Action orientation	Freedom	Responsibility
Altruism	Harmony	Risk taking
Authority	Helpfulness	Security
Compassion	Honesty/Integrity	Self-discipline
Competence	Honor	Status
Conformity	Humility	Success
Creativity	Initiative	Teamwork
Customer satisfaction	Innovation	Tradition
Diversity	Moderation	Wealth
Equality	Novelty	Winning
Excitement	Obedience	
Experimentation	Order	
Fairness/Justice	Power	
Family well-being	Promise keeping	
Flexibility/adaptability	Respect	

Introducing the Pinto Fires Case. Next, you're going to read a case that chronicles an event that took place over 30 years ago. You may ask, why study such an old case? We study this case because it is extremely important in American business history. In 2005, *Fortune Magazine* called it one of the 20 business decisions that "helped create the business world as it is today"²⁵ According to *Fortune*, the case and ensuing legal battles contributed to the development of consumer activism as well as to the consumer protections and class action lawsuits that we now take for granted. We have also seen aspects of the case play out in product safety cases that have arisen more recently, including Ford Explorer rollovers after Firestone tire failures, a case that was settled in 2001.

CASE		
PINTO FIRES		

by Dennis A. Gioia (used with permission)

On August 10, 1978, three teenage girls died horribly in an automobile accident. Driving a 1973 Ford Pinto to their church volleyball practice in Goshen, Indiana, they were struck from behind by a Chevrolet van. The Pinto's fuel tank ruptured and the car exploded in flames. Two passengers, Lynn Marie Ulrich, 16, and her cousin, Donna Ulrich, 18, were trapped inside the inferno and burned to death. After three attempts, Lynn Marie's sister, 18-year-old Judy Ann, was dragged out alive from the driver's seat, but died in agony hours later in the hospital.

They were merely the latest in a long list of people to burn to death in accidents involving the Pinto, which Ford had begun selling in 1970. By the time of the accident, the car had been the subject of a great deal of public outcry and debate about its safety, especially its susceptibility to fire in low-speed rear-end collisions. This particular accident, however, resulted in more media attention than any other auto accident in U.S. history. Why? Because it led to an unprecedented court case in which the prosecution brought charges of reckless homicide against the Ford Motor Co.—the first time that a corporation had been charged with criminal conduct, and the charge was not negligence but murder. At stake was much more than the maximum penalty of \$30,000 in fines. Of immediate concern, a guilty verdict could have affected 40 pending civil cases nationwide and resulted in hundreds of millions of dollars in punitive damage awards. Of perhaps greater concern, however, were larger issues involving corporate social responsibility, ethical decision making by individuals within corporations, and ultimately, the proper conduct of business in the modern era.

How did Ford get into this situation? The chronology begins in early 1968 when the decision was made to battle the foreign competition in the small car market, specifically the Germans, but also the growing threat from the Japanese. This decision came after a hard-fought, two-year internal struggle between then-president Semon "Bunky" Knudsen and Lee Iacocca, who had risen quickly within the company because of his success with the Mustang. Iacocca strongly supported fighting the competition at their own game, while Knudsen argued instead for letting them have the small car market so Ford could concentrate on the more profitable medium and large models. The final decision ultimately was in the hands of then-CEO Henry Ford II, who not only agreed with Iacocca but also promoted him to president after Knudsen's subsequent forced resignation.

Iacocca wanted the Pinto in the showrooms by the 1971 model introductions, which would require the shortest production planning period in automotive history to that time. The typical time span from conception to production of a new car was more than three and a half years; Iacocca, however, wanted to launch the Pinto in just over two years. Under normal conditions, chassis design, styling, product planning, advance engineering, component testing, and so on were all either completed or nearly completed prior to tooling of the production factories. Yet, because tooling had a fixed time frame of about 18 months, some of these other processes were done more or less concurrently. As a consequence, when it was discovered through crash testing that the Pinto's fuel tank often ruptured during rear-end impact, it was too late (in other words, too costly) to do much about it in terms of redesign.

A closer look at the crash-test reports reveals that Ford was aware of faulty fuel tank design. Eleven Pintos were subjected to rear-end collisions with a barrier at average speeds of 31 miles per hour to determine if any fuel would be lost after impact. All eight of the Pintos equipped with the standard fuel tank failed. The three remaining cars, however, survived the test because special measures had been taken to prevent tank rupture or fuel leakage. These measures included a plastic baffle placed between the axle housing and the gas tank, a steel plate between the tank and the rear bumper, and a rubber lining in the gas tank.

It should be noted that these tests were done under guidelines established by Federal Motor Vehicle Safety Standard 301, which was proposed in 1968 by the National Highway Traffic Safety Administration (NHTSA), but not officially adopted until the 1977 model year. Therefore, at the time of the tests, the Pinto met the required standards. Standard 301 had been strenuously opposed by the auto industry, and specifically Ford Motor Co. In fact, the lobbying efforts were so strong that negotiations continued until 1976, despite studies showing that hundreds of thousands of cars burned every year, taking 3,000 lives annually; the adoption of the standard was projected to reduce the death rate by 40 percent. Upon approval of Standard 301 in 1977, all Pintos were provided with a rupture-proof fuel tank design.

But for the Pinto's 1971 debut, Ford decided to go with its original gas tank design despite the crash-test results. Because the typical Pinto buyer was assumed to be extremely price conscious, Iacocca set an important goal known as "the limits of 2,000": the Pinto could not cost more than \$2,000 and could not weigh more than \$2,000 pounds. Thus, to be competitive with foreign manufacturers, Ford felt it could not spend any money on improving the gas tank. Besides, during the late 1960s and early 1970s, American consumers demonstrated little concern for safety, so it was not considered good business sense to promote it. Iacocca echoed these sentiments when he said time and time again "Safety doesn't sell," a lesson he had learned after a failed attempt to add costly safety features to 1950s Fords.

Ford had experimented with placing the gas tank in different locations, but all alternatives reduced usable trunk space. A design similar to that of the Ford Capri was successful in many crash tests at speeds over 50 miles per hour, but Ford felt that lost trunk space would hurt sales too much. One Ford engineer, when asked about the dangerous gas tank said, "Safety isn't the issue, trunk space is. You have no idea how stiff the competition is over trunk space. Do you realize that if we put a Capri-type tank in the Pinto, you could only get one set of golf clubs in the trunk?"

The last of Ford's reasons for not making adjustments to the fuel tank design, however, was unquestionably the most controversial. After strong lobbying efforts, Ford and the auto industry in general convinced NHTSA regulators that cost/benefit analysis would be an appropriate basis for determining the feasibility of safety design standards. Such an analysis, however, required the assignment of a value for a human life. A prior study had concluded that every time someone died in an auto accident there was an estimated "cost to society" of \$200,725 (detailed in Table 1: What's Your Life Worth?).¹

Having this value in hand, Ford calculated the cost of adding an \$11 gas tank improvement versus the benefits of the projected 180 lives that would be saved (via an internal memo entitled "Fatalities Associated with Crash-Induced Fuel Leakage and Fires"). This is presented in Table 2: The Cost of Dying in a Pinto.² As is demonstrated, the costs outweigh the benefits by almost three times. Thus, the cost/benefit analysis indicated that no improvements to the gas tanks were warranted.

Ford decided to go ahead with normal production plans, but the Pinto's problems soon surfaced. By early 1973, Ford's recall coordinator received field reports

¹ M. Dowie, "How Ford Put Two Million Fire Traps on Wheels," *Business and Society Review* 23 (1977): 51–55.

² Ibid.

Table 1 What's Your Life Worth?

The chart below, from a 1971 study by the National Highway Traffic Safety Administration, is a breakdown of the estimated cost to society every time someone is killed in a car accident. The Ford Motor Company used the \$200,725 total figure in its own cost-benefit analysis.

Component	1971 Costs	5
Future productivity losses		
Direct	\$132,300	
Indirect	41,000	
Medical costs		
Hospital	700	
Other	425	
Property damage	1,500	
Insurance administration	4,700	
Legal and court	3,000	
Employer losses	1,000	
Victim's pain and suffering	10,000	
Funeral	900	
Assets (lost consumption)	5,000	
Miscellaneous accident cost	200	
Total per fatality	\$200,725	

suggesting that Pintos were susceptible to "exploding" in rear-end collisions at very low speeds (under 25 miles per hour). Reports continued to indicate a similar trend in subsequent years, but no recall was initiated despite the mounting evidence. At every internal review, those responsible decided not to recall the Pinto.

Prior to the Indiana accident, the most publicized case concerning the Pinto's gas tank was that of Richard Grimshaw. In 1972, Richard, then 13, was riding with a

Table 2 The Cost of Dying in a Pinto

These figures are from a Ford Motor Co. internal memorandum on the benefits and costs of an \$11 safety improvement (applicable to all vehicles with similar gas tank designs) that would have made the Pinto less likely to burn.

Benefits

Savings: 180 burn deaths, 180 serious burn injuries, 2,100 burned vehicles Unit Cost: \$200,000 per death, \$67,000 per injury, \$700 per vehicle Total Benefit: $(180 \times 200,000) + (180 \times 67,000) + (2,100 \times 700) = 49.5$ million **Costs** Sales: 11 million cars, 1.5 million light trucks Unit Cost: \$11 per car, \$11 per truck Total Cost: $(11,000,000 \times 11) + (1,500,000 \times 11) = 137.5$ million neighbor on a road near San Bernardino, California, when they were hit from the rear. The Pinto's gas tank ruptured, causing the car to burst into flames. The neighbor was burned to death in a crash that would have been survivable if there had been no fire. Richard suffered third-degree burns over 90 percent of his body and subsequently underwent more than 60 operations, with only limited success. A civil suit was settled in February 1978, when a jury awarded a judgment of over \$125 million against Ford, most of which consisted of punitive damages (later reduced to \$6 million by a judge who nonetheless accused Ford of "callous indifference to human life"). This judgment was based on convincing evidence that Ford chose not to spend the \$11 per car to correct the faults in the Pinto gas tanks that its own crash testing had revealed.

The Pinto sold well until the media called special attention to the Pinto fuel tank story. As a consequence, in June 1978, in the face of pressure from the media, the government, pending court cases, and the potential loss of future sales, Ford ordered a complete recall of all 1.5 million Pintos built between 1970 and 1976. During the 1980 Indiana trial that resulted from the fatal accident of 1978, differing views continued to be expressed about the Pinto fires case. Ford representatives argued that companies must make cost/benefit decisions all the time. They claimed that it is an essential part of business, and even though everyone knows that some people will die in auto accidents, buyers want costs held down; therefore, people implicitly accept risks when buying cars.

In a scathing article accusing Ford of criminally mismanaging the Pinto problem, investigative reporter Mark Dowie framed the case in a different and rather more sensational way, with this often-quoted speculation: "One wonders how long the Ford Motor Company would continue to market lethal cars were Henry Ford II and Lee Iacocca serving twenty-year terms in Leavenworth for consumer homicide."³

Case Questions

- 1. Put yourself in the role of the recall coordinator for Ford Motor Co. It's 1973, and field reports have been coming in about rear-end collisions, fires, and fatalities. You must decide whether to recall the automobile.
 - a. Identify the relevant facts.
 - b. Identify the pertinent ethical issues and points of ethical conflict.
 - c. Identify the relevant affected parties.
 - d. Identify the possible consequences of alternative courses of action.
 - e. Identify relevant obligations.
 - **f.** Identify your relevant community standards that should guide you as a person of integrity.
 - g. Check your gut.

What will you decide?

³ M. Dowie, "How Ford Put Two Million Fire Traps on Wheels," *Business and Society Review* 23 (1977): 51–55.