Data Request No: TURN/SCGC DR 007 Exhibit Reference: SCG - 15 Witness: Phillips Subject: Follow up to TURN/SCGC-001

SoCalGas Question1:

 With respect to each of the pipelines or pipeline segments that are listed as replacement projects, please explain in detail why the pipeline cannot be pressure tested instead of being replaced.

Utility Response 1:

Please refer to SCG-15 Direct Testimony (Phillips) at pp. RDP-A-6 which states, "The scope of Phase 1B, as outlined in SoCalGas and SDG&E's PSEP, is to replace nonpiggable pipelines installed prior to 1946."

In addition, the 2000-E Cactus City Compressor Station is being replaced because it is a short section and it is more cost efficient to replace than test the blow-off piping, crossover piping, and bridle piping.

SoCalGas Question 2:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 85:
 - a. On page 200, SoCalGas lists 28,250 hours of construction management time. On the same page, SoCalGas lists 1,188 hours of project management/project services time. Given that the project is 187 days in length, it appears that SoCalGas projects 151.1 hours of construction management time per day or 18.9 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 6.4 hours of project managers/project services time per day or 0.8 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 18.9 construction managers and 0.8 project managers/project services contractors on the pressure testing work for Line 85 by stating separately the duties and activities for each of the 18.9 construction managers and 0.8 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

QUESTION 2 CONTINUED:

- b. On page 200, SoCalGas lists 40,166 hours of project management employee time. On the same page, SoCalGas lists 1,487 hours of project field management employee time, and 5,138 hours of construction management/inspectors employee time. Given that the project is 187 days in length, it appears that SoCalGas projects 214.8 hours of project management time per day or 26.8 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas project field managers per day or 1.0 project field managers per day for the duration of the project field managers per day for the duration of the project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 27.5 hours of construction management/inspector employee time per day or 3.4 construction manager/inspectors for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 26.8 project managers, 1.0 project field managers, and 3.4 construction management/inspector on the pressure testing work for Line 85 by stating separately the duties and activities for each of the 26.8 project managers, 1.0 project field managers, and 3.4 construction management/inspector projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 2:

2.a.i : The numbers quoted in the question are incorrect.

2.a.ii : Not applicable.

2.a.iii: The estimate assumed 15 construction managers, not 18.9.The 15 construction managers can be found in the excel workbook for Line 85 provided in response to TURN-SCGC DR 01.

- Open attachment "85 Ph2 Stage 3 Est 05-15-2017_redacted"¹ that was provided in response to "TURN-SCGC DR01".
- Select worksheet tab "CM".
- In column A, identify the cells labeled "CM/Inspectors" (Rows: 10, 13, and 19-30).
- The various titles that fall under the construction manager categories can be found under column D, such as: titles shown as CM/Inspectors Sources" in column D: Chief Inspector, Material Coordinator/Field Engineer, Right-of-way Clearing -Inspector, Right-of way Clean-up, Boring Inspector/coordinator, Pot hole inspector, Trenching inspector, Stringing inspector, Bending inspector, Welding Inspector, X-ray welds/repairs, Coating inspector, Lowering inspector and Backfill inspector.

TURN/SCGC's calculation of 18.9 assumed an 8 hour day. As stated in the WP-III-A5 in the Aassumptions section the construction schedule assumed 10 hours per day. , and their duties include

2.b.i : The numbers quoted in the question are incorrect.

2.b.ii : Not applicable.

2.b.iii: To properly understand the relationship of project manager hours to the overall project, it should be understood that project duration in not the same as construction duration. Line 85's project duration, as indicated on page WP-III-A10, extends to September 2021. The construction duration is 187 days, working 10 hours per day, five days per week, as listed on page WP-III-A5 under the "Construction" section for this project. Further, the term "Project Managers" relates to the "SCG-PSEP Project (Field Management) and "SCG-PSEP Project (Field Management) Close-out" categories, and Construction Management/Inspector is related to the "SCG-Inspectors/CA's" category.

The project management hours include the following positions: Project Manager, Project Engineer, Construction Close Out Lead, Project Specialist, Survey/As - Built Specialist, Supply Management Manager, Material Coordinator and Land Services Coordinator. These individuals are working on the project for 57 months as listed in the "Projected FTE" worksheet from Cell H3-BQ3, where the work months are totaled to 57. The calculation for the project management

¹ Please refer to response for "TURN-SCGC DR01"

Utility Response 2 Continued:

hours should be 40,166 ("Estimate" worksheet Cell M251) divided by 4.75 years which equals 8,456 hours spent per year. An FTE per year is approximately 2,080 hours therefore Line 85 has 4.06 Project Management Personnel listed for this project on average per year.

The "SCG- PSEP Field Management" should be compared against the 187-day construction duration since their activities and duties as listed in "TURN/SCGC DR 006" Response 7.1 are primarily construction based. The "Project Field Management" personnel are listed in the "CM" worksheet and the "Eng" worksheet. To derive the hours per day for the project field management, go to the "Estimate" worksheet and divide 1,487 hours (Cell M249-M250) by the 187-day (Cell M34) construction duration to get 7.95 hours per day.

The "Construction Management/Inspector" hours were created by the project management team specifically for this project. The hours do not drive the estimated cost for this cost category as can be seen by dividing the \$121,550 by the 1,870 hours in the estimate in Cell M255, which produce the cost of \$65/hour. The hours in this estimate consist of 1,870 Construction Management/Inspection hours; however, the 5,138 hours in the workpaper are from the FTE count from the Project Manager for Construction Management/inspectors per day should be calculated as such: 1870 hours (Cell E84 in the "CM worksheet") /187 days = 10 hours per day for 1 full time SCG Construction Manager during the course of the construction schedule.

To determine the Construction Management/Inspector hours for all other projects, please reference the "CM" tab in the estimate Excel file. The "construction management/ inspector" is related to the "SCG-Inspectors/CA's" and can be found in Column "A." The total hours for this job category are summarized in Cell K7-M7. Dividing these hours by the construction duration will produce the correct manpower estimates for each of the projects.

SoCalGas Question 3:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 36-9-09 North Section 12:
 - a. On page 210, SoCalGas lists 3,940 hours of construction management time. On the same page, SoCalGas lists 5,906 hours of project management/project services time. Given that the project is 48 days in length, it appears that SoCalGas projects 82.1 hours of construction management time per day or 10.3 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 123.0 hours of project management/project services time per day or 15.4 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 10.3 construction managers and 15.4 project managers/project services contractors on the pressure testing work for Line 36-9-09 N S12 by stating separately the duties and activities for each of the 10.3 construction managers and 15.4 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 210, SoCalGas lists 2,327 hours of project management employee time. On the same page, SoCalGas lists 1,183 hours of project field management employee time, and 77 hours of construction management/inspectors employee time. Given that the project is 48 days in

QUESTION 3 CONTINUED:

length, it appears that SoCalGas projects 48.5 hours of project management time per day or 6.1 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 24.6 hours of project field management employee time per day or 3.1 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 6.1 project managers, 3.1 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 36-9-09 N S12 by stating separately the duties and activities for each of the 6.1 project managers, 3.1 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 3:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 4:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 36-9-09 North Section 14:
 - a. On page 220, SoCalGas lists 9,900 hours of construction management time. On the same page, SoCalGas lists 4,557 hours of project management/project services time. Given that the project is 98 days in length, it appears that SoCalGas projects 101.0 hours of construction management time per day or 12.6 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 46.5 hours of project management/project services time per day or 5.8 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 12.6 construction managers and 5.8 project managers/project services contractors on the pressure testing work for Line 36-9-09 N S14 by stating separately the duties and activities for each of the 12.6 construction managers and 5.8 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 220, SoCalGas lists 2,327 hours of project management employee time. On the same page, SoCalGas lists 1,361 hours of project field management employee time, and 157 hours of construction management/inspectors employee time. Given that the project is 98 days in length, it appears that SoCalGas projects 23.7 hours of project management

QUESTION 4 CONTINUED:

time per day or 3.0 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 13.9 hours of project field management employee time per day or 1.7 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 3.0 project managers, 1.7 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 36-9-09 N S14 by stating separately the duties and activities for each of the 3.0 project managers, 1.7 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 5:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 36-9-09 North Section 15:
 - a. On page 230, SoCalGas lists 13,600 hours of construction management time. On the same page, SoCalGas lists 1,883 hours of project management/project services time. Given that the project is 95 days in length, it appears that SoCalGas projects 143.2 hours of construction management time per day or 17.9 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 19.8 hours of project management/project services time per day or 2.5 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 17.9 construction managers and 2.5 project managers/project services contractors on the pressure testing work for Line 36-9-09 N S15 by stating separately the duties and activities for each of the 17.9 construction managers and 2.5 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 230, SoCalGas lists 2,327 hours of project management employee time. On the same page, SoCalGas lists 1,473 hours of project field management employee time, and 216 hours of construction management/inspectors employee time. Given that the project is 95 days in length, it appears that SoCalGas projects 24.5 hours of project management

QUESTION 5 CONTINUED:

time per day or 3.1 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 15.5 hours of project field management employee time per day or 1.9 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 2.3 hours of construction management/inspector employee time per day or 0.3 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 3.1 project managers, 1.9 project field managers, and 0.3 construction management/inspector on the pressure testing work for Line 36-9-09 N S15 by stating separately the duties and activities for each of the 3.1 project managers, 1.9 project field managers, and 0.3 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 5:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 6:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 36-9-09 North Section 16:
 - a. On page 240, SoCalGas lists 10,200 hours of construction management time. On the same page, SoCalGas lists 9,808 hours of project management/project services time. Given that the project is 101 days in length, it appears that SoCalGas projects 101.0 hours of construction management time per day or 12.6 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 97.1 hours of project management/project services time per day or 12.1 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 12.6 construction managers and 12.1 project managers/project services contractors on the pressure testing work for Line 36-9-09 N S16 by stating separately the duties and activities for each of the 12.6 construction managers and 12.1 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 240, SoCalGas lists 2,392 hours of project management employee time. On the same page, SoCalGas lists 1,553 hours of project field management employee time, and 162 hours of construction management/inspectors employee time. Given that the project is 101 days in

QUESTION 6 CONTINUED:

length, it appears that SoCalGas projects 23.7 hours of project management time per day or 3.0 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 15.4 hours of project field management employee time per day or 1.9 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- iv. Please confirm that the above numbers of personnel identified above are correct.
- v. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 3.0 project managers, 1.9 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 36-9-09 N S16 by stating separately the duties and activities for each of the 3.0 project managers, 1.9 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- vi. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 6:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 7:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 1032 Section 11:
 - a. On page 250, SoCalGas lists 6,100 hours of construction management time. On the same page, SoCalGas lists 2,251 hours of project management/project services time. Given that the project is 60 days in length, it appears that SoCalGas projects 101.7 hours of construction management time per day or 12.7 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 37.5 hours of project management/project services time per day or 4.7 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 12.7 construction managers and 4.7 project managers/project services contractors on the pressure testing work for Line 1032 S11 by stating separately the duties and activities for each of the 12.7 construction managers and 4.7 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 250, SoCalGas lists 2,327 hours of project management employee time. On the same page, SoCalGas lists 1,313 hours of project field management employee time, and 96 hours of construction management/inspectors employee time. Given that the project is 60 days in length, it appears that SoCalGas projects 38.8 hours of project management time per day or 4.8 project managers per day for the duration of the project,

QUESTION 7 CONTINUED:

assuming an 8 hour day. Similarly, it appears that SoCalGas projects 21.9 hours of project field management employee time per day or 2.7 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 4.8 project managers, 2.7 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 1032 S11 by stating separately the duties and activities for each of the 4.8 project managers, 2.7 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 7:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 8:

- 8. With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 1032 Section 12:
 - a. On page 260, SoCalGas lists 14,900 hours of construction management time. On the same page, SoCalGas lists 2,755 hours of project management/project services time. Given that the project is 148 days in length, it appears that SoCalGas projects 100.7 hours of construction management time per day or 12.6 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 18.6 hours of project management/project services time per day or 2.3 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 12.6 construction managers and 2.3 project managers/project services contractors on the pressure testing work for Line 1032 S12 by stating separately the duties and activities for each of the 12.6 construction managers and 2.3 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 259-260, SoCalGas lists 3,203 hours of project management employee time. On the same page, SoCalGas lists 1,831 hours of project field management employee time, and 237 hours of construction management/inspectors employee time. Given that the project is 148 days in length, it appears that SoCalGas projects 21.6 hours of project management time per day or 2.7 project managers per day for the duration

QUESTION 8 CONTINUED:

of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 12.4 hours of project field management employee time per day or 1.5 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 2.7 project managers, 1.5 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 1032 S12 by stating separately the duties and activities for each of the 2.7 project managers, 1.5 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 8:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 9:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 1032 Section 13:
 - b. On page 271, SoCalGas lists 11,800 hours of construction management time. On the same page, SoCalGas lists 1,343 hours of project management/project services time. Given that the project is 114 days in length, it appears that SoCalGas projects 103.5 hours of construction management time per day or 12.9 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 11.8 hours of project management/project services time per day or 1.5 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 12.9 construction managers and 1.5 project managers/project services contractors on the pressure testing work for Line 1032 S13 by stating separately the duties and activities for each of the 12.9 construction managers and 1.5 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 271, SoCalGas lists 3,890 hours of project management employee time. On the same page, SoCalGas lists 1,827 hours of project field management employee time, and 187 hours of construction management/inspectors employee time. Given that the project is 114 days in length, it appears that SoCalGas projects 34.1 hours of project

QUESTION 9 CONTINUED:

management time per day or 4.3 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 16.0 hours of project field management employee time per day or 2.0 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 4.3 project managers, 2.0 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 1032 S13 by stating separately the duties and activities for each of the 4.3 project managers, 2.0 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 9:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 10:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 1032 Section 14:
 - a. On page 283, SoCalGas lists 9,100 hours of construction management time. On the same page, SoCalGas lists 1,273 hours of project management/project services time. Given that the project is 90 days in length, it appears that SoCalGas projects 101.1 hours of construction management time per day or 12.6 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 14.1 hours of project management/project services time per day or 1.8 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 12.6 construction managers and 1.8 project managers/project services contractors on the pressure testing work for Line 1032 S14 by stating separately the duties and activities for each of the 12.6 construction managers and 1.8 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 282, SoCalGas lists 3,568 hours of project management employee time. On the same page, SoCalGas lists 1,405 hours of project field management employee time, and 144 hours of construction management/inspectors employee time. Given that the project is 90 days in length, it appears that SoCalGas projects 39.6 hours of project

QUESTION 10 CONTINUED:

management time per day or 5.0 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 15.6 hours of project field management employee time per day or 2.0 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 1.6 hours of construction management/inspector employee time per day or 0.2 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 5.0 project managers, 2.0 project field managers, and 0.2 construction management/inspector on the pressure testing work for Line 1032 S14 by stating separately the duties and activities for each of the 5.0 project managers, 2.0 project field managers, and 0.2 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 10:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 11:

- 11. With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 44-1008:
 - b. On page 298, SoCalGas lists 33,850 hours of construction management time. On the same page, SoCalGas lists 1,716 hours of project management/project services time. Given that the project is 225 days in length, it appears that SoCalGas projects 150.4 hours of construction management time per day or 18.8 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 7.6 hours of project managers/project services time per day or 1.0 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 18.8 construction managers and 1.0 project managers/project services contractors on the pressure testing work for Line 44-1008 by stating separately the duties and activities for each of the 18.8 construction managers and 1.0 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 297, SoCalGas lists 12,186 hours of project management employee time. On the same page, SoCalGas lists 3,308 hours of project field management employee time, and 4,500 hours of construction management/inspectors employee time. Given that the project is 225 days in length, it appears that SoCalGas projects 54.2 hours of project management time per day or 6.8 project managers per day for the duration

QUESTION 11 CONTINUED:

of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 14.7 hours of project field management employee time per day or 1.8 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 20.0 hours of construction management/inspector employee time per day or 2.5 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 6.8 project managers, 1.8 project field managers, and 2.5 construction management/inspector on the pressure testing work for Line 44-1008 by stating separately the duties and activities for each of the 6.8 project managers, 1.8 project field managers, and 2.5 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 11:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.

SoCalGas Question 12:

- With respect to the workpapers to SCG-15 that were provided in response to TURN/SCGC-SEU-001, Q.1, for the replacement work on Line 2000-E Cactus City Compressor Station:
 - a. On page 308, SoCalGas lists 1,920 hours of construction management time. On the same page, SoCalGas lists 1,196 hours of project management/project services time. Given that the project is 43 days in length, it appears that SoCalGas projects 44.7 hours of construction management time per day or 5.6 construction managers per day for the duration of the project, assuming an 8 hour day. Similarly, SoCalGas projects 27.8 hours of project managers/project services time per day or 3.5 project managers/project services contractors per day for the duration of the project, assuming an 8 hour day.
 - i. Please confirm that the above numbers of personnel identified above are correct.
 - ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 5.6 construction managers and 3.5 project managers/project services contractors on the pressure testing work for Line 2000-E Cactus City Compressor Station by stating separately the duties and activities for each of the 5.6 construction managers and 3.5 project managers/project services contractors projected to be working on this project.
 - iii. If SoCalGas disagrees with the calculation of the number of contract personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.
 - b. On page 307, SoCalGas lists 1,959 hours of project management employee time. On the same page, SoCalGas lists 697 hours of project field management employee time, and 344 hours of construction

QUESTION 12 CONTINUED:

management/inspectors employee time. Given that the project is 43 days in length, it appears that SoCalGas projects 45.6 hours of project management time per day or 5.7 project managers per day for the duration of the project, assuming an 8 hour day. Similarly, it appears that SoCalGas projects 16.2 hours of project field management employee time per day or 2.0 project field managers per day for the duration of the project, assuming an 8 hour day. Furthermore, it appears that SoCalGas projects 8.0 hours of construction management/inspector employee time per day or 1.0 construction manager/inspectors for the duration of the project, assuming an 8 hour day.

- i. Please confirm that the above numbers of personnel identified above are correct.
- ii. If the numbers are correct, please explain in detail how SoCalGas would appropriately utilize 5.7 project managers, 2.0 project field managers, and 1.0 construction management/inspector on the pressure testing work for Line 2000-E Cactus City Compressor Station by stating separately the duties and activities for each of the 5.7 project managers, 2.0 project field managers, and 1.0 construction management/inspector projected to be working on this project.
- iii. If SoCalGas disagrees with the calculation of the number of SoCalGas personnel identified for any category listed above, please provide a corrected number and answer the previous question using the corrected number.

Utility Response 12:

SoCalGas objects to this request on the grounds that it seeks information that is beyond the scope of permissible discovery contemplated by Rule 10.1 of the Rules of Practice and Procedure of the State of California Public Utilities Commission and requires SoCalGas to perform a mathematical analysis of information that is in the possession of TURN/SCGC and, thus, could be performed equally by TURN/SCGC.