

BEFORE THE
STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

In the Matter of
Consolidated Edison Company of New York, Inc.
Case 07-S-1315
February 2008

Prepared Testimony of:

SAFETY PANEL

Joseph F. Klesin
Utility Supervisor

Rachel Jenkins
Utility Engineer 2 (Safety)

Jeffrey Kline
Utility Engineer 3

Office of Electric, Gas & Water
State of New York
Department of Public Service

Three Empire Plaza
Albany, New York 12223-1350

90 Church Street
New York, New York 10007-2919

1 Q. Please state your names and business address.

2 A. Joseph Klesin and Rachel Jenkins, 90 Church St.,
3 New York City.

4 Jeffrey Kline, 3 Empire State Plaza, Albany, New
5 York.

6 Q. Mr. Klesin, what is your position with the
7 Department of Public Service?

8 A. I am a Utility Supervisor assigned to the Office
9 of Electric, Gas & Water, Safety Section in New
10 York City.

11 Q. Mr. Klesin, please state your education and
12 experience.

13 A. I graduated from New York Institute of
14 Technology (NYIT) in Old Westbury, NY in 1989
15 with a Bachelor of Technology Degree in
16 Electro/Mechanical/Computer Technology. I
17 joined the Department in 1990 and am currently
18 the regional Supervisor of the Safety Section's
19 NYC and Albany offices. I have oversight
20 responsibility for two area supervisors and
21 subordinate staff and implementation
22 responsibility for the New York Pipeline Safety
23 Program in the Albany, New York City,
24 Westchester and Long Island areas.

1 I am responsible for ensuring the organization,
2 scheduling, coordination and direction of field
3 activities of the New York City and Albany area
4 offices. The program involves comprehensive
5 safety & reliability evaluations of eastern
6 region utilities and covers all aspects of
7 operations, maintenance and construction of
8 jurisdictional natural gas, liquid petroleum,
9 liquefied natural gas and steam pipelines. I am
10 familiar with all NYS and federal gas, liquid
11 and steam pipeline safety codes, including the
12 overall operations of the major downstate gas
13 utilities.

14 Q. Have you previously testified in a regulatory
15 proceeding?

16 A. Yes, I have testified in two previous rate cases
17 for Orange & Rockland Utilities; Cases 99-G-1695
18 and 02-G-1553 and for Consolidated Edison of New
19 York in Case 06-G-1332. I have also prefiled
20 testimony in three other cases for the Keyspan
21 Corporation; 06-M-0878, 06-G-1185 and 06-G-1186.

22 Q. Ms. Jenkins, what is your position with the
23 Department of Public Service?

24 A. I am a Utility Engineer 2 (Safety) assigned to

1 the Office of Electric, Gas & Water, Safety
2 Section in the NYC Office.

3 Q. Ms. Jenkins, please state your education and
4 experience.

5 A. I graduated from The Ohio State University with
6 a Bachelor of Science in Civil Engineering in
7 2003. I joined the Department of Public Service
8 in 2004.

9 I am responsible for the investigation and
10 analysis of gas and steam pipeline utility
11 facilities, company standard practices and
12 records related to system design, construction,
13 operation and maintenance. My duties also
14 include ensuring compliance with the federal and
15 state pipeline safety regulations that apply to
16 gas and steam utilities and pipeline operators.
17 Investigation of complaints from utility
18 customers and the public regarding pipeline
19 safety and service issues and facilitation of
20 the resolution between the utilities and
21 complainants are also part of my
22 responsibilities. My duties also include
23 preparing detailed reports related to my
24 investigations, analysis, audit findings and

1 recommendations. Another one of my roles is to
2 investigate natural gas, steam and carbon
3 monoxide related incidents, and outages for
4 violation of the pipeline safety regulations and
5 recommend preventive measures to eliminate or
6 mitigate occurrence. I have also participated in
7 rotation programs within the Department through
8 which I have had the opportunity to work on
9 water and gas rate matters as well as electric
10 incident investigations.

11 Q. Have you previously testified in a regulatory
12 proceeding?

13 A. Yes, I have previously testified in the United
14 Water New York rate case, 06-W-0131, and in the
15 latest Consolidated Edison Company of New York,
16 Inc. gas rate case, 06-G-1332.

17 Q. Mr. Kline, what is your position with the
18 Department of Public Service?

19 A. I am a Utility Engineer 3 assigned to the Office
20 of Electric, Gas & Water, Safety Section in the
21 Albany Office.

22 Q. Mr. Kline, please state your education and
23 experience.

24 A. I graduated in May 1986, from Western New

1 England College, with a Bachelor of Science
2 degree in Electrical Engineering. I have been
3 employed by the Department of Public Service
4 since November of 1994. Prior to that, I worked
5 for the New York State Department of
6 Transportation as a materials technician.
7 I am responsible for the investigation and
8 analysis of gas, liquid, and steam pipeline
9 utility facilities, company standard practices
10 and records related to system design,
11 construction, operation and maintenance. My
12 duties also include ensuring compliance with the
13 federal and state pipeline safety regulations
14 that apply to gas, liquid, and steam utilities
15 and pipeline operators. My other duties include
16 engineering support for the Safety Section field
17 staff, reviewing possible violations relating to
18 16 NYCRR Part 753 (damage prevention),
19 participating in rate proceedings and
20 negotiations, reviewing proposed pipeline
21 designs, processing petitions and waivers
22 relating to code compliance matters, and
23 reviewing proposed updates to utility operations
24 and maintenance procedures. I have also

1 participated in rotation programs within the
2 Department which has given me to opportunity to
3 work on gas rate matters and I have previous
4 contributed to steam rate cases in a supportive
5 roll.

6 Q. Have you previously testified in a regulatory
7 proceeding?

8 A. No.

9 Q. Please provide a brief summary of your
10 testimony.

11 A. The Safety Panel was primarily responsible for
12 the review of the Company's Steam Operations
13 Panel testimony. We reviewed the steam
14 distribution construction program and the
15 operations and maintenance (O&M) budget as it
16 applied to steam distribution. We also reviewed
17 some projects proposed under the steam
18 production construction program.

19 Our goal was to evaluate all capital projects
20 for reasonableness of cost and the safety and
21 reliability value provided to the steam
22 distribution system. We compared both the
23 proposed capital and O&M budgets to historic
24 spending levels.

1 We also assisted other Staff in the review of
2 proposed Research and Development programs to
3 evaluate their relevance.

4 The Safety Panel is also proposing new safety
5 related performance measures similar to those
6 currently in place for many natural gas
7 distribution companies, including Con Edison.
8 These performance measures are designed to
9 encourage actions that improve public safety.

10 Q. Is the Panel sponsoring any exhibits?

11 A. Yes, attached are Exhibits (SP-1) and (SP-2).

12 **Research and Development**

13 Q. Is the panel familiar with Con Ed witness
14 Ecock's testimony?

15 A. Yes.

16 Q. Does the Safety Panel take issue with witness
17 Ecock's testimony?

18 A. Yes. We have two issues. For our first issue,
19 we believe that the five Research and
20 Development line items shown in our
21 Exhibit__(SP-2) are related to the July 18,
22 2007, steam incident at 41st Street and Lexington
23 Avenue¹ (the July 18th incident) and rate case

¹ Case 07-S-0984

1 treatment of these items should be held over
2 pending the outcome of that proceeding. The
3 first item is the development of a condensate
4 accumulation model. This item relates to the
5 July 18th incident as condensation accumulation
6 was one of the primary causes of the incident.²
7 The second item is the development of high
8 temperature and advanced technology sensors.
9 Technology being considered through these
10 efforts might have detected the conditions
11 subsequent to the July 18th incident. The third
12 item is a program to demonstrate remote water
13 level monitoring in steam manholes, again
14 relating to the manhole flooding condition that
15 contributed to the July 18th incident. The
16 fourth program aims to demonstrate a laser-based
17 tool to analyze steam main structural integrity.
18 This tool might enable Con Edison to identify
19 weaknesses in steam mains and replace them
20 proactively. The goal of the fifth and final
21 program is to demonstrate transient pressure
22 monitoring devices, which relates to the July

² See Staff Report on Steam Pipeline Rupture, Case 07-S-0984.

1 18th incident because the cause of this rupture
2 was an extreme over pressurization of the steam
3 main. The total adjustment in 2009 for these
4 Research and Development projects totals to
5 \$340,000.

6 For our second issue, we do not support the
7 Company's proposed study on Feasibility and
8 Demonstration of High Strength Coatings for
9 Corrosion Protection, an adjustment totaling
10 \$20,000.

11 Q. Why is the corrosion study not supported?

12 A. We are unaware of any issues related to either
13 external or internal corrosion of steam
14 pipelines that cannot be mitigated by other
15 means. Generally speaking, steam pipeline
16 operating temperatures are such that water is
17 vaporized and does not collect around the
18 pipeline. Water is a necessary part of a
19 corrosion cell known as the electrolyte. This
20 negates the need for an external corrosion
21 protection coating to be developed.

22 We are aware that Con Edison has been
23 experiencing some internal corrosion issues
24 related to ions not being removed by the water

1 softening treatment process. With the
2 installation of water demineralization equipment
3 sought in this rate case, the threat to the
4 system is mitigated. We feel that introduction
5 of an internal coating for the purpose of
6 removing or reducing the internal corrosion
7 threat is, therefore, not necessary and could
8 lead to future problems if the coatings were to
9 break down. Therefore the proposed R&D project
10 related to corrosion protection should be
11 rejected.

12 **Steam Distribution Construction**

13 Q. Does the Safety Panel have any concerns with the
14 Company's proposed Steam Distribution
15 Construction program?

16 A. Yes. The Safety Panel specifically considered
17 the budget increases proposed in the area of
18 System Reinforcement. The steam operations
19 testimony states that the company plans to spend
20 approximately \$20.56 million in 2009. However,
21 the rest of the testimony only details a total
22 of \$15.66 million. The Company indicates, in
23 response to DPS-97, attached in (SP-1), that the
24 system reinforcement budget for future years

1 includes a \$5 million place-holder to help cover
2 costs it expects to incur as a result of the
3 afore-mentioned July 18th incident and Staff's
4 recommendations in that proceeding. This place-
5 holder is quite substantial as it increases the
6 amount otherwise proposed for system
7 reinforcement by approximately a third. Staff
8 proposes that this amount be adjusted out of the
9 budget until the Company's obligations are made
10 clear in Case 07-S-0984. A concomitant
11 adjustment is also required reducing the
12 forecast of rate year depreciation expense
13 \$134,000 to reflect the removal of the estimated
14 depreciation expense associated with these
15 expenditures.

16 Q. Does Staff have any other concerns with the
17 system reinforcement budget?

18 A. No. Other expenditures within the system
19 reinforcement budget appear to align with
20 historical spending. Many of the programs are
21 essential to the Company's compliance with
22 safety regulations and play a large role in the
23 reliability of the steam distribution system.

24 Q. Did Staff have any other comments on the

1 proposed steam distribution budget?

2 A. The proposed budgets in the areas of
3 Interference, Meter Installation, and Meter
4 Purchases have changed very little, if at all,
5 from previous year's budgets. The small
6 increase in the budget for New Business in 2008
7 is directly associated with known work on behalf
8 of the Company and Staff believes that the
9 modest increase is reasonable. Staff does not
10 propose any adjustments in these areas of the
11 proposed budget.

12 **Steam Distribution O&M**

13 Q. Did the Safety Panel have any issues concerning
14 the Steam O&M budget?

15 A. Yes.

16 Q. Please elaborate on the Panel's concerns.

17 A. The Safety Panel is concerned with the general
18 increase in operations spending and supports the
19 adjustments proposed by the Staff Accounting
20 Panel.

21 **Steam Production Construction**

22 Q. Which sections of the steam production
23 construction budget did the Safety Panel review?

24 A. The Safety Panel considered the proposed changes

1 to the water treatment facilities at both the
2 59th Street and 74th Street plants. While Staff
3 believes that the Company has sufficiently
4 demonstrated the need for the change in the
5 method of water treatment at these facilities,
6 Staff also believes that the Company did not
7 sufficiently consider the risks involved when it
8 first instituted water softening as a water
9 treatment method. De-mineralization, the water
10 treatment method being implemented at these
11 facilities, was previously in use at both
12 facilities until 1999. However, the Company was
13 facing mandatory upgrades in its water treatment
14 chemical storage facilities in order to comply
15 with new environmental regulations, specifically
16 DEC-999. Moving to water softening in 1999
17 eliminated the need for the chemicals, and
18 therefore eliminated the costs associated with
19 upgrading chemical storage facilities. In this
20 case, the Company is now proposing to move away
21 from water softening and revert back to de-
22 mineralization. Staff believes that the costs
23 associated with moving back to de-mineralization
24 should not be entirely borne by the steam

1 ratepayer, as the move is only necessary now
2 because the Company did not properly assess the
3 risks associated with water softening in 1999,
4 but merely considered the cost savings
5 associated with the change.

6 Q. What were those risks and how have they affected
7 the steam distribution system?

8 A. The Company acknowledges in its response to DPS-
9 41, attached in (SP-1), that since the change to
10 water softening 1999, it has noted an increase
11 in leaks due to internal corrosion pitting at
12 the bottom, or six-o'clock position, of steam
13 mains. These leaks have been investigated by
14 the Company and have been characterized as being
15 caused by the lower pH and increased carbonic
16 acid levels of softened water. The impact on
17 the reliability of the steam mains creates the
18 need to convert back to demineralization as a
19 water treatment method.

20 Q. How do you propose that these new costs be
21 treated?

22 A. We propose that the Company not be allowed to
23 recover the total amount of carrying charges on
24 the new demineralization plant based on the

1 company's failure to recognize all the risks of
2 converting to water softening. As described
3 above.

4 Q. Do you have a specific dollar amount?

5 A. While the Company asserts in its response to
6 DPS-41 (attached in (SP)-1) that significant
7 operational and capital costs were avoided by
8 the move to water softening in 1999, it cannot
9 provide the details of these savings. Staff
10 cannot be sure what the cost of upgrading the
11 chemical storage facilities in 1999 would have
12 cost. Because we do not have this data
13 available, Staff proposes that the entire net
14 plant cost associated with the \$25,300,000
15 demineralization construction project be
16 adjusted out of the company's rate base.

17

18 **Safety Performance Targets**

19 Q. Does the Safety Panel wish to submit testimony
20 on any new issues?

21 A. Yes. The Safety Panel recommends that the
22 Commission adopt a safety performance mechanism.
23 This mechanism will encourage the Company to
24 maintain and improve its operations in specific

1 areas that affect the safety and reliability of
2 its steam distribution system. This mechanism
3 is intended to focus the Company's attention on
4 areas widely accepted as of high importance, and
5 will help ensure service reliability. The
6 underlying performance targets are derived from
7 the Company's actual levels of historic
8 performance and our knowledge of Con Edison's
9 steam distribution system.

10 Q. What does the Safety Panel recommend in the area
11 of safety performance targets?

12 A. We recommend, at a minimum, that Con Edison be
13 required to implement the safety performance
14 targets and associated incentives listed below
15 for calendar year 2009, and for each subsequent
16 year until the rate plan resulting from this
17 proceeding is superseded. Staff derived the
18 approximate value of a single basis point at
19 \$108,000. The safety performance incentives are
20 assigned a maximum total of 16 basis points or
21 approximately \$1.6 million of equivalent
22 regulatory liability.

23 Q. Please explain the basis for your proposed
24 revenue adjustments for each of the proposed

1 measures.

2 A. Although no negative revenue adjustment measures
3 currently exist, Staff determined that the
4 proposed basis point level is consistent with
5 other current rate cases to maintain an adequate
6 focus on safety and reliability.

7 Q. Did Con Edison propose any safety or reliability
8 related performance targets in its filing?

9 A. No. The Company's current rate plan does not
10 provide for any safety related performance
11 targets. While previous rate plans did not
12 include targets, we believe that such
13 requirements are now necessary based on the
14 Company's actual performance, to ensure that the
15 Company improves its level of safety so that it
16 may better serve and protect the public.

17 Q. Please described the panel's proposed Safety
18 Performance Mechanism.

19 A. The panel recommends that Con Edison be required
20 to implement the following two safety and
21 reliability performance measures:

- 22 (1) Emergency Response to Steam Leak/Vapor Calls
23 (2) Steam Leak Management

24 Q. Please describe the Emergency Response

1 performance measure?

2 A. This measure evaluates the Company's response to
3 steam leaks, vapor conditions and emergency
4 calls generated by the public and non-company
5 personnel. Currently the Company is required,
6 under existing steam distribution safety
7 regulations, to provide a monthly report of the
8 total number of calls received and responded to
9 in intervals of 15 minutes during normal
10 business hours, weekdays outside of business
11 hours, and weekends and holidays.

12 Q. How has Con Edison's performance under this
13 measure been in recent years?

14 A. For the 30-minute response goal, Con Edison
15 responded to 47.7%, 59.3% and 58.1% for 2005,
16 2006 and 2007, respectively. For the 45 minute
17 response goal, Con Edison responded to 73.0%,
18 83.9% and 81.6% for 2005, 2006 and 2007,
19 respectively. For the 60-minute response goal,
20 Con Edison responded to 96.1%, 99.3% and 98.9%
21 for 2005, 2006 and 2007, respectively.

22 Q. What performance measures and associated revenue
23 adjustments do you recommend for emergency
24 response to leak and vapor calls?

1 A. Consistent with measures in place for Con Edison
2 Gas Distribution, we recommend the following
3 performance measures for Con Edison steam for
4 calendar year ending December 31, 2009:
5 a) Respond to 75% of all steam leak, vapor and
6 emergency calls within 30 minutes.
7 b) Respond to 90% of all steam leak, vapor and
8 emergency calls within 45 minutes.
9 c) Respond to 95% of all steam leak, vapor and
10 emergency calls within 60 minutes.
11

12 Failure to comply with (a) or (b) or (c) will
13 result in an annual pre-tax revenue adjustment
14 of 5 basis points, or approximately \$540,000.
15 Failure to comply with both (a) and (b) will
16 result in an annual pre-tax revenue adjustment
17 of 10 basis points, or approximately \$1,080,000.

18 Q. Please describe your proposed Leak Management
19 performance measure.

20 A. The Leak Management performance measure focuses
21 on the reduction of unrepaired steam leaks.

22 Q. What is the significance of this performance
23 measure?

24 A. The overall objective of this performance

- 1 measure is to encourage the Company to reduce
2 the number of active steam leaks on its system.
3 Eliminating leaks help minimize the possibility
4 of incidents involving uncontrolled vapor
5 conditions. Elimination of leaks also reduces
6 the amount of steam loss; aiding in the
7 reduction of operating and maintenance costs.
8 Reducing backlogs of unrepaired leaks
9 immediately prior to peak summer and winter
10 loads requires effort year-round and not only
11 results in minimizing public hazards, but also
12 mitigates excessive and prolonged system repairs
13 that create increased risk to service
14 reliability during peak demand periods.
- 15 Q. What has been Con Edison's performance with
16 respect to monthly steam leak backlogs?
- 17 A. Con Edison's annual average of monthly steam
18 leak backlogs for 2005, 2006 and 2007 were 24.5,
19 16, and 22 respectively. Calculations for a
20 three year monthly average yielded 20.
- 21 Q. What performance measures and associated revenue
22 adjustments do you recommend for Steam Leak
23 Management?
- 24 A. Similar to measures in place for Con Edison Gas

1 Distribution, we recommend the following Leak
2 Management performance measures for Con Edison
3 steam for calendar year ending December 31,
4 2009:

5 Maintain a month ending backlog number of steam
6 leaks less than or equal to fifteen (15) on the
7 following dates:

8 a) April 30, 2009

9 b) October 31, 2009

10 The backlog measure shall be exclusive of any
11 on-stream leak sealing capability.

12 Failure to comply with either (a) or (b) will
13 result in an annual pre-tax revenue adjustment
14 of 3 basis points, or approximately \$324,000.

15 Failure to comply with both (a) and (b) will
16 result in an annual pre-tax revenue adjustment
17 of 6 basis points, or approximately \$648,000.

18 Q. Are there any additional recommendations
19 regarding the aforementioned performance
20 measures?

21 A. Yes. The Safety Panel recommends that Con
22 Edison be required to implement the
23 aforementioned safety performance measurements
24 for calendar year 2009, and that those

1 incentives remain at the 2009 target levels for
2 each subsequent year until the mechanisms
3 recommended in this proceeding are superseded in
4 the future by the Commission.

5 Q. Are there any other conditions that the Company
6 should meet pertaining to your safety-related
7 recommendations?

8 A. Yes, we urge the Commission to direct Con Edison
9 to submit a report to the Director of the Office
10 of Electric, Gas and Water on its performance in
11 the areas of the recommended targets in this
12 testimony within 30 days following the end of
13 each calendar year. In addition, any revenue
14 adjustments should be deferred and used for the
15 benefit of ratepayers in a manner to be
16 determined by the Commission.

17 Q. Does this conclude your panel testimony at this
18 time?

19 A. Yes.