## Introduction

In 1831 Larrey envisioned the impending invasion of cholera in these terms:

The topographical situation of France is so advantageous that there is little to fear in this country from cholera morbus or any other pestilential epidemic.

... As for the plague's entering by way of our seaports, I find little probability of such an occurrence, particularly in the Atlantic ports, where sanitary measures have been so carefully observed that it would seem to me quite difficult for the disease to infiltrate our borders. And in any event, the disease would quickly be confined to the ports and treated with such success by rational medicine, known to all French physicians, that there need be no fear of its spreading to the interior....

Throughout France, the felicitous application that has been made since the Revolution of 1789 of rules of hygiene and health measures has redounded to the benefit of the country's inhabitants... All things considered, then, we may feel perfectly secure as to the danger of the invasion and spread of cholera morbus in France.

By contrast, recall that, so far as we know, the disease has proved devastating only in fetid, marshy areas in certain parts of Asia Minor, Russia, and Poland....

Today in no other country of the globe have civilization, industry, and commerce achieved a higher degree of perfection [than in France] and in no country but England are the rules of hygiene more faithfully observed. Cleanliness and above all sobriety, prophylactics against every sort of disease, are the leading traits of the French citizenry. . . .

Enlightenment has spread so widely through all classes of society that everyone is well aware of the precautions to be taken against the causes of disease: We are blessed with a superb and healthy population...

What country, moreover, is richer than ours in enlightened physicians who contribute so powerfully to the maintenance of public health?<sup>1</sup>

A few months later Michel Chevalier offered this account of a country in the grip of epidemic:

Should poisoning, pestilence, and death be the watchwords of the government of France, the world's premier nation?

... The admirable people of Paris, who are so heroically confronting the cholera of poverty, which in eighteen months has tripled the death rolls—the people of Paris were not made to serve as fodder for the cholera of Asia and to die like slaves in pain and terror.

There is one true protection against cholera; it is to remain, in the presence of this new and ubiquitous enemy, courageous and invincible.

There is, as I have suggested, an important lesson to be learned in the midst of public calamity: namely, that man is in part the author of his own destiny. For in the external world man may not always be master, capable of preventing nature from encroaching in ways often destructive to his own work; but he is almost always capable of stopping, and energetically repelling, these invasions of evil, by means of a moral reaction that stems from within...

One more step for France, and Europe will be in a position to teach the East that the sun has changed course and that henceforth day is dawning for the nations in the West of the old world....

Paris—that center of civilization and progress, a city where such vast resources are sacrificed on the altar of public welfare—should have demonstrated the power of the social state (*l'état social*) by triumphing over the most terrible scourge to afflict the human race. Instead, Paris has succumbed to this new invasion; the disease has proved more lethal here than elsewhere; and no quarter of this great city is nowadays so populous as its cemeteries.

What good, then, are all its hospitals, its doctors, its science, and its public administration? Are all the resources of civilization worthless? Is civilization incapable of compensating mankind for all the harm it has done through its laws, its institutions, its errors, and its injustices?

No: the blame should not be laid at the door of the social state itself. Instead, the finger of accusation should point at those who exploit the state and corrupt it, at those who see civilization merely as a more sophisticated servant of their luxury and pleasure, at those who view a great city as a factory in which all hands labor for their benefit and all space is arranged for their convenience.

The city is a city of palaces and hovels: a few splendid quarters with colonnades and huge gardens closed to the man in work clothes and, in the center of this sumptuous enclosure, a sewer of narrow streets and dark, unhealthy buildings, as dank as dungeons, where those who toil come to catch their breath in fetid air.

So, an epidemic arrives, preceded by cries of terror from two continents, and finds its prey ready-made, its victims huddled together and weak. It opens its charnel house in the artisans' district, whereupon the philanthrophists say that the public should take heart, for the scourge seems willing to claim as its victims only the ill-clad, ill-housed, and ill-fed, which is to say, the working people of Paris.<sup>2</sup>

Here, then, we have a utopian vision and an eyewitness account, separated by only a few months in time. Though both refer to the same event, the scenes they describe are quite different. One is serene and confident, the other a somber picture in words of what another contemporary, Daumier, captured in unforgettable pictorial images. At first sight these two texts are diametrically opposed. They speak of cholera, of the population, of public administration, of medicine, of science, and of policy. But their re-

spective attitudes toward the plague are very different. Larrey describes a people well informed about health issues, educated and cooperative. He holds the French system of public health to be such a paragon that the possibility of disaster does not even occur to him. For the nation is protected not only by a medical "police" but also by "rational medicine," whose forces can if necessary be swiftly mobilized to snuff out any disease. In the France of the Juste-Milieu [literally "happy medium," used to characterize the middle-of-the-road politics of the liberal monarchy of Louis-Philippe-Trans.] the standard of living is so satisfactory that Larrey feels justified in describing the populace as "superb and healthy." Hence the plague, he imagines, will simply pass over France without causing the slightest harm, without revealing the least flaw in the well-being of the public. By contrast, Michel Chevalier describes a society tormented and racked by harsh privations, a wretched populace oppressed by an exploitative ruling class, an impotent government, an ineffective public health system, and a medicine powerless to deal with the disease. Before the epidemic arrived Larrey believed that it would demonstrate that French society was secure and sound; afterward Michel Chevalier is equally certain that the epidemic has inflicted a hard lesson.

My point, however, is not to draw a contrast between the dreams of the liberal social imagination and the disastrous consequences of liberal social policies. Nor is it to call attention to the distance between Larrey's illusion of readiness and the actual incompetence of the government. Rather, my intention in juxtaposing these two passages is to make clear how similar they really are. For Larrey is after all merely describing a situation that Chevalier believes to be entirely within the realm of possibility. The difference is that Larrey believes what he is describing to be a state of affairs that actually exists, whereas Chevalier merely says that it *ought to exist:* "Paris...should have

demonstrated the power of the social state by triumphing over the most terrible scourge to afflict the human race." Larrey's main point, that French society has achieved such a degree of perfection as to be able to withstand the plague, brands him as a utopian of the same stripe as Chevalier, who insists that "one more step for France, and Europe will be in a position to teach the East that the sun has changed course and that henceforth day is dawning for the nations in the West of the old world." And finally, for us, there is an even deeper kinship between the two statements, in that Larrey's sets forth, before the fact, the normative lessons to be drawn from the catastrophe that Chevalier describes. There can be no doubt that disasters like the epidemic of 1832 had to occur before the countries of the West could make Larrey's visionary ideal an actual goal of policy.

We are concerned, then, with the period during which France, like so many other nations before it, confronted that great modern plague, cholera. We know what course the disease followed before reaching French frontiers. The initial outbreak occurred in India in 1826. From there the disease moved to Persia in 1829 and to Russia in 1830. It then continued its westward push, attacking Poland, Hungary, Prussia, Germany, Austria, and England in 1831. By the spring of 1832 it had reached Paris, where it killed 18,000 people in a population of 785,000.

It is tempting to assert right at the outset that cholera cannot be studied solely as a medical question. For is it not self-evident that questions of sociology, mentalities, and ideology must also be taken into account? Any society confronted with an epidemic will exhibit certain defensive reactions. Deadly disease evokes widespread fears, shaped in part by popular beliefs. In the case of cholera, faith in the superiority of Western values was shaken to such a degree that some people felt the need to defend the Western,

which is to say, the modern industrial, world, whence the involvement of ideology. These remarks, if true, suggest that any study of the cholera epidemic of 1832 ought to proceed along two parallel lines. First, find out what was known about the disease: What were the predisposing causes? What was known about pathogenesis? And above all, where did the disease come from and how did it spread? Pursuing this line of inquiry would lead us to consider three related topics: public health, medical theory in the strict sense, and epidemiology. At the same time we would also have to study the social response to the disease. Again, three major headings: the preventive measures adopted by more or less enlightened authorities; the violent reactions of the poor, which were quickly put down by the government; and the shrewd responses of administrators who, without denying the high mortality rate, managed to exculpate the government as well as "civilization" in general. To write the history of the 1832 epidemic in the manner just outlined would in fact be to ratify what one recent writer has proposed as the three principles of medical anthropology:

Disease in some form is a universal fact of human life.
All known human groups develop some set of *beliefs*, cognitions, and perceptions... for defining or cognizing disease.

3. All known human groups develop *methods* and allocate *roles*... for coping with or responding to disease.<sup>3</sup>

I see no useful purpose to be served by undertaking here to criticize these methodological presuppositions and to draw out their consequences. Let me simply put my own view as starkly as possible, to emphasize the contrast. I assert, to begin with, that "disease" does not exist. It is therefore illusory to think that one can "develop beliefs" about it or "respond" to it. What does exist is not disease but practices. In denying that "human groups develop some set of *beliefs, cognitions, and perceptions*... for defining or cognizing disease," I do not mean to deny that people did in fact attempt to determine the predisposing causes of cholera, to establish the pathology of the disease, and to explain its origin and propagation. I would simply make the following points:

1. Living conditions and other social factors were not seen as predisposing causes except in the context of a study that defined the specific living conditions of the working classes in terms of urban overcrowding and common habits of the poor.

2. Different schools of medicine classified cholera in different ways. Physiological medicine saw it as an acute form of gastroenteritis and hence as a consequence of inflammation. Experimental medicine—another form, if you will, of medical practice—saw the same set of symptoms as evidence of an affliction of the heart. And there were still other forms of medical practice: nervous pathology, for example, which classified cholera as a form of "neurosis," and humoral pathology, which defined it as an "alteration of the blood" or "general poisoning" (psorentery).

3. As a disease affecting large numbers of people, cholera was defined by some as "epidemic" (or "infectious") disease caused by a morbid agent acting on the respiratory or digestive membranes, while others believed that it was a "contagious" disease caused by a germ or virus that acted primarily on the skin.

Furthermore, in denying that "human groups develop *methods* and allocate *roles* . . . for coping with or responding to disease," I do not mean to deny that the government adopted various tactics for dealing with the plague, that the various social classes appointed officials to take charge of the situation, or that government administrators attempted to justify the devastation caused by the epidemic. I would simply make the following points:

1. The tactics employed to counter the epidemic or to reduce its virulence were adopted in response to issues that the government itself raised. It is banal to say that men attempted to cope with death by taking steps to prevent it. Rather than repeat such a banality, what we must do is to show how, in 1832, one class sought to control another, which it saw as powerless but potentially dangerous. How were traditional defensive measures against disease modified and implemented?

2. The violence of the population and the even more insidious violence of the authorities were merely continuations, or perceptible effects, of other responses to issues raised by both sides in the conflict. Not all of these issues were associated with the outbreak of the epidemic. Rather than make the hackneyed claim that in time of epidemic class hatreds are exacerbated, we must try to understand how violent attacks on physicians resulted from the widespread belief that the government was seeking to resolve the issue of unemployment by poisoning the unemployed. Medical personnel were simply viewed as the agents of the enemy. Conversely, the ruling class cast the working class as a threat to public welfare, as both carriers of disease and fomenters of riot. Accordingly, a system of vigilance was proposed that would protect society against both sedition and disease.

3. What was the purpose of the apologia that was made in behalf of Western civilization and the values of the Juste-Milieu? Let me say at once that it was not to respond to the political challenge posed by the (undeniably) high mortality rate. It is commonplace to say that the function of an ideology is to compensate a social class for what it does not have, or to portray what is in the interest of one social class as being in the interest of society in general. My point is different. What I want to show is that some people felt the need to justify the extremely high mortality rate among the poor of Paris by arguing that poverty is the consequence of barbarousness, while others claimed that it was the moral weakness, the irresponsibility, of the poor that contributed to the spread of cholera in impoverished areas.

In 1831 Larrey believed that cholera would not invade France. The reasons for his belief were clearly stated: they had to do with geography, geopolitics, and history. France enjoyed a unique topography and a healthy population and had eliminated the causes of disease from its cities. In spite of this belief, however, Larrey was not inclined to stand by idly. He discussed what health measures should be taken in the port cities and in Paris if a threat did arise. To establish quarantines and to clean up filthy areas was to diminish the risk of disease. Taken together, such measures constituted a policy of prevention, the result of recommendations by panels of leading experts from the Royal Academy of Medicine, for example, as well as commissions that had been sent abroad to investigate the epidemic in other countries. Two points are worth noting: cholera seemed to be a contagious disease because it followed major trade routes, and it had struck chiefly the poorest classes living in the filthiest sections of the city. The government therefore imposed quarantines in the ports, established "sanitary cordons" on the borders, and set up health committees in each district of the capital. When these preventive measures failed, it became necessary to manage the disease. The government sought to clean up filthy areas, assist the poor, and care for the sick, naturally at the lowest possible cost. It was also forced to deal with the panic triggered by disease and death.

Michel Chevalier protested that "poisoning, pestilence, and death" were the watchwords of the French govern-

ment. It is true that the malady was exploited politically by the government and by reactionary political factions. My purpose here, however, is not to try (or retry) the ruling class for its alleged crimes or to justify the behavior of the populace. I hope, rather, to describe the various meanings that different social classes attached to the epidemic and to show that these contrasting interpretations were actually variant forms of a single fear. At the level of fantasy, the epidemic was conceived as an instrument for settling social scores. The working class feared that it was being poisoned, while the privileged were afraid that they were being contaminated by lethal germs. One group feared the subversive activities of revolutionaries, the other ruthless murder by the ruling elite. Signs of this class antagonism included widespread suspicions on the part of the proletariat that food and beverages were tainted, that the government had sent agitators to stir up trouble, and ultimately that doctors were involved in the plot against the poor. The wealthy, on the other hand, believed that poor quarters of the city were tainted and that poor workers and even their own downstairs tenants and servants were spreading the disease. The doctors who attended at the bedside of Casimir Périer were seen as allies of power; the poor, who rioted at the funeral of General Lamarque, were seen as agents of subversion. The two names just mentioned clearly show what forces were in contention: Casimir Périer, the Restoration financier, champion of the banks and the Juste-Milieu, and General Lamarque, who embodied republican hopes. Périer's funeral procession passed with great pomp before the Stock Market and through the wealthy quarters, whereas Lamarque's was followed by a mob of political refugees, proletarians, and anarchists. It is simply a fact that issues of public health and disease prevention were inextricably associated with issues of wealth, public order, and the survival of the poorest.

Michel Chevalier was a good observer: "A city of palaces and hovels: a few splendid quarters with colonnades and huge gardens . . . and a sewer of narrow streets and dark, unhealthy buildings, as dank as dungeons, where those who toil come to catch their breath in fetid air. So, an epidemic arrives . . . and finds its prey ready-made, its victims huddled together and weak." Cholera's first victim was the pauper. But to see that this was so required a careful investigation. The Report on the Progress and Effects of Cholera Morbus in Paris (1834) clearly established that inequality with respect to death coincided with inequality with respect to life. This report was the first systematic and exhaustive study to focus on the theme of "living conditions," which was to become the central focus of public health discourse. The ravages of the epidemic pointed up shortcomings in urban design and demonstrated the urgent need for a new code of public health. The other salient fact about the cholera inquiry was its neglect of traditional Hippocratic theories. Climate and topography played virtually no role in the report, which delved into social factors in great detail. From this investigation emerged the idea that no fate is fixed for the masses. If many died as a result of calamities like the cholera epidemic, the fault lay primarily with defective institutions. Thus investigation of the epidemic led to political conclusions. We must be careful, though. The apparent politicization of medical discourse is in fact paradoxical. The revival of certain presumably outdated etiologies had the effect of imposing a new requirement on medical theory: to explain how social factors might contribute to disease.

Many hygienists moved from the analysis of living conditions to a philosophical critique of Western civilization. How did this happen? Before the epidemic had reached French borders Larrey drew a distinction between countries like France where "civilization" had attained "a high-

II

er degree of perfection" and "fetid, marshy areas in certain parts of Asia Minor." He obviously believed that the virtues of civilization repel the plague while the vices of barbarism afford it free passage. Oddly enough, the same distinction was invoked by the hygienists at the very moment when cholera was ravaging the people of Paris. Why? So that they could use the observed mortality rate as a justification of civilization. If cholera had proved less deadly than past plagues, one had the benefits of progress to thank. The claim, in other words, was that the death toll among the poor was not as bad as it might have been. But that toll was acknowledged, for example, by Michel Chevalier, who observed that the people of Paris had become "fodder for the cholera of Asia" and died "like slaves in pain and terror." Not only was the mortality of the poor acknowledged, it was also justified by an analogy: the working classes were to the privileged classes as India was to France. Within the bosom of French society the proletariat constituted another race-a singularly vulnerable race. Proof that this belief was indeed prevalent is contained, in part, in Chevalier's recommendations. To a nervous populace he suggests two preventive measures: "to remain, in the presence of this new and ubiquitous enemy, courageous and invincible" and to repel the evil by means of a "moral reaction." If the poor were decimated, it was because they failed to bring sufficient moral strength and force of character to the battle against the plague. The poor were not just poor, they were also pusillanimous and debauched. For hygienists this was reason enough for the high mortality rates in impoverished sections.

If cholera did come to France, Larrey believed that "the disease would quickly be confined to the ports and treated with such success by rational medicine . . . that there need be no fear of its spreading." In the moment of truth Michel Chevalier asked himself what was the good of medicine:

I 2

"No quarter of this great city is nowadays so populous as its cemeteries." There is no point in repeating what contemporaries and historians have already said, that medicine failed utterly to stem the tide of cholera in 1832. Does it follow that, because treatment of the disease was unsuccessful, the underlying medical theories were false or absurd? It is better, I think, to see what powerful ideas these theories contained along with much that was undoubtedly conjectural or adventitious. And there is another reason for looking at the way in which the medical profession confronted cholera in 1832: the epidemic mobilized medical thought. It offers what Jacques Piquemal has called a "snapshot" of medical practice, a glimpse of the physician at work. What is more, as Cruveilhier noted at the time, "Each physician seeks to explain this disease in terms of the doctrine that he himself has developed or adopted, and even to present it, on account of its seriousness, as proof of that doctrine."<sup>4</sup> Thus the attempt to elaborate a theory of cholera brought into play several of the dominant themes of early nineteenth-century medicine. As we shall see in what follows, the cholera epidemic highlights a necessary stage in the epistemological development of scientific knowledge.

When Larrey distinguishes between "sanitary measures" (*mesures sanitaires*) and "health measures" (*mesures de salubrité*) he is alluding to the two distinct medical theories that were used to justify these two distinct tactics of defense. His mention of the "sanitary measures . . . so carefully observed" in the seaports reminds us that 1832 was a landmark year for quarantines. By the "enlightened physicians who contribute so powerfully to the maintenance of public health," Larrey means the physiologists. "Sanitary measures" were directed against contagion (i.e., the principle that disease is spread by direct contact with the body of an affected person) and "health measures" against infec-

tion (i.e., the principle that disease is spread through the air or by other distant means). There can be no doubt that the epidemic of 1832 seemed to lend credence to the theory of infection and to contradict the theory of contagion. For cholera was able to leap over "sanitary cordons" and thereby to demonstrate its infectious nature, or so it was felt. It is significant, for example, that the anticontagionist Chervin was unanimously elected to the Royal Academy of Medicine. At the same time the Society for the Propagation of the Idea that Cholera Morbus Is a Contagious Disease, proposed by Pariset, was dissolved before it could hold a single meeting. Every textbook of the history of medicine repeats the assertion that the conflict between infectionists and contagionists was one of the most vehement disputes in medical annals. But in this conflict most historians see only the transfer to the medical arena of preexisting political differences. The contagion theory, we are told, was the tool of a conservative and despotic government, whereas the infection theory appealed to liberals and progressives. In reality, "high politics" had very little bearing on the debate as to the nature of epidemics and the proposed revision of the public health code. But the cholera epidemic of 1832 did have an important impact on these matters.

14