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THE SOCIAL  
CONSTRUCTION  
OF WHAT?

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One person argues that scientific results, even in fundamental physics, are social constructs. An opponent, angered, protests that the results are usually discoveries about our world that hold independently of society. People also talk of the culture wars, which often hinge on issues of race, gender, colonialism, or a shared canon of history and literature that children should master—and so on. These conflicts are serious. They invite heartfelt emotions. Nevertheless I doubt that the terms “culture wars,” “science wars” (and now, “Freud wars”) would have caught on if they did not suggest gladiatorial sport. It is the bemused spectators who talk about the “wars.”

There is, alas, a great deal of anger out there that no amount of light-heartedness will dispel. Many more things are at work in these wars than I can possibly touch on. One of them is a great fear of relativism. What is this wicked troll? Clear statements about it are hard to find. Commonly, people suspected of relativism insist they are not haunted by it. A few, such as the Edinburgh sociologists of science, Barry Barnes and David Bloor (1982), gladly accept the epithet “relativist.” Paul Feyerabend (1987), of “anything goes” fame, managed to describe some thirteen versions of relativism, but this attempt at divide-and-rule convinced no one.

I think that we should be less highbrow than these authors. Let us get down to gut reactions. What are we afraid of? Plenty. There is the notion that any opinion is as good as any other; if so, won't relativism license anything at all? Feminists have recently cautioned us about the dangers of this kind of relativism, for it seems to leave no ground for criticizing oppressive ideas (Code 1995). The matter may seem especially pressing for third-world feminists (Nanda 1997).

Then there is historical revisionism. The next stage in the notorious series of holocaust denials might be a book entitled *The Social Construction of the Holocaust*, a work urging that the Nazi extermination camps are exaggerated and the gas chambers fictions. No one wants a relativism that tells us that such a book will, so far as concerns truth, be on a par with all others. My own view is that we do not need to discuss such issues under the heading of relativism. The question of historical revisionism is a question of how to write history.<sup>5</sup> Barnes and Bloor (1983, 27) make plain that relativist sociologists of their stripe are obliged to sort out their beliefs and actions, using a critical version of the standards of their own culture. Feyerabend's last words (1994) were that every culture is one culture, and we ought to take a stand against oppression

anywhere. And I ended my own contribution to a book on rationality and relativism by quoting Sartre's last words explaining why the Jewish and Islamic traditions played no part in his thought: they did not for the simple reason that they were no part of his life (Hacking 1983).

There are more global bogeymen. Intellectuals and nationalists are frightened of religious fundamentalism in India, Israel, the Islamic world, and the United States. Does not relativism entail that any kind of religious fundamentalism is as good as any kind of science?

Or maybe the real issue is the decline of the West (in the United States, read America). Decline is positively encouraged by some social constructionists, is it not? Sometimes people focus on the loss of tradition and resent "multiculturalism." That is one fear that I cannot take seriously, perhaps because the word was in use, in a purely positive way, in Canada long before it got taken up in the American culture wars. My goodness, where I live my provincial government has had a Minister of Multiculturalism for years and years; I'm supposed to be worried about that?

Relativism and decline are real worries, but I am not going to address them directly. It is good to stay away from them, for I cannot expect successfully to dispel or solve problems where so many wise heads have written so many wise words without effect. More generally, I avoid speculating further on the profound malaise that fuels today's culture wars. I am at most an unhappy witness to it, saddened by what it does.

#### DON'T FIRST DEFINE, ASK FOR THE POINT

Social construction talk has recently been all the rage. I cannot hope to do justice to all parties. I shall take most of my examples from authors who put social construction up front, in their titles. They may not be the clearest, most sensible, or most profound contributors, but at any rate they are self-declared. So what are social constructions and what is social constructionism? With so many inflamed passions going the rounds, you might think that we first want a definition to clear the air. On the contrary, we first need to confront the point of social construction analyses. Don't ask for the meaning, ask what's the point.

This is not an unusual situation. There are many words or phrases of which the same thing must be said. Take "exploitation." In a recent book about it, Alan Wertheimer (1996) does a splendid job of seeking out necessary and sufficient conditions for the truth of statements of the form

“A exploits B.” He does not quite succeed, because the point of saying that middle-class couples exploit surrogate mothers, or that colleges exploit their basketball stars on scholarships—Wertheimer’s prized examples—is to raise consciousness. The point is less to describe the relation between colleges and stars than to change how we see those relations. This relies not on necessary and sufficient conditions for claims about exploitation, but on fruitful analogies and new perspectives.

In the same way, a primary use of “social construction” has been for raising consciousness.<sup>6</sup> This is done in two distinct ways, one overarching, the other more localized. First, it is urged that a great deal (or all) of our lived experience, and of the world we inhabit, is to be conceived of as socially constructed. Then there are local claims, about the social construction of a specific *X*. The *X* may be authorship or Zulu nationalism. A local claim may be suggested by an overarching attitude, but the point of a local claim is to raise consciousness about something in particular. Local claims are in principle independent of each other. You might be a social constructionist about brotherhood and fraternity, but maintain that youth homelessness is real enough. Most of this book is about local claims. That is why I began with the question, “The social construction of what?” and opened with a list of whats. The items in my alphabetical list are so various! Danger is a different sort of thing from reality, or women refugees. What unites many of the claims is an underlying aim to raise consciousness.

#### AGAINST INEVITABILITY

Social construction work is critical of the status quo. Social constructionists about *X* tend to hold that:

- (1) *X* need not have existed, or need not be at all as it is. *X*, or *X* as it is at present, is not determined by the nature of things; it is not inevitable.

Very often they go further, and urge that:

- (2) *X* is quite bad as it is.
- (3) We would be much better off if *X* were done away with, or at least radically transformed.

A thesis of type (1) is the starting point: the existence or character of *X*

is not determined by the nature of things.  $X$  is not inevitable.  $X$  was brought into existence or shaped by social events, forces, history, all of which could well have been different. Many social construction theses at once advance to (2) and (3), but they need not do so. One may realize that something, which seems inevitable in the present state of things, was not inevitable, and yet is not thereby a bad thing. But most people who use the social construction idea enthusiastically want to criticize, change, or destroy some  $X$  that they dislike in the established order of things.

## GENDER

Not all constructionists about  $X$  go as far as thesis (3) or even (2). There are many grades of commitment. Later on I distinguish six of them. You can get some idea of the gradations by thinking about feminist uses of construction ideas. Undoubtedly the most influential social construction doctrines have had to do with gender.<sup>7</sup> That was to be expected. The canonical text, Simone de Beauvoir's *The Second Sex*, had as its most famous line, *On ne naît pas femme: on le devient*; "One is not born, but rather becomes, a woman" (de Beauvoir 1949, II, 1; 1953, 267). It also suggested to many readers that gender is constructed.<sup>8</sup>

Previous toilers in the women's movements knew that power relations needed reform, but many differences between the sexes had a feeling of inevitability about them. Then feminists mobilized the word "gender." Let  $X$  = gender in (1)–(3) above. Feminists convinced us (1) that gendered attributes and relations are highly contingent. They also urged (2) that they are terrible, and (3) that women in particular, and human beings in general, would be much better off if present gender attributes and relations were abolished or radically transformed. Very well, but this basic sequence (1)–(3) is too simplistic. There are many differences of theory among feminists who use or allude to the idea of construction.<sup>9</sup>

One core idea of early gender theorists was that biological differences between the sexes do not determine gender, gender attributes, or gender relations. Before feminists began their work, this was far from obvious. Gender was, in the first analyses, thought of as an add-on to physiology, the contingent product of the social world. Gender, in this conception, is "a constitutive social construction: . . . Gender should be understood

as a social category whose definition makes reference to a broad network of social relations, and it is not simply a matter of anatomical differences" (Haslanger 1995, 130).<sup>10</sup>

Many constructionist uses of gender go beyond this add-on approach. Naomi Scheman (1993, ch. 18) inclines to functionalism about gender. That is, she thinks that the category of gender is in use among us to serve ends of which members of a social group may not be aware, ends which benefit some and only some members of the group. The task is to unmask these ends, to unmask the ideology. When Scheman says that gender is socially constructed, she means in part that it motivates visions in which women are held to be essentially, of their very nature, subject to male domination.

Scheman wants to reform the category of gender. Judith Butler is more rebellious. She insists that individuals become gendered by what they do—a favored word is "performance." She rejects the notion that gender is a constructed add-on to sexual identity. Male and female bodies are not givens. My body is, for me, part of my life, and how I live that life is part of the determination of what kind of body I have. "Perhaps this construct called 'sex' is as culturally constructed as gender . . . with the consequence that the distinction between sex and gender turns out to be no distinction at all" (Butler 1990, 7).

We may here be reminded, but only for a moment, of Thomas Laqueur's (1990) observations of how differently the sex organs have been represented in, among other things, Western medical texts of the past millennium. Butler is not discussing such systems of knowledge about the body. They have, of course, limned some possibilities for perception of self, and influenced possibilities for acting, living. But her concern goes far beyond Laqueur's. The systems of knowledge that he presents all assume that sex is physiological, a given prior to human thought. They differ about what is given. Butler questions how we get the idea of that given. Older notions of gender do not help answer such questions. "How, then," she asks, "does gender need to be reformulated to encompass the power relations that produce the effect of a prediscursive sex and so conceal that very operation of discursive production?" Thus she wants at least to revise early feminist notions of gender, and as I read her, wants to mature away from talk of construction and proceed to a more complex analysis that would, perhaps, shed the word "construction" altogether.

Butler cites as an ally an author whose work is revolutionary. Monique

Wittig (1992, 9) repudiates the feminist tradition that affirms the power of being woman. The entire set of sexual and gender categories should be overthrown. According to Wittig, the lesbian is an agent of revolution because she lives out a refusal to be either man or woman.

Scheman, to use a ranking I shall elaborate later, is a *reformist* constructionist who wants to *unmask* some ideology. Butler's published work is what I call *rebellious*, while Wittig's is *revolutionary*. But do not imagine that all feminists are hospitable to social construction talk. I suggested that Butler distances herself from it, preferring concepts of greater precision and subtlety. Jeffner Allen seems to have avoided it from the start. She thinks that too much of such talk gets caught up in banal and narcissistic postmodern fascinations with mere texts. It diverts attention away from the basics, like wage inequalities. Quite in opposition to Wittig, she suggests that it might be a good idea to refashion a specifically feminine sensitivity. She can be caustic about the idea that she, herself, is socially constructed. Which society did you have in mind? she asks (Allen 1989, 7).

## WOMEN REFUGEES

*What* is said to be constructed, if someone speaks of the social construction of gender? Individuals as gendered, the category of gender, bodies, souls, concepts, coding, subjectivity, the list runs on. I have used gender as an example to get us started. It is far too intense a topic to fit any easy schematism. So let me venture a small clarification using a less controversial item from my alphabetical list of titles—women refugees.

Why would someone use the title *The Social Construction of Women Refugees* (Moussa 1992), when it is obvious that women are refugees in consequence of a sequence of social events? We all think that the world would be a better place if there were no women refugees. We do not mean that the world would be better if women were simply unable to flee intolerable conditions, or were killed while so doing. We mean that a more decent world would be one in which women were not driven out of their homes by force, threats of force, or at any rate did not feel so desperate they felt forced to flee. When  $X = \text{Women refugees}$ , propositions (1), (2), and (3) are painfully obvious. What, then, could possibly be the point of talking about the social construction of women refugees?

To answer, we must, as always, examine the context. The discussion does not spring from an ideal: let no women be forced to flee. The per-

spective of Moussa (1992) is that of the host country (in this case Canada, which in recent years, for all its faults, has had the refugee policy that most closely approximates that of United Nations resolutions on refugees). What is socially constructed is not, in the first instance, the individual people, the women refugees. It is the classification, *woman refugee*. Moussa addresses the idea of “the woman refugee” as if that were a kind of human being, a species like “the whale.” She argues that this way of classifying people is the product of social events, of legislation, of social workers, of immigrant groups, of activists, of lawyers, and of the activities of the women involved. This kind of person, as a specific *kind* of person, is socially constructed. Or simply: the *idea* of the woman refugee is constructed.

#### IDEAS IN THEIR MATRICES

“Idea” is shorthand, and a very unsatisfactory shorthand it is too. The trouble is that we want some general way to make the distinction needed, not just for  $X$  = women refugees, but for a host of other items said to be socially constructed. “Idea” may have to serve, although more specific words like “concept” and “kind” are waiting in the wings. I do not mean anything curiously mental by “idea.” Ideas (as we ordinarily use the word) are usually out there in public. They can be proposed, criticized, entertained, rejected.

Ideas do not exist in a vacuum. They inhabit a social setting. Let us call that the *matrix* within which an idea, a concept or kind, is formed. “Matrix” is no more perfect for my purpose than the word “idea.” It derives from the word for “womb,” but it has acquired a lot of other senses—in advanced algebra, for example. The matrix in which the idea of the woman refugee is formed is a complex of institutions, advocates, newspaper articles, lawyers, court decisions, immigration proceedings. Not to mention the material infrastructure, barriers, passports, uniforms, counters at airports, detention centers, courthouses, holiday camps for refugee children. You may want to call these social because their meanings are what matter to us, but they are material, and in their sheer materiality make substantial differences to people. Conversely, ideas about women refugees make a difference to the material environment (women refugees are not violent, so there is no need for guns, but there is a great need for paper, paper, paper). Materiel influences the



people (many of whom have no comprehension of that paper, paper, paper, the different offices, the uniforms). Sheer matter, even the color of the paint on the walls, can gradually replace optimistic hope by a feeling of impersonal grinding oppression.

This discussion of ideas and classification takes for granted the obvious, namely that they work only in a matrix. But I do want to emphasize what in shorthand I call the *idea* of the woman refugee, that classification, that kind of person. When we read of the social construction of *X*, it is very commonly the idea of *X* (in its matrix) that is meant. And ideas, thus understood, do matter. It can really matter to someone to be classified as a woman refugee; if she is not thus classified, she may be deported, or go into hiding, or marry to gain citizenship. The matrix can affect an individual woman. She needs to become a women refugee in order to stay in Canada; she learns what characteristics to establish, knows how to live her life. By living that life, she evolves, becomes a certain kind of person (a woman refugee). And so it may make sense to say that the very individuals and their experiences are constructed within the matrix surrounding the classification "women refugees."

Notice how important it is to answer the question "The social construction of what?" For in this example *X* does not refer directly to individual women refugees. No, the *X* refers first of all to the woman refugee as a kind of person, the classification itself, and the matrix within which the classification works. In consequence of being so classified, individual women and their experiences of themselves are changed by being so classified.

This sounds very complicated. But the logical point is simple. Women in flight are the product of social conditions in their homelands. It would be stupid to talk about social construction in that context, because social circumstances so manifestly provoke the fear of staying home and the hope of succor in another land. But since, in Canada, *woman refugee* may seem a straightforward and rather inevitable way of classifying some people, there is indeed a point to claiming that the classification is far from inevitable. One can also argue that this contingent classification, and the matrix within which it is embedded, changes how some women refugees feel about themselves, their experiences, and their actions. Hence in that indirect way people themselves are affected by the classification—and, if you like, the individual herself is socially constructed as a certain kind of person.

## A PRECONDITION

Notice how thesis (1)— $X$  need not have existed—sets the stage for social construction talk about  $X$ . If everybody knows that  $X$  is the contingent upshot of social arrangements, there is no point in saying that it is socially constructed. Women in flight, or at the immigration barrier, are there as a result of social events. Everyone knows that, and only a fool (or someone who likes to jump on bandwagons) would bother to say that they are socially constructed. People begin to argue that  $X$  is socially constructed precisely when they find that:

- (0) In the present state of affairs,  $X$  is taken for granted;  $X$  appears to be inevitable.

In my example, the concept of the woman refugee seems inevitable, once you have the practices of nationality, immigration, citizenship, and women in flight who have arrived in your country begging asylum. The author of a book on the social construction of women refugees is saying no, the concept, and the matrix of rules, practices, and material infrastructure in which it is embedded, are not inevitable at all.

Statement (0) is not an assumption or presupposition about  $X$ . It states a precondition for a social constructionist thesis about  $X$ . Without (0) there is no inclination (aside from bandwagon jumping) to talk about the social construction of  $X$ . You can confirm this by scrolling down the  $A$  through  $Z$  above. You do not find books on the social construction of banks, the fiscal system, cheques, money, dollar bills, bills of lading, contracts, tort, the Federal Reserve, or the British monarchy. These are all contractual or institutional objects, and no one doubts that contracts and institutions are the result of historical events and social processes. Hence no one urges that they are socially constructed. They are part of what John Searle (1995) calls social reality. His book is titled *The Construction of Social Reality*, and as I explained elsewhere (Hacking 1997), that is not a *social* construction book at all.

I left out  $J$  in my alphabetical list. I could have gone from “constructing” to “inventing,” with *Inventing Japan: The Making of a Post-War Civilization* (Chapman 1991). The title is possibly a pun, in the manner of the book called *Inventing Leonardo* (Turner 1993): postwar Japan is inventive and invented. (There are two books titled *Inventing Women*, Panabaker 1991, and Kirkup and Keller 1992; one is about women inventors, and one is about how roles for women in science were invented.)

The book about Japan is a history book with a thesis. It argues that modern Japan is a wholly new phenomenon. The common claim that Japan is deeply rooted in ancient tradition is, says the author, false. Regardless of the truth of his thesis, the phenomena he presents are obviously social phenomena, but no one files this book with the social construction literature. This is partly because, if the topic is contemporary Japan, the nation, then condition (0) is not satisfied. No one could think that the modern nation arose inevitably.

On the other hand, if the topic is the *idea* of Japan, that does seem more inevitable. Take some books with similar titles; *Inventing America* (Rabasa 1993); *Inventing Australia* (White 1981); *Inventing Canada* (Zeller 1987); *Inventing Europe* (Delanty 1995); *Inventing New England* (Brown 1995); *Inventing India* (Crane 1992); *Inventing Ireland* (Kiberd 1996). The 1991 *Inventing Japan* appears, in retrospect, to have participated in an early 1990s orgy of inventions, composed for people who think that the idea of nation or region X, with all its connotations in fiction and stereotypes, is pretty inevitable. In short, for people who act as if condition (0) were satisfied.

Since the Federal Reserve is so obviously the upshot of contingent arrangements, a book titled *The Social Construction of the Federal Reserve* would likely be silly; we would suspect someone was trying to cash in on the cachet of "social construction." But we can imagine a startling work, *The Social Construction of the Economy*. Every day we read that the economy is up or down, and we are supposed to be moved to fear or elation. Yet this splendid icon, the economy, was hard to find on the front pages of newspapers even forty years ago. Why are we so unquestioning about this very idea, "the economy"? One could argue that the idea, as an analytic tool, as a way of thinking of industrial life, is very much a construction. It is not the economy of Sweden in the year 2000 that one argues is a social construction (obviously it is that; condition (0) is not satisfied). Instead, that seemingly inevitable and unavoidable idea, *the economy*, may be argued to be a social construct.

A more terrifying creature than the economy has emerged from the fiscal woods: the deficit. That is familiar as the great political slogan of reaction of the early 1990s. Another bestseller could well be *Constructing the Deficit*. Of course the deficit was brought into being by a great deal of borrowing in the course of recent history; that is not what would be in question. The topic of this imagined bestseller would be the construction of the *idea* of the deficit. We can foresee the argument. The

idea of the deficit was constructed as a threat, a constraining element in the lives of many, an instrument for the restoration of the hegemony of capital, and for the systematic and ruthless unweaving of the social net. It was constructed as a device for encouraging poor people willingly to consign themselves to yet more abject poverty.

In what follows I shall lay great emphasis on the difficult distinction between object and idea. Starting point (0) does not hold for the objects (the deficit or the economy). Obviously our present economy and our present deficit were not inevitable. They are the contingent upshot of historical events. Starting point (0) does, in contrast, hold for the ideas of the economy or the deficit; these ideas, with many of their connotations, seem inevitable.

## THE SELF

Statement (0) helps clarify one very popular site for social construction analyses: "the self." I have a little trouble here. We seldom encounter anyone talking about "the self," except for rather highbrow conversation. This is quite unlike the situation with women refugees, a down-to-earth and practical topic. Our English word "self" works better as a suffix (herself) and a prefix (self-importance) than as a substantive. That is significant, but I do not want to practice linguistic philosophy here. We have to accept a situation in which many scholars contentedly discuss the self.

The history of modern philosophy contains many discussions that can induce talk about constructing the self. All of them (to foreshadow a theme developed in the next chapter) go back to Kant, and his visions of the way in which both the moral realm and the framework for the material realm are constructed.

Take existentialism. Readers of Camus or the early Sartre can form a picture of a self with absolutely no center, a self that constructs itself by free acts of will. The constructed self must, however, accept agonizing responsibility for that which it has constructed. Later, Sartre with greater awareness of Heidegger and Karl Jaspers, thought of the self as being constructed in a social matrix. This suggests a genuine distinction in which some constructions of the self are social, and some are not. Thus May (1992, 3) writes of a view, which he calls "social existentialism," and which he finds "worth reviving"; one "which derives from Heidegger, Jaspers and the later Sartre [and which] sees the self as a social

construct, as a function of the interplay of history, social conditioning, and the chosen behavior of the individual person." This is the very view, quoted earlier, expressed by the overworked director of the welfare agency: "And *I* myself am, of course, a social construct; each of us is."

The point of saying *social* construct is to contrast it with individualist, and in the case of Camus and early Sartre almost solipsist, construction of the self. Note that the quasi-solipsist construction of the self is rather naturally called construction. We have the picture of a self step by step coalescing through a sequence of free acts, each of which must build on the self built up by preceding free acts. Conversely, the "interplay of history, social conditioning, and the chosen behavior of the individual person" can hardly be called *construction* at all. Only a somewhat unreflective usage—the result of rote and repetition—of terms like "social construct" would prompt one to call the resultant self a social construct. Social product, product of society, yes, but construct?

Some people find the social construction of the self repugnant for quite the opposite reason. Far from thinking of the self as beginning in a centerless Sartrean vacuum, they identify "the self" with a religious, mystical, metaphysical, or transcendental vision of the soul. Selves have essences, and, except in superficial and accidental ways, they are not constructs. Sartre, early and late, thought this was simply a mistake, so here we have a profound philosophical disagreement masquerading under the label of construction, pro or con.

There is yet another ground of objection, more empiricist than the last. Today's English-language traditions of political theory emphasize individual liberty and individual rights. Human beings are thought of as self-subsistent atoms who enter into relationships with other human beings. Enlightenment philosophies of the social contract theories had such a background, as do present-day game-theoretic approaches to ethics. Such pictures invite us to think that first there are individual "selves," and then there are societies. That has been a fruitful model in terms of which to think about justice, duty, government, and law. People who subscribe to this vision or strategy find talk of social construction suspect.

Others, who began by thinking in that way, come to realize that, despite their upbringing and the assumptions of much of the political discourse that governs the societies they inhabit, the atomistic presocial self is a harmful myth. They then find it rather liberating to proclaim that the self is a construct. That is one reason we have heard so much

about the social construction of the self. It comes from people who once found the notion of a presocial self natural, even inevitable. They feel that condition (0) has been satisfied: in the present state of affairs, the atomistic self is taken for granted; it appears to be inevitable. (And it isn't inevitable at all.)

Some thinkers find atomistic visions of human nature to be obviously false. Rather, we are born into a society, educated by it, and our "selves" are sculpted out of biological raw material by constant interaction with our fellow humans—not to mention the material environments that our extended families and larger communities have made. Charles Taylor (1995) is one distinguished philosopher who takes this stance. He uses anti-Enlightenment German authors as his authorities in this connection—what he calls the Hamann-Herder-Humboldt axis. For such a thinker, there seems very little point in talking about the social construction of the self, because condition (0) is not satisfied. The self (whatever that is imagined to be) does not seem in the least inevitable.

#### ESSENTIALISM, ABOUT RACE, FOR EXAMPLE

Statement (0) says that *X* is taken for granted; *X* appears to be inevitable. This formulation is deliberately weak and vague. Often social construction theses are advanced against a stronger background. They are used to undermine the idea that *X* is essential, even that *X* has an "essence." Debates about the self furnish an obvious example. For something more down to earth, take race. Obviously, essentialism is an especially strong form of background assumption (0). If a person's race is an essential element of a person's being, then race is not inevitable only in the present state of affairs. It is inevitable, period, so long as there are human beings with anything like our evolutionary history on the face of the earth. Hence the anthropologist Lawrence Hirschfeld (1996) contrasts "constructionist" and "essentialist" views about race. Essentialists (usually more implicit than explicit in their beliefs) hold that one's race is part of one's "essence."

Very often essentialism is a crutch for racism, but it need not be. Hirschfeld, deeply imbued with recent cognitive science approaches to developmental psychology, argues from his experimental data that children have an innate disposition to sort people according to races, and are programmed to take an essentialist attitude to certain classifications

of people, an attitude which is strongly reinforced by cultural background. This “psychological essentialism” is proposed, in part, to explain the prevalence of concepts of race and the ease with which they can be conscripted for racism. Hirschfeld argues that unqualified constructionism about race clouds our view.

Out-and-out social constructionism about race is far more politically correct than essentialism. Most anti-racist writing denounces essentialist attitudes to race. Anthony Appiah and Amy Gutman do so in their recent book about color (1996). They may not use the label “social construction” much, but they are regularly grouped among social constructionists about race.<sup>11</sup>

Essentialism comes to the fore in many other highly controversial sites. Feminists have opposed views of gender and even sex as essential properties. Some debates about the nature of homosexuality can be cast as essentialism versus constructionism. The book edited by Stein (1990b), which is widely respected, is a collection of papers half of which incline to constructionism, and half to essentialism. Stein himself (1990a) produced a succinct analysis of the issues. As elsewhere, it is important to sort out the various “whats” that may be said to be socially constructed—or essential. Homosexual individuals? Homosexual culture? Homosexual practices? Homosexual genes? The homosexual as a kind of person?

As a philosopher I am, in respect of essences, an heir of John Locke and John Stuart Mill, skeptical of the very idea of essence. I am too much of their party to discuss essentialism impartially. But we do not need to. It suffices to work under the weaker umbrella notion of inevitability used in statements (0) and (1). For our purposes, essentialism is merely the strongest version of inevitability.

Notice, however, that “essentialism” is not purely descriptive. Most people who use it use it as a slur word, intended to put down the opposition. I cannot recall anyone standing up and saying, “I am an essentialist about race.” Not even (so far as I know) Philippe Rushton, who presents book upon book of scientific arguments that race is an objective category that sorts human beings into three essential classes, color-coded as black, white, and yellow. He believes that members of each class tend to have a large number of characteristics distinctive of the class of which they are members, such as levels of intelligence, sex drive, athletic prowess, sociability, and so on. (e.g. Rushton 1995). In short,

races have what the philosophers call essences. Nevertheless, although Rushton stands up and says the most amazing things in public, even he does not say, "I am an essentialist about race."

## EMOTIONS

Emotions provide yet another field for disagreement. Some students of the subject think that there are basic, pan-cultural emotions, expressed on human faces, recognized by human beings of every culture, and produced in brain centers, all of them determined by evolutionary history. Others argue that emotions and their expression are quite specific to a social and linguistic group. Paul Ekman (1998), one of the most dedicated universalists, has provided a personal account of the controversy before the social construction era. His opponents then were those mighty figures of a yet earlier generation, Margaret Mead and Geoffrey Bateson. Nowadays the issues have been translated into social construction talk. When people say that the emotions are socially constructed, or that the emotion of grief, say, is a social construct, they do not mean that the *idea* of the emotions, or of grief is constructed, but that the emotions themselves, grief itself, are social constructs. But the word "construct" has lost all force here. In fact the "emotion" entry in my alphabetical list refers to Rom Harré's *The Social Construction of the Emotions* (1986). He told me that the original title was to be *The Social Production of the Emotions*, but the publisher insisted on *Construction*, believing that would sell more copies of the book. His later anthology, Harré and Parrott (1996), includes many essays by diverse hands about social construction. The authors argue that emotions vary from culture to culture, that the character of grief has changed in Western culture and is changing today, and that the physiological expressions of emotion vary from group to group. They argue, in various ways, that how we describe emotions affects how the emotions are experienced.

The exact expression of such a thesis depends, of course, on what the author thinks emotions are. Griffiths (1997, ch. 6) notes that "There are two very different models of the social construction of emotion in the literature." There is a *social concept* model, according to which emotions are inherently cognitive and conceptual, and are the concepts peculiar to a social group, formed by the culture of that group. Then there is a *social role* model, in which "an emotion is a transitory social role (a socially constituted syndrome)" (Averill 1980, 312, quoted by Grif-



fiths). In these discussions, the label “social construction” is more code than description. There is no literal sense in which either the Victorian concept or the Victorian role of grief was *constructed* during Her Most Britannic Majesty’s long reign. “Social construct” is code for not universal, not part of pan-cultural human nature, and don’t tread on me with those heavy hegemonic (racist, patriarchal) boots of yours. Griffiths sensibly contends that the “insights of social constructionism [about the emotions] are perfectly compatible with what is known about the evolutionary [and therefore biological, pre-cultural] basis of emotion” (p. 138). Since we are not talking about anything that is literally constructed, it is not obvious that these insights are best couched in terms of construction talk at all. But there is the residual force of starting point (0). Constructionists about the emotions do start by feeling that “In the present state of affairs, the emotions are taken for granted; the emotions and our expressions of them appear to be inevitable.”

#### GRADES OF COMMITMENT

Very roughly, the gradations of constructionist commitment arise from increasingly strong reactions to (1), (2), and (3) below: (1) was the claim that *X* is not inevitable; (2) that *X* is a bad thing; and (3) that the world would be a better place without *X*. Here are names for six grades of constructionism.

Historical  
 Ironic  
 Reformist      Unmasking  
 Rebellious  
 Revolutionary

The least demanding grade of constructionism about *X* is historical. Someone presents a history of *X* and argues that *X* has been constructed in the course of social processes. Far from being inevitable, *X* is the contingent upshot of historical events. A historical constructionist could be quite noncommittal about whether *X* is good or bad. How does historical “social” constructionism differ from history? Not much, a matter of attitude, perhaps.

The next grade of commitment takes an *ironic* attitude to *X*. *X*, which we thought to be an inevitable part of the world or of our conceptual architecture, could have been quite different. We are nevertheless stuck

with it, it forms part of our way of thinking which will evolve, perhaps, in its own way, but about which we can do nothing much right now. The name used for this stance takes its cue from Richard Rorty's title, *Contingency, Irony and Solidarity*. Irony about *X* is the recognition that *X* is highly contingent, the product of social history and forces, and yet something we cannot, in our present lives, avoid treating as part of the universe in which we interact with other people, the material world, and ourselves.

The ironist, we feel, is a kibitzer, a powerful intellect, well able to understand the architecture of the world that pertains to *X*, but ironically forced to leave it much as it is. A third grade of commitment takes (2) seriously: *X* is quite bad as it is. Agreed, we have no idea at present how to live our lives without *X*, but having seen that *X* was not inevitable, in the present state of things, we can at least modify some aspects of *X*, in order to make *X* less of a bad thing. This is *reformist* constructionism. Reformist constructionism about *X*, like every kind of constructionism, starts from (0).

On the other side of irony is what Karl Mannheim (1925/1952, 140) called "the unmasking turn of mind," which does not seek to refute ideas but to undermine them by exposing the function they serve. Mannheim had learned from Marxism. The notion is that once one sees the "*extra-theoretical function*" (Mannheim's emphasis) of an idea, it will lose its "practical effectiveness." We unmask an idea not so much to "disintegrate" it as to strip it of a false appeal or authority. This is *unmasking* constructionism. A reformist may be an unmasker, or may not be; an unmasker may or may not be reformist. That is why, in my little table, I place the two grades of commitment side by side.

Unmaskers, at least as understood by Mannheim, believe not only (1) that *X* is not inevitable, but also (2) that *X* is a bad thing, and probably (3) that we would be better off without *X*. Unmasking is nevertheless an intellectual exercise in itself. A great deal of gender politics goes further, and is unequivocally radical about (1), (2), and (3), so far as concerns gender relations. A constructionist who actively maintains (1), (2), and (3) about *X* will be called *rebellious* about *X*. An activist who moves beyond the world of ideas and tries to change the world in respect of *X* is *revolutionary*.

As our consciousness about gender is raised, some of us find our attitudes moving along from historical to ironic to reformist, and then to

unmasking the function of gender relations. With the mask removed, we become rebellious; a few become revolutionary.

Recall the economy. How could we possibly think about the industrial world without thinking about the economy? That is where our ironic, perhaps unmasking, social constructionist could enter. The ironist shows how the idea of the economy became so entrenched; it did not have to be, but now it is so much a part of our way of thinking, we cannot escape it. The unmasker exposes the ideologies that underlie the idea of the economy and shows what extra-theoretical functions and interests it serves. In former times there were activists who would have passed on to rebellion and even revolution about the idea of the economy. Their task becomes harder and harder with the hegemony of the world system. What once was visibly contingent feels like it has become part of the human mind. It takes only a little fortitude to be a rebellious constructionist about the idea of the deficit. But perhaps the only way you can begin to be a constructionist about the idea of the economy is to pass at once from irony to revolution.

## OBJECTS, IDEAS, AND ELEVATOR WORDS

Three distinguishable types of things are said to be socially constructed. The resulting divisions are so general and so fuzzy at the edges that felicitous names do not come to hand. In addition to “objects” and “ideas” we need to take note of a group of words that arise by what Quine calls semantic ascent: truth, facts, reality. Since there is no common way of grouping these words, I call them elevator words, for in philosophical discussions they raise the level of discourse.

*Objects.* Items in the following disparate list are “in the world” in a commonsensical, not fancy, meaning of that phrase.

- People (children)
- States (childhood)
- Conditions (health, childhood autism)
- Practices (child abuse, hiking)
- Actions (throwing a ball, rape)
- Behavior (generous, fidgety)
- Classes (middle)

Experiences (of falling in love, of being disabled)  
 Relations (gender)  
 Material objects (rocks)  
 Substances (sulphur, dolomite)  
 Unobservables (genes, sulphate ions)  
 Fundamental particles (quarks)

And homes, landlords, housecleaning, rent, dry rot, evictions, bailiffs, squatting, greed, and the Caspian Sea. The id is an object, if there is an id, and who doubts that there are egos, big ones, in the world? These items of very different categories are all in the world, so I call them objects, for lack of a better label. Adapting a terminology of John Searle's (1995), we find that some of these items are ontologically subjective but epistemologically objective items. The rent you have to pay is all too objective (and in the world, as I put it) but requires human practices in order to exist. It is ontologically subjective, because without human subjects and their institutions there would be no such object as rent. But rent is epistemologically objective. You know full well (there is nothing subjective about it) that \$850 is due on the first of the month.

*Ideas.* I mean ideas, conceptions, concepts, beliefs, attitudes to, theories. They need not be private, the ideas of this or that person. Ideas are discussed, accepted, shared, stated, worked out, clarified, contested. They may be woolly, suggestive, profound, stupid, useful, clear, or distinct. For present purposes, groupings, classifications (ways of classifying), and kinds (the woman refugee) will be filed as ideas. Their extensions—classes, sets, and groups (the group of women refugees now meeting with the Minister of Immigration)—are collections in the world, and so count as “objects.” I am well aware that there is much slippage in this coarse system of sorting.<sup>12</sup>

*Elevator words.* Among the items said by some to be constructed are facts, truth, reality, and knowledge. In philosophical discussions, these words are often made to work at a different level than words for ideas or words for objects, so I call them elevator words. Facts, truths, reality, and even knowledge are not objects in the world, like periods of time, little children, fidgety behavior, or loving-kindness. The words are used to say something about the world, or about what we say or think about the

world.<sup>13</sup> They are at a higher level. Yes, there is a correspondence theory of truth, according to which true propositions correspond to facts. So are not facts “in the world”? They are not in the world in the same way that homes, greed, and bailiffs are in the world. Even if we agreed with Wittgenstein that the world is made up of facts and not things, facts would not be *in* the world, in the way in which greed and bailiffs are.

There are two particular points to note about elevator words. First, they tend to be circularly defined. Compare some desk dictionaries. One would hardly know that the word “fact,” as defined in *Webster’s New Collegiate*, is the same word as that defined in *Collins*. The *American Heritage Dictionary* begins with “1. Information presented as objectively real.” It plays it safe with those two words at the end, but blows it with “presented”—you mean something could be a fact just because it is *presented* as objectively real? The *New Shorter Oxford* gives as one sense of “real,” “that is actually and truly such.” J. L. Austin and his fellow 1950s philosophers of language are said to have played a game called *Vish!* You look up a word, and then look up words in its dictionary definition; when you have got back to the original word, you cry *Vish!* (vicious circle). Try that on the *New Shorter Oxford* entries for “real” and break some records.

A second point to notice is that these words, along with their adjectives such as “objective,” “ideological,” “factual,” and “real” (not to mention the “objectively real” of the *American Heritage*), have undergone substantial mutations of sense and value (Daston 1992, Daston and Galison 1992, Shapin 1995, Poovey 1998). Some of the most general, and venomous, debates about social construction end up with arguments heavily loaded with these words, as if their meanings were stable and transparent. But when we investigate their uses over time, we find that they have been remarkably free-floating. This is not the place to explore such issues. The difficulties with these nouns and adjectives provide one reason for being wary of arguments in which they are used, especially when we are asked to glide from one to the other without noticing how thin is the ice over which we are skating.

Despite these difficulties, we can agree that a thesis about the construction of a fact is different in character from a thesis about the construction of the child viewer of television, for it is not about the construction of either an object or an idea. One place we encounter the alleged construction of facts is in the sciences, as in the subtitle of La-

tour and Woolgar's (1986) *Laboratory Life: The Construction of Scientific Facts* (see Chapter 3). What about the social construction of reality? That sounds like the social construction of everything.

## UNIVERSAL CONSTRUCTIONISM

The notion that everything is socially constructed has been going the rounds. John Searle (1995) argues vehemently (and in my opinion cogently) against universal constructionism. Yet he does not name a single universal constructionist. Sally Haslanger (1995, 128) writes that "On occasion it is possible to find the claim that 'everything' is socially constructed 'all the way down.'" She cites only a single allusive pair of pages out of the whole of late twentieth-century writing (namely Fraser 1989, pages 3 and 59, writing about Foucault), as if she had a hard time finding even one consistently self-declared universal social constructionist.

We require someone who claims that every object whatsoever—the earth, your feet, quarks, the aroma of coffee, grief, polar bears in the Arctic—is in some nontrivial sense socially constructed. Not just our experience of them, our classifications of them, our interests in them, but these things themselves. Universal social constructionism is descended from the doctrine that I once named linguistic idealism and attributed, only half in jest, to Richard Nixon (Hacking, 1975, 182). Linguistic idealism is the doctrine that only what is talked about exists; nothing has reality until it is spoken of, or written about. This extravagant notion is descended from Berkeley's idealism, which we call idealism: the doctrine that all that exists is mental.

Universal social constructionism is in this vein of thought, but it has not yet found its Berkeley to expound it. Most constructionism is not universal. The authors who contributed books for my alphabetical list of topics, from authorship to Zulu nationalism, were making specific and local claims. What would be the point of arguing that danger, or the woman refugee, is socially constructed, if you thought that everything is socially constructed?

But is there not an obvious example of universal constructionism, even in my alphabetical list? I mean *R* for Reality. The very first book to have "social construction" in the title was by Peter Berger and Thomas Luckmann (1966): *The Social Construction of Reality*. They argued that our experience of reality, our sense of reality as other, in all

its rich and circumstantial detail, as independent of us, is neither a Kantian *a priori* nor solely the product of psychological maturation. It is the result of processes and activities which they thought might aptly be called social construction. Their book has roots in phenomenology, and especially the 1930s work of the Viennese social theorist Alfred Schutz (1899–1959). Schutz worked at the New School for Social Research after 1939. His philosophical roots were in Edmund Husserl and Max Weber. Where Husserl had asked us, in his middle years, to reflect on the quality of immediate experiences, and Weber had directed us to the fabric of society as a way to understand ourselves and others, Schutz brought the two together. His project was to understand the taken-for-granted and experienced world that each person in a society shares with others. That is the topic for Berger and Luckmann, themselves closely associated with Frankfurt and with the New School.

Their book, then, is about the social construction of our sense of, feel for, experience of, and confidence in, commonsense reality. Or rather, as the authors made plain from the start, of various realities that arise in the complex social worlds we inhabit. The book thus contrasts with psychological accounts of the origins of our conceptions of space, number, reality, and the like advanced by Jean Piaget and his colleagues. According to Berger and Luckmann, the experience of the world as other is constituted for each of us in social settings. The two authors began by examining what they called “everyday reality,” which is permeated by both social relations and material objects. They moved at once to what they said is the prototypical case of social interaction, “the face-to-face situation,” from which all other cases are, they held, derivative.

Berger and Luckmann did not stake a claim for any form of universal social constructionism. They did not claim that everything is a social construct, including, say, the taste of honey and the planet Mars—the very taste and planet themselves, as opposed to their meanings, our experience of them, or the sensibilities that they arouse in us. As their subtitle said, they wrote *A Treatise in the Sociology of Knowledge*. They did not claim that nothing can exist unless it is socially constructed.

## THE CHILD VIEWER OF TELEVISION

As you run down my alphabetical list, you seem to see what I call objects, and a few elevator words, but no ideas. Yet that is misleading, for on closer inspection, it seems to be the idea of danger, or the classifi-

cation of individuals as women refugees, that is being discussed. One of the first social-construction-of books to be published after Berger and Luckmann was Jack Douglas's (1970) *Deviance and Respectability: The Social Construction of Moral Meanings*. That makes it nicely clear that meanings, not deviance and respectability themselves, are the primary focus of discussion. Of course deviance and respectability themselves are formed in social settings, but that is not the topic of this intelligent book by the author of a famous work on suicide. Much later there is a treatment of the subject with a less clear title, *The Social Construction of Deviance* (Goode 1994).

The most banal example on my list is the child viewer. It is urged that the very idea of this definite kind of person, the child viewer of television, is a construct. Although children have watched television since the advent of the box, there is (it is claimed) no definite class of children who are "child viewers of television" until "the child viewer of television" becomes thought of as a social problem. The child viewer, steeped in visions of violence, primed for the role of consumer, idled away from healthy sport and education, becomes an object of research. Putting it crudely, what is socially constructed, in this case, is an *idea*, the idea of the child viewer. Once again "the whale" comes to mind; "the child viewer" becomes a species of person. The idea works. V-chips are invented in a Vancouver basement, devices to allow children to watch only the shows favored by parental guidance (or Parental Guidance), chips that are then to be embedded in TV sets, while talk about chips becomes part of the rhetoric of a United States presidential campaign.

The story continues. At one point when I was thinking about social constructs, there was a world congress on the child viewer of television.<sup>14</sup> Previously research had been conducted only in advanced industrial countries, and chiefly in English. In 1997, researchers from Chile and Tunisia could have their say alongside their well-established colleagues. Certain absences were conspicuous: children, producers, advertisers, products, and television sets as objects of study (as opposed to mere devices for use at the conference). Nevertheless, The Child Viewer advanced. No longer passive victims, children were presented as active, as masters of the screen, controllers of their world, or at any rate participants alongside the image-makers.

We have presupposition (0): The child viewer seems like an inevitable categorization in our day and age. The constructionist argues (1): Not at all. Children who watch television need never have been conceptualized



as a distinct kind of human being. What seems like a sensible classification to use when thinking about the activities of children, has, it may be argued, been foisted upon us, in part because of certain moralizing interests. Hence there is also a strong implication of (2), that this category is not an especially good one. Perhaps also a suggestion of (3), that we would be better off without it. Talk about the child viewer is not exactly false, but it uses an inapt idea. It presupposes that there is a coherent object, the child viewer of television. Yes, we can collect data about watching television, ages, sex, parental status, shows, duration, attentiveness, school scores. These are not, however, very meaningful data: they are artifacts of a construction that we would be better off without, or so says the unmasker.

Once we have the phrase, the label, we get the notion that there is a definite kind of person, the child viewer, a species. This *kind* of person becomes reified. Some parents start to think of their children as child viewers, a special type of child (not just their kid who watches television). They start to interact, on occasion, with their children regarded not as their children but as child viewers. Since children are such self-aware creatures, they may become not only children who watch television, but, in their own self-consciousness, child viewers. They are well aware of theories about the child viewer and adapt to, react against, or reject them. Studies of the child viewer of television may have to be revised, because the objects of study, the human beings studied, have changed. That species, the Child Viewer, is not what it was, a collection of some children who watch television, but a collection that includes self-conscious child viewers.

Thus a social construction claim becomes complex. What is constructed is not only a certain classification, a certain kind of person, the child viewer. It is also children who, it might be argued, become socially constructed or reconstructed within the matrix. One of the reasons that social construction theses are so hard to nail down is that, in the phrase "the social construction of *X*," the *X* may implicitly refer to entities of different types, and the social construction may in part involve interaction between entities of the different types. In my example, the first reference of the *X* is a certain classification, or kind of person, the child viewer. A subsidiary reference may be children themselves, individual human beings. And yet not simply the children, but their ways of being children, Catherine-as-a-child-viewer-of-television. So you see that "the social construction of what?" need not have a single answer. That causes

a lot of problems in constructionist debates, People talk at cross purposes because they have different “whats” in mind. Yet it is precisely the interaction between different “whats” that makes the topic interesting.

And confusing, for there are lots of interactions. Consider one reason that the scholars at the 1997 World Congress on the child viewer suddenly acknowledged that children are not passive victims. It is because new technologies have made children interact with screens. Not just middle-class children with family PCs, but the poor in video arcades. Children’s relationships to screens change because of changes in the material world of manufacture and commerce. But they also change because of the way in which these phenomena are conceptualized.

There are many examples of this multi-leveled reference of the *X* in “the social construction of *X*.” It is plain in the case of gender. What is constructed? The idea of gendered human beings (an idea), and gendered human beings themselves (people); language; institutions; bodies. Above all, “the experiences of being female.” One great interest of gender studies is less how any one of these types of entity was constructed than how the constructions intertwine and interact, how people who have certain “essential” gender traits are the product of certain gendering institutions, language, practices, and how this determines their experiences of self.

In the case of the child viewer I may have stretched things to find more than one reference for the *X*; in the case of gender there are allusions to a great many different *X*s. What about the construction of Homosexual Culture? Are we being told about how the idea of there being such a culture, was constructed, or are we being told that the culture itself was constructed? In this case a social construction thesis will refer to both the idea of the culture and to the culture, if only because some idea of homosexual culture is at present part of homosexual culture.

#### WHY WHAT? FIRST SINNER, MYSELF

Why bother to distinguish ideas from objects, especially if many writers use one word, *X*, to refer to both objects of a certain sort and the sort itself, the idea under which the objects are thought about? Because idea and object are often confused. I have done it myself.

In *Rewriting the Soul* (Hacking 1995) I referred to a paper by a pediatrician titled “The Social Construction of Child Abuse” (Gelles 1975).

We have since had a book with that subtitle (Janko, 1994), and a thesis titled "The Social Construction of Child Neglect" (Marshall 1993), so this topic is still timely. In order to forestall tedious discussion about whether child abuse was socially constructed or real, I wrote that "it is a real evil, and it was so before the concept was constructed. It was nevertheless constructed. Neither reality nor construction should be in question" (Hacking 1995, 67f).<sup>15</sup>

What a terrible equivocation! What "it" is a real evil? The object, namely the behavior or practice of child abuse. What "it" is said to be socially constructed? The concept. My switch from object (child abuse) to idea (the concept of child abuse) is worse than careless. But not so fast. I thought, in retrospect, that I had been guilty of careless confusion, yet a number of people have told me how the very same passage has been helpful to them. It gave some readers a way to see that there need be no clash between construction and reality. We analytic philosophers should be humble, and acknowledge that what is confused is sometimes more useful than what has been clarified. We should diagnose this situation, and not evade it.

My diagnosis is that my error conceals the most difficult matter of all. As illustrated even by the child viewer of television, concepts, practices, and people interact with each other. Such interaction is often the very point of talk of social construction. My original plan for studying child abuse was largely motivated by an attempt to understand this type of interaction, which goes right back to my project of "making up people" (Hacking 1986). However, the fact that I was constantly aware of all that is no excuse. I still conflated two fundamentally different categories.

#### WHY WHAT? SECOND SINNER, STANLEY FISH

Directly after Sokal's notorious hoax and self-exposure, Fish sent an op-ed piece to *The New York Times*. He was at pains (in this respect like me, alas) to urge that something can be both socially constructed and real. Hence (urged Fish) when the social constructionists are taken to say that quarks are social constructions, that is perfectly consistent with saying that quarks are real, so why should Sokal get into a tizzy?

Fish argued his case by saying that baseball is a social construction. He took as his example balls and strikes.<sup>16</sup> "Are balls and strikes socially constructed?" he asked, "Yes. Are balls and strikes real? Yes." Fish may

have meant to say that the idea of what a strike is, is a social product. If he had used Searle's terminology, he might have said that strikes are epistemologically objective: whether or not someone struck out is an objective fact. ("Kill the ump!" you cry, because you think the umpire made an objectively wrong decision.) But strikes are ontologically subjective. There would be no strikes without the institution of baseball, without the rules and practices of people.

Fish wanted to aid his allies, but did nothing but harm. Balls and strikes are real *and* socially constructed, he wrote. Analogously, he was arguing, quarks are real *and* socially constructed. So what are Sokal and company so upset about? Unfortunately for Fish, the situation with quarks is fundamentally different from that for strikes. Strikes are quite self-evidently ontologically subjective. Without human rules and practices, no balls, no strikes, no errors. Quarks are not self-evidently ontologically subjective. The shortlived quarks (if there are any) are all over the place, quite independently of any human rules or institutions. Someone may be a universal constructionist, in which case quarks, strikes, and all things are socially constructed, but you cannot just say "quarks are like strikes, both real and constructed." How might Fish have argued his case?

Perhaps it is the idea of quarks, rather than quarks, which is the social construction. Both the process of discovering quarks and the product, the concept of the quark and its physical applications, interest historians of science. Likewise for ideas of, and the theory behind, Maxwell's Equations, the Second Law of Thermodynamics, the velocity of light, and the classification of dolomite as a significant variant of limestone. All these ideas have histories, as does any idea, and they have different types of history, including social histories. But quarks, the objects themselves, are not constructs, are not social, and are not historical.

I am taking some liberties here, which I will correct in Chapter 3. Andrew Pickering's *Constructing Quarks* (1986) is the only systematic social construction work about quarks. I would trivialize its central themes if I tried to turn it into a mere social and material history of the idea of the quark. Not surprisingly, Pickering wrote, in a letter of 6 June 1997: "I would never say that *Constructing Quarks* is about 'the idea of quarks.' That may be your take on constructionism re the natural sciences, but it is not mine. My idea is that if one comes at the world in a certain way—your heterogeneous matrix—one can elicit certain phenomena that can be construed as evidence for quarks."

The problem with that final sentence is, who would disagree with it? Pickering's interesting claim is a converse of what he wrote: if you came at the world in another way, you could elicit other phenomena that could be construed as evidence for a different (not formally incompatible, but different) successful physics. Pickering holds that the evolution of physics, including the quark idea, is thoroughly contingent and could have evolved in other ways, although subject to very different types of resistance than, say, the conservatism of ballplayers.

Most physicists, in contrast, think that the quark solution was inevitable. They are pretty sure that longstanding parts of physics were inevitable. There is a significant point at issue here, which Fish's inept conciliation conceals. In Chapter 3 I call this disagreement about contingency "sticking point #1" in the science wars. Far from wanting to sweep it under the carpet, I want to make it a central piece of furniture in the parlor of debate. Unlike Stanley Fish, I do not want peace between constructionist and scientist. I want a better understanding of how they disagree, and why, perhaps, the twain shall never meet.

## INTERACTIONS

We have seen how some objects and ideas may interact. The idea of the child viewer of television interacts with the child viewer. Ways of classifying human beings interact with the human beings who are classified. There are all sorts of reasons for this. People think of themselves as of a kind, perhaps, or reject the classification. All our acts are under descriptions, and the acts that are open to us depend, in a purely formal way, on the descriptions available to us. Moreover, classifications do not exist only in the empty space of language but in institutions, practices, material interactions with things and other people. The woman refugee—that kind or "species" of person, not the person—is not only a kind of person. It is a legal entity, and more importantly a paralegal one, used by boards, schools, social workers, activists—and refugees. Only within such a matrix could there be serious interaction between the "kind" of person and people who may be of that kind.

Interactions do not just happen. They happen within matrices, which include many obvious social elements and many obvious material ones. Nevertheless, a first and simplistic observation seems uncontroversial. It stems from the almost-too-boring-to-state fact that people are aware of what is said about them, thought about them, done to them. They think

about and conceptualize themselves. Inanimate things are, by definition, not aware of themselves in the same way. Take the extremes, women refugees and quarks. A woman refugee may learn that she is a certain kind of person and act accordingly. Quarks do not learn that they are a certain kind of entity and act accordingly. But I do not want to overemphasize the awareness of an individual. Women refugees who do not speak one word of English may still, as part of a group, acquire the characteristics of women refugees precisely because they are so classified.

The "woman refugee" (as a kind of classification) can be called an *interactive kind* because it interacts with things of that kind, namely people, including individual women refugees, who can become aware of how they are classified and modify their behavior accordingly. Quarks in contrast do not form an interactive kind; the idea of the quark does not interact with quarks. Quarks are not aware that they are quarks and are not altered simply by being classified as quarks. There are plenty of questions about this distinction, but it is basic. Some version of it forms a fundamental difference between the natural and the social sciences. The classifications of the social sciences are interactive. The classifications and concepts of the natural sciences are not. In the social sciences there are conscious interactions between kind and person. There are no interactions of the same type in the natural sciences. It is not surprising that the ways in which constructionist issues arise in the natural sciences differ from questions about construction in human affairs. I shall now pose two separate groups of questions: (1) those involving contingency, metaphysics, and stability; and (2) issues that are biological but still of the interactive kind.

## TWO QUESTION AREAS

The history of science tells of definite bench marks, established facts, discovered objects, secure laws, on the basis of which subsequent inquiry proceeds, at least for some substantial period of time. Physics establishes, with Rutherford, that the atom can be split; on we go, through quantum electrodynamics, weak neutral currents, gauge theory, quarks. The Higgs boson and the lepto-quark lurk tantalizingly in the future, one predicted by theory, the other a refutation of it.

A social construction thesis for the natural sciences would hold that, in a thoroughly nontrivial sense, a successful science did not have to develop in the way it did, but could have had different successes evol-

ing in other ways that do not converge on the route that was in fact taken. Neither a prior set of bench marks nor the world itself determines what will be the next set of bench marks in high-energy physics or any other field of inquiry. I myself find this idea hard to state, let alone to believe. One question, worthy of discussion, is how should we state the idea implicit in Pickering's work, in order to make it at least intelligible to those who are skeptical of it? Then comes the question of whether it is a good idea, a true idea, a plausible idea, a useful perspective.

If contingency is the first sticking point, the second one is more metaphysical. Constructionists tend to maintain that classifications are not determined by how the world is, but are convenient ways in which to represent it. They maintain that the world does not come quietly wrapped up in facts. Facts are the consequences of ways in which we represent the world. The constructionist vision here is splendidly old-fashioned. It is a species of nominalism. It is countered by a strong sense that the world has an inherent structure that we discover.

The third sticking point is the question of stability. Contrary to the themes of Karl Popper and Thomas Kuhn, namely refutation and revolution, a great deal of modern science is stable. Maxwell's Equations, the Second Law of Thermodynamics, the velocity of light, and lowly substances such as dolomite are here to stay. Scientists think that the stability is the consequence of compelling evidence. Constructionists think that stability results from factors external to the overt content of the science. This makes for the third sticking point, internal versus external explanations of stability.

Each of these three sticking points is the basis of genuine and fundamental disagreement. Each is logically independent of the others. Moreover, each can be stated without using elevator words like "fact," "truth," or "reality," and without closely connected notions such as "objectivity" or "relativism." Let us try to stay as far as we can from those blunted lances with which philosophical mobs charge each other in the eternal jousting of ideas.

A second group of questions arises in human affairs rather than in the theoretical and experimental natural sciences. We have seen that very commonly, when people talk of the social construction of *X*, they have in mind several interacting items, all designated by *X*.

To return to my alphabetical list, many of the items, such as authorship or brotherhood, are built around kinds of people such as authors and brothers (in the sense of solidarity, not blood). *Author* and *brother*

are kinds of people, as are *child viewer* and *Zulu*. People of these kinds can become aware that they are classified as such. They can make tacit or even explicit choices, adapt or adopt ways of living so as to fit or get away from the very classification that may be applied to them. These very choices, adaptations or adoptions have consequences for the very group, for the kind of people that is invoked. The result may be particularly strong interactions. What was known about people of a kind may become false because people of that kind have changed in virtue of what they believe about themselves. I have called this phenomenon *the looping effect of human kinds* (Hacking 1995).

Looping effects are everywhere. Think what the category of genius did to those Romantics who saw themselves as geniuses, and what their behavior did in turn to the category of genius itself. Think about the transformations effected by the notions of fat, overweight, anorexic. If someone talks about the social construction of genius or anorexia, they are likely talking about the idea, the individuals falling under the idea, the interaction between the idea and the people, and the manifold of social practices and institutions that these interactions involve: the matrix, in short.