Exhibit No.: Witness:	Gwen Marelli		
Application of Southern California Gas Company (U 904 G) and San Diego Gas & Electric Company (U 902 G) For Authority To Recover North-South Project Revenue Requirement In Customer Rates And For Approval Of Related Cost Allocation And Rate Design Proposals		(Filed Dec	3-12-013 cember 20, 2013)

PREPARED REBUTTAL TESTIMONY ON PROJECT ALTERNATIVES OF

GWEN MARELLI

SAN DIEGO GAS & ELECTRC COMPANY

AND

SOUTHERN CALIFORNIA GAS COMPANY

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

May 8, 2015

PREPARED REBUTTAL TESTIMONY ON PROJECT ALTERNATIVES OF GWEN MARELLI

I. PURPOSE

The purpose of my rebuttal testimony is to address comments by the Southern California Generation Coalition (SCGC) and The Utility Reform Network (TURN) as to the need of the North-South Project and why the alternatives suggested do not meet the project objectives of the Southern California Gas Company (SoCalGas) and San Diego Gas & Electric Company (SDG&E) from the perspective of the director charged with the day-to-day responsibility for obtaining the supplies to meet minimum flow requirements on the SoCalGas Southern Transmission System (Southern System).

II. THE NORTH-SOUTH PROJECT IS THE PHYSICAL SOLUTION THAT IS NEEDED

Contrary to TURN's statement that SoCalGas and SDG&E, "have not demonstrated either a shortage of pipeline capacity or gas supplies causing minimum flow problems at Blythe," both a shortage of pipeline capacity and gas supplies have been experienced at Blythe and were drivers of recent curtailment events. In fact, SoCalGas and SDG&E have experienced numerous curtailment events on the Southern System over the last two years due to the limitations in moving gas across the northern part of the system and from storage facilities to the Southern System. As was explained in Resolution G-3468, "SoCalGas needs a certain minimum amount (which can vary depending upon conditions) of flowing supplies on its Southern System to operate effectively." The Southern System minimum flow requirement for any particular day is based in large part upon customer demand on the Southern System, minus the limited amount of flowing supplies that SoCalGas is currently able to flow from its Northern System to its

¹ A.13-12-013, Updated Prepared Direct Testimony of Herbert Emmrich, dated March 23, 2015, page 2.

Southern System. To the extent that customer deliveries into its Southern System fall short of the minimum flow requirement SoCalGas must provide additional supplies in order to keep the system operating.

III. SYSTEM OPERATOR TOOLS ARE ONLY SHORT TERM APPROACHES

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

As explained in my Updated Direct Testimony, SoCalGas has put in place and is actively using several tools for the SoCalGas and SDG&E Utility System Operator (System Operator), which have likely limited the number of curtailment events affecting customers on the Southern System.² These tools for Southern System support include the ability to buy and sell gas on a spot basis, November to March baseload contracts, the movement of supplies from Blythe to Otay Mesa, Memorandums in Lieu of Contract (MILCs) with SoCalGas' Gas Acquisition Department (Gas Acquisition), and discounted interruptible Backbone Transportation Service (BTS) capacity. However, while these tools have helped to manage the Southern System minimum flow requirements, these are only short term approaches and do not provide Southern System customers the same level of reliability afforded other customers throughout the system. TURN and SCGC would prefer the Commission order SoCalGas and SDG&E to continue to use these tools to address Southern System reliability. However, SCGC and TURN fail to recognize that the continued use of these tools maintains Southern System customer exposure to flowing supply failures on El Paso's Southern System. This risk to Southern System customers is unique to them, whereas customers on other parts of the system are protected against potential flowing supply failures with storage and access to multiple pipeline receipt points. SoCalGas' Southern System customers need to be provided the same level of reliability by securing access to these other supplies and storage. This long-term solution can only be accomplished through a physical solution like that proposed by the North-South Project.

² A.13-12-013, Updated Direct Testimony of Gwen Marelli dated November 12, 2014, pages 12-16.

IV. ADDITIONAL SYSTEM OPERATOR TOOLS SUGGESTED BY SCGC ARE SHORT TERM IN NATURE

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

SCGC Witness Yap proposes alternative approaches for SoCalGas and SDG&E based on either contracting for baseload border supply purchases or by contracting with El Paso for interstate capacity that would permit gas purchases in supply basins for re-sale at the SoCalGas citygate.³ Even with basin supplies and matching interstate capacity, Southern System customers would be at the mercy of supply-related problems outside of California, just as they are today. While each of the tools could be expanded to provide larger volumes and/or over longer periods, they are limited in that they only provide short term mitigation to reduce the cost of providing Southern System support for our customers in an effort to decrease the need to effectuate curtailment. Even if expanded, these mitigation efforts, though they may appear less costly; do not deal with the long-term Southern System support issues. Contracting for interstate supplies or capacity to meet peak day requirements is not an inexpensive option and does not provide a long-term solution to Southern System reliability. Southern System customers need access to supplies from SoCalGas storage fields and other system receipt points, and such access can only be achieved through physical upgrades. We believe that the North–South Project is the best physical solution that meets these needs.

V. LOW OPERATIONAL FLOW ORDER IMPLEMENTATION COMBINES WITH NORTH – SOUTH PIPELINE FOR OPTIMAL LONG TERM SOLUTION

On June 27, 2014, SoCalGas and SDG&E filed A.14-06-021 Low Operational Flow Order (OFO) and Emergency Flow Order (EFO) Requirements. This Application proposes to replace monthly balancing rules in place since the early 1990's with a unified, statewide approach to dealing with low levels of flowing supplies during times of system stress. SoCalGas

³ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, page 24-25.

and SDG&E believe the new low OFO and EFO procedures will minimize supply-related curtailment threats by ensuring that transportation customers do not use any more storage withdrawal than has been allocated for the purpose of balancing. A.14-06-021 is awaiting CPUC approval but once this tool is in place it will provide accurate balancing and storage-related price signals to the market place, and may reduce the need in the future for SoCalGas and SDG&E to call supply-related curtailments.⁴ TURN Witness Emmrich advocates for the implementation of the low OFO system improvement as well as tightening up the monthly balancing level from 10% to 5%, as SoCalGas and SDG&E have proposed in their 2016 Triennial Cost Allocation Proceeding Phase 1, A. 14-12-017.⁵ TURN is correct to support these supply related tariff rule improvements, but by themselves, these improvements do not eliminate potential Southern System supply shortages. The implementation of Low OFO procedures coupled with the physical improvement of the North-South pipeline, ensures that the same level of supply reliability is provided to our Southern System customers.

VI. EXPANSION OF EL PASO NATURAL GAS PIPELINE CAPACITY RIGHTS DOES NOT SOLVE THE SOUTHERN SYSTEM RELIABILITY PROBLEM

In their comments, TURN and SCGC suggest exact opposite opinions about capacity on El Paso's southern system, which cancel out any conclusion as to the adequacy of these rights in relation to the Southern System reliability problem. TURN states that, "If CA noncore shippers purchased more capacity on El Paso's southern system, the minimum flow problem would largely disappear." While SCGC states, "Transportation customers currently hold 805 MDTH/d of firm capacity rights on El Paso for delivery to Ehrenberg – more than sufficient to meet the SS

⁴ On May 1, 2015, a Proposed Decision of ALJ Mason was issued which would grant the application of SoCalGas and SDG&E for low operation flow order and emergency flow order requirements.

⁵ A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2015, pages 12-15.

⁶ A.13-12-013, Updated Prepared Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2014, page 5.

minimum flow requirement." Capacity to deliver to Ehrenberg, whether it is purchased by customers or not, does not provide physical gas supply assurances since those customers may choose not to deliver gas on that capacity on a daily basis. Although tools such as the MILC could be expanded to cover summer as well as winter months and/or expanded to cover noncore as well as core's share of minimum flow requirements as SCGC and TURN suggest, none of these options mitigates the continued reliance on the single interstate pipeline receipt source of the El Paso System. SoCalGas and SDG&E Southern System customers are at the mercy of periodic upstream force majeure event such as well freeze offs or pipeline outages that negate the effectiveness of MILC arrangements and put the Southern System in operational jeopardy.

One of the system operator tools currently available to address Southern System minimum flow requirements are deliveries to the Otay Mesa receipt point. While this tool can be helpful to manage Southern System flow requirements on a short-term basis, it does not mitigate the fact that the supplies still come from the single pipeline source of El Paso. When the El Paso pipeline next experiences a force majeure event, gas would not be available for delivery to the Otay Mesa receipt point. SCGC incorrectly assumes that delivering supplies at Otay Mesa is a solution to get gas supplies to San Diego. SCGC goes on to state, in error, that deliveries through the Otay Mesa receipt point are a possibility when a cold weather event produces high demand in San Diego. Again, unfortunately this proposal has the same difficulties in execution as gas coming into the Ehrenberg receipt point, since the gas is sourced from the same point.

⁷ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, page 12.

⁸ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, page 4.

⁹ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, page 4.

SCGC continues to speculate on the advantages of delivery through the Otay Mesa receipt point, suggesting that the California Public Utilities Commission (CPUC or Commission) could authorize the utilities to purchase LNG from ECA. This option assumes that there is excess capacity of LNG that is not fully committed to other parties, which is contrary to publically available information about the output of that facility and prevailing market conditions. Speculation surrounding the future of ECA unfortunately does not make it a viable alternative to the North-South Project.

VII. THERE IS VALUE IN AN INTEGRATED GAS SUPPLY SYSTEM

Even though the North–South Project would not have alleviated the system-wide supply shortages experienced in recent curtailments as TURN points out in its testimony, the value of having an integrated gas supply system should not be discounted. The recent supply shortages have highlighted for us the need to have a system that is flexible and has the ability to respond to localized supply issues. Had the system-wide shortage been limited to Blythe, due to operational issues with El Paso, having the North–South Project would allow SoCalGas to flow gas from the North to the South where it is needed, avoiding the need for curtailments. By connecting the Northern System supply and access to storage with Southern System demand, the North–South Project enables the Southern System to flexibly access gas from multiple receipt points, thus reducing the risk of curtailment resulting from deliveries from just one receipt point.

¹⁰ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, page 3. "ECA" refers to the Energia Costa Azul LNG facility in Baja California, Mexico.

¹¹ A.13-12-013, Updated Prepared Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated May 23, 2105, page 9.

A. Future System Maintenance Elevate Need for a Physical Solution for Southern System

In addition to the past curtailment and near curtailment experiences SoCalGas and SDG&E have witnessed on the Southern System in recent years, another potential problem involving curtailments is due to system maintenance and repair. SoCalGas and SDG&E are required to perform pipeline integrity (PI) testing on their transmission lines every 7 years. Should this testing result in requiring reduction of maximum allowable operating pressure, the utilities would have to immediately reduce the pressure in the transmission line, potentially interrupting service to customers. With the North–South Project in place, service interruptions resulting from PI testing on the Southern System would likely be unnecessary.

VIII. THE NORTH-SOUTH PROJECT WOULD HAVE ALLEVIATED PAST CURTAILMENT EVENTS

SCGC's testimony opines that the North–South pipeline would not have prevented the curtailment of 2011 because the rest of SoCalGas' system was also experiencing low supplies and thus would have been unable to deliver adequate volumes south. However, the fact that we had to curtail the Southern System and not any other part of our system highlights the fact that the Southern System requires systemic improvements to meet operational needs. While the northern portion of our system had access to multiple receipt points as well as storage gas, the Southern System did not have such flexibility, and thus was curtailed.

It is expected for the Southern System to be at higher risk of having supply related issues at Blythe due to anticipated electricity load growth in the San Diego area as well as gas load growth in Mexico, increasing the likelihood of a curtailment of Southern System as was discussed in the

¹² A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, pages 25-29.

1 Direct Testimony of Mr. Chaudhury. 13 SCGC's testimony goes on to say that the North-South

2 Project would not have reduced the risk of curtailment the utilities faced in January 2013. 14

Although the North-South Project would not have been sufficient to eliminate the curtailment

4 watch, it would have reduced the magnitude of the potential curtailment.

Finally, SCGC also states that "while a curtailment due to operational limitations on the Southern System is possible, it is unlikely to be a deep curtailment." SoCalGas and SDG&E cannot predict the next time there will be a problem. However, with the North–South Project in service, any supply related problems arising from El Paso such as freeze up, terrorism, or natural disasters will be alleviated by having a North–South Project that will provide redundancy and access to other supply sources.

IX. THE ALTERNATIVES SUGGESTED DO NOT MEET THE PROJECT OBJECTIVES

One fact that can be taken away from the testimony of all the intervenors is the acknowledgement that there is a problem with Southern System reliability and all have suggested some form of a solution be considered by the Commission. With that fact in mind the question for the Commission is what solution provides the best option. SoCalGas and SDG&E continue to believe that our proposed North–South Project is the optimal long-term solution and the only one addressing each of the project objectives as defined in the Proponents Environmental Assessment (PEA).¹⁶ TURN states in its testimony that "if the CPUC decides that a physical option should be pursued it should require SEU to conduct an open season for all proposed

¹³ A.13-12-013, Direct Testimony of Sharim Chaudhury. Dated December 20, 2013. Pages 1-3.

¹⁴ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, pages 31-32.

¹⁵ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, page 33.

¹⁶ SoCalGas and SDG&E Proponents' Environmental Assessment North-South Project, dated June 6, 2014.

physical pipeline options" and "require a comprehensive cost-benefit analysis of all operational, regulatory, and tariff alternatives." This proceeding has already provided just that opportunity and three parties have presented alternative physical pipeline options in their testimony. 18

LNG additions to the system have also been suggested by both TURN and SCGC, as discussed in the Rebuttal Testimony of Mr. Buczkowski these options are unrealistic alternatives to the North-South Project. Other suggestions by TURN include that SoCalGas and SDG&E should evaluate other physical alternatives, such as the purchase or lease of El Paso Line 1903 or looping of Line 6916. Neither of these alternatives would provide the capacity as defined in the PEA to "provide an interconnection allowing the Applicant to efficiently transport 800 MMcfd of natural gas supplies into the Southern System from interstate and intrastate receipt points located outside of the Southern System." Furthermore, these purchase/leases do not provide adequate capacity to meet the needs to provide Southern System reliability at the same level as other customers on the system receive. In short, these alternatives do not meet the project objectives and should be summarily dismissed by the Commission in favor of the North-South Project.

Network, dated March 23, 2015, pages 23 and 24.

¹⁷ A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2015, pages 21 and 24.

¹⁸ Prepared Updated Intervenor Testimony of Anthony M. Sanabria, El Paso Natural Gas Company, L.L.C, dated March 23, 2015, Direct Testimony of Steve Hearn on behalf of Transwestern Pipeline Company, LLC, and Updated Prepared Direct Testimony of James R. Schoene on behalf of TransCanada Pipelines Limited and North Baja Pipeline, LLC.

¹⁹ A.13-12-013, Updated Direct Testimony of Catherine E. Yap on behalf of Southern California Generation Coalition, dated March 23, 2015, pages 30-31. A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2015, page 22 ²⁰ A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform

X. SOUTHERN SYSTEM MINIMUM FLOW RESPONSIBILITY TRANSFERS ONLY DEFER THE RISK TO OTHERS

While it may be of merit to require all end-use customers to bring some portion of their gas usage into the Southern System as TURN suggests, only a physical upgrade that enables storage gas to reach the Southern System will provide the Southern System customers with the same level of reliability received by customers located on the rest of the SoCalGas and SDG&E system without dependence of a single pipeline receipt source.²¹

TURN suggests in its testimony that the future costs could be reduced by transferring minimum flow responsibility back to Gas Acquisition. As I originally noted in my Updated Direct Testimony, although there may be some initial cost savings, re-transferring the responsibility back to Gas Acquisition would undermine the Commission's goal of putting bundled core customers on a more equal footing with noncore customers. More importantly, transferring the responsibility for the Southern System minimum flow requirement has nothing to do with the supply and reliability problems that our Southern System customers are facing, nor the solution that the North–South Project brings. The impending Southern System supply and reliability issues are the same no matter whether Gas Acquisition or the System Operator is responsible for the Southern System support.

XI. TURN'S ELECTRIC GENERATION RELATED PROPOSALS DO NOT SOLVE THE SOUTHERN SYSTEM RELIABILITY PROBLEM

There are many additional proposals thrown out by TURN for differing treatment of electric generation (EG) customers as alternatives to the North–South Project. One such suggestion is to require the EGs to obtain core priority status. SoCalGas and SDG&E disagree

²¹ A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2015, page 2.

²² A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2015, page 12.

²³ A.13-12-013. Updated Direct Testimony of Gwen Marelli, dated November 12, 2014, pages 18-19.

with this suggestion. While we can agree that there is some level of gas-fired electric generation needed to maintain grid reliability, neither SoCalGas and SDG&E, nor the grid operators know exactly what that level would be. At some point perhaps that component of the electric generation demand should be considered core. However, this is not currently possible because by tariff definition,²⁴ all electric generation usage from generators greater than 1 megawatt (MW) system rated generating capacity, based on net continuous power output are classified as noncore. The intent of this priority distinction was to distinguish between those users who were smaller, less sophisticated natural gas users who were dependent on natural gas and not willing or sophisticated enough to manage their own gas supplies. These electric generation operators have and continue to be sophisticated enough to manage their own gas supplies. As such they should remain noncore and our ratepayers should not be obligated to build out the system for this unnecessary level of service as TURN suggests.

At the conclusion of his testimony TURN Witness Emmrich makes a passing reference to "other electric alternatives" including possible upgrades to electric transmission facilities including the Southwest Powerlink or "power lines from the Los Angeles and Orange County area to San Diego County" to "reduce power production in San Diego County." These alternatives suggest that TURN is recommending that the Commission consider increasing electric transmission capacity (and by extension, electric rates). This supposed alternative does not meet the objectives of this application and therefore it should be rejected.

²⁴ SoCalGas Rule No. 23, section b.

XII. THE NORTH-SOUTH PROJECT IS THE BEST PHYSICAL SOLUTION

This proceeding has shown consistent input from all parties involved that there is acknowledgement of a problem with the reliability of the Southern System. The curtailment events of previous years are an indication that current tools being used by the System Operator have not always been able to meet Southern System flowing supply needs. While TURN points out that, "the utilities did not see Southern System requirements increase this past winter season," this is likely due to the fact that December 2014 to February 2015 was officially California's warmest winter on record. February 2015 was California's singularly warmest February on record, and the 2014 calendar year was California's warmest calendar year (and 12-month period) on record. However, the utilities do not believe that this will continue to be the trend. Forbes reports that objective scientific data show winters have been getting colder and colder throughout the United States for the past two decades. Given the irregularity of the recent weather patterns, it is not a matter of *if* we have upstream supply issues with the Southern System, but *when* we will have them.

The time to deal with the Southern System reliability concerns is right now, not when conditions get so extreme that we are in a regular pattern of curtailments and we begin affecting the economic viability of our customers getting service from the Southern System. SoCalGas and SDG&E have put in place many tools to assist with short term Southern System reliability issues. However, to provide a long term solution and equal level of reliability for Southern System customers as other customers on our system, the addition of the North South Project is needed to provide a complement with the tariff balancing rule changes proposed in the Low OFO

²⁵ A.13-12-013, Updated Direct Testimony of Herbert Emmrich on behalf of The Utility Reform Network, dated March 23, 2015, page 7.

²⁶ http://www.weatherwest.com/archives/2995

http://www.forbes.com/sites/jamestaylor/2015/02/25/cold-and-snow-destroy-global-warming-claims/

and TCAP Phase 1 proceedings. These new tools only work in concert with the North-South Project to provide the complete solution for Southern System reliability. This concludes my prepared rebuttal testimony on project alternatives.