## San Francisco Chronicle - PG&E engineers warned of spending cuts

Engineers warned execs about safety concerns

By Jaxon Van Derbeken, April 15

Pacific Gas and Electric Co. management slashed spending for inspections and gas pipeline maintenance so deeply in the three years before the 2010 San Bruno explosion that company engineers warned executives they were possibly endangering the public and risking state fines, newly released documents show.

The previously confidential PG&E memos and e-mails were made public as part of legal hearings into whether the company will be fined as much as \$2.5 billion for state regulatory violations connected to the Sept. 9, 2010, explosion of a gas-transmission pipeline that killed eight people and destroyed 38 homes.

Lawyers for the California Public Utilities Commission told two administrative law judges overseeing the hearings that the documents paint a "stark and disturbing portrait" of how PG&E "ignored the professional recommendations of its own engineers and systematically reduced" the engineers' spending proposals for gas-line inspections and maintenance.

The lawyers for the commission's ratepayer watchdog arm said the documents showed that "PG&E top management repeatedly and inexplicably reduced" spending and "expressed no concern for the actual safety of PG&E's gas transmission system."

PG&E lawyers have responded that although it's possible the company should have spent more on its gas system, executives' budget decisions didn't amount to wrongdoing.

From 2007 through 2010, the documents show, PG&E executives slashed more than \$50 million from company engineers' spending proposals. In most cases, the authors of the confidential documents

about the spending were not identified or their names were redacted.

In one planning document, engineers objected to cuts in training and staffing for gas transmission system operators and controllers. The performance and training of those operators were faulted in the federal investigation into the San Bruno disaster.

Planned cuts in training, PG&E gas system engineers warned in 2009, could lead to "operator errors, which can impact system reliability and safety."

'Spending reduction'

Another document, a PG&E report on gas transmission expenses in July 2009, laid out the challenges to the company's "2010 spending reduction plan." Among them was managing "pipeline reliability while not doing preventative and corrective projects," according to the report, written by engineers with PG&E's gas transmission and distribution division.

PG&E began its cost-cutting campaign in 2007, overriding gas engineers' warnings that the reductions would undermine "many high-priority reliability projects."

Over the next three years, PG&E executives steadily cut proposed budgets for inspection and maintenance of gas lines - even dropping membership in gas trade organizations. In 2008 alone, the company reduced by half the spending levels for maintenance that gas transmission engineers had proposed.

PG&E had begun cutting the workforce assigned to gas transmission lines long before 2007, the documents show. From 1998 to 2010, staffing levels went from 302 employees to about 220.

In 2007, PG&E management budgeted \$13.4 million for maintenance projects for 2008, just over half of the \$25.2 million that gas transmission engineers sought.

Safety warnings

The engineers warned PG&E executives that such cuts would mean killing important projects, which they said would "likely lead to poor pipeline and storage reliability" and risk "potential fines."

"In some cases, not completing projects may lead to employee and public safety issues," the document concluded.

When PG&E's gas engineers went \$6.3 million over budget in 2009 to deal with gas-line emergencies, the company responded by ordering more cuts the next year.

PG&E was so understaffed in the three year period that it wasn't repairing 40 percent of leaks that inspectors found in gas-transmission lines, company documents show. And in emergency surveys done after the San Bruno disaster, PG&E found dozens of leaks that had to be repaired.

PG&E's campaign culminated in November 2009, when it outlined its "Reduce Pipeline Project Work" program for 2010. The stated goal was to delay any work not required by law or by contractual obligation until "2011 or beyond."

The plan carried some risk of pipeline failure, the authors noted, but they downplayed that possibility.

2010 blast

That was less than a year before a 30-inch transmission line under San Bruno's Crestmoor neighborhood ruptured at a flawed weld and exploded. Investigators later found that PG&E had not conducted the type of inspections that might have discovered the problem weld.

PG&E has also acknowledged that it lacked records and accurate information on hundreds of miles of its gas system. The company has embarked on a \$2.5 billion program to test with high pressure water or replace nearly 1,000 miles of pipeline it can't prove are safe.

In filings with the administrative law judges considering the potential fines, PG&E has denied any wrongdoing in cutting inspection and maintenance budgets before the San Bruno blast.

"While in hindsight one might argue that PG&E ought to have invested more in the gas transmission system, that does not mean that PG&E's officers and managers at the time were more concerned about financial performance than safety," the company said.