December 9, 2019

BY E-MAIL
(AlisoCanyonOII@cpuc.ca.gov)

California Public Utilities Commission
Energy Division
505 Van Ness Avenue
San Francisco, CA 94102

RE: Southern California Gas Company’s Comments on Aliso Canyon OII (I.17-02-002)
November 13, 2019 Technical Workshop #2 – Econometric Modeling Results and Modeling Updates

Dear Commission Staff:

SoCalGas appreciates the opportunity to offer written comments on the California Public Utilities Commission’s (Commission) November 13, 2019 Technical Workshop and Modeling Update (Workshop) for the Senate Bill 380 Aliso Canyon Order Instituting Investigation. SoCalGas thanks Commission staff for presenting at the Workshop and offers comments on the presentations as well as certain comments, questions, and statements made by parties to the proceeding.

As the proceeding progresses, it bears restating the purpose of this proceeding. Senate Bill 380 (California Public Utilities Code section 714 [Section 714]) tasks the Commission with analyzing the “feasibility of minimizing or eliminating the use of the Aliso Canyon natural gas storage facility located in the County of Los Angeles while still maintaining energy and electric reliability for the region.” Consistent with Section 714, the Assigned Commissioner identified two issues to be addressed: (1) “the impacts to system reliability and on electric and gas rates of reducing or eliminating the use of the Aliso Canyon Natural Gas Storage Facility;” and (2) based on those impacts, whether “the Commission [should] authorize the reduction or elimination of the use of the Aliso Canyon Natural Gas Storage Facility, and if so, under what timeframe and parameters.”

1 Assigned Commissioner’s Phase 2 Scoping Memo and Ruling at page 2.
As such, Phase 2’s purpose should be the development of accurate and reasonable analysis of the importance of Aliso Canyon to energy reliability and affordability, and adherence to a process that will support the continued reliability and affordability of the electric and gas systems in California.

1. **Full Econometric Model Results – Difference in Difference (DID) and Volatility Analysis.**

SoCalGas notes, generally, that the analyses presented in this Workshop, and Energy Division’s June 20, 2019 workshop, appear to confirm that Aliso Canyon reduces energy costs, lowers core customer gas bills, and mitigates gas price volatility. With that noted, to better enable parties to understand and comment on Energy Division’s analysis, SoCalGas requests that Energy Division post the underlying data and analyses, so parties can download and review them.

During the workshop, Dr. Issam Najm commented with respect to Slide 7 of the presentation that the volatility analysis should not include the parts of 2017 and 2018 that coincide with the Northern System “pipeline events” (i.e., Line 235 and Line 4000 pipeline interruptions), apparently assuming that all of the volatility reflected in that time was attributable solely to the pipeline interruptions. As we have noted in the past, SoCalGas’ storage assets are an important part of SoCalGas’ gas system and system resiliency, and which enable the system to operate with contingencies to guard against the effects of maintenance and operational outages. With restrictions on Aliso Canyon, pipeline outages have a more noticeable impact on system operations and the market. In other words, as the Commission has previously recognized, market volatility is due to a combination of both pipeline interruptions and restricted use of Aliso Canyon.

It should also be noted that the pipeline interruptions and restricted use of Aliso Canyon should not be confused as having the same type of cause and effect. The pipelines were not operational as a result of ongoing safety-related pipeline maintenance work. In contrast, whereas Aliso Canyon was operationally available, State policy restrictions limited its usefulness for mitigating system gas price volatility. Energy Division has since implemented a less restrictive Aliso Canyon Withdrawal Protocol, noting, "The changes in the Withdrawal Protocol are focused on improving short-term reliability and price stability in the Southern California region."²

2. **Hydraulic Model Input Data Development – Peak Day Design, Far Term, and Hourly Gas Demand Profiles.**

SoCalGas notes that Energy Division’s presentation generally confirms the demand forecasts in the 2018 California Gas Report.

With respect to Slide 66 of the presentation, SoCalGas believes using cold-day percentiles during warm winters to create extremely cold-day profiles is not an appropriate methodology. For example, using the 94.3⁰ to 100⁰ percentile of daily demand during a warm winter does not

accurately represent daily demand during a cold winter; it only represents the coldest days during a warm period. Even the 45th to 55th percentile of daily demand during a warm winter does not accurately represent daily demand during an “average” year, since the daily demand is below average. When the Commission is considering what inputs or assumptions to make for the various scenarios, it should be careful to ensure that the model and assessments are supported by facts and reasonable assumptions and do not produce false results regarding customer curtailments and increased costs. Accordingly, the Commission should not rely on warm day forecasts as a basis for forecasting cold day conditions.

SoCalGas has reviewed the system-wide core hourly load factor profile generated from AMI data for a cold day on January 24, 2017 having a system demand of approximately 4 BCFD, and found that the AMI hourly profile closely matched the original core profile SoCalGas has used in hydraulic modeling and made available to Energy Division.

While SoCalGas does not dispute the Energy Division’s conclusion that “some ZIP codes have a higher load factor, while other ZIP codes have a lower load factor” compared to SoCalGas’ core hourly profile, SoCalGas believes that its core profile has a better fit with AMI data than the Energy Division finds. SoCalGas further believes that selecting specific high demand cold days will provide a better representation of peak hourly demand than using the percentile that matches a design standard with warm temperature data.


SoCalGas agrees with the Energy Division’s Workshop comments regarding Slide 5 of the presentation that there is a “need to agree” with the upstream and downstream boundary conditions for modeling. To this end, SoCalGas encourages Energy Division to schedule another workshop for this purpose.
SoCalGas also notes that it is unclear whether Public Safety Power Shutoffs (PSPS) were factored into the electric generation gas demand projections and, if they were, at what magnitude and frequency, and how that was determined.

With respect to Slide 18, SoCalGas notes there is a need for clarity as to what comprises the 2000 MW of perfect capacity. SoCalGas notes that this issue appears to be a topic of another proceeding, where the California Independent System Operator (CAISO) has also questioned the reasonableness of such an assumption. For example:

[CAISO Representative] noted that the Energy Division staff initially determined that the 46 MMT Alternate Scenario was unreliable. As a result, Energy Division staff had to manually add 2,000 MW of generic, effective capacity which was modeled in SERVM as “a perfectly dispatchable peaker with zero emissions” which “[i]n reality … could be realized through firm imports, batteries paired with solar, geothermal, more economic retention of existing thermal generation, demand response, or other.”

[CAISO Representative] explained that using generic, effective capacity to meet reliability standards is problematic in a number of ways.….  

…because “generic effective capacity” does not exist, there is also no way for the CAISO to include this capacity in its transmission planning assessments. The CAISO cannot model generic, effective capacity because such capacity has no operating characteristics; is not specified as renewable or non-renewable; has no greenhouse gas emissions profile; cannot be identified as a single resource or many resources; and has no specific location on the grid. Consequently, if the CAISO removes the 2,000 MW of generic capacity from the portfolio, the CAISO will be using a portfolio that Energy Division staff demonstrated to be unreliable, typically showing reliability needs in the evening net peak hours after the sun sets.3

Based on the above, SoCalGas understands that these issues are being separately addressed, but notes the importance to this proceeding of clarity and certainty around assumptions related to 2,000 MW of generation capacity.

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4. Conclusion

SoCalGas appreciates the opportunity to submit comments and participate in this ongoing and important Commission effort to promote system reliability and affordable energy rates.

Sincerely,

/s/ Avisha A. Patel
Avisha A. Patel
Senior Counsel

SOUTHERN CALIFORNIA GAS COMPANY