

Application of SOUTHERN CALIFORNIA GAS)
COMPANY for authority to update its gas)
revenue requirement and base rates)
effective January 1, 2024 (U 904-G))

Application No. 22-05-015

Exhibit No.: (SCG-06-WP-R-E)

REVISED WORKPAPERS TO
PREPARED DIRECT TESTIMONY
OF RICK H. CHIAPA / AARON M. BELL / STEVE A. HRUBY
ON BEHALF OF SOUTHERN CALIFORNIA GAS COMPANY

ERRATA

BEFORE THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF CALIFORNIA

MAY 2023



2024 General Rate Case - REVISED

ERRATA

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Southern California Gas Company
 2024 GRC - REVISED
 ERRATA

Overall Summary For Exhibit No. SCG-06-WP-R-E

Area:	GAS TRANSMISSION
Witness:	Rick H. Chiapa

Description	In 2021 \$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Non-Shared Services	38,266	37,818	38,399	38,754
Shared Services	9,008	10,754	12,128	13,303
Total	47,274	48,572	50,527	52,057

Note: Totals may include rounding differences.

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa

Summary of Non-Shared Services Workpapers:

Description	In 2021 \$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
	48	0	0	0
A. PIPELINE & INSTRUMENTATION OPERATIONS	17,827	18,713	18,713	18,713
B. COMPRESSOR STATION OPERATIONS	10,672	11,508	11,924	12,003
C. CATHODIC PROTECTION OPERATIONS	1,352	1,352	1,352	1,352
D. TECHNICAL SERVICES	7,519	5,373	5,373	5,373
E. STORAGE PRODUCTS MANAGER	158	164	164	164
F. CONTROL CENTER MODERNIZATION	690	708	873	1,149
Total	38,266	37,818	38,399	38,754

Note: Totals may include rounding differences.

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000

Summary for Category: A. PIPELINE & INSTRUMENTATION OPERATIONS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	14,731	15,617	15,617	15,617
Non-Labor	3,096	3,096	3,096	3,096
NSE	0	0	0	0
Total	17,827	18,713	18,713	18,713
FTE	130.9	139.9	139.9	139.9

Workpapers belonging to this Category:

2GT000.000 Pipeline and Instrumentation Operations

Labor	14,731	15,617	15,617	15,617
Non-Labor	3,096	3,096	3,096	3,096
NSE	0	0	0	0
Total	17,827	18,713	18,713	18,713
FTE	130.9	139.9	139.9	139.9

Note: Totals may include rounding differences.

Beginning of Workpaper
2GT000.000 - Pipeline and Instrumentation Operations

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

Activity Description:

Pipeline & Instrumentation Operations within Gas Transmission Operations consists of instrument leak survey, pipeline patrol, locate and mark activities, measurement and regulation inspections, and odorization of natural gas.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded forecast methodology plus the incremental costs for nine new employees. In developing the TY 2024 forecast, SoCalGas evaluated the historical expenditures from 2017 through 2021 for the Pipeline and Instrumentation category. Increases in recent years for Pipeline and Instrumentation Operations are present and can be attributed to newly installed automated equipment by the Pipeline Safety Enhancement Program (PSEP) which requires more compliance inspections and increased pipeline patrol in areas susceptible to land movement and washouts. The increased workload associated with this work, as well as an increase in system maintenance, makes using historical averages an inaccurate method of forecasting. Therefore, the most accurate estimate of anticipated future needs is provided by base year recorded plus incremental costs.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded forecast methodology plus the incremental costs for nine new employees. In developing the TY 2024 forecast, SoCalGas evaluated the historical expenditures from 2017 through 2021 for the Pipeline and Instrumentation category. Increases in recent years for Pipeline and Instrumentation Operations are present and can be attributed to newly installed automated equipment by the Pipeline Safety Enhancement Program (PSEP) which requires more compliance inspections and increased pipeline patrol in areas susceptible to land movement and washouts. The increased workload associated with this work, as well as an increase in system maintenance, makes using historical averages an inaccurate method of forecasting. Therefore, the most accurate estimate of anticipated future needs is provided by base year recorded plus incremental costs.

NSE - Base YR Rec

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		11,744	11,836	11,542	11,729	14,731	15,617	15,617	15,617	
Non-Labor		9,140	6,287	3,198	3,846	3,096	3,096	3,096	3,096	
NSE		0	0	0	0	0	0	0	0	
Total		20,883	18,124	14,740	15,576	17,827	18,713	18,713	18,713	
FTE		107.2	100.9	103.8	104.5	130.9	139.9	139.9	139.9	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	14,731	14,731	14,731	886	886	886	15,617	15,617	15,617
Non-Labor	Base YR Rec	3,096	3,096	3,096	0	0	0	3,096	3,096	3,096
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		17,827	17,827	17,827	886	886	886	18,713	18,713	18,713
FTE	Base YR Rec	130.9	130.9	130.9	9.0	9.0	9.0	139.9	139.9	139.9

Forecast Adjustment Details:

Year	Labor	NLbr	NSE	Total	FTE	Adj Type
2022	381	0	0	381	4.0	1-Sided Adj
Explanation:	Leak Survey & Patrol RAMP C4, 4 PT (50% of \$91K), 1 Standby (50% of \$91), 3 Welding Specialists (50% of \$101K)					
2022	381	0	0	381	4.0	1-Sided Adj
Explanation:	Pipeline Maintenance RAMP C7, 3 Welding Specialists (50% of \$101K), 4 Pipeline techs (50% of \$91K), and 1 Standby (50% of \$91K)					
2022	62	0	0	62	0.5	1-Sided Adj
Explanation:	Measurement & Regulation Stations - Maintenance RAMP C13, 1 MCS (50% of \$125K)					
2022	62	0	0	62	0.5	1-Sided Adj
Explanation:	Odorization RAMP base. C14, , 1 MCS (50% of \$125K)					
2022 Total	886	0	0	886	9.0	
2023	381	0	0	381	4.0	1-Sided Adj
Explanation:	Ongoing costs for new hires in 2022 RAMP C7					
2023	62	0	0	62	0.5	1-Sided Adj
Explanation:	Ongoing costs for new hires in 2022. RAMP C13					
2023	62	0	0	62	0.5	1-Sided Adj
Explanation:	Ongoing costs for new hires in 2022. RAMP C14					
2023	381	0	0	381	4.0	1-Sided Adj
Explanation:	Ongoing costs for new hires in 2022 RAMP C4					
2023 Total	886	0	0	886	9.0	
2024	381	0	0	381	4.0	1-Sided Adj
Explanation:	Ongoing RAMP costs from new hires in 2022 RAMP C4					
2024	381	0	0	381	4.0	1-Sided Adj
Explanation:	Ongoing RAMP costs from new hires in 2022 RAMP C7					
2024	62	0	0	62	0.5	1-Sided Adj

Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj_Type</u>
Explanation:	Ongoing RAMP costs from new hires in 2022 RAMP C13					
2024	62	0	0	62	0.5	1-Sided Adj
Explanation:	Ongoing RAMP costs from new hires in 2022 RAMP C14					
2024 Total	886	0	0	886	9.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	9,196	9,287	9,195	9,848	12,564
Non-Labor	8,141	5,791	2,983	3,673	3,156
NSE	0	0	0	0	0
Total	17,337	15,078	12,178	13,521	15,720
FTE	92.3	85.6	87.2	89.2	111.0
Adjustments (Nominal \$) **					
Labor	-192	18	-7	-164	-42
Non-Labor	-19	-26	0	-100	-61
NSE	0	0	0	0	0
Total	-211	-9	-8	-264	-103
FTE	-1.3	0.1	-0.3	-2.1	-0.8
Recorded-Adjusted (Nominal \$)					
Labor	9,004	9,305	9,187	9,684	12,521
Non-Labor	8,122	5,764	2,983	3,573	3,096
NSE	0	0	0	0	0
Total	17,126	15,069	12,170	13,257	15,617
FTE	90.9	85.6	86.9	87.1	110.1
Vacation & Sick (Nominal \$)					
Labor	1,526	1,601	1,742	1,706	2,210
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	1,526	1,601	1,742	1,706	2,210
FTE	16.3	15.3	16.9	17.4	20.8
Escalation to 2021\$					
Labor	1,213	930	613	339	0
Non-Labor	1,018	523	215	273	0
NSE	0	0	0	0	0
Total	2,231	1,453	828	612	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	11,744	11,836	11,542	11,729	14,731
Non-Labor	9,140	6,287	3,198	3,846	3,096
NSE	0	0	0	0	0
Total	20,883	18,124	14,740	15,576	17,827
FTE	107.2	100.9	103.8	104.5	130.9

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	-192	18	-7	-164	-42
Non-Labor	-19	-26	-0.061	-100	-61
NSE	0	0	0	0	0
Total	-211	-9	-8	-264	-103
FTE	-1.3	0.1	-0.3	-2.1	-0.8

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017	-18	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017	-132	-14	0	-0.8	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017	-31	0	0	-0.2	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017	-2	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017	0	-4	0	0.0	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017	-9	-1	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017 Total	-192	-19	0	-1.3	
2018	3	-2	0	0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018	13	-24	0	0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2018	0	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018	-1	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018	3	0	0	0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018 Total	18	-26	0	0.1	
2019	-5	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2019	-1	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2019	-1	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2019 Total	-7	0	0	-0.3	
2020	-2	-1	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-7	-1	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-16	-6	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-3	0	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-15	-31	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2020	-2	-4	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-3	-1	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-13	-46	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-7	-7	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-17	-3	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-18	-7	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	-4	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-52	-1	0	-0.5	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	-4	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	0	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	-6	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	0	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	0	0	0	-0.1	CCTR Transf To 2200-2011.000

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	0	0	0	0.0	CCTR Transf To 2200-2011.002
Explanation:	Transfer costs to GOSI CC 2200-2011.002 related to SB1371 (BLM) Emissions Strategy Program				
2020	0	3	0	0.0	CCTR Transf From 2200-1164.000
Explanation:	Helium ordered for Transmission operation incorrectly posted to Crenshaw base cost center.				
2020	0	3	0	0.0	CCTR Transf From 2200-1164.000
Explanation:	Helium ordered on behalf of Transmission incorrectly posted to Crenshaw Facilities cost center.				
2020	0	3	0	0.0	CCTR Transf From 2200-1164.000
Explanation:	Helium ordered on behalf of Transmission incorrectly posted to Crenshaw Facilities cost center.				
2020	0	3	0	0.0	CCTR Transf From 2200-1164.000
Explanation:	Helium ordered on behalf of Transmission incorrectly posted to Crenshaw Facilities cost center.				
2020 Total	-164	-100	0	-2.1	
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-4	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-31	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-7	0	0.0	1-Sided Adj

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-8	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	-38	-1	0	-0.4	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	0	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	0	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	-1	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	-2	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021 Total	-42	-61	0	-0.8	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C04 T1 & T2

RAMP Line Item Name: Leak Survey & Patrol (HCA & Non-HCA)

Tranche(/s): Tranche1: Transmission - HCA; Tranche2: Transmission - Non-HCA

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	606	731	731	731	249	318
Tranche 2 Cost Estimate	1,230	1,486	1,486	1,486	505	645

Cost Estimate Changes from RAMP:

The RAMP filing did not include the entirety of pipeline patrol and leak survey.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Miles of Pipeline Surveyed & Patrolled	2,234.00	2,234.00	2,234.00	2,234.00	2,011.00	2,569.00
Tranche 2 Miles of Pipeline Surveyed & Patrolled	4,536.00	4,536.00	4,536.00	4,536.00	4,082.00	5,216.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	381.000	901.000
Tranche 2	108.000	577.000

RSE Changes from RAMP:

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 2

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C07 T1 & T2

RAMP Line Item Name: Pipeline Maintenance (HCA & Non-HCA)

Tranche(/s): Tranche1: Transmission - HCA; Tranche2: Transmission - Non-HCA

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	153	278	278	278	134	171
Tranche 2 Cost Estimate	312	568	568	568	272	347

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 # of pipeline orders	311.00	317.00	317.00	317.00	285.00	364.00
Tranche 2 # of pipeline orders	630.00	643.00	643.00	643.00	579.00	740.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	639.000	1,336.000
Tranche 2	334.000	856.000

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 3

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C13 T1 & T2

RAMP Line Item Name: Measurement & Regulation Stations - Maintenance (HCA & non-HCA)

Tranche(/s): Tranche1: Transmission - HCA; Tranche2: Transmission - Non-HCA

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	685	705	705	705	601	767
Tranche 2 Cost Estimate	1,392	1,434	1,434	1,434	1,219	1,558

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 # of compliance and preventative work orders	1,030.00	1,030.00	1,030.00	1,030.00	978.00	1,184.00
Tranche 2 # of compliance and preventative work orders	2,090.00	2,090.00	2,090.00	2,090.00	1,986.00	2,404.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	297.000	129.000
Tranche 2	156.000	83.000

RSE Changes from RAMP:

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

RAMP Item # 4

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C14

RAMP Line Item Name: Odorization

Tranche(/s): Tranche1: Transmission Facilities

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	620	682	682	682	648	784

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 LBS of odorant	146,341.00	146,341.00	146,341.00	146,341.00	139,024.00	168,292.00

Work Unit Changes from RAMP:

2020 none.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	2.600

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 5

RAMP Activity

RAMP Chapter: SCG-Risk-2 Excavation Damage (Dig-In) on the Gas System

RAMP Line Item ID: C02

RAMP Line Item Name: Locate & Mark Training (HP)

Tranche(/s): Tranche1: Locate & Mark Training (HP)

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	5	5	5	5	36	43

Cost Estimate Changes from RAMP:

All identified RAMP costs are not associated with Transmission.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 training hours	72.00	72.00	72.00	72.00	543.00	657.00

Work Unit Changes from RAMP:

NA

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

Providing Locator training is standard practice across the industry. The need for in-depth knowledge for the use of proper tools and resources is paramount for the efficient and accurate application of L & M procedures. There are no known sources to find data associated with operators who do not have a training program and SMEs are unable to reliably speculate on the quantitative benefits of training.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 6

RAMP Activity

RAMP Chapter: SCG-Risk-2 Excavation Damage (Dig-In) on the Gas System

RAMP Line Item ID: C04

RAMP Line Item Name: Locate & Mark Activities (HP)

Tranche(/s): Tranche1: Locate & Mark Activities (HP)

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	3,111	3,111	3,111	3,111	4,346	5,261

Cost Estimate Changes from RAMP:

Activities may be included in other chapters of the GRC.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Ticket count	136,044.00	136,044.00	136,044.00	136,044.00	192,324.00	232,813.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	53.000	55.000

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology, as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 7

RAMP Activity

RAMP Chapter: SCG-Risk-2 Excavation Damage (Dig-In) on the Gas System

RAMP Line Item ID: C06

RAMP Line Item Name: Locate and Mark Annual Refresher Training and Competency Program (HP)

Tranche(/s): Tranche1: Locate and Mark Annual Refresher Training and Competency Program (HP)

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	9	9	9	9	14	16

Cost Estimate Changes from RAMP:

All costs are not contained within Transmission.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Training Hours	161.00	161.00	161.00	161.00	244.00	295.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	158.000	121.000

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology, as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 8

RAMP Activity

RAMP Chapter: SCG-Risk-2 Excavation Damage (Dig-In) on the Gas System

RAMP Line Item ID: C26

RAMP Line Item Name: Pipeline Patrol and Pipeline Markers (HP)

Tranche(/s): Tranche1: Pipeline Patrol and Pipeline Markers (HP)

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	452	452	452	452	451	576

Cost Estimate Changes from RAMP:

Other chapters may also have costs associated with this.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Number of items	2,181.00	2,181.00	2,181.00	2,181.00	2,181.00	2,640.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	46.000	39.000

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. PIPELINE & INSTRUMENTATION OPERATIONS
 Category-Sub: 1. PIPELINE & INSTRUMENTATION OPERATIONS
 Workpaper: 2GT000.000 - Pipeline and Instrumentation Operations

RAMP Item # 9

RAMP Activity

RAMP Chapter: SCG-Risk-2 Excavation Damage (Dig-In) on the Gas System

RAMP Line Item ID: C28

RAMP Line Item Name: Company Excavator Training (HP)

Tranche(/s): Tranche1: Company Excavator Training (HP)

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	14	14	14	14	36	47

Cost Estimate Changes from RAMP:

Other chapters may have costs associated with this.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Training hours	2,020.00	2,020.00	2,020.00	2,020.00	5,376.00	6,508.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

Providing training is a common, necessary, and expected practice regardless of the industry. It is important to properly train employees on the safe use of excavation implements or machines. When working around a hazardous material such as natural gas, many safety practices and protocols have been developed internally and by institutions such as OSHA to promote safety and personal wellbeing. It is unknown where data can be found to represent an entity that does not provide adequate training, and SMEs cannot determine the quantitative effects of these activities.

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. COMPRESSOR STATION OPERATIONS
 Workpaper: 2GT001.000

Summary for Category: B. COMPRESSOR STATION OPERATIONS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	4,886	5,722	6,138	6,217
Non-Labor	5,786	5,786	5,786	5,786
NSE	0	0	0	0
Total	10,672	11,508	11,924	12,003
FTE	41.3	49.3	53.3	54.3

Workpapers belonging to this Category:

2GT001.000 Compressor Station Operations

Labor	4,886	5,722	6,138	6,217
Non-Labor	5,786	5,786	5,786	5,786
NSE	0	0	0	0
Total	10,672	11,508	11,924	12,003
FTE	41.3	49.3	53.3	54.3

Note: Totals may include rounding differences.

Beginning of Workpaper
2GT001.000 - Compressor Station Operations

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. COMPRESSOR STATION OPERATIONS
 Category-Sub: 1. COMPRESSOR STATION OPERATIONS
 Workpaper: 2GT001.000 - Compressor Station Operations

Activity Description:

The Gas Compression Operations function is responsible for the safe and reliable day-to-day operation and maintenance of SoCalGas's nine compressor station facilities and related infrastructure .

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology to which the anticipated incremental activity costs for new hires were added. This methodology was selected because 2021 spending best represents the best starting point for future anticipated annual O&M costs associated with the completion of multiple compressor upgrade projects across the organization. The new incremental hires are essential to the completion of the planned upgrade work. Therefore, this represents the most accurate estimate of the anticipated future expenditure during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology to which the anticipated incremental activity costs for new hires were added. This methodology was selected because 2021 spending best represents the best starting point for future anticipated annual O&M costs associated with the completion of multiple compressor upgrade projects across the organization. The new incremental hires are essential to the completion of the planned upgrade work. Therefore, this represents the most accurate estimate of the anticipated future expenditure during the forecast period.

NSE - Base YR Rec

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		5,286	5,329	5,329	5,047	4,886	5,722	6,138	6,217	
Non-Labor		5,372	4,600	4,895	5,853	5,786	5,786	5,786	5,786	
NSE		0	0	0	0	0	0	0	0	
Total		10,659	9,929	10,224	10,900	10,672	11,508	11,924	12,003	
FTE		46.1	45.4	45.0	43.0	41.3	49.3	53.3	54.3	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. COMPRESSOR STATION OPERATIONS
 Category-Sub: 1. COMPRESSOR STATION OPERATIONS
 Workpaper: 2GT001.000 - Compressor Station Operations

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	4,886	4,886	4,886	836	1,252	1,331	5,722	6,138	6,217
Non-Labor	Base YR Rec	5,786	5,786	5,786	0	0	0	5,786	5,786	5,786
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		10,672	10,672	10,672	836	1,252	1,331	11,508	11,924	12,003
FTE	Base YR Rec	41.3	41.3	41.3	8.0	12.0	13.0	49.3	53.3	54.3

Forecast Adjustment Details:

Year	Labor	NLbr	NSE	Total	FTE	Adj Type
2022	836	0	0	836	8.0	1-Sided Adj
Explanation:	Compressor Station Maintenance. 1 Station Tech (Station Tech Level 5 avg \$44 hr) 3 Inst. Spec. (IS Level 8 avg \$52 hr) 1 SMS Mechanic (Station Maint Spec - Level 8 avg \$52/hr) 1 Operator (Station Maint Spec - Level 8 avg \$52/hr) 1 Base Assistant (Level 3 avg \$38/hr) 1 MGMT M&C Supervisor 125 RAMP C11					
2022 Total	836	0	0	836	8.0	
2023	1,252	0	0	1,252	12.0	1-Sided Adj
Explanation:	1 Station Tech (Station Tech Level 5 avg \$44 hr) 1 Mgmt. M&C Supervisor (Avg \$125K) 1 Union Operator (Station Maint Spec - Level 8 avg \$52/hr) 1 Station Tech (Station Tech Level 5 avg \$44 hr) plus carry over from 2022. RAMP C11					
2023 Total	1,252	0	0	1,252	12.0	
2024	1,331	0	0	1,331	13.0	1-Sided Adj
Explanation:	1 Base Assistant (Level 3 avg \$38/hr) plus carry over. RAMP C11					
2024 Total	1,331	0	0	1,331	13.0	

Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: B. COMPRESSOR STATION OPERATIONS
Category-Sub: 1. COMPRESSOR STATION OPERATIONS
Workpaper: 2GT001.000 - Compressor Station Operations

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	4,053	4,189	4,242	4,207	4,152
Non-Labor	4,774	4,217	4,566	6,531	6,212
NSE	0	0	0	0	0
Total	8,827	8,407	8,808	10,738	10,365
FTE	39.2	38.6	37.8	36.5	34.8
Adjustments (Nominal \$) **					
Labor	0	0	0	-40	1
Non-Labor	0	0	0	-1,094	-426
NSE	0	0	0	0	0
Total	0	0	0	-1,134	-425
FTE	0.0	0.0	0.0	-0.5	0.1
Recorded-Adjusted (Nominal \$)					
Labor	4,053	4,189	4,242	4,167	4,153
Non-Labor	4,774	4,217	4,566	5,437	5,786
NSE	0	0	0	0	0
Total	8,827	8,407	8,808	9,604	9,939
FTE	39.2	38.5	37.7	35.9	34.8
Vacation & Sick (Nominal \$)					
Labor	687	721	804	734	733
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	687	721	804	734	733
FTE	6.9	6.9	7.3	7.1	6.5
Escalation to 2021\$					
Labor	546	419	283	146	0
Non-Labor	598	383	329	416	0
NSE	0	0	0	0	0
Total	1,145	802	612	561	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	5,286	5,329	5,329	5,047	4,886
Non-Labor	5,372	4,600	4,895	5,853	5,786
NSE	0	0	0	0	0
Total	10,659	9,929	10,224	10,900	10,672
FTE	46.1	45.4	45.0	43.0	41.3

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. COMPRESSOR STATION OPERATIONS
 Category-Sub: 1. COMPRESSOR STATION OPERATIONS
 Workpaper: 2GT001.000 - Compressor Station Operations

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs						
Years	2017	2018	2019	2020	2021	
Labor	0	0	0	-40	0.882	
Non-Labor	0	0	0	-1,094	-426	
NSE	0	0	0	0	0	
Total	0	0	0	-1,134	-425	
FTE	0.0	0.0	0.0	-0.5	0.1	

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	-1	-1	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-3	-6	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-12	-774	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-18	-301	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-6	-8	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. COMPRESSOR STATION OPERATIONS
 Category-Sub: 1. COMPRESSOR STATION OPERATIONS
 Workpaper: 2GT001.000 - Compressor Station Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2020	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020 Total	-40	-1,094	0	-0.5	
2021	0	-3	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-331	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-89	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	1	0	0	0.1	CCTR Transf From 2200-2038.000
Explanation:	Transfer from FIMP WKP 2TD004 to base business WKP 2GT001; base O&M activity				
2021	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021 Total	1	-426	0	0.1	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. COMPRESSOR STATION OPERATIONS
 Category-Sub: 1. COMPRESSOR STATION OPERATIONS
 Workpaper: 2GT001.000 - Compressor Station Operations

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C11

RAMP Line Item Name: Compressor Station Maintenance

Tranche(s): Tranche1: Transmission - Facilities

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	10,671	11,507	11,923	12,002	7,312	9,343

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 # of Compliance and Preventative maintenance work orders	3,843.00	4,035.00	4,035.00	4,035.00	3,651.00	4,419.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	3.000	261.000

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology, as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. CATHODIC PROTECTION OPERATIONS
 Workpaper: 2GT002.000

Summary for Category: C. CATHODIC PROTECTION OPERATIONS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	1,044	1,044	1,044	1,044
Non-Labor	309	309	309	309
NSE	0	0	0	0
Total	1,353	1,353	1,353	1,353
FTE	9.7	9.7	9.7	9.7

Workpapers belonging to this Category:

2GT002.000 Cathodic Protection Operations

Labor	1,044	1,044	1,044	1,044
Non-Labor	309	309	309	309
NSE	0	0	0	0
Total	1,353	1,353	1,353	1,353
FTE	9.7	9.7	9.7	9.7

Note: Totals may include rounding differences.

Beginning of Workpaper
2GT002.000 - Cathodic Protection Operations

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. CATHODIC PROTECTION OPERATIONS
 Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
 Workpaper: 2GT002.000 - Cathodic Protection Operations

Activity Description:

The primary function of Cathodic Protection Operations is to control corrosion of underground structures and is commonly used as a supplement to coatings on underground structures.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. SoCalGas evaluated the historical expenditures from 2017 through 2021 for Cathodic Protection Operations. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded is the most accurate representation of future costs for this category during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. SoCalGas evaluated the historical expenditures from 2017 through 2021 for Cathodic Protection Operations. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded is the most accurate representation of future costs for this category during the forecast period.

NSE - Base YR Rec

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		1,106	1,040	1,056	1,036	1,044	1,044	1,044	1,044	
Non-Labor		363	358	409	503	309	308	308	308	
NSE		0	0	0	0	0	0	0	0	
Total		1,470	1,398	1,465	1,539	1,352	1,352	1,352	1,352	
FTE		10.2	9.6	9.6	9.4	9.7	9.7	9.7	9.7	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. CATHODIC PROTECTION OPERATIONS
 Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
 Workpaper: 2GT002.000 - Cathodic Protection Operations

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	1,044	1,044	1,044	0	0	0	1,044	1,044	1,044
Non-Labor	Base YR Rec	309	309	309	0	0	0	309	309	309
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		1,352	1,352	1,352	0	0	0	1,352	1,352	1,352
FTE	Base YR Rec	9.7	9.7	9.7	0.0	0.0	0.0	9.7	9.7	9.7

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: C. CATHODIC PROTECTION OPERATIONS
Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
Workpaper: 2GT002.000 - Cathodic Protection Operations

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	848	818	841	867	887
Non-Labor	323	328	381	470	309
NSE	0	0	0	0	0
Total	1,171	1,147	1,222	1,337	1,196
FTE	8.7	8.2	8.2	8.1	8.1
Adjustments (Nominal \$) **					
Labor	0	-1	0	-11	0
Non-Labor	0	0	0	-3	0
NSE	0	0	0	0	0
Total	0	-1	0	-14	0
FTE	0.0	-0.1	-0.1	-0.3	0.0
Recorded-Adjusted (Nominal \$)					
Labor	848	818	840	856	887
Non-Labor	323	328	381	467	309
NSE	0	0	0	0	0
Total	1,171	1,146	1,222	1,323	1,196
FTE	8.7	8.1	8.0	7.8	8.1
Vacation & Sick (Nominal \$)					
Labor	144	141	159	151	157
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	144	141	159	151	157
FTE	1.5	1.5	1.6	1.6	1.6
Escalation to 2021\$					
Labor	114	82	56	30	0
Non-Labor	40	30	27	36	0
NSE	0	0	0	0	0
Total	155	112	84	66	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	1,106	1,040	1,056	1,036	1,044
Non-Labor	363	358	409	503	309
NSE	0	0	0	0	0
Total	1,470	1,398	1,465	1,539	1,352
FTE	10.2	9.6	9.6	9.4	9.7

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: C. CATHODIC PROTECTION OPERATIONS
Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
Workpaper: 2GT002.000 - Cathodic Protection Operations

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	-0.776	-0.077	-11	0
Non-Labor	0	-0.151	0	-3	-0.300
NSE	0	0	0	0	0
Total	0	-0.927	-0.077	-14	-0.300
FTE	0.0	-0.1	-0.1	-0.3	0.0

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018	-1	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018 Total	-1	0	0	-0.1	
2019	0	0	0	-0.1	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2019 Total	0	0	0	-0.1	
2020	-4	0	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-6	-3	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020 Total	-11	-3	0	-0.3	
2021	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: C. CATHODIC PROTECTION OPERATIONS
Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
Workpaper: 2GT002.000 - Cathodic Protection Operations

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2021 Total	0	0	0	0.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. CATHODIC PROTECTION OPERATIONS
 Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
 Workpaper: 2GT002.000 - Cathodic Protection Operations

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C02 T1&T2

RAMP Line Item Name: Cathodic Protection - Maintenance (HCA & Non-HCA)

Tranche(/s): Tranche1: Transmission - HCA; Tranche2: Transmission - Non-HCA

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	445	445	445	445	344	440
Tranche 2 Cost Estimate	906	906	906	906	699	893

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 # of CP and follow up reads	584.00	581.00	581.00	617.00	555.00	709.00
Tranche 2 # of CP and follow up reads	1,185.00	1,181.00	1,181.00	1,181.00	1,062.00	1,358.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	532.000	276.000
Tranche 2	279.000	177.000

RSE Changes from RAMP:

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: C. CATHODIC PROTECTION OPERATIONS
Category-Sub: 1. CATHODIC PROTECTION OPERATIONS
Workpaper: 2GT002.000 - Cathodic Protection Operations

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Workpaper: 2GT003.000

Summary for Category: D. TECHNICAL SERVICES

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	1,003	810	810	810
Non-Labor	6,516	4,564	4,564	4,564
NSE	0	0	0	0
Total	7,519	5,374	5,374	5,374
FTE	10.9	8.4	8.4	8.4

Workpapers belonging to this Category:

2GT003.000 Technical Services

Labor	1,003	810	810	810
Non-Labor	6,516	4,564	4,564	4,564
NSE	0	0	0	0
Total	7,519	5,374	5,374	5,374
FTE	10.9	8.4	8.4	8.4

Note: Totals may include rounding differences.

Beginning of Workpaper
2GT003.000 - Technical Services

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Category-Sub: 1. TECHNICAL SERVICES
 Workpaper: 2GT003.000 - Technical Services

Activity Description:

Technical Services provides many of the technical and administrative services needed for the successful and timely completion of operation and maintenance (O&M) activities. The primary activities and costs in this category include the planning and permitting of projects, including right-of-way maintenance and strength testing for class location change projects.

Forecast Explanations:

Labor - 5-YR Average

The TY 2024 forecast was developed using the five-year average methodology to which the anticipated incremental costs of a new employee were added. Given the activities described previously and a review of historical costs and underlying cost drivers, SoCalGas determined that the five-year average forecast methodology best reflects the anticipated needs of Technical Services in the forecast period .

Non-Labor - 5-YR Average

The TY 2024 forecast was developed using the five-year average methodology to which the anticipated incremental costs of a new employee were added. Given the activities described previously and a review of historical costs and underlying cost drivers, SoCalGas determined that the five-year average forecast methodology best reflects the anticipated needs of Technical Services in the forecast period .

NSE - 5-YR Average

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		753	541	615	661	1,003	809	809	809	
Non-Labor		3,563	2,429	4,612	5,698	6,516	4,564	4,564	4,564	
NSE		0	0	0	0	0	0	0	0	
Total		4,316	2,970	5,228	6,359	7,519	5,373	5,373	5,373	
FTE		7.5	5.7	6.2	6.5	10.9	8.4	8.4	8.4	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Category-Sub: 1. TECHNICAL SERVICES
 Workpaper: 2GT003.000 - Technical Services

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	5-YR Average	715	715	715	95	95	95	810	810	810
Non-Labor	5-YR Average	4,564	4,564	4,564	0	0	0	4,564	4,564	4,564
NSE	5-YR Average	0	0	0	0	0	0	0	0	0
Total		5,278	5,278	5,278	95	95	95	5,373	5,373	5,373
FTE	5-YR Average	7.4	7.4	7.4	1.0	1.0	1.0	8.4	8.4	8.4

Forecast Adjustment Details:

Year	Labor	NLbr	NSE	Total	FTE	Adj Type
2022	95	0	0	95	1.0	1-Sided Adj
Explanation:	Right of Way RAMP base. C8 1 Incremental headcount for ROW C8					
2022 Total	95	0	0	95	1.0	
2023	95	0	0	95	1.0	1-Sided Adj
Explanation:	RAMP C8 Includes ongoing costs from new hire in 2022.					
2023 Total	95	0	0	95	1.0	
2024	95	0	0	95	1.0	1-Sided Adj
Explanation:	C8 Includes ongoing costs from new hire in 2022					
2024 Total	95	0	0	95	1.0	

Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: D. TECHNICAL SERVICES
Category-Sub: 1. TECHNICAL SERVICES
Workpaper: 2GT003.000 - Technical Services

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	577	425	490	547	852
Non-Labor	3,167	2,294	4,381	5,321	6,432
NSE	0	0	0	0	0
Total	3,744	2,719	4,871	5,868	7,284
FTE	6.4	4.8	5.1	5.5	9.2
Adjustments (Nominal \$) **					
Labor	0	0	0	-1	0
Non-Labor	-1	-66	-79	-28	84
NSE	0	0	0	0	0
Total	-1	-66	-79	-29	84
FTE	0.0	0.0	0.0	-0.1	0.0
Recorded-Adjusted (Nominal \$)					
Labor	577	425	490	546	852
Non-Labor	3,166	2,227	4,302	5,293	6,516
NSE	0	0	0	0	0
Total	3,743	2,652	4,792	5,839	7,368
FTE	6.4	4.8	5.2	5.4	9.2
Vacation & Sick (Nominal \$)					
Labor	98	73	93	96	150
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	98	73	93	96	150
FTE	1.1	0.9	1.0	1.1	1.7
Escalation to 2021\$					
Labor	78	42	33	19	0
Non-Labor	397	202	310	405	0
NSE	0	0	0	0	0
Total	475	245	343	424	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	753	541	615	661	1,003
Non-Labor	3,563	2,429	4,612	5,698	6,516
NSE	0	0	0	0	0
Total	4,316	2,970	5,228	6,359	7,519
FTE	7.5	5.7	6.2	6.5	10.9

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: D. TECHNICAL SERVICES
Category-Sub: 1. TECHNICAL SERVICES
Workpaper: 2GT003.000 - Technical Services

Summary of Adjustments to Recorded:

		In Nominal \$ (000) Incurred Costs				
Years	2017	2018	2019	2020	2021	
Labor	0	0	0	-1	0.054	
Non-Labor	-1	-66	-79	-28	84	
NSE	0	0	0	0	0	
Total	-1	-66	-79	-29	84	
FTE	0.0	0.0	0.0	-0.1	0.0	

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2017 Total	0	-1	0	0.0	
2018	0	-66	0	0.0	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2018 Total	0	-66	0	0.0	
2019	0	-79	0	0.0	1-Sided Adj
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2019 Total	0	-79	0	0.0	
2020	0	-28	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	0.0	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020	-1	0	0	-0.1	CCTR Transf To 2200-2011.002
Explanation:	Transfer costs to GOSI CC 2200-2011.002 related to SB1371 (BLM) Emissions Strategy Program				
2020 Total	-1	-28	0	-0.1	
2021	0	-19	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				

Note: Totals may include rounding differences.

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Category-Sub: 1. TECHNICAL SERVICES
 Workpaper: 2GT003.000 - Technical Services

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2021	0	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	0	103	0	0.1	CCTR Transf From 2200-2038.000
Explanation:	Transfer from FIMP WKP 2TD004 to base business WKP 2GT001; base O&M activity				
2021 Total	0	84	0	0.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Category-Sub: 1. TECHNICAL SERVICES
 Workpaper: 2GT003.000 - Technical Services

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C08 T1& T2

RAMP Line Item Name: Right of Way (HCA & Non-HCA)

Tranche(/s): Tranche1: Transmission - HCA; Tranche2: Transmission - Non-HC

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	1,468	711	711	711	768	981
Tranche 2 Cost Estimate	2,982	1,445	1,445	1,445	1,559	1,992

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 # of Projects	8.00	8.00	8.00	8.00	7.00	9.00
Tranche 2 # of Projects	16.00	16.00	16.00	16.00	14.00	18.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	4.000	1.700
Tranche 2	2.000	1.700

RSE Changes from RAMP:

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03).

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Category-Sub: 1. TECHNICAL SERVICES
 Workpaper: 2GT003.000 - Technical Services

RAMP Item # 2

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C09 T1 & T2

RAMP Line Item Name: Class Location (Hydrotest) (HCA-Non-HCA)

Tranche(/s): Tranche1: Transmission - HCA; Tranche2: Transmission - Non-HCA

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	0	237	237	237	214	273
Tranche 2 Cost Estimate	0	483	483	483	434	555

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Miles of Pipeline Hydrotested	0.00	5.00	5.00	5.00	4.00	6.00
Tranche 2 Miles of Pipeline Hydrotested	0.00	10.00	10.00	10.00	9.00	12.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	39.000	0.000
Tranche 2	19.000	0.000

RSE Changes from RAMP:

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. TECHNICAL SERVICES
 Category-Sub: 1. TECHNICAL SERVICES
 Workpaper: 2GT003.000 - Technical Services

General changes to risks scores or RSE values are primarily due to changes in the MAVF and RSE methodology , as discussed in the RAMP to GRC Integration testimony of R. Scott Pearson and Gregory S. Flores (SCG-03). No costs were associated with this measure in the RAMP filing.

RAMP Item # 3

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C19

RAMP Line Item Name: Engineering, Oversight and Compliance Review

Tranche(/s): Tranche1: N/A

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	1,500	2,498	2,498	2,498	2,057	2,873

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 N/A	0.00	0.00	0.00	0.00	0.00	0.00

Work Unit Changes from RAMP:

A measurable unit is not practical given the charges are coded against multiple cost elements , such as labor, material, and purchased services.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

N/A

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. STORAGE PRODUCTS MANAGER
 Workpaper: 2GT004.000

Summary for Category: E. STORAGE PRODUCTS MANAGER

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	136	136	136	136
Non-Labor	22	28	28	28
NSE	0	0	0	0
Total	158	164	164	164
FTE	1.0	1.0	1.0	1.0

Workpapers belonging to this Category:

2GT004.000 Storage Products Manager

Labor	136	136	136	136
Non-Labor	22	28	28	28
NSE	0	0	0	0
Total	158	164	164	164
FTE	1.0	1.0	1.0	1.0

Note: Totals may include rounding differences.

Beginning of Workpaper
2GT004.000 - Storage Products Manager

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. STORAGE PRODUCTS MANAGER
 Category-Sub: 1. STORAGE PRODUCTS MANAGER
 Workpaper: 2GT004.000 - Storage Products Manager

Activity Description:

The Storage Products Manager operates the California Energy Hub (CEH)/Operational Hub to provide unbundled natural gas storage and parking services (SoCalGas Rate Schedules G-TBS and G-PAL).

Forecast Explanations:

Labor - 5-YR Average

The TY 2024 forecast was developed using the five-year average methodology. Given the activities described previously and a review of historical costs and underlying cost drivers, SoCalGas determined that the five-year average forecast methodology best reflects the anticipated needs of the Storage Products Manager in the forecast period.

Non-Labor - 5-YR Average

The TY 2024 forecast was developed using the five-year average methodology. Given the activities described previously and a review of historical costs and underlying cost drivers, SoCalGas determined that the five-year average forecast methodology best reflects the anticipated needs of the Storage Products Manager in the forecast period.

NSE - 5-YR Average

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		131	138	139	137	136	136	136	136	
Non-Labor		32	30	25	29	22	28	28	28	
NSE		0	0	0	0	0	0	0	0	
Total		163	169	164	166	158	164	164	164	
FTE		0.9	0.9	1.0	1.0	1.0	1.0	1.0	1.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. STORAGE PRODUCTS MANAGER
 Category-Sub: 1. STORAGE PRODUCTS MANAGER
 Workpaper: 2GT004.000 - Storage Products Manager

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	5-YR Average	136	136	136	0	0	0	136	136	136
Non-Labor	5-YR Average	28	28	28	0	0	0	28	28	28
NSE	5-YR Average	0	0	0	0	0	0	0	0	0
Total		164	164	164	0	0	0	164	164	164
FTE	5-YR Average	1.0	1.0	1.0	0.0	0.0	0.0	1.0	1.0	1.0

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: E. STORAGE PRODUCTS MANAGER
Category-Sub: 1. STORAGE PRODUCTS MANAGER
Workpaper: 2GT004.000 - Storage Products Manager

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	100	109	111	113	116
Non-Labor	29	28	24	27	23
NSE	0	0	0	0	0
Total	129	137	134	141	138
FTE	0.8	0.8	0.8	0.8	0.8
Adjustments (Nominal \$) **					
Labor	0	0	0	0	0
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	0	0	0	0	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Nominal \$)					
Labor	100	109	111	113	116
Non-Labor	29	28	24	27	22
NSE	0	0	0	0	0
Total	129	137	134	140	138
FTE	0.8	0.8	0.8	0.8	0.8
Vacation & Sick (Nominal \$)					
Labor	17	19	21	20	20
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	17	19	21	20	20
FTE	0.1	0.1	0.2	0.2	0.2
Escalation to 2021\$					
Labor	14	11	7	4	0
Non-Labor	4	3	2	2	0
NSE	0	0	0	0	0
Total	17	13	9	6	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	131	138	139	137	136
Non-Labor	32	30	25	29	22
NSE	0	0	0	0	0
Total	163	169	164	166	158
FTE	0.9	0.9	1.0	1.0	1.0

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. STORAGE PRODUCTS MANAGER
 Category-Sub: 1. STORAGE PRODUCTS MANAGER
 Workpaper: 2GT004.000 - Storage Products Manager

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	0	0
Non-Labor	0	0	0	-0.250	-0.300
NSE	0	0	0	0	0
Total	0	0	0	-0.250	-0.300
FTE	0.0	0.0	0.0	0.0	0.0

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020 Total	0	0	0	0.0	
2021	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021 Total	0	0	0	0.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. CONTROL CENTER MODERNIZATION
 Workpaper: 2GT005.000

Summary for Category: F. CONTROL CENTER MODERNIZATION

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	324	601	680	721
Non-Labor	366	107	193	428
NSE	0	0	0	0
Total	690	708	873	1,149
FTE	2.7	6.0	7.0	7.0

Workpapers belonging to this Category:

2GT005.000 Control Center Modernization

Labor	324	601	680	721
Non-Labor	366	107	193	428
NSE	0	0	0	0
Total	690	708	873	1,149
FTE	2.7	6.0	7.0	7.0

Note: Totals may include rounding differences.

Beginning of Workpaper
2GT005.000 - Control Center Modernization

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. CONTROL CENTER MODERNIZATION
 Category-Sub: 1. CONTROL CENTER MODERNIZATION
 Workpaper: 2GT005.000 - Control Center Modernization

Activity Description:

The Control Center Modernization (CCM) project has operating and maintenance costs associated to the CCM project management office (PMO), change management, optical pipeline monitoring (OPM) stations, High Consequence Area (HCA) methane sensors, and operations technology (OT) enhancements.

Forecast Explanations:

Labor - Zero-Based

The forecast method developed for this cost category is zero-based methodology. CCM project activities commenced in 2020 and continue to ramp up. Historical costs do not adequately reflect full deployment labor costs that will be seen in 2022, 2023, and 2024. The PMO and change management labor cost was based on the number of FTEs needed to support the CCM activities. The labor cost for both the HCA Methane Sensors and OPM stations was based on various factors. Labor numbers were analyzed from previous related maintenance programs. Subject matter feedback and insights from pilot/test site technologies were also used to develop the labor cost on a per unit basis. The labor costs for OT enhancements are associated to the application support team whose costs will begin to incur when the deployment of various systems is completed.

Non-Labor - Zero-Based

The forecast method developed for this cost category is zero-based methodology. CCM project activities commenced in 2020 and continue to ramp up. Historical costs do not adequately reflect full deployment non-labor costs that will be seen in 2022, 2023, and 2024. The OPM station and HCA methane sensor non-labor costs were based on contract costs and vendor quotes for similar maintenance program activities. Vendor and contractor costs related to the pilot/test sites as well as subject matter expert feedback was also used to develop the per unit maintenance costs for these activities. The non-labor costs related to OT enhancements are based off vendor estimates, various secure cell related costs, and various application subscription costs.

NSE - Zero-Based

n/a

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		0	0	0	26	324	601	680	721	
Non-Labor		0	0	0	17	366	107	193	428	
NSE		0	0	0	0	0	0	0	0	
Total		0	0	0	43	690	708	873	1,149	
FTE		0.0	0.0	0.0	0.0	2.7	6.0	7.0	7.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. CONTROL CENTER MODERNIZATION
 Category-Sub: 1. CONTROL CENTER MODERNIZATION
 Workpaper: 2GT005.000 - Control Center Modernization

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Zero-Based	0	0	0	601	680	721	601	680	721
Non-Labor	Zero-Based	0	0	0	107	193	428	107	193	428
NSE	Zero-Based	0	0	0	0	0	0	0	0	0
Total		0	0	0	708	873	1,149	708	873	1,149
FTE	Zero-Based	0.0	0.0	0.0	6.0	7.0	7.0	6.0	7.0	7.0

Forecast Adjustment Details:

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
2022	601	107	0	708	6.0	1-Sided Adj
Explanation:	CCM Forecast					
2022 Total	601	107	0	708	6.0	
2023	680	193	0	873	7.0	1-Sided Adj
Explanation:	CCM Forecast					
2023 Total	680	193	0	873	7.0	
2024	721	428	0	1,149	7.0	1-Sided Adj
Explanation:	CCM Forecast					
2024 Total	721	428	0	1,149	7.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: F. CONTROL CENTER MODERNIZATION
Category-Sub: 1. CONTROL CENTER MODERNIZATION
Workpaper: 2GT005.000 - Control Center Modernization

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	0	0	0	22	219
Non-Labor	0	0	0	19	373
NSE	0	0	0	0	0
Total	0	0	0	40	592
FTE	0.0	0.0	0.0	0.1	1.7
Adjustments (Nominal \$) **					
Labor	0	0	0	0	57
Non-Labor	0	0	0	-3	-7
NSE	0	0	0	0	0
Total	0	0	0	-3	50
FTE	0.0	0.0	0.0	-0.1	0.6
Recorded-Adjusted (Nominal \$)					
Labor	0	0	0	21	275
Non-Labor	0	0	0	16	366
NSE	0	0	0	0	0
Total	0	0	0	37	642
FTE	0.0	0.0	0.0	0.0	2.3
Vacation & Sick (Nominal \$)					
Labor	0	0	0	4	49
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	0	0	0	4	49
FTE	0.0	0.0	0.0	0.0	0.4
Escalation to 2021\$					
Labor	0	0	0	1	0
Non-Labor	0	0	0	1	0
NSE	0	0	0	0	0
Total	0	0	0	2	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	0	0	0	26	324
Non-Labor	0	0	0	17	366
NSE	0	0	0	0	0
Total	0	0	0	43	690
FTE	0.0	0.0	0.0	0.0	2.7

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. CONTROL CENTER MODERNIZATION
 Category-Sub: 1. CONTROL CENTER MODERNIZATION
 Workpaper: 2GT005.000 - Control Center Modernization

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	-0.299	57
Non-Labor	0	0	0	-3	-7
NSE	0	0	0	0	0
Total	0	0	0	-3	50
FTE	0.0	0.0	0.0	-0.1	0.6

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	-0.1	CCTR Transf To 2200-2011.002
Explanation:	Transfer costs to GOSI CC 2200-2011.002 related to SB1371 (BLM) Emissions Strategy Program				
2020 Total	0	-3	0	-0.1	
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-1	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. CONTROL CENTER MODERNIZATION
 Category-Sub: 1. CONTROL CENTER MODERNIZATION
 Workpaper: 2GT005.000 - Control Center Modernization

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2021	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-3	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	16	0	0	0.2	CCTR Transf From 2200-0342.000
Explanation:	Dollars that the Organizational Change Management department is charging to CCM is still falling under workpaper 2IT013 but we'd like those specific costs to show up under 2GT005. IO 300811020				
2021	41	0	0	0.4	CCTR Transf From 2200-0413.000
Explanation:	Dollars that the Organizational Change Management department is charging to CCM is still falling under workpaper 2IT013 but we'd like those specific costs to show up under 2GT005. IO 300811020				
2021 Total	57	-7	0	0.6	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. CONTROL CENTER MODERNIZATION
 Category-Sub: 1. CONTROL CENTER MODERNIZATION
 Workpaper: 2GT005.000 - Control Center Modernization

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-2 Excavation Damage (Dig-In) on the Gas System

RAMP Line Item ID: C37

RAMP Line Item Name: Pipeline Monitoring Technologies (HP)

Tranche(/s): Tranche1: N/A

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	0	51	108	376	320	432

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 Maintenance Visits	0.00	1.00	22.00	65.00	55.00	75.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

No RSE assigned due to no historical work or benchmark being performed before this GRC cycle.

Supplemental Workpapers for Workpaper 2GT005.000

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Non-Shared Service Workpapers

Control Center Modernization (CCM) O&M Summary				
O&M Forecast				
	2022	2023	2024	Total
Labor	\$ 601,399.73	\$ 680,221.26	\$ 720,920.65	\$ 2,002,541.64
Non-Labor	\$ 107,040.00	\$ 192,520.00	\$ 428,100.00	\$ 727,660.00
Total	\$ 708,439.73	\$ 872,741.26	\$ 1,149,020.65	\$ 2,730,201.64
FTE	6	7	7	

**\$100k used for Transmission FTE calculation*

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

Control Center Modernization (CCM) O&M					
Unit Count - Optical Pipeline Monitoring (OPM) Stations					
	2022	2023	2024	2022-2024 Total	2025-2028 Total
OPM Stations	2	5	1	8	8
*Units also include OPM Stations Installed by other projects during GRC cycle					
OPM Station Maintenance Cost Per Unit Breakdown & Forecast					
COST TYPE	LABOR/NON-LABOR	CLASSIFICATION	DESCRIPTION	COST	
O&M	Labor	Internal Resource	Maintenance, Troubleshoot, Repair	\$ 6,399.73	
O&M	Non-Labor	External Resources	Service Contract (Annual)	\$ 41,000.00	
O&M	Non-Labor	Materials & Expenses	Battery Replacement	\$ 1,500.00	
O&M	Non-Labor	Materials & Expenses	Utility power	\$ 240.00	
O&M	Non-Labor	Materials & Expenses	Monitoring Fee	\$ 1,800.00	
O&M	Non-Labor	Materials & Expenses	Materials and Misc. Expenses	\$ 500.00	
Total Cost/Unit				\$ 51,439.73	
		2022	2023	2024	Total
Labor	\$	6,399.73	\$ 12,799.46	\$ 44,798.11	\$ 63,997.30
Non-Labor	\$	45,040.00	\$ 90,080.00	\$ 315,280.00	\$ 450,400.00
Total	\$	51,439.73	\$ 102,879.46	\$ 360,078.11	\$ 514,397.30
Unit Count - High Consequence Area (HCA) Methane Sensors					
	2022	2023	2024	2022-2024 Total	2025-2028 Total
Methane Sensors	20	40	80	140	1540
HCA Methane Sensor Maintenance Cost Per Unit Breakdown & Forecast					
COST TYPE	LABOR/NON-LABOR	CLASSIFICATION	DESCRIPTION	COST	
O&M	Labor	Internal Resource	Maintenance, Troubleshoot, Repair	\$ 221.09	
O&M	Non-Labor	External Resources	Pole Inspection	\$ 12.00	
O&M	Non-Labor	Materials & Expense	Materials & Misc.	\$ 35.00	
		2022	2023	2024	Total
Labor	\$	-	\$ 4,421.80	\$ 13,265.40	\$ 17,687.20
Non-Labor	\$	-	\$ 940.00	\$ 2,820.00	\$ 3,760.00
Total	\$	-	\$ 5,361.80	\$ 16,085.40	\$ 21,447.20
PMO and Change Management Forecast					
COST TYPE	LABOR/NON-LABOR	CLASSIFICATION	DESCRIPTION	COST	
O&M	Labor	CCM Project Staff	Project Managemnt Office Support (Salary per 1 FTE)	\$ 100,000	
O&M	Labor	CCM Project Staff	Change Management Support (Salary per 1 FTE)	\$ 100,000	
		2022	2023	2024	Total
Labor	\$	495,000.00	\$ 363,000.00	\$ 62,857.14	\$ 920,857.14
Total	\$	495,000.00	\$ 363,000.00	\$ 62,857.14	\$ 920,857.14
		2022	2023	2024	
PMO FTE		1.4	1.0	0.17	
CM FTE		3.6	2.6	0.46	
*\$100k used for Transmission FTE calculation					
Total O&M Forecast					
		2022	2023	2024	Total
Labor	\$	501,399.73	\$ 380,221.26	\$ 120,920.65	\$ 1,002,541.64
Non Labor	\$	45,040.00	\$ 91,020.00	\$ 318,100.00	\$ 454,160.00
Total	\$	546,439.73	\$ 471,241.26	\$ 439,020.65	\$ 1,456,701.64

Southern California Gas Company
2024 GRC - REVISED ERRATA
Non-Shared Service Workpapers

CCM - Technology (O&M)				
O&M Cost Breakdown				
Labor/Non-Labor	O&M Cost Description	2022	2023	2024
Labor	CCM Technology Team - Gas Control application support	\$100,000	\$300,000	\$600,000
Non-Labor	Secure Cell CCM field asset deployments SIM	\$3,000	\$7,500	\$16,000
Non-Labor	Secure Cell Data center circuits	\$12,000	\$12,000	\$12,000
Non-Labor	Secure Cell Prod and pre-prod APN	\$15,000	\$15,000	\$15,000
Non-Labor	Application subscription costs (AWS, 6k each dev & prod)	\$12,000	\$12,000	\$12,000
Non-Labor	Application subscription costs (work scheduling SAAS)	\$5,000	\$5,000	\$5,000
Non-Labor	Application subscription costs (AWS cloud subscription services)	\$15,000	\$50,000	\$50,000
Total		\$162,000	\$401,500	\$710,000

O&M Forecast				
	2022	2023	2024	Total
Labor	\$ 100,000.00	\$ 300,000.00	\$ 600,000.00	\$ 1,000,000.00
Non-Labor	\$ 62,000.00	\$ 101,500.00	\$ 110,000.00	\$ 273,500.00
Total	\$ 162,000.00	\$ 401,500.00	\$ 710,000.00	\$ 1,273,500.00

Assumptions
<p>Application support team O&M costs begin to incur when deployment of systems complete; Gas Control Application Support team - \$1M total: 10% in 2022, 30% in 2023, and 60% in 2024</p> <p>Monthly SIM cards. Assumption is no cost for SDGE since they will use PLTE</p> <p>Gas control costs for dedicated ATT FirstNet network</p> <p>Portion of costs being shared with IT Team; Forecast only includes CCM portion</p> <p>Data analytics costs based on vendor estimates</p> <p>Cloud service costs based on vendors estimates</p>

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa

Summary of Shared Services Workpapers:

Description	In 2021 \$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS	183	238	238	238
B. 2200-0265 - FOM EAST TRANSMISSION - USS	376	376	376	376
C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US	566	566	566	566
D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS	465	900	900	900
E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE	906	906	906	906
F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS	686	686	686	686
G. 2200-2158 - GAS SCHEDULING - USS	796	796	796	796
H. 2200-2329 - GAS TRANSMISSION PLANNING - USS	861	861	861	861
I. 2200-2289 - GAS CONTROL - USS	2,983	4,134	5,508	6,683
J. 2200-0329 - SCADA OPERATIONS - USS	1,186	1,291	1,291	1,291
Total	9,008	10,754	12,128	13,303

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Cost Center: 2200-0253.000

Summary for Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	152	198	198	198
Non-Labor	32	40	40	40
NSE	0	0	0	0
Total	184	238	238	238
FTE	1.3	1.3	1.3	1.3

Cost Centers belonging to this Category:

2200-0253.000 Director of Gas Transmission - 2200-0253

Labor	152	198	198	198
Non-Labor	32	40	40	40
NSE	0	0	0	0
Total	184	238	238	238
FTE	1.3	1.3	1.3	1.3

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-0253.000 - Director of Gas Transmission - 2200-0253

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Category-Sub: 1. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Cost Center: 2200-0253.000 - Director of Gas Transmission - 2200-0253

Activity Description:

The Director of the Gas Transmission Operations organization is responsible for Gas Transmission Operations' overall operational and directional leadership, operation and maintenance performance, regulatory compliance, financial performance, and work measurement reporting.

Forecast Explanations:

Labor - 5-YR Average

The TY 2024 forecast was developed using the five-year average methodology. The base year recorded methodology is not representative of the forecast period because the costs for a full year of an administrative associate are not accounted for, since this employee joined the team midway through 2021. Given the activities described previously and a review of historical costs and underlying cost drivers, SoCalGas determined that the five-year average forecast methodology best reflects the anticipated needs of the Director of Gas Transmission Operations in the forecast period.

Non-Labor - 5-YR Average

The TY 2024 forecast was developed using the five-year average methodology. The base year recorded methodology is not representative of the forecast period because the costs for a full year of an administrative associate are not accounted for, since this employee joined the team midway through 2021. Given the activities described previously and a review of historical costs and underlying cost drivers, SoCalGas determined that the five-year average forecast methodology best reflects the anticipated needs of the Director of Gas Transmission Operations in the forecast period.

NSE - 5-YR Average

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		190	163	220	264	152	198	198	198	
Non-Labor		35	39	43	50	32	40	40	40	
NSE		0	0	0	0	0	0	0	0	
Total		226	202	262	315	183	238	238	238	
FTE		1.1	0.9	1.4	1.8	1.3	1.3	1.3	1.3	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Category-Sub: 1. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Cost Center: 2200-0253.000 - Director of Gas Transmission - 2200-0253

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	1	0	1	0.0	0	1	0	1	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	152	31	0	183	1.4	198	39	0	237	1.3
Total Incurred	152	32	0	184	1.3	198	40	0	238	1.3
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	1	0	1	0.0	0	1	0	1	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	198	39	0	237	1.3	198	39	0	237	1.3
Total Incurred	198	40	0	238	1.3	198	40	0	238	1.3
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Category-Sub: 1. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Cost Center: 2200-0253.000 - Director of Gas Transmission - 2200-0253

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	5-YR Average	198	198	198	0	0	0	198	198	198
Non-Labor	5-YR Average	40	40	40	0	0	0	40	40	40
NSE	5-YR Average	0	0	0	0	0	0	0	0	0
Total		238	238	238	0	0	0	238	238	238
FTE	5-YR Average	1.3	1.3	1.3	0.0	0.0	0.0	1.3	1.3	1.3

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Category-Sub: 1. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Cost Center: 2200-0253.000 - Director of Gas Transmission - 2200-0253

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	147	129	175	216	129
Non-Labor	32	38	41	49	33
NSE	0	0	0	0	0
Total	179	167	215	265	162
FTE	0.9	0.8	1.2	1.5	1.2
Adjustments (Nominal \$) **					
Labor	0	0	0	0	0
Non-Labor	0	-2	0	-1	-1
NSE	0	0	0	0	0
Total	0	-2	0	-1	-1
FTE	0.0	0.0	0.0	0.0	-0.1
Recorded-Adjusted (Nominal \$)					
Labor	147	129	175	216	129
Non-Labor	32	36	41	48	32
NSE	0	0	0	0	0
Total	179	165	215	264	161
FTE	0.9	0.8	1.2	1.5	1.1
Vacation & Sick (Nominal \$)					
Labor	25	22	33	38	23
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	25	22	33	38	23
FTE	0.2	0.1	0.2	0.3	0.2
Escalation to 2021\$					
Labor	18	12	12	11	0
Non-Labor	3	3	2	2	0
NSE	0	0	0	0	0
Total	22	15	14	13	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	190	163	220	264	152
Non-Labor	35	39	43	50	32
NSE	0	0	0	0	0
Total	226	202	262	315	183
FTE	1.1	0.9	1.4	1.8	1.3

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: A. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Category-Sub: 1. 2200-0253 - DIRECTOR GAS TRANSMISSION - USS
 Cost Center: 2200-0253.000 - Director of Gas Transmission - 2200-0253

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	0	-0.081
Non-Labor	0	-2	0	-0.880	-0.891
NSE	0	0	0	0	0
Total	0	-2	0	-0.880	-0.972
FTE	0.0	0.0	0.0	0.0	-0.1

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018	0	-2	0	0.0	1-Sided Adj
2018 Total	0	-2	0	0.0	
Explanation:	Incremental costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2019 Total	0	0	0	0.0	
2020	0	-1	0	0.0	1-Sided Adj
2020 Total	0	-1	0	0.0	
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-1	0	0.0	1-Sided Adj
2021 Total	0	-1	0	-0.1	
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS
 Cost Center: 2200-0265.000

Summary for Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	336	336	336	336
Non-Labor	40	40	40	40
NSE	0	0	0	0
Total	<u>376</u>	<u>376</u>	<u>376</u>	<u>376</u>
FTE	3.0	3.0	3.0	3.0

Cost Centers belonging to this Category:

2200-0265.000 FOM East Transmission - 2200-0265

Labor	336	336	336	336
Non-Labor	40	40	40	40
NSE	0	0	0	0
Total	<u>376</u>	<u>376</u>	<u>376</u>	<u>376</u>
FTE	3.0	3.0	3.0	3.0

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-0265.000 - FOM East Transmission - 2200-0265

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS
 Category-Sub: 1. 2200-0265 - FOM EAST TRANSMISSION - USS
 Cost Center: 2200-0265.000 - FOM East Transmission - 2200-0265

Activity Description:

The Field Operations Manager (FOM) East Transmission organization is responsible for departmental operational leadership, staffing management, operation and maintenance performance, regulatory compliance, financial and work measurement performance, and reporting for Gas Transmission within both SoCalGas and SDG&E.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. The three-year and four-year historical averages would not accurately capture the costs for the four management employees overseeing the pipeline and instrumentation assets. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for this category during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. The three-year and four-year historical averages would not accurately capture the costs for the four management employees overseeing the pipeline and instrumentation assets. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for this category during the forecast period.

NSE - Base YR Rec

Not applicable.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		350	399	301	269	336	336	336	336	
Non-Labor		65	50	24	42	40	41	41	41	
NSE		0	0	0	0	0	0	0	0	
Total		415	449	324	311	376	377	377	377	
FTE		2.9	3.7	2.9	2.4	3.0	3.0	3.0	3.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS
 Category-Sub: 1. 2200-0265 - FOM EAST TRANSMISSION - USS
 Cost Center: 2200-0265.000 - FOM East Transmission - 2200-0265

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	13	16	0	29	0.0	13	16	0	29	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	323	25	0	348	3.0	323	25	0	348	3.0
Total Incurred	336	41	0	377	3.0	336	41	0	377	3.0
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	13	16	0	29	0.0	13	16	0	29	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	323	25	0	348	3.0	323	25	0	348	3.0
Total Incurred	336	41	0	377	3.0	336	41	0	377	3.0
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS
 Category-Sub: 1. 2200-0265 - FOM EAST TRANSMISSION - USS
 Cost Center: 2200-0265.000 - FOM East Transmission - 2200-0265

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	336	336	336	0	0	0	336	336	336
Non-Labor	Base YR Rec	40	40	40	0	0	0	40	40	40
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		376	376	376	0	0	0	376	376	376
FTE	Base YR Rec	3.0	3.0	3.0	0.0	0.0	0.0	3.0	3.0	3.0

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS
 Category-Sub: 1. 2200-0265 - FOM EAST TRANSMISSION - USS
 Cost Center: 2200-0265.000 - FOM East Transmission - 2200-0265

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	270	315	239	221	286
Non-Labor	59	46	22	45	43
NSE	0	0	0	0	0
Total	330	361	261	266	328
FTE	2.5	3.1	2.4	2.0	2.6
Adjustments (Nominal \$) **					
Labor	0	0	0	-2	0
Non-Labor	0	0	0	-5	-2
NSE	0	0	0	0	0
Total	0	0	0	-7	-2
FTE	0.0	0.0	0.0	-0.1	-0.1
Recorded-Adjusted (Nominal \$)					
Labor	270	315	239	219	285
Non-Labor	59	46	22	40	40
NSE	0	0	0	0	0
Total	330	361	261	260	326
FTE	2.5	3.1	2.4	2.0	2.5
Vacation & Sick (Nominal \$)					
Labor	46	54	45	39	50
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	46	54	45	39	50
FTE	0.4	0.6	0.5	0.4	0.5
Escalation to 2021\$					
Labor	34	30	16	11	0
Non-Labor	6	4	1	2	0
NSE	0	0	0	0	0
Total	40	34	18	13	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	350	399	301	269	336
Non-Labor	65	50	24	42	40
NSE	0	0	0	0	0
Total	415	449	324	311	376
FTE	2.9	3.7	2.9	2.4	3.0

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: B. 2200-0265 - FOM EAST TRANSMISSION - USS
 Category-Sub: 1. 2200-0265 - FOM EAST TRANSMISSION - USS
 Cost Center: 2200-0265.000 - FOM East Transmission - 2200-0265

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	-2	-0.091
Non-Labor	0	0	0	-5	-2
NSE	0	0	0	0	0
Total	0	0	0	-7	-2
FTE	0.0	0.0	0.0	-0.1	-0.1

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-5	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-2	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020 Total	-2	-5	0	-0.1	
2021	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021 Total	0	-2	0	-0.1	

Note: Totals may include rounding differences.

Southern California Gas Company
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US
 Cost Center: 2200-2173.000

Summary for Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	457	457	457	457
Non-Labor	109	109	109	109
NSE	0	0	0	0
Total	566	566	566	566
FTE	4.1	4.1	4.1	4.1

Cost Centers belonging to this Category:

2200-2173.000 FOM Compressor Station Operations 2200-2173

Labor	457	457	457	457
Non-Labor	109	109	109	109
NSE	0	0	0	0
Total	566	566	566	566
FTE	4.1	4.1	4.1	4.1

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-2173.000 - FOM Compressor Station Operations 2200-2173

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS -
 Category-Sub: 1. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US
 Cost Center: 2200-2173.000 - FOM Compressor Station Operations 2200-2173

Activity Description:

The Field Operations Manager Compressor Stations organization is responsible for departmental operational leadership, operation and maintenance, regulatory compliance, financial and work measurement performance and reporting for Gas Transmission Operations compressor station operations , within both SoCalGas and SDG&E.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. The three-year, four-year, and five-year historical averages would not accurately capture the costs for the six management employees overseeing the compressor station assets. Since these costs are primarily labor driven, the most recent actual expenditures from 2021 provide the best estimate of what future expenses will be. Therefore, the base year recorded most accurately represents the future recurring annual O&M costs associated with the overall management and supervision of SoCalGas's nine compressor stations , as well as SDG&E's Moreno Compressor Station.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. The three-year, four-year, and five-year historical averages would not accurately capture the costs for the six management employees overseeing the compressor station assets. Since these costs are primarily labor driven, the most recent actual expenditures from 2021 provide the best estimate of what future expenses will be. Therefore, the base year recorded most accurately represents the future recurring annual O&M costs associated with the overall management and supervision of SoCalGas's nine compressor stations , as well as SDG&E's Moreno Compressor Station.

NSE - Base YR Rec

None.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		235	187	260	345	457	457	457	457	
Non-Labor		62	65	87	66	109	109	109	109	
NSE		0	0	0	0	0	0	0	0	
Total		297	252	347	412	566	566	566	566	
FTE		2.4	1.9	2.4	3.2	4.1	4.1	4.1	4.1	

Note: Totals may include rounding differences.

Southern California Gas Company
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS -
 Category-Sub: 1. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US
 Cost Center: 2200-2173.000 - FOM Compressor Station Operations 2200-2173

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	21	20	0	41	0.0	21	20	0	41	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	436	89	0	525	4.1	436	89	0	525	4.1
Total Incurred	457	109	0	566	4.1	457	109	0	566	4.1
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	21	20	0	41	0.0	21	20	0	41	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	436	89	0	525	4.1	436	89	0	525	4.1
Total Incurred	457	109	0	566	4.1	457	109	0	566	4.1
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS -
 Category-Sub: 1. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US
 Cost Center: 2200-2173.000 - FOM Compressor Station Operations 2200-2173

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	457	457	457	0	0	0	457	457	457
Non-Labor	Base YR Rec	109	109	109	0	0	0	109	109	109
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		566	566	566	0	0	0	566	566	566
FTE	Base YR Rec	4.1	4.1	4.1	0.0	0.0	0.0	4.1	4.1	4.1

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS -
 Category-Sub: 1. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US
 Cost Center: 2200-2173.000 - FOM Compressor Station Operations 2200-2173

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	182	148	207	282	387
Non-Labor	56	60	82	69	115
NSE	0	0	0	0	0
Total	238	208	289	351	503
FTE	2.0	1.6	2.0	2.8	3.5
Adjustments (Nominal \$) **					
Labor	0	0	0	0	1
Non-Labor	0	0	0	-6	-6
NSE	0	0	0	0	0
Total	0	0	0	-6	-5
FTE	0.0	0.0	0.0	-0.1	0.0
Recorded-Adjusted (Nominal \$)					
Labor	182	148	207	281	388
Non-Labor	56	60	82	64	109
NSE	0	0	0	0	0
Total	238	208	289	345	497
FTE	2.0	1.6	2.0	2.7	3.5
Vacation & Sick (Nominal \$)					
Labor	31	25	39	50	68
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	31	25	39	50	68
FTE	0.4	0.3	0.4	0.5	0.6
Escalation to 2021\$					
Labor	23	14	14	14	0
Non-Labor	6	5	5	3	0
NSE	0	0	0	0	0
Total	29	19	19	17	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	235	187	260	345	457
Non-Labor	62	65	87	66	109
NSE	0	0	0	0	0
Total	297	252	347	412	566
FTE	2.4	1.9	2.4	3.2	4.1

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: C. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS -
 Category-Sub: 1. 2200-2173 - FOM COMPRESSOR STATION OPERATIONS - US
 Cost Center: 2200-2173.000 - FOM Compressor Station Operations 2200-2173

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	-0.297	0.627
Non-Labor	0	0	0	-6	-6
NSE	0	0	0	0	0
Total	0	0	0	-6	-5
FTE	0.0	0.0	0.0	-0.1	0.0

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-6	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	0	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020 Total	0	-6	0	-0.1	
2021	0	-5	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	-1	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021	1	0	0	0.1	CCTR Transf From 2200-2038.000
Explanation:	Transfer from FIMP WKP 2TD004 to base business WKP 2GT001; base O&M activity				
2021 Total	1	-6	0	0.0	

Note: Totals may include rounding differences.

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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000

Summary for Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	437	872	872	872
Non-Labor	27	27	27	27
NSE	0	0	0	0
Total	464	899	899	899
FTE	4.3	8.3	8.3	8.3

Cost Centers belonging to this Category:

2200-0931.000 Governance & Compliance 2200-0931

Labor	437	872	872	872
Non-Labor	27	27	27	27
NSE	0	0	0	0
Total	464	899	899	899
FTE	4.3	8.3	8.3	8.3

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-0931.000 - Governance & Compliance 2200-0931

Southern California Gas Company
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

Activity Description:

The Governance & Compliance Manager's organization is responsible for system business governance and compliance across the Gas Transmission organization.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since this is a new department created in late 2020 there are no historical costs to evaluate. BY 2021 actual expenditure with adjusted costs to account for the incremental positions is the best forecast option to provide the funding required to meet the projected costs over the forecast years.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since this is a new department created in late 2020 there are no historical costs to evaluate. BY 2021 actual expenditure with adjusted costs to account for the incremental positions is the best forecast option to provide the funding required to meet the projected costs over the forecast years.

NSE - Base YR Rec

NA

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		61	324	167	310	437	872	872	872	
Non-Labor		25	14	143	104	27	27	27	27	
NSE		0	0	0	0	0	0	0	0	
Total		86	338	310	414	465	899	899	899	
FTE		0.7	3.6	1.7	3.1	4.3	8.3	8.3	8.3	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	9	0	0	9	0.0	9	0	0	9	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	428	27	0	455	4.3	863	27	0	890	8.3
Total Incurred	437	27	0	464	4.3	872	27	0	899	8.3
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	9	0	0	9	0.0	9	0	0	9	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	863	27	0	890	8.3	863	27	0	890	8.3
Total Incurred	872	27	0	899	8.3	872	27	0	899	8.3
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput in 2021.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	437	437	437	435	435	435	872	872	872
Non-Labor	Base YR Rec	27	27	27	0	0	0	27	27	27
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		465	465	465	435	435	435	900	900	900
FTE	Base YR Rec	4.3	4.3	4.3	4.0	4.0	4.0	8.3	8.3	8.3

Forecast Adjustment Details:

Year	Labor	NLbr	NSE	Total	FTE	Adj Type
2022	235	0	0	235	2.0	1-Sided Adj
Explanation:	1 -Project Manager II \$100,800 - \$151,200 1 -Technical Advisor II \$89,000 - \$133,5001					
2022	200	0	0	200	2.0	1-Sided Adj
Explanation:	2 Document Advisors \$77,300 - \$116,000 RAMP: SCG-CFF-1, line 7 Establish an Enterprise Asset Management Operating Model					
2022 Total	435	0	0	435	4.0	
2023	235	0	0	235	2.0	1-Sided Adj
Explanation:	Carry over from new hires in 2022.					
2023	200	0	0	200	2.0	1-Sided Adj
Explanation:	Ongoing cost of two new document advisors in 2022.					
2023 Total	435	0	0	435	4.0	
2024	235	0	0	235	2.0	1-Sided Adj
Explanation:	Carry over from new hires in 2022.					
2024	200	0	0	200	2.0	1-Sided Adj
Explanation:	Ongoing cost of two new document advisors in 2022.					
2024 Total	435	0	0	435	4.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	0	0	0	0	160
Non-Labor	0	0	0	0	9
NSE	0	0	0	0	0
Total	0	0	0	0	169
FTE	0.0	0.0	0.0	0.0	1.5
Adjustments (Nominal \$) **					
Labor	47	256	133	253	211
Non-Labor	23	13	135	100	19
NSE	0	0	0	0	0
Total	70	269	268	353	230
FTE	0.6	3.1	1.4	2.6	2.1
Recorded-Adjusted (Nominal \$)					
Labor	47	256	133	253	372
Non-Labor	23	13	135	100	27
NSE	0	0	0	0	0
Total	70	269	268	353	399
FTE	0.6	3.1	1.4	2.6	3.6
Vacation & Sick (Nominal \$)					
Labor	8	44	25	45	66
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	8	44	25	45	66
FTE	0.1	0.5	0.3	0.5	0.7
Escalation to 2021\$					
Labor	6	24	9	13	0
Non-Labor	2	1	8	4	0
NSE	0	0	0	0	0
Total	8	26	17	17	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	61	324	167	310	437
Non-Labor	25	14	143	104	27
NSE	0	0	0	0	0
Total	86	338	310	414	465
FTE	0.7	3.6	1.7	3.1	4.3

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	47	256	133	253	211
Non-Labor	23	13	135	100	19
NSE	0	0	0	0	0
Total	70	269	268	353	230
FTE	0.6	3.1	1.4	2.6	2.1

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017	47	23	0	0.6	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2017 Total	47	23	0	0.6	
2018	0	0	0	0.1	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2018	1	0	0	0.1	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2018	255	13	0	2.9	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2018 Total	256	13	0	3.1	
2019	0	0	0	0.0	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2019	133	135	0	1.4	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2019 Total	133	135	0	1.4	
2020	0	0	0	0.0	CCTR Transf From 2200-2172.000
Explanation:	transfer to 2200-0931				
2020	253	100	0	2.6	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2020 Total	253	100	0	2.6	
2021	0	-1	0	0.0	1-Sided Adj

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	0	0	0	0.0	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2021	212	19	0	2.2	CCTR Transf From 2200-2172.000
Explanation:	Transfer to 2200-0931				
2021	-1	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021 Total	211	19	0	2.1	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: D. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Category-Sub: 1. 2200-0931 - GOVERNANCE & COMPLIANCE - USS
 Cost Center: 2200-0931.000 - Governance & Compliance 2200-0931

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-CFF-1 Asset and Records Management
 RAMP Line Item ID: 7
 RAMP Line Item Name: Establish an Enterprise Asset Management Operating Model
 Tranche(/s): Tranche1: Establish an Enterprise Asset Management Operating Model

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	200	200	200	200	1,890	2,730

Cost Estimate Changes from RAMP:

Only partial costs for SCG - CFF - 1, line 7. This forecast supports the hiring of two doument advisors to help establish an enterprise asset management operating model.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 NA	0.00	0.00	0.00	0.00	0.00	0.00

Work Unit Changes from RAMP:

None.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

None.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE
 Cost Center: 2200-0330.000

Summary for Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	788	788	788	788
Non-Labor	118	118	118	118
NSE	0	0	0	0
Total	906	906	906	906
FTE	5.6	5.6	5.6	5.6

Cost Centers belonging to this Category:

2200-0330.000 Transmission & Storage Strategy Manager 2200-0330

Labor	788	788	788	788
Non-Labor	118	118	118	118
NSE	0	0	0	0
Total	906	906	906	906
FTE	5.6	5.6	5.6	5.6

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-0330.000 - Transmission & Storage Strategy Manager 2200-0330

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MAN
 Category-Sub: 1. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE
 Cost Center: 2200-0330.000 - Transmission & Storage Strategy Manager 2200-0330

Activity Description:

The Transmission and Storage Strategy Manager shared service elements include both direct customer service and staff support. Specific groups in this area include Capacity Products Support and shared services provide capacity services for gas marketers that serve both SoCalGas and SDG&E customers, large nonresidential customers who choose to act as their own gas supplier, and core aggregators. The group also manages business relationships with upstream pipelines that serve the SoCalGas and SDG&E systems, provides analytical and regulatory compliance support for Backbone Transportation Service , unbundled storage and Hub transactions, and represent SoCalGas in the development and modification of gas industry standards for gas scheduling.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for the Transmission and Storage Strategy Manager cost category during the forecast period .

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for the Transmission and Storage Strategy Manager cost category during the forecast period .

NSE - Base YR Rec

None.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		741	825	804	782	788	788	788	788	
Non-Labor		44	37	122	122	118	118	118	118	
NSE		0	0	0	0	0	0	0	0	
Total		785	862	926	903	906	906	906	906	
FTE		5.5	6.0	5.7	5.5	5.6	5.6	5.6	5.6	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MAN
 Category-Sub: 1. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE
 Cost Center: 2200-0330.000 - Transmission & Storage Strategy Manager 2200-0330

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	0	0	0	0.0	0	0	0	0	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	788	118	0	906	5.6	788	118	0	906	5.6
Total Incurred	788	118	0	906	5.6	788	118	0	906	5.6
% Allocation										
Retained	95.12%	95.12%				95.12%	95.12%			
SEU	4.88%	4.88%				4.88%	4.88%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	0	0	0	0.0	0	0	0	0	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	788	118	0	906	5.6	788	118	0	906	5.6
Total Incurred	788	118	0	906	5.6	788	118	0	906	5.6
% Allocation										
Retained	95.12%	95.12%				95.12%	95.12%			
SEU	4.88%	4.88%				4.88%	4.88%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput. 50% of gas flow throughput for SDG&E was used because costs are split with Storage.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput. 50% of gas flow throughput for SDG&E was used because costs are split with Storage.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput. 50% of gas flow throughput for SDG&E was used because costs are split with Storage.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput. 50% of gas flow throughput for SDG&E was used because costs are split with Storage.

Note: Totals may include rounding differences.

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MAN
 Category-Sub: 1. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE
 Cost Center: 2200-0330.000 - Transmission & Storage Strategy Manager 2200-0330

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	788	788	788	0	0	0	788	788	788
Non-Labor	Base YR Rec	118	118	118	0	0	0	118	118	118
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		906	906	906	0	0	0	906	906	906
FTE	Base YR Rec	5.6	5.6	5.6	0.0	0.0	0.0	5.6	5.6	5.6

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MAN
 Category-Sub: 1. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE
 Cost Center: 2200-0330.000 - Transmission & Storage Strategy Manager 2200-0330

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	578	651	639	637	670
Non-Labor	40	34	115	118	120
NSE	0	0	0	0	0
Total	617	685	755	756	791
FTE	4.8	5.1	4.8	4.6	4.7
Adjustments (Nominal \$) **					
Labor	-5	0	0	0	0
Non-Labor	0	0	0	-2	-3
NSE	0	0	0	0	0
Total	-5	0	0	-2	-3
FTE	-0.1	0.0	0.0	0.0	0.0
Recorded-Adjusted (Nominal \$)					
Labor	573	651	639	637	670
Non-Labor	40	34	115	117	118
NSE	0	0	0	0	0
Total	612	685	755	754	788
FTE	4.7	5.1	4.8	4.6	4.7
Vacation & Sick (Nominal \$)					
Labor	97	112	121	112	118
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	97	112	121	112	118
FTE	0.8	0.9	0.9	0.9	0.9
Escalation to 2021\$					
Labor	71	62	43	32	0
Non-Labor	4	3	7	5	0
NSE	0	0	0	0	0
Total	75	65	50	37	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	741	825	804	782	788
Non-Labor	44	37	122	122	118
NSE	0	0	0	0	0
Total	785	862	926	903	906
FTE	5.5	6.0	5.7	5.5	5.6

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: E. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MAN
 Category-Sub: 1. 2200-0330 - TRANSMISSION & STORAGE STRATEGY MANAGE
 Cost Center: 2200-0330.000 - Transmission & Storage Strategy Manager 2200-0330

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs						
	Years	2017	2018	2019	2020	2021
Labor		-5	0	0	0	0
Non-Labor		0	0	0	-2	-3
NSE		0	0	0	0	0
	Total	-5	0	0	-2	-3
FTE		-0.1	0.0	0.0	0.0	0.0

Detail of Adjustments to Recorded:

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2017	-5	0	0	-0.1	CCTR Transf From 2200-0251.000
Explanation:	To transfer of Jeff Huang's labor adjustments to Transmission Storage				
2017 Total	-5	0	0	-0.1	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-2	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020 Total	0	-2	0	0.0	
2021	0	-3	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021 Total	0	-3	0	0.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Cost Center: 2200-0328.000

Summary for Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	641	641	641	641
Non-Labor	45	45	45	45
NSE	0	0	0	0
Total	686	686	686	686
FTE	5.0	5.0	5.0	5.0

Cost Centers belonging to this Category:

2200-0328.000 Capacity Products Support - 2200-0328

Labor	641	641	641	641
Non-Labor	45	45	45	45
NSE	0	0	0	0
Total	686	686	686	686
FTE	5.0	5.0	5.0	5.0

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-0328.000 - Capacity Products Support - 2200-0328

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Category-Sub: 1. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Cost Center: 2200-0328.000 - Capacity Products Support - 2200-0328

Activity Description:

Capacity Products Support group is responsible for direct customer service and staff support for functions supporting direct customer service. Responsibilities include developing and maintaining ENVOY® business requirements, administering BTS, managing and supporting gas marketer, supplier and upstream pipeline business relationships, administering the core transportation aggregation (CTA) program, providing back-office support for the CEH, participating in North American Energy Standards Board (NAESB) activities at the committee level on behalf of SoCalGas and SDG&E for industry standard development, monitoring regulatory matters under the authority of the Federal Energy Regulatory Commission (FERC) concerning the upstream pipelines serving the SoCalGas and SDG&E system that affect operations, and supporting implementation of modification to policies and procedures for scheduling and nominations on the SoCalGas and SDG&E system.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for Capacity Products Support during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for Capacity Products Support during the forecast period.

NSE - Base YR Rec

None.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		683	889	815	700	641	641	641	641	
Non-Labor		81	53	107	141	45	45	45	45	
NSE		0	0	0	0	0	0	0	0	
Total		764	941	922	841	686	686	686	686	
FTE		5.3	7.5	6.6	5.5	5.0	5.0	5.0	5.0	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Category-Sub: 1. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Cost Center: 2200-0328.000 - Capacity Products Support - 2200-0328

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	0	0	0	0.0	0	0	0	0	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	641	45	0	686	5.0	641	45	0	686	5.0
Total Incurred	641	45	0	686	5.0	641	45	0	686	5.0
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	0	0	0	0.0	0	0	0	0	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	641	45	0	686	5.0	641	45	0	686	5.0
Total Incurred	641	45	0	686	5.0	641	45	0	686	5.0
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Category-Sub: 1. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Cost Center: 2200-0328.000 - Capacity Products Support - 2200-0328

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	641	641	641	0	0	0	641	641	641
Non-Labor	Base YR Rec	45	45	45	0	0	0	45	45	45
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		686	686	686	0	0	0	686	686	686
FTE	Base YR Rec	5.0	5.0	5.0	0.0	0.0	0.0	5.0	5.0	5.0

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Category-Sub: 1. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Cost Center: 2200-0328.000 - Capacity Products Support - 2200-0328

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	528	701	648	571	545
Non-Labor	73	49	101	138	47
NSE	0	0	0	0	0
Total	601	750	749	708	592
FTE	4.5	6.4	5.5	4.6	4.2
Adjustments (Nominal \$) **					
Labor	0	0	0	0	0
Non-Labor	0	0	0	-2	-2
NSE	0	0	0	0	0
Total	0	0	0	-2	-2
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Nominal \$)					
Labor	528	701	648	571	545
Non-Labor	73	49	101	135	45
NSE	0	0	0	0	0
Total	601	750	749	706	590
FTE	4.5	6.4	5.5	4.6	4.2
Vacation & Sick (Nominal \$)					
Labor	89	121	123	101	96
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	89	121	123	101	96
FTE	0.8	1.1	1.1	0.9	0.8
Escalation to 2021\$					
Labor	66	67	44	29	0
Non-Labor	8	4	6	6	0
NSE	0	0	0	0	0
Total	73	71	50	34	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	683	889	815	700	641
Non-Labor	81	53	107	141	45
NSE	0	0	0	0	0
Total	764	941	922	841	686
FTE	5.3	7.5	6.6	5.5	5.0

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: F. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Category-Sub: 1. 2200-0328 - CAPACITY PRODUCTS SUPPORT - USS
 Cost Center: 2200-0328.000 - Capacity Products Support - 2200-0328

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs						
	Years	2017	2018	2019	2020	2021
Labor		0	0	0	0	0
Non-Labor		0	0	0	-2	-2
NSE		0	0	0	0	0
	Total	0	0	0	-2	-2
FTE		0.0	0.0	0.0	0.0	0.0

Detail of Adjustments to Recorded:

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-2	0	0.0	1-Sided Adj
2020 Total	0	-2	0	0.0	
2021	0	-2	0	0.0	1-Sided Adj
2021 Total	0	-2	0	0.0	

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Note: Totals may include rounding differences.

Southern California Gas Company
 2024 GRC - REVISED ERRATA
 Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: G. 2200-2158 - GAS SCHEDULING - USS
 Cost Center: 2200-2158.000

Summary for Category: G. 2200-2158 - GAS SCHEDULING - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	765	765	765	765
Non-Labor	31	31	31	31
NSE	0	0	0	0
Total	796	796	796	796
FTE	6.8	6.8	6.8	6.8

Cost Centers belonging to this Category:

2200-2158.000 Gas Scheduling - 2200-2158

Labor	765	765	765	765
Non-Labor	31	31	31	31
NSE	0	0	0	0
Total	796	796	796	796
FTE	6.8	6.8	6.8	6.8

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-2158.000 - Gas Scheduling - 2200-2158

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: G. 2200-2158 - GAS SCHEDULING - USS
 Category-Sub: 1. 2200-2158 - GAS SCHEDULING - USS
 Cost Center: 2200-2158.000 - Gas Scheduling - 2200-2158

Activity Description:

Gas Scheduling is a 365 day per year operation that manages the daily scheduling of nominations for gas transportation service, storage injections and withdrawals for all gas quantities transported on the SoCalGas and SDG&E systems each day.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. BY 2021 actual expenditures provide the funding to meet the projected costs over the forecast years and represent the best forecast option. In 2021, a new Gas Scheduling Manager was hired to provide needed support. The expenditure for this position was not accounted for in previous years, therefore an average forecast would not provide sufficient funding in future years. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, base year recorded provides the most accurate representation of future costs for Gas Scheduling during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. BY 2021 actual expenditures provide the funding to meet the projected costs over the forecast years and represent the best forecast option. In 2021, a new Gas Scheduling Manager was hired to provide needed support. The expenditure for this position was not accounted for in previous years, therefore an average forecast would not provide sufficient funding in future years. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, base year recorded provides the most accurate representation of future costs for Gas Scheduling during the forecast period.

NSE - Base YR Rec

None.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		626	478	661	613	765	765	765	765	
Non-Labor		19	6	16	6	31	31	31	31	
NSE		0	0	0	0	0	0	0	0	
Total		645	484	678	620	796	796	796	796	
FTE		6.1	4.6	6.4	5.9	6.8	6.8	6.8	6.8	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: G. 2200-2158 - GAS SCHEDULING - USS
 Category-Sub: 1. 2200-2158 - GAS SCHEDULING - USS
 Cost Center: 2200-2158.000 - Gas Scheduling - 2200-2158

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	29	0	0	29	0.0	29	0	0	29	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	736	31	0	767	6.8	736	31	0	767	6.8
Total Incurred	765	31	0	796	6.8	765	31	0	796	6.8
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	29	0	0	29	0.0	29	0	0	29	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	736	31	0	767	6.8	736	31	0	767	6.8
Total Incurred	765	31	0	796	6.8	765	31	0	796	6.8
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: G. 2200-2158 - GAS SCHEDULING - USS
 Category-Sub: 1. 2200-2158 - GAS SCHEDULING - USS
 Cost Center: 2200-2158.000 - Gas Scheduling - 2200-2158

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	765	765	765	0	0	0	765	765	765
Non-Labor	Base YR Rec	31	31	31	0	0	0	31	31	31
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		796	796	796	0	0	0	796	796	796
FTE	Base YR Rec	6.8	6.8	6.8	0.0	0.0	0.0	6.8	6.8	6.8

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: G. 2200-2158 - GAS SCHEDULING - USS
 Category-Sub: 1. 2200-2158 - GAS SCHEDULING - USS
 Cost Center: 2200-2158.000 - Gas Scheduling - 2200-2158

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	484	377	526	500	650
Non-Labor	17	6	15	8	33
NSE	0	0	0	0	0
Total	501	383	541	509	684
FTE	5.3	3.9	5.4	4.9	5.7
Adjustments (Nominal \$) **					
Labor	0	0	0	0	0
Non-Labor	0	0	0	-2	-2
NSE	0	0	0	0	0
Total	0	0	0	-2	-2
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Nominal \$)					
Labor	484	377	526	500	650
Non-Labor	17	6	15	6	31
NSE	0	0	0	0	0
Total	501	383	541	506	681
FTE	5.2	3.9	5.4	4.9	5.7
Vacation & Sick (Nominal \$)					
Labor	82	65	100	88	115
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	82	65	100	88	115
FTE	0.9	0.7	1.0	1.0	1.1
Escalation to 2021\$					
Labor	60	36	36	25	0
Non-Labor	2	0	1	0	0
NSE	0	0	0	0	0
Total	62	37	37	25	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	626	478	661	613	765
Non-Labor	19	6	16	6	31
NSE	0	0	0	0	0
Total	645	484	678	620	796
FTE	6.1	4.6	6.4	5.9	6.8

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: G. 2200-2158 - GAS SCHEDULING - USS
 Category-Sub: 1. 2200-2158 - GAS SCHEDULING - USS
 Cost Center: 2200-2158.000 - Gas Scheduling - 2200-2158

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	0	0
Non-Labor	0	0	0	-2	-2
NSE	0	0	0	0	0
Total	0	0	0	-2	-2
FTE	0.0	0.0	0.0	0.0	0.0

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-2	0	0.0	1-Sided Adj
2020 Total	0	-2	0	0.0	
2021	0	-2	0	0.0	1-Sided Adj
2021 Total	0	-2	0	0.0	

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000

Summary for Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	820	820	820	820
Non-Labor	40	41	41	41
NSE	0	0	0	0
Total	860	861	861	861
FTE	7.5	7.5	7.5	7.5

Cost Centers belonging to this Category:

2200-2329.000 Gas Transmission Planning - 2200-2329

Labor	820	820	820	820
Non-Labor	40	41	41	41
NSE	0	0	0	0
Total	860	861	861	861
FTE	7.5	7.5	7.5	7.5

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-2329.000 - Gas Transmission Planning - 2200-2329

Southern California Gas Company
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Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Category-Sub: 1. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000 - Gas Transmission Planning - 2200-2329

Activity Description:

Gas Transmission Planning is responsible for long-term planning and design of the SoCalGas and SDG&E gas transmission systems.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for this category during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for this category during the forecast period.

NSE - Base YR Rec

Not applicable

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		582	662	718	872	820	820	820	820	
Non-Labor		20	41	33	29	40	41	41	41	
NSE		0	0	0	0	0	0	0	0	
Total		602	703	751	901	861	861	861	861	
FTE		5.5	6.1	6.3	8.0	7.5	7.5	7.5	7.5	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Category-Sub: 1. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000 - Gas Transmission Planning - 2200-2329

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	0	0	0	0.0	0	0	0	0	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	820	40	0	860	7.5	820	41	0	861	7.5
Total Incurred	820	40	0	860	7.5	820	41	0	861	7.5
% Allocation										
Retained	66.67%	66.67%				66.67%	66.67%			
SEU	33.33%	33.33%				33.33%	33.33%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	0	0	0	0	0.0	0	0	0	0	0.0
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	820	41	0	861	7.5	820	41	0	861	7.5
Total Incurred	820	41	0	861	7.5	820	41	0	861	7.5
% Allocation										
Retained	66.67%	66.67%				66.67%	66.67%			
SEU	33.33%	33.33%				33.33%	33.33%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage split based on weighted averages of department allocations.

Cost Center Allocation Percentage for 2022

Percentage split based on weighted averages of department allocations.

Cost Center Allocation Percentage for 2023

Percentage split based on weighted averages of department allocations.

Cost Center Allocation Percentage for 2024

Percentage split based on weighted averages of department allocations.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Category-Sub: 1. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000 - Gas Transmission Planning - 2200-2329

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	820	820	820	0	0	0	820	820	820
Non-Labor	Base YR Rec	41	41	41	0	0	0	41	41	41
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		861	861	861	0	0	0	861	861	861
FTE	Base YR Rec	7.5	7.5	7.5	0.0	0.0	0.0	7.5	7.5	7.5

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>Total</u>	<u>FTE</u>	<u>Adj Type</u>
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Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
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Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Category-Sub: 1. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000 - Gas Transmission Planning - 2200-2329

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	450	522	571	711	697
Non-Labor	18	38	31	31	43
NSE	0	0	0	0	0
Total	467	560	602	742	740
FTE	4.7	5.2	5.4	6.7	6.3
Adjustments (Nominal \$) **					
Labor	0	0	0	0	0
Non-Labor	0	0	0	-4	-3
NSE	0	0	0	0	0
Total	0	0	0	-4	-3
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Nominal \$)					
Labor	450	522	571	711	697
Non-Labor	18	38	31	28	40
NSE	0	0	0	0	0
Total	467	560	602	739	738
FTE	4.7	5.2	5.3	6.7	6.3
Vacation & Sick (Nominal \$)					
Labor	76	90	108	125	123
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	76	90	108	125	123
FTE	0.8	0.9	1.0	1.3	1.2
Escalation to 2021\$					
Labor	56	50	39	36	0
Non-Labor	2	3	2	1	0
NSE	0	0	0	0	0
Total	58	53	41	37	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	582	662	718	872	820
Non-Labor	20	41	33	29	40
NSE	0	0	0	0	0
Total	602	703	751	901	861
FTE	5.5	6.1	6.3	8.0	7.5

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Category-Sub: 1. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000 - Gas Transmission Planning - 2200-2329

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs						
	Years	2017	2018	2019	2020	2021
Labor		0	0	0	0	0
Non-Labor		0	0	0	-4	-3
NSE		0	0	0	0	0
	Total	0	0	0	-4	-3
FTE		0.0	0.0	0.0	0.0	0.0

Detail of Adjustments to Recorded:

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-4	0	0.0	1-Sided Adj
2020 Total	0	-4	0	0.0	
2021	0	-3	0	0.0	1-Sided Adj
2021 Total	0	-3	0	0.0	

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: H. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Category-Sub: 1. 2200-2329 - GAS TRANSMISSION PLANNING - USS
 Cost Center: 2200-2329.000 - Gas Transmission Planning - 2200-2329

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C18

RAMP Line Item Name: Gas Transmission Planning

Tranche(/s): Tranche1: N/A

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	860	860	860	860	522	667

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 N/A	0.00	0.00	0.00	0.00	0.00	0.00

Work Unit Changes from RAMP:

A measurable unit is not practical given the charges are coded against multiple cost elements like Labor , Material, and Purchased Services

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

A measurable unit is not practical given the various types of requests the Department analyzes using different analytical tools.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: I. 2200-2289 - GAS CONTROL - USS
 Cost Center: 2200-2289.000

Summary for Category: I. 2200-2289 - GAS CONTROL - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	2,825	3,918	5,224	6,340
Non-Labor	158	216	284	343
NSE	0	0	0	0
Total	2,983	4,134	5,508	6,683
FTE	25.2	38.2	52.2	59.2

Cost Centers belonging to this Category:

2200-2289.000 Gas Control - 2200-2289

Labor	2,825	3,918	5,224	6,340
Non-Labor	158	216	284	343
NSE	0	0	0	0
Total	2,983	4,134	5,508	6,683
FTE	25.2	38.2	52.2	59.2

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-2289.000 - Gas Control - 2200-2289

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: I. 2200-2289 - GAS CONTROL - USS
 Category-Sub: 1. 2200-2289 - GAS CONTROL - USS
 Cost Center: 2200-2289.000 - Gas Control - 2200-2289

Activity Description:

Control Room Monitoring and Operation activities consist of 24/7 operation of the transmission pipeline system in a real-time control room environment.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology to which the anticipated costs for incremental hires were added. BY 2021 actual expenses, along with the costs for the incremental employees, is the most effective forecast method and will provide the necessary funding during the forecast period. Historical averages would not accurately reflect the incremental employees needed to support CCM during the forecast period. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for Gas Control during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology to which the anticipated costs for incremental hires were added. BY 2021 actual expenses, along with the costs for the incremental employees, is the most effective forecast method and will provide the necessary funding during the forecast period. Historical averages would not accurately reflect the incremental employees needed to support CCM during the forecast period. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, the base year recorded provides the most accurate representation of future costs for Gas Control during the forecast period.

NSE - Base YR Rec

None.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		2,188	1,977	2,279	2,664	2,825	3,918	5,224	6,340	
Non-Labor		259	280	255	372	158	216	284	343	
NSE		0	0	0	0	0	0	0	0	
Total		2,448	2,257	2,534	3,035	2,983	4,134	5,508	6,683	
FTE		18.8	16.9	19.3	22.2	25.2	38.2	52.2	59.2	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: I. 2200-2289 - GAS CONTROL - USS
 Category-Sub: 1. 2200-2289 - GAS CONTROL - USS
 Cost Center: 2200-2289.000 - Gas Control - 2200-2289

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	38	9	0	47	0.4	38	9	0	47	0.4
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	2,787	149	0	2,936	24.8	3,880	207	0	4,087	37.8
Total Incurred	2,825	158	0	2,983	25.2	3,918	216	0	4,134	38.2
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	38	9	0	47	0.4	38	9	0	47	0.4
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	5,186	275	0	5,461	51.8	6,302	334	0	6,636	58.8
Total Incurred	5,224	284	0	5,508	52.2	6,340	343	0	6,683	59.2
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: I. 2200-2289 - GAS CONTROL - USS
 Category-Sub: 1. 2200-2289 - GAS CONTROL - USS
 Cost Center: 2200-2289.000 - Gas Control - 2200-2289

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	2,825	2,825	2,825	1,093	2,399	3,515	3,918	5,224	6,340
Non-Labor	Base YR Rec	158	158	158	58	126	185	216	284	343
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		2,983	2,983	2,983	1,151	2,525	3,700	4,134	5,508	6,683
FTE	Base YR Rec	25.2	25.2	25.2	13.0	27.0	34.0	38.2	52.2	59.2

Forecast Adjustment Details:

Year	Labor	NLbr	NSE	Total	FTE	Adj Type
2022	1,093	58	0	1,151	13.0	1-Sided Adj
Explanation:	New hires for gas control in 2022 to support extra data collection needed for the Control Center Modernization.					
2022 Total	1,093	58	0	1,151	13.0	
2023	2,399	126	0	2,525	27.0	1-Sided Adj
Explanation:	14 new hires in 2023 to support extra data collection needed for Control Center Modernization. Carry over costs from 2022 added.					
2023 Total	2,399	126	0	2,525	27.0	
2024	3,515	185	0	3,700	34.0	1-Sided Adj
Explanation:	7 new hires in 2024 to support extra data collection needed for the Control Center Modernization. Carry over costs from 2022 and 2023 added.					
2024 Total	3,515	185	0	3,700	34.0	

Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa
Category: I. 2200-2289 - GAS CONTROL - USS
Category-Sub: 1. 2200-2289 - GAS CONTROL - USS
Cost Center: 2200-2289.000 - Gas Control - 2200-2289

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	1,691	1,560	1,812	2,175	2,408
Non-Labor	234	259	241	994	545
NSE	0	0	0	0	0
Total	1,925	1,818	2,053	3,169	2,953
FTE	16.0	14.3	16.2	18.7	21.3
Adjustments (Nominal \$) **					
Labor	0	0	0	-3	-6
Non-Labor	0	0	0	-638	-387
NSE	0	0	0	0	0
Total	0	0	0	-641	-394
FTE	0.0	0.0	0.0	-0.2	-0.1
Recorded-Adjusted (Nominal \$)					
Labor	1,691	1,560	1,812	2,172	2,401
Non-Labor	234	259	241	357	158
NSE	0	0	0	0	0
Total	1,925	1,818	2,053	2,528	2,559
FTE	16.0	14.3	16.2	18.5	21.2
Vacation & Sick (Nominal \$)					
Labor	287	268	344	383	424
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	287	268	344	383	424
FTE	2.8	2.6	3.1	3.7	4.0
Escalation to 2021\$					
Labor	211	149	123	109	0
Non-Labor	25	21	14	15	0
NSE	0	0	0	0	0
Total	235	170	137	124	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	2,188	1,977	2,279	2,664	2,825
Non-Labor	259	280	255	372	158
NSE	0	0	0	0	0
Total	2,448	2,257	2,534	3,035	2,983
FTE	18.8	16.9	19.3	22.2	25.2

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: I. 2200-2289 - GAS CONTROL - USS
 Category-Sub: 1. 2200-2289 - GAS CONTROL - USS
 Cost Center: 2200-2289.000 - Gas Control - 2200-2289

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs					
Years	2017	2018	2019	2020	2021
Labor	0	0	0	-3	-6
Non-Labor	0	0	0	-638	-387
NSE	0	0	0	0	0
Total	0	0	0	-641	-394
FTE	0.0	0.0	0.0	-0.2	-0.1

Detail of Adjustments to Recorded:

Year	Labor	NLbr	NSE	FTE	Adj Type
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	-1	-638	0	-0.1	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2020	-1	0	0	-0.1	CCTR Transf To 2200-2011.000
Explanation:	Transfer costs to GOSI CC 2200-2011.000 related to SB1371 (BNE) Emissions Strategy Program				
2020 Total	-3	-638	0	-0.2	
2021	0	-387	0	0.0	1-Sided Adj
Explanation:	Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).				
2021	-6	0	0	-0.1	1-Sided Adj
Explanation:	Adjustment to remove non-GRC costs related to the SB1371 Emissions Strategy Program that are being recovered through a separate regulatory process.				
2021 Total	-6	-387	0	-0.1	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: I. 2200-2289 - GAS CONTROL - USS
 Category-Sub: 1. 2200-2289 - GAS CONTROL - USS
 Cost Center: 2200-2289.000 - Gas Control - 2200-2289

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C17

RAMP Line Item Name: Control Room Monitoring, Operation and Fatigue Management

Tranche(/s): Tranche1: N/A

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	2,982	2,982	2,982	2,982	2,978	3,168

Cost Estimate Changes from RAMP:
None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 N/A	0.00	0.00	0.00	0.00	0.00	0.00

Work Unit Changes from RAMP:
A measurable unit is not practical given the multiple means of communications and operations used to address this risk.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:
N/A

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000

Summary for Category: J. 2200-0329 - SCADA OPERATIONS - USS

	In 2021\$ (000) Incurred Costs			
	Adjusted-Recorded	Adjusted-Forecast		
	2021	2022	2023	2024
Labor	686	791	791	791
Non-Labor	500	500	500	500
NSE	0	0	0	0
Total	1,186	1,291	1,291	1,291
FTE	5.7	6.7	6.7	7.7

Cost Centers belonging to this Category:

2200-0329.000 SCADA Operations - 2200-0329

Labor	686	791	791	791
Non-Labor	500	500	500	500
NSE	0	0	0	0
Total	1,186	1,291	1,291	1,291
FTE	5.7	6.7	6.7	7.7

Note: Totals may include rounding differences.

Beginning of Workpaper
2200-0329.000 - SCADA Operations - 2200-0329

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

Activity Description:

The Supervisory Control and Data Acquisition (SCADA) Operations department manages the planning, operation, and maintenance of the SCADA system for both SoCalGas and SDG&E.

Forecast Explanations:

Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. SoCalGas anticipates that costs related to SCADA Operations will remain consistent with BY 2021 actual expenditures over the forecast period. Forecasted incremental costs associated with one new hire were then added to the base year result to establish the TY 2024 forecast. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, base year recorded is the most accurate representation of future costs for this category during the forecast period.

Non-Labor - Base YR Rec

The TY 2024 forecast was established using the base year recorded methodology. SoCalGas anticipates that costs related to SCADA Operations will remain consistent with BY 2021 actual expenditures over the forecast period. Forecasted incremental costs associated with one new hire were then added to the base year result to establish the TY 2024 forecast. Since the costs in this category are primarily labor driven, the most recent year's actual expenditures provide the best estimate of future expenses. Therefore, base year recorded is the most accurate representation of future costs for this category during the forecast period.

NSE - Base YR Rec

None.

Summary of Results:

		In 2021\$ (000) Incurred Costs								
		Adjusted-Recorded					Adjusted-Forecast			
Years		2017	2018	2019	2020	2021	2022	2023	2024	
Labor		361	649	638	714	686	791	791	791	
Non-Labor		154	626	494	249	500	500	500	500	
NSE		0	0	0	0	0	0	0	0	
Total		515	1,276	1,132	963	1,186	1,291	1,291	1,291	
FTE		3.3	5.8	5.5	6.0	5.7	6.7	6.7	7.7	

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

Cost Center Allocations (Incurred Costs):

	2021 Adjusted-Recorded					2022 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	15	1	0	16	0.1	15	1	0	16	0.1
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	671	499	0	1,170	5.6	776	499	0	1,275	6.6
Total Incurred	686	500	0	1,186	5.7	791	500	0	1,291	6.7
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

	2023 Adjusted-Forecast					2024 Adjusted-Forecast				
	Labor	Non-Labor	NSE	Total	FTE	Labor	Non-Labor	NSE	Total	FTE
Directly Retained	15	1	0	16	0.1	15	1	0	16	0.1
Directly Allocated	0	0	0	0	0.0	0	0	0	0	0.0
Subj. To % Alloc.	776	499	0	1,275	6.6	776	499	0	1,275	7.6
Total Incurred	791	500	0	1,291	6.7	791	500	0	1,291	7.7
% Allocation										
Retained	90.23%	90.23%				90.23%	90.23%			
SEU	9.77%	9.77%				9.77%	9.77%			
CORP	0.00%	0.00%				0.00%	0.00%			
Unreg	0.00%	0.00%				0.00%	0.00%			

Cost Center Allocation Percentage Drivers/Methodology:

Cost Center Allocation Percentage for 2021

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2022

Percentage was developed through analysis of gas flow throughput in 2021.

Cost Center Allocation Percentage for 2023

Percentage was developed through analysis of gas flow throughput.

Cost Center Allocation Percentage for 2024

Percentage was developed through analysis of gas flow throughput.

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

Summary of Adjustments to Forecast:

In 2021 \$(000) Incurred Costs										
Forecast Method		Base Forecast			Forecast Adjustments			Adjusted-Forecast		
Years		2022	2023	2024	2022	2023	2024	2022	2023	2024
Labor	Base YR Rec	686	686	686	105	105	105	791	791	791
Non-Labor	Base YR Rec	500	500	500	0	0	0	500	500	500
NSE	Base YR Rec	0	0	0	0	0	0	0	0	0
Total		1,186	1,186	1,186	105	105	105	1,291	1,291	1,291
FTE	Base YR Rec	5.7	5.7	5.7	1.0	1.0	2.0	6.7	6.7	7.7

Forecast Adjustment Details:

Year	Labor	NLbr	NSE	Total	FTE	Adj Type
2022	105	0	0	105	1.0	1-Sided Adj
Explanation: RAMP 1 PL admin (\$105) in 2022. Ongoing cost for this in 2023 and 2024.						
2022 Total 105 0 0 105 1.0						
2023	105	0	0	105	1.0	1-Sided Adj
Explanation: Ongoing costs from new hire in 2022.						
2023 Total 105 0 0 105 1.0						
2024	105	0	0	105	2.0	1-Sided Adj
Explanation: Carry over from new hire in 2022.						
2024 Total 105 0 0 105 2.0						

Note: Totals may include rounding differences.

SCG/GAS TRANSMISSION/Exh No:SCG-06-WP-R-E/Witness: R. Chiapa

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

Determination of Adjusted-Recorded (Incurred Costs):

	2017 (\$000)	2018 (\$000)	2019 (\$000)	2020 (\$000)	2021 (\$000)
Recorded (Nominal \$)*					
Labor	279	512	508	582	583
Non-Labor	139	579	467	241	503
NSE	0	0	0	0	0
Total	418	1,091	975	823	1,085
FTE	2.8	4.9	4.6	5.0	4.8
Adjustments (Nominal \$) **					
Labor	0	0	0	0	0
Non-Labor	0	0	0	-2	-3
NSE	0	0	0	0	0
Total	0	0	0	-2	-3
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Nominal \$)					
Labor	279	512	508	582	583
Non-Labor	139	579	467	239	500
NSE	0	0	0	0	0
Total	418	1,091	975	821	1,083
FTE	2.8	4.9	4.6	5.0	4.8
Vacation & Sick (Nominal \$)					
Labor	47	88	96	103	103
Non-Labor	0	0	0	0	0
NSE	0	0	0	0	0
Total	47	88	96	103	103
FTE	0.5	0.9	0.9	1.0	0.9
Escalation to 2021\$					
Labor	35	49	34	29	0
Non-Labor	15	47	27	10	0
NSE	0	0	0	0	0
Total	50	96	61	39	0
FTE	0.0	0.0	0.0	0.0	0.0
Recorded-Adjusted (Constant 2021\$)					
Labor	361	649	638	714	686
Non-Labor	154	626	494	249	500
NSE	0	0	0	0	0
Total	515	1,276	1,132	963	1,186
FTE	3.3	5.8	5.5	6.0	5.7

* After company-wide exclusions of Non-GRC costs

** Refer to "Detail of Adjustments to Recorded" page for line item adjustments

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

Summary of Adjustments to Recorded:

In Nominal \$ (000) Incurred Costs						
	Years	2017	2018	2019	2020	2021
Labor		0	0	0	0	0
Non-Labor		0	0	0	-2	-3
NSE		0	0	0	0	0
	Total	0	0	0	-2	-3
FTE		0.0	0.0	0.0	0.0	0.0

Detail of Adjustments to Recorded:

<u>Year</u>	<u>Labor</u>	<u>NLbr</u>	<u>NSE</u>	<u>FTE</u>	<u>Adj Type</u>
2017 Total	0	0	0	0.0	
2018 Total	0	0	0	0.0	
2019 Total	0	0	0	0.0	
2020	0	-2	0	0.0	1-Sided Adj
2020 Total	0	-2	0	0.0	
2021	0	-3	0	0.0	1-Sided Adj
2021 Total	0	-3	0	0.0	

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Explanation: Incremental COVID-related costs that are anticipated to be requested for recovery through a non-GRC Catastrophic Event Memorandum Account (CEMA).

Note: Totals may include rounding differences.

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

RAMP Item # 1

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C16

RAMP Line Item Name: SCADA Operations

Tranche(/s): Tranche1: N/A

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	1,185	1,185	1,185	1,185	727	929

Cost Estimate Changes from RAMP:
None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 N/A	0.00	0.00	0.00	0.00	0.00	0.00

Work Unit Changes from RAMP:
A measurable unit for the SCADA Operations department is not practical given the multiple assets that are remotely monitored for different departments.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:
NA

Southern California Gas Company
2024 GRC - REVISED ERRATA
Shared Services Workpapers

Area: GAS TRANSMISSION
 Witness: Rick H. Chiapa
 Category: J. 2200-0329 - SCADA OPERATIONS - USS
 Category-Sub: 1. 2200-0329 - SCADA OPERATIONS - USS
 Cost Center: 2200-0329.000 - SCADA Operations - 2200-0329

RAMP Item # 2

RAMP Activity

RAMP Chapter: SCG-Risk-1 Incident Related to the High Pressure System (Excluding Dig-in)

RAMP Line Item ID: C16

RAMP Line Item Name: SCADA Operations

Tranche(s): Tranche1: na

GRC Forecast Cost Estimates (\$000)

	2021 Historical Embedded Cost (2021 \$)	2022 Forecast (2021 \$)	2023 Forecast (2021 \$)	2024 Forecast (2021 \$)	2024 RAMP Range (2020 Incurred \$)	
					Low	High
Tranche 1 Cost Estimate	0	105	105	105	727	929

Cost Estimate Changes from RAMP:

None.

GRC Work Unit/Activity Level Estimates

Unit of Measure	2021 Historical Embedded Activities	2022 Forecast Activities	2023 Forecast Activities	2024 Forecast Activities	2024 RAMP Range Activities	
					Low	High
Tranche 1 N/A	0.00	0.00	0.00	0.00	0.00	0.00

Work Unit Changes from RAMP:

A measureable unit for the SCADA Operations department is not practical given the multiple assets that are remotely monitored for different departments.

Risk Spend Efficiency (RSE)

	GRC RSE	RAMP RSE
Tranche 1	0.000	0.000

RSE Changes from RAMP:

None.

Southern California Gas Company
2024 GRC - REVISED
Non-Shared Service Workpapers

Area: GAS TRANSMISSION
Witness: Rick H. Chiapa

Appendix A: List of Non-Shared Cost Centers

Cost Center	Sub	Description
2200-0016	000	CONTROL CENTER MODERNIZATION DIRECTOR
2200-0017	000	CONTROL CENTER MODERNIZATION INFRASTRUCTURE TECHNOLOGY
2200-0019	000	CONTROL CENTER MODERNIZATION ENGINEERING & FIELD TECHNOLOGY
2200-0020	000	CONTROL CENTER MODERNIZATION PROJECT EXECUTION
2200-0249	000	SB1371LAP
2200-0255	000	TECHNICAL SERVICES MANAGER
2200-0258	000	DOM VALENCIA
2200-0259	000	DOM VENTURA
2200-0260	000	DOM GOLETA
2200-0262	000	DOM TAFT
2200-0263	000	STATION MAINTANENCE- VENTURA
2200-0264	000	STATION MAINTANENCE- WHEELER RIDGE
2200-0267	000	STATION MAINTANENCE- BLYTHE
2200-0268	000	DOM BLYTHE
2200-0269	000	STATION MAINTANENCE- S. NEEDLES
2200-0270	000	DOM NEEDLES
2200-0273	000	DOM BEAUMONT
2200-0274	000	DOM VICTORVILLE
2200-0276	000	DOM BREA
2200-0277	000	DOM OLYMPIC
2200-0327	000	STORAGE PRODUCTS MANAGER
2200-0427	000	EL CENTRO PIPELINE
2200-0868	000	CCM- POP CAPITAL DISTRIBUTION
2200-1215	000	STATION MAINTANENCE- N. NEEDLES
2200-1216	000	STATION MAINTANENCE- KELSO
2200-1219	000	STATION MAINTANENCE- NEWBERRY
2200-1221	000	STATION MAINTANENCE- DESERT CENTER
2200-1222	000	STATION MAINTANENCE- CACTUS CITY
2200-1223	000	STATION MAINTANENCE- ADELANTO
2200-1265	000	STATION MAINTANENCE- SYLMAR
2200-2170	000	DIR TRANSMISSION - NSS
2200-2175	000	FOM WEST TRANSMISSION- NSS
2200-2209	000	C.P. OPERATIONS EAST TRANSMISSION
2200-2210	000	C.P. OPERATIONS WEST TRANSMISSION