CHAPTER 3
Pig in the Pipeline

SOMEWHERE, USA

"They threatened me. Last night I got a call and they threatened me. If I talked."

Oh shit oh no oh my God *how did they find out* damn it but *please please tell me you're still getting on the plane.*

"But I'm still getting on the plane."

Dear Lord, I take back everything I've said about You this week.

It was Pig Man #1. We met somewhere in the USA. I forget where.

In a darkened room—not a hotel, no receipts to track—Rick wired him up, put a blinding light behind him to leave his face only a talking shadow with nervous hands.

"Wow," said Pig Man. "I feel like I'm in the CIA." Rick said, not thinking, "The last guy I filmed was CIA. In Afghanistan."

Pig Man asked, "What happened to him?" We changed the topic to the lighting. Pig Man wanted to take a souvenir photo of me on his own cell phone,

nothing that will transmit via computer. Director James said, "Absolutely no!" We went through the motions of ultra-security although the company knows who he is, knows who I am, and we know they know it. But we didn't like to think about that.

Pig Man told me again about the marvelous machine, the Pipeline Inspection Gauge, the way it could chug through a pipeline, leashed to a GPS, sending out beeps and boops. An elaborate and expensive software program trans- lated PIG-ese into colored charts that marked spots of

dangerous corrosion, bad cracks, or other dangers. The law requires it, so BP bought the software, and uses it.

Or *maybe* BP used it. But if BP did run the PIG through the Alaska Pipe- line, shouldn't it have caught the corrosion that led to the 2006 explosion, to the Prudhoe Bay spill disaster? Yes, he said, absolutely. The PIG would have caught it in advance.

But only, he added, if errors in the program were corrected.

Was it corrected?

"My team corrected it. I was part of a team, corrected the error."

His team even did it on their own time. They were very proud that they had found the problem and did the difficult reprogramming to conform the software to the sensitivities required by federal law. I know Americans love to hate bureaucrats with their thick rule books, but if you lived on top of a pipe- line (and several million of you do), all I can say is, *the thicker the better.*

Up until his team's fix, BP's robo-pigs were fugitives from the law. Now he could make them law-abiding porkers, conformed to the rules. The geeks proudly showed the correction to their supervisor.

They were fired.

Not immediately, though. First, the supervisor tried to explain the difficulties of the fix: "The exact phrase that he used was, 'This is not going to make a lot of people happy.'"

Why?

"He said that if we release the software with the fix that we could potentially lose sales."

The company would lose sales if their customers found out their software actually worked?

Exactly.

The oil and gas companies, BP among them, preferred the error to remain in the program, in violation of the law?

"The consequence of fixing the software would be that the client using the software would now have additional costs. . . . That pipeline operator would need to apply fixes to a greater number of pipeline segments, they would have to do more re-routes, which are expensive."

Expensive is an understatement. Each ten-mile re-route could easily cost $100 million, $200 million.

The company told Pig Man's crew, "The people we are selling the soft- ware to, pipeline operators, BP, if they were to see that, overnight, they have more problems to deal with, they have larger segments, they have segments that are now classified as higher risk, they would not be so inclined to purchase the software. So they made a business decision."

Their fix to the software would never leave that office. And the guys who did the fix, only three months into a one-year contract, were terminated.

Were you told not to make it public?

"Yes."

He'd been a little nervous to this point, now he was big nervous.

"We had to sign nondisclosure agreements."

They were required to conceal "any problems of this sort or the nature of the software we worked." It could not "be made public at all. Under threat of lawsuit." Nice.

But maybe the company was just kidding, and the nondisclosure agreement was just a formality. Maybe he had nothing to fear.

No. He got a call.

"People who worked at the company, they informed me that if I were to speak publicly about this, I would be sued."

The question was, how did they know he was talking to me? I had the answer: It was my fault.

Good little reporter that I am, I simply could not accept Pig Man's word without corroboration. Literally millions of dollars hung in the balance and, we soon learned, some burnt corpses to account for.

So I approached one of his coworkers, who verified everything and even agreed to go on camera. But a couple of weeks later, Pig Man #2 panicked and ran. It was just after September 9, 2010, when a pipeline blew in California; eight dead. Some people blew apart instantly, some burnt slowly. I know: I've been there, years back, when I was an investigator. I discovered that the giant energy corporation called Peoples Gas that moved natural gas from the Gulf of Mexico into Chicago had been warned by engineers to fix a dangerous pipe- line design. The company decided it was cheaper to wait and pay for the coffins. After eighteen people burnt up, they apologized. They paid out a few bucks, including my fee.

The September 9 pipeline explosion meant the stakes were getting higher. To protect himself and his own career, Pig Man #2 ratted out Pig Man #1.

"I was threatened," Pig Man #1 repeated on tape, speaking calmly now, with a resignation to the consequences. "A person can be—can be made silent, can be made bankrupt by this power that they hold. Any person that speaks out against the pipeline companies puts a lot at risk, puts a lot . . ."

He trailed off, talking about what could befall "someone." Needless to say, the "someone" was him.

My only justification for printing and filming his story, and jeopardizing this good man further, beyond the feeble thread of "the public interest," is that I can offer Pig Man a bit of protection. *Dear Pig Man employer: I have a much bigger file than I am spilling here. Any*

company that dares to go after Pig Man #1 will have much to lose. Capisce? If Pig Man is touched: I know who you are, I know where you operate, and I know what you've done.

You notice I have not named BP's software provider—because it's not about a bad apple, it's about an industry rotten from branch to root.

And BP itself? They have plausible deniability. The oil giant could say, like Mr. Gambino, "I didn't know that Big Louie off'd Jimmy the Skunk."

But deniability isn't plausible—because, as Holmes would say, "the dog didn't bark." When the pipe busted in 2006, why didn't BP bark, bite, and sue its software designers? After all, the failure to find the corrosion problem cost the oil company tens of millions.

Here's why: Because the software firm could turn around, "discover" their "accidental" error, and hand it to BP: The total cost of repairs and re- routes to the industry would run into t*ens of billions of dollars*.

Or the software maker could ask BP when the pig was run. Was it run at all? Where's the data? It costs a million dollars a mile to run a diagnostic pig test. Cheaper to keep them locked in that giant metal PIG-pen in Prudhoe, eh, BP?

Omerta, then, is the wise course both in The Mob and in the Oil Patch.
But now I was curious: Why Pig Man #1? Why now? How come he didn't run away squealing in fear like Pig Man #2?

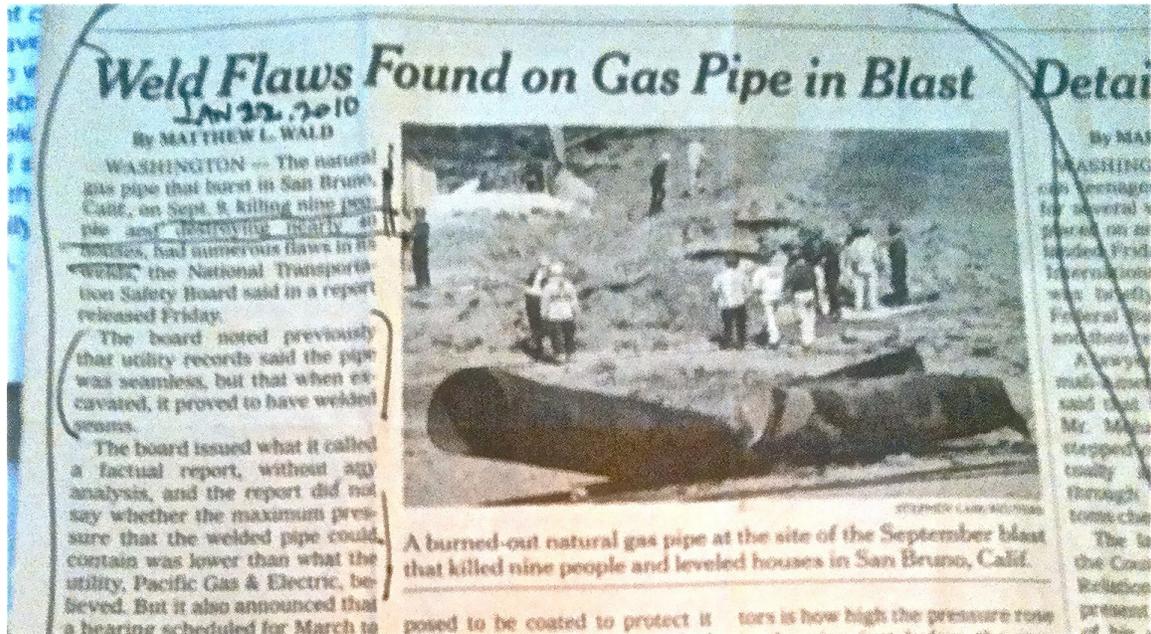He sent the note that got us all hot after he read my story about BP's Prudhoe pipe burst.

Before that, he thought of the coding episode as a professional disagreement, the bottom-line guys stomping on the expert. But reading the Prudhoe story, he realized, that, "This stuff had real-world consequences."

Before that, Pig Man #1 stayed *schtum* for years. Still, when I first approached him, he said "no way" to filming, even in shadow. Something then changed his mind, made him volunteer to put his ass on the line. It was the California pipeline blowup. The eight dead. It finally struck him: "People die."

> "I was very disconnected from the real impact that such work has on the general public and people. And so when seeing the explosion . . . it made a direct link between inaccuracies in software that *result in death. . . .*"

His corporate mask had slipped when the photo of the burnt houses hit the front pages.

Weld Flaws Found on Gas Pipe in Blast

By MATTHEW L. WALD

WASHINGTON — The natural gas pipe that burst in San Bruno, Calif., on Sept. 9, killing nine people and destroying nearly 40 houses, had numerous flaws in its welds, the National Transportation Safety Board said in a report released Friday.

The board noted previously that utility records said the pipe was seamless, but that when excavated, it proved to have welded seams.

The board issued what it called a factual report, without any analysis, and the report did not say whether the maximum pressure that the welded pipe could contain was lower than what the utility, Pacific Gas & Electric, believed. But it also announced that a hearing scheduled for March to

A burned-out natural gas pipe at the site of the September blast that killed nine people and leveled houses in San Bruno, Calif.

It turns out, the California company whose pipes blew, PG&E, had bad welds holding together a thirty-inch-diameter pipe that wasn't supposed to have welds at all. A PIG, honestly programmed, could have picked that up easily.

Pig Man #2 saw the same photos, and it caused him to run away. So, what pushed #1 to be a fool to courage?

I took a guess and asked him about the genesis of his soul. "Tell me about your dad."

His father, he said, was one of the first people in the industry to use computers to analyze pipeline flow and conditions. His dad was one of the men who *invented* the Smart PIG.

"I talked to my father before I came down here." Of course he did.

"He thought I'm doing the right thing."

Of course he did.