension with one another I want to propose that this tension can also be a productive one, generating insights into our subject that might not be apparent to a lay observer.

So defined, social science encompasses the disciplines of anthropology, archaeology, business, communications, demography, economics, education, environmental design, geography, law, political science, psychology, public administration, public health, public policy, social work, sociology, and urban

[4] Alford and Hibbing (2008); Carey (2002); Fowler and Schreiber (2008); Freese and Shostak (2009); Institute of Medicine (2006).

[5] This matters quite a lot to the conduct of scientific inquiry, justifying the focus of this book on social science, not science in general. In claiming a distinction between social science and natural science I am not, of course, asserting a clear dichotomy; indeed, many disciplines straddle the divide and there are many features of science that are shared by all scientific enterprises, whether focused on natural or social phenomena. However, the distinction is important because the nature of the phenomena are so different that they often require rather different approaches. A sign of this can be found in the definition of the key term "experiment." While in natural science the term is used loosely to refer to any manipulated treatment, in social science it has come to have a much more specific definition: a treatment that is randomized (and probably manipulated) across treatment and control groups. This is because control groups are generally necessary in order to overcome potential confounders in a social-science setting, while they are often unnecessary in natural-science settings (e.g., when two fluids are combined in a beaker and the result is immediately observable). See Cook *et al.* (2010: 109).

[6] I have purposefully strung together all the adjectives that are commonly applied to "science," forming an ideal-type definition (see Chapter 5). For a compendium of definitions from prominent writers see: www.gly.uga.edu/railsback/1122sciencedefns.html. For work addressing the meaning of science in a more nuanced and extended fashion see Laudan (1983) and Schaffer (1997). Evidently, there is disagreement over how to define science, and over the utility of the scientific ideal – however defined. For critical views, see Barnes and Bloor (1982); Feyerabend (1975); Harding (1986, 1987); Latour and Woolgar (1979); Woolgar (1988).

planning, along with various offshoots of these disciplines. Of course, the social science label does not encompass all practitioners of all the aforementioned disciplines, for some practitioners are engaged in studying aspects of human behavior that are largely biological (e.g., cognitive psychology), and others do not accept the goal of science, or have a different view of it than is presented here. (For example, they might question the possibility, or the pay-off, of generalizing about human behavior.[7])

I shall have something to say about objections to social science later on (see Chapter 14). For the moment, it should be stressed that my understanding of social science will not please everyone, and those unhappy with the point of departure are unlikely to be happy with the point of arrival. Some may regard my perspective on the social-scientific enterprise as unduly positivistic. Others may regard it as not positivistic enough. (Much depends on one's definition of that vexed term, positivism, discussed briefly in the Glossary.)

## The problem of pluralism

Any book purporting to address the broad rubric of social science must come to terms with the many divisions that haunt these fields, and the repercussions of those divisions. As early as 1938, John Dewey complained: "One of the chief practical obstacles to the development of social inquiry is the existing division of social phenomena into a number of compartmentalized and supposedly independent non-interacting fields."[8] Arguably, social science is not a single endeavor, but rather many different endeavors, each with its own peculiarities, as averred by E. O. Wilson in the epigraph to this chapter.

The social sciences are divided, first of all, among the separate disciplines: anthropology, archeology, etc. Although scholars occasionally cross these borders, such crossings are arduous and often problematic. It is no surprise, then, that for the most part, anthropologists associate with other anthropologists, and economists with other economists. Whether sustained by methodological differences, organizational incentives, or simple inertia, academics tend to stick to their own tribe.

[7] This is true, for example, for those who embrace a poststructuralist or postmodernist perspective (Norris 1997; Rosenau 1992). A more difficult question of classification concerns cultural anthropology, history, and other fields or subfields with an interpretivist bent. They are clearly social and empirical, but they are also leery of science – especially the scientific quest to generalize about patterns of human behavior. In this respect, they may fall somewhat outside the framework described in this book. Examples of self-consciously scientific methodology applied to cultural anthropology can be found in Brim and Spain (1974) and Radcliffe-Brown ([1948] 1957, 1958), but are less frequent in contemporary work.

[8] Dewey (1938: 509). Contemporary work on this issue includes Easton and Schelling (1991).

The social sciences are divided, second, among *sub*disciplinary fields. The American Political Science Association currently recognizes forty-odd sections (e.g., federalism and intergovernmental relations, law and courts, legislative studies, etc.), the American Economics Association several hundred. Similar divisions may be found elsewhere. These cubbyholes define courses, jobs, conferences, journals, and scholarly activity generally. They comprise the *de facto* boundaries of most academic lives.[9]

The social sciences are divided, third, among specific substantive problems. Some study the welfare state, others study ethnic conflict, and others study market behavior. A problem-centered approach to social science presumes that, because there are many problems, each with its own specific methodological obstacles and opportunities, there are many ways of going about business.[10]

The social sciences are divided, fourth, among theoretical frameworks, each with its own implicit or explicit methodology. Behavioralism, conflict theory, ethnomethodology, exchange theory, institutionalism, interpretivism, ordinary language, rational choice, structural-functionalism, symbolic interactionism, systems theory (cybernetics), and the research schools associated with Freud, Marx, and Weber each offer their own research paradigm.[11]

The social sciences are divided, finally, and perhaps most importantly, by their methods. The methodological tool one employs, for example, experiments, time-series analysis, factor analysis, formal models, survey research, archival research, ethnography, qualitative comparative analysis, and so forth, helps to define one as a scholar and probably also affects how one views the social world.[12]

Beyond these fine divisions lies one over-arching cleavage between "quants" and "quals," that is, between those who are comfortable with statistical analysis and mathematical models and those who prefer the time-honored expedients of informal logic and natural language. This division, in evidence for well over a century, continues to provoke and offend. As the reader is no doubt aware, quantoids and qualtoids have developed different languages and different approaches to their topics. They are accustomed to arguing with each other or ignoring each other.[13]

[9] Almond (1990b). [10] Shapiro (2005); Smith (2003).
[11] Collins (1985); Parsons (2007); Sil and Doherty (2000); Tang (2010).
[12] Moses and Knutsen (2007).
[13] An impression exists among some quantitativists that their colleagues writing prose (particularly those writing good prose) are compensating for a lack of rigor. "If you can't measure it," goes the unstated premise, "that ain't it." A corresponding impression exists among some qualitativists that to measure something – to "reduce it to a variable" – is to impoverish our understanding of a phenomenon. "If you can measure it," goes their credo, "that ain't it." Kaplan (1964: 206) attributes this dictum to members of

Divisions within the contemporary social sciences are therefore deep and complex, involving disciplinary, subdisciplinary, problem-based, theory-based, and method-based cleavages. From the obvious fragmentation of the social sciences today it is a small step to a pluralistic social science methodology. This accepts what is, by all appearances, an irrevocable fact on the ground. Richard Miller argues:

> there is no framework of empirical principles determining what counts as an explanation in all social sciences. Rather, there are particular frameworks for particular fields. Each specific framework is, in turn, highly complex, with components serving many functions. Whether a true hypothesis explains, or whether a hypothesis should be accepted as explaining, in light of given data, is determined by facts specific, say, to the study of power structures or investment decisions.[14]

Methodological pluralism has an appealing air to it, suggesting tolerance for approaches employed by other scholars and pragmatism in selecting one's own approach to a topic. Be a good craftsman, C. Wright Mills advises us in a famous passage:

> Avoid any rigid set of procedures. Above all seek to develop and to use the sociological imagination. Avoid the fetishism of method and technique. Urge the rehabilitation of the unpretentious intellectual craftsman and try to become such a craftsman yourself. Let every man be his own methodologist; let every man be his own theorist: let theory and method again become part of the practice of the craft.[15]

There are evidently many ways to do good social science. Methods may be statistical or nonstatistical, large-*N* or small-*N*, historical or nonhistorical, and so forth. Theories may be useful for one project, and useless for another. Much depends on the nature of the evidence available and the nature of the question

the University of Michigan faculty (satirizing the anti-quantoids). The same opposing sentiments can also be found in statements uttered long ago by Lord Kelvin ("When you cannot measure it, when you cannot express it in numbers, your knowledge is of a meagre and unsatisfactory kind") and Jacob Viner ("When you can measure it, when you can express it in numbers, your knowledge is still of a meagre and unsatisfactory kind"). Quoted in Berelson and Steiner (1964: 14). See also the words of Robert Fogel (on the quant side) and Carl Bridenbaugh and Arthur Schlesinger, Jr. (on the qual side), recorded in Landes and Tilly (1971: 12). Anti-quantificationist manifestos may be found in Winch (1958) and Wolin (1969). For other examples, including statements by Daniel Boorstin, Carl Bridenbaugh, Barrington Moore, Arthur Schlesinger, and E. P. Thompson, see Fischer (1970: 94–96). For historical background on the qual–quant distinction see Snow ([1959] 1993). Current statements on the subject include Brady and Collier (2004); Gerring and Thomas (2011); Glassner and Moreno (1989); Hammersley (1992); Mahoney and Goertz (2006); McLaughlin (1991); Shweder (1996); Snow ([1959] 1993). For further discussion see Chapter 13.

[14] Miller ([1983] 1991). See also Cartwright (2007); Hall (2003); Hitchcock (2007); Little (1991); Miller (1987); Reiss (2009); Roth (1987).

[15] Mills (1959: 224), quoted in Eldridge (1983: 37).

under investigation. It would be folly, therefore, to propose a uniform method or theoretical framework for all of social science, or even for a single discipline. In any case, specialization is necessary in order for social science to thrive. Perhaps, then, the current fragmentation of social science is the happy outcome of different scholars doing what they, individually, do best. Perhaps we ought to regard diversity as a mark of disciplinary maturity rather than as a mark of confusion and disarray.

In addressing this question, I shall invoke a distinction between *methods* and *methodology*.[16] The first refers to a specific procedure for gathering and/or analyzing data. The second refers to the tasks, strategies, and criteria governing scientific inquiry, including all facets of the research enterprise. While method refers to the particular choices made in a given study, methodology refers to the larger and more persistent features of the scientific enterprise.

Methods pluralism is easy to justify, and impossible to avoid. However, there are reasons to doubt the wisdom of methodological pluralism. Beneath the diversity of methods there is – or at least ought to be – a methodological consensus.[17]

Consider some of the practical questions that we face in the quotidian work of social science. How, for example, should we choose our methods and theoretical frameworks, and how, at the same time, might we judge the product of our choices? It is apparent that these questions are unclear to many social scientists, even to those working within the same subfield. Charles Lindblom relates the findings of a recent review of literature covering a small subfield of political science. Progress has been notable, the author reports. Yet, Lindblom discovers that

> these claims were not posited by detailing findings but rather by alleging that political scientists had "illuminated," "were concerned with," "gave special emphasis to," "developed insights, hypotheses, and analytical categories," "codified," "stressed the importance of," "examined the significance of," "placed in the context of," "treated variables theoretically," "produced good work," "were fruitful," "applied concepts and models to," "vastly improved our understanding," "dealt with," and "increased the level of rigor."[18]

The reviewer's methodological difficulties are characteristic of the social sciences at large. Within many disciplines – and, *a fortiori*, across disciplines – we seem to have no clear way of charting progress.

[16] Sartori (1970).
[17] My perspective echoes that of a recent book edited by Henry Brady and David Collier (2004), subtitled *Diverse Tools, Shared Standards*.
[18] Lindblom (1997: 257).

Although some standards apply only to particular fields or topics there must also be standards applying to social science at large. Otherwise, we cannot make decisions among available methods and theoretical frameworks. On what basis does the method-pluralist choose his or her method? It does not make sense to argue that norms of truth should be field-specific or steeped in a particular tradition. For if standards of truth are understandable only within the context of specific fields or theoretical traditions there is no way to adjudicate among contending views. Where traditions are deemed to be incommensurable, whatever scholars in a subfield decide to believe becomes, by virtue of that fact, true (as long as scholars do not violate their own norms). This sort of epistemological relativism is not what Miller, Mills, and others intend, but it does seem to be a necessary conclusion if one is to accept the assertion that methodological norms are field-specific.

While it is reasonable to cultivate a diversity of tools, it is unreasonable to cultivate a diversity of methodological standards.[19] A discovery in sociology ought to be understandable, and appraisable, by those who are not sociologists; otherwise, it cannot claim the status of truth, as that term is generally understood. "The theoretical aim of a genuine discipline, scientific or humanistic, is the attainment of truth," writes E. D. Hirsch, "and its practical aim is agreement that truth has probably been achieved. Thus, the practical goal of every genuine discipline is consensus – the winning of firmly grounded agreement that one set of conclusions is more probable than others."[20]

Nor will it suffice to conclude that methodologies must be appropriate to "context."[21] Which contexts, and how many, will be privileged? And how might one justify one's choice of tools and arguments within a given context? It is all very well to say, as hard-nosed practitioners are wont to say, that the proof is in the pudding (i.e., that we can judge social science work only by its product, not its method). But if the proof is in the pudding, by what standards shall we judge the pudding?

No escape is possible from broader interdisciplinary standards if the enterprise of social science is to prove useful to humanity. Indeed, the rationale for a professional caste of scholars, financed at public expense, breaks down if we deny transdisciplinary standards. Naturally, scholarly consensus is not always possible. But surely there are certain things – craniology (phrenology), for example – that may safely be excluded from consideration. And if craniology is rejected, we must appeal to some transdisciplinary standards in doing so. Note that if knowledge across disciplines is truly incommensurable, we are

[19] Brady and Collier (2004). [20] Hirsch (1967: viii–ix). [21] See van Fraassen (1980).

compelled to leave the question of craniology to the craniologists. In this vision, social science is defined simply by what social scientists do; the fact of being a craniologist is self-justifying.

While one can ignore methodology, one cannot choose not to have a methodology. In teaching, in research, and in analyzing the work of colleagues, scholars must separate the good from the bad, the beautiful from the ugly. In so doing, broader criteria of the good, the true, and the beautiful necessarily come into play. Social science is a normative endeavor. Like members of any community social scientists create and enforce norms, rewarding good behavior and punishing – or simply ignoring – bad behavior. The gate-keeping functions of the academy cannot be abolished by a wistful appeal to diversity. For social science has a limited supply of goods, such as jobs, funding, journals, books, and public attention, which must be allocated according to some rationale, hopefully a rationale we can all agree upon.

Finally, as a matter of good scholarship, writers in the social sciences ought to be able to converse with one another.[22] Economists interested in political economy should be cognizant – and should seek to incorporate, wherever possible – work in political science. And vice versa.

While cross-disciplinary research is one of the most fertile areas of research in the social sciences today, it is not as common as it should be. The problem posed by academic parochialism stems from the fact that the world of human endeavor, which it is the business of social scientists to study, is remarkably interconnected. "The domain of truth," notes Abraham Kaplan, "has no fixed boundaries within it."[23] It is difficult, for example, to understand features of a political system without understanding something about the economic system. Yet if political scientists and economists conduct their work with different vocabularies and are guided by a narrow conception of method, they will not have the intellectual equipment to share insights. They may not read each other's work or understand it when they do, even when working on related topics.

Because the various methods and theories that populate the social sciences are not currently unified by a single methodology, cumulation of knowledge is impeded. It is obvious that knowledge cannot progress unless there is some shared ground on which such knowledge can rest.[24] Even arguments demand

[22] Hayek (1956: 462–463; quoted in Redman 1991: epigraph) once remarked, "The physicist who is only a physicist can still be a first-class physicist and a most valuable member of society. But nobody can be a great economist who is only an economist – and I am even tempted to add that the economist who is only an economist is likely to become a nuisance if not a positive danger." See also Wilson (1998).

[23] Kaplan (1964: 4).

[24] For discussion of what "progress" might mean in this context, see Laudan (1977). For discussion of the importance of shared standards see Brady and Collier (2004).

a common frame of reference; without such shared ground, they are merely statements of position. In the latter circumstance, science degenerates into a chorus of yeas and nays reminiscent of Monty Python's infamous "Argument Clinic" (excerpted in the epigraph to Chapter 3).

This book does not delve into the sociological aspects of social science. Even so, it is worth reflecting briefly on social science as a professional activity, with distinctive norms, habits, rewards, and sanctions. Donald Campbell's comments, synthesizing early work by Robert Merton, are worth quoting at length. Science, writes Campbell,

> requires a disputatious community of "truth seekers" . . . The norms of science are explicitly anti-authoritarian, anti-traditional, anti-revelational, and pro-individualistic. Truth is yet to be discovered. Old beliefs are to be systematically doubted until they have been reconfirmed by the methods of the new science. Persuasion is to be limited to equalitarian means, potentially accessible to all: visual demonstrations and logical demonstrations. The community of scientists is to stay together in focused disputation, attending to each other's arguments and illustrations, mutually monitoring and "keeping each other honest," until some working consensus emerges (but mutual conformity in belief per se is rejected as an acceptable goal).[25]

Campbell notes that this is a difficult balancing act, requiring both individualism (everyone must think for him- or herself and refuse to engage in herd behavior) and collectivism (everyone in the community must focus on similar problems with the aim of finding consensus).

In order to get proponents of different methods and theories on talking terms we need to provide a common framework by which arguments and evidence can be evaluated and alternative methods understood. If each has something to contribute (as the phrase goes), then we ought to be able to explain what these contributions are. Whether, in point of fact, norms exist that might provide grounds for judgments of adequacy across the social sciences is the question taken up in the following chapters. For the moment it is sufficient to note that the normative argument for norms is strong. There is no profit in incommensurability.[26] To the extent that academics employ idiosyncratic or field-specific

[25] Campbell (1988: 290).

[26] Incommensurability is a term that entered the lexicon of philosophy of science with the work of Thomas Kuhn. It refers (broadly and ambiguously) to a condition where persons are unable to understand one another because of their different ideological, theoretical, or methodological commitments. It is a very old problem, of course. Bacon noticed that error was the likely result whenever "argument or inference passes from one world of experience to another" (quoted in Wilson 1998: 10), a condition we would now label incommensurability. It should be noted that pluralism and uniformity are matters of degree. All but the most rabid deconstructionists will admit that there are some general perspectives on truth and knowledge that tie the social sciences together. See Laudan (1983, 1996); Wallerstein *et al.* (1996: 92–93); and Wilson

theoretical frameworks, we become islands in a boatless archipelago. Knowledge will not cumulate. Progress – define it how you will – is impeded.

To be sure, the need for agreement varies by topic. Those subjects firmly embedded in the past – those, that is, with few contemporary ramifications – can perhaps afford a wider array of views. Yet, for all subjects, social scientists should always strive for agreement, and the greater agreement they achieve – *ceteris paribus* – the more useful that field of study is likely to be. Whether the issue is a declaration of war or a capital-gains tax, citizens and policymakers look for scholarly consensus. Profound scholarly disagreement over these matters hampers public action. How can we justify the expenditure of millions of dollars of public funds if the effectiveness of a policy is openly and repeatedly challenged by experts? Indeed, support for social welfare programs has been undermined by suggestions from prominent policy experts that these programs are not achieving their intended purposes.[27] Similarly, support for anti-missile defense systems has been weakened by expert testimony questioning the technological viability of these visionary weapons.[28] Citizens are rightfully loath to surrender their earnings in order to pay for programs that cannot demonstrate workability, a judgment we rely on experts to provide.

Under the circumstances, it is not very useful if the social science community generates fourteen different perspectives on vouchers or democracy (two key examples, introduced below, that will guide much of our discussion in this book). If this is the end result of academic endeavor, we have not advanced very far over sheer intuition. Perhaps we have increased our "understanding" of these matters by looking at them from such varied perspectives. However, if we have no way of adjudicating between conflicting visions – if dissensus reigns supreme among academics who study these matters – then we have little to offer policymakers or the general public.

Of course, scholarly dissensus may simply be a reflection of the uncertain nature of the phenomena. Consensus is useful only if it is warranted by the evidence. Even so, there is no advantage in cultivating diversity *per se*. One might applaud *différance* (a Derridean neologism) in the humanities, but not, I think, in the social sciences.[29] Scholars in anthropology, archaeology,

(1998) for further defenses of a unified ("objective") methodology. See Hollis and Lukes (1982) and Laudan (1983, 1996) for general discussions of relativism. For arguments in favor of unifying the "qualitative" and "quantitative" dimensions of social science methodology, see Lazarsfeld and Rosenberg (1955: 387–391) and King, Keohane, and Verba (1994). For doubts on this score, see McKeown (1999).

[27] Murray (1984). [28] Lakoff and York (1989).

[29] The quest for consensus might also be referred to as a quest for objectivity. The trouble with this much abused term is that it fosters the illusion that such agreement will arise unproblematically from an empirical reality insofar as we view that reality neutrally (without prejudice). My argument for