

Brian Yim
Senior Environmental Specialist
8315 Century Park Court, CP21E
San Diego, CA 92123
Tel: 858-654-1658
Fax: 858-637-3700
Mobile: 858-449-0242
bvim@semprautilities.com

September 12, 2017

Mr. Douglas Erwin Senior Air Quality Engineer San Diego County Air Pollution Control District 10124 Old Grove Road San Diego, CA 92131-1649

SUBJECT: Title V Permit Renewal Application

San Diego Gas & Electric, Palomar Energy Center

Dear Mr. Erwin:

San Diego Gas & Electric Company ("SDG&E") is hereby submitting a renewal application for the Part 70 (Title V) Operating Permit (APCD2013-TVP-00038) for its Palomar Energy Center (PEC) located at 2300 Harveson Place, Escondido, California 92029. The Title V permit expires on October 3, 2018. According to Section I.B.1 of the permit, a Title V renewal application must be submitted to the San Diego Air Pollution Control District ("District") no later than October 3, 2017. SDG&E is submitting the attached permit renewal application package to comply with this requirement.

We believe this application package constitutes both a timely and complete submittal to fulfill Part 70 and Regulation XIV permit renewal application requirements. The forms and attachments included for your review are provided in accordance with guidance from the District and includes the Responsible Official's Certification. The forms included are as follows:

•	1401-A1 & A2	Stationary Source Summary
•	1401-G	Insignificant Activity List
•	1401-H1	Applicable Requirements Summary Check List
•	1401-H2	List of Permits by Equipment Category
•	1401-I	Certification Statement
•	1401-O	Multiple Applicable Requirements Streamlining (MARS)
		o 1401-O Details on Attachment O-1 (Table 1)
•	1401-Q	Request for Permit Shield
•	1401-M	List of Abatement Devices
•	Additional	Greenhouse Gas Potential Calculations

SDG&E has also included greenhouse gas (GHG) potential to emit calculations from the plant to address applicability of PEC to EPA's PSD and Title V GHG Tailoring Rule.

A check in the amount of \$8,945 is also being submitted (pursuant to the Title V permit renewal application fee estimate provided by the District).

If you have any questions regarding this application please contact me at (858) 654-1658 (email: byim@semprautilities.com).

Sincerely,

Brian Yim

Senior Environmental Specialist

Enclosures

cc: Carl LaPeter (SDG&E)

Charles Hardman (SDG&E)

Jason Bowman (SDG&E) Moses Peram (SDG&E)

Hashim Navrozali (SDG&E)

	TITLE V A	PPLICATION	= "
	Stationary Source Sur	nmary (FORM 1401-A1)	125
Sa	Company Name an Diego Gas & Electric (Electric Generation)		District Use Only NEDS # SITE ID #
I. F.	ACILITY IDENTIFICATION		
1.	Facility Name (if different than company name): P	Palomar Energy Center (PEC)	
2.	Four digit SIC Code: 4931		
3.	Parent Company (if different than Company Name): N/A	
4.	Mailing Address: 2300 Harveson Place, SD 1473		
		State CA	Zip 92029
5.	Street Address or Source Location: 2300 Harveson	Place, SD1473	
	City Escondido	State <u>CA</u>	Zip <u>92029</u>
6.	UTM Coordinates: <u>UTM 11 489146E, 3664504 N</u>	(NAD27)	
7.	Source Located within 50 miles of a state line:		sources <u>are</u> within 50 miles)
8.	Source Located within 1000 feet of a school:	☐ Yes	_
9.	Type of Organization: ☐ Partnership ☐ Utility Company	Sole Ownership	Government
10.	Legal Owner's Name: San Diego Gas & Electric		
11.	Owner's Agent name (if any): N/A	× 10 .	
12.	Responsible Official: Carl LaPeter	71 // 750 100 050	D. T. T. H. E.C. 100 0510
13.	Plant Site Manager/Contact: Moses Peram	Phone #: 760-432-250	07 FAX #: <u>760-432-2510</u>
14.	Application Contact: Brian Yim, SDG&E (Tel: 85	8-654-1658)	
15.	Type of Facility: Electric Generation	C .: CCPP 5D4	1 1 .
16.	General description of processes/products: <u>Electric</u>		combustion turbine generators
17	with heat recovery steam generators; emergency na		⊠ Yes □ No
17.	Is a Federal Risk Management Plan (RMP) pursuan (If application is submitted after RMP due date, atta		
	(If application is submitted after Rivir due date, and	ich vermeation mat plan is regis	tered with the appropriate agency
II. T	YPE OF PERMIT ACTION	CURRENT PERMIT	EXPIRATION
(check)		(permit number)	(date)
	Initial Title V Application	N/A	N/A
	Permit Renewal	00038	October 3, 2018
	Significant Permit Modification		
H	Minor Permit Modification		
	Administrative Amendment	-	
	ESCRIPTION OF PERMIT ACTION		Voluntari Erritari C
1.	Does the permit action requested involve:	emporary Source	Voluntary Emissions Caps
		ternative Operating Scenarios	Abatement Devices
		ermit Shield	la Danninamant Stuannalinina
	Outdated SIP Requirement Streamlining		le Requirement Streamlining
	Source Subject to MACT Requirements [Section of ACCE.]		onitorio al
2	Source Subject to Enhanced Monitoring (40CF		
2.	Is source operating under a Compliance Schedule?		Proposed rach variance information)
3.			
4.	For permit modification, provide a general des	cription of the proposed perm	iii modification:
	N/A		
IV. ST	PPLEMENTAL ATTACHMENTS*: A2, G, F	H1, H2, I, M, O (& Att. O-1). O.	support info.
	Means all attachments to the complete application		•

SDAPCD – Rev. 01.06 Page 1 of 2

TITLE V APPLICATION	
Stationary Source Summary (FORM 1401-A2)	

Company Name	District Use Only
San Diego Gas & Electric (Electric Generation)	NEDS# SITE ID#

I. MAJOR SOURCE APPLICABILITY

Check appropriate pollutant(s) for which you are a Major Source under Title V. Applicability is based on potential to emit. If more space is necessary, use additional forms. Please type or print legibly.

POLLUTANT	MAJOR SOURCE THRESHOLD TOTAL EMISSIONS, TPY	(check if appropriate)
VOC	100	
PM ₁₀	100	
SO ₂	100	
NOx	100	
CO	100	
ODC	100	
LEAD COMPOUNDS	10	
HAZARDOUS AIR POLLUTANTS		
SINGLE HAP	10	
COMBINATION HAP	25	

Attach all necessary calculations to this form as applicable. NOTE: Calculations are only needed if no Emission Inventory is on file with the District

Reference Emission Inventory Report	Inventory Year _2014	
Carl S. La Peter	11 SEP 2017	
Signature of Responsible Official	Date	
Carl LaPeter	(760) 432-2503	
Print Name of Responsible Official	Telephone No. of Responsible Official	
Plant Manager		
Title of Responsible Official		
II. EMISSIONS CALCULATIONS ATTACHED (as needed)	☐ Yes ⊠ No	
DISTRICT USE O		
Date Application Received:	Application #	
Application Filing Fee:	District Received Stamp:	
Receipt #:	Fee Code:	

TITLE V APPLICATION	
Insignificant Activity List (FORM 1401-G)	

Company Name	District Use Only
San Diego Gas & Electric - Palomar Energy Center	NEDS #
Facility Address: 2300 Harveson Place, Escondido, CA 92029	SITE ID #

LIST OF EQUIPMENT – INSIGNIFICANT ACTIVITIES

Place a check mark in the appropriate box for equipment that is considered an insignificant activity based on throughput or equipment capacity.

Exemptions based on Size (Capacity)

	(Condensed Language of Rule)	Appendix A Citation
\boxtimes	Stationary & portable internal combustion engines with ≤ 50 bhp output rating	(d)(1)(iii)
	Stationary gas turbines with a power rating of < 0.3 megawatt (MW) or a maximum gross heat input rating of 1 million BTUs per hour	(d)(1)(iv)
	Water cooling towers & ponds with a capacity < 10,000 gal/min not used for evaporative cooling of process water or not used for evaporative cooling of water, contaminated water or industrial waste water from barometric jets or from barometric condensers.	(d)(2)
	Fuel-burning equipment with a maximum gross heat input rate of < 1 million Btu/hour when not part of a process, process line, line, equipment, article, machine or other contrivance for which a permit to operate is required by these Rules and Regulations	(d)(4)(i)
	Fuel burning equipment with a maximum gross heat input of < 20 million Btu/hour, and fired exclusively with natural gas and/or liquefied petroleum gas	(d)(4)(ii)
	Steam boilers, process heaters, and steam generators with a maximum gross heat input of < 5 million Btu/hour	(d)(4)(iii)
	Crucible-type or pot-type furnaces with a brimful capacity of < 450 in ³ of any molten metal	(d)(12)
	Crucible, pot or induction furnaces with a capacity of ≤ 2500 in ³ , in which no sweating or distilling is conducted and from which only non-ferrous metals except yellow brass, are poured or non-ferrous metals are held in a molten state	(d)(13)
\boxtimes	Dry batch mixers with ≤ 0.5 cubic yards rated working capacity	(d)(27)
\boxtimes	Batch mixers (wet) with ≤ 1 cubic yard capacity where no organic solvents, diluents or thinners are used.	(d)(28)
	Roofing kettles (used to heat asphalt) with a capacity of ≤ 85 gallons	(d)(33)
\boxtimes	Abrasive blasting equipment with a manufacturer's-rated sand capacity of < 100 lbs or < 1 ft ³	(d)(34)
	Paper shredders and paper disintegrators that have a capacity of 600 pounds per hour or less, and the	
	associated conveying systems and baling equipment.	(d)(41)
	Ovens having an internal volume of \leq 27 ft ³ in which organic solvents or materials containing organic solvents are charged	(d)(59)
	Cold solvent cleaning tanks, vapor degreasers, and paint stripping tanks with a liquid surface area of \leq 1.0 ft ²	(d)(61)(i)
	Cold solvent cleaning tanks, vapor degreasers, and paint stripping tanks which have a maximum capacity of ≤ 1 gallon	(d)(61)(ii)

TITLE V APPLICATION Insignificant Activity List (FORM 1401-G)

Continued - Exemptions based on Size (Capacity)

	(Condensed Language of Rule)	Appendix A <u>Citation</u>
\boxtimes	Stationary organic compound storage tanks with a capacity of \leq 250 gallons	(e)(1)
	Liquid surface coating application operations using hand-held brushes for application of a primer coating from containers of \leq eight (8) ounces in size, to fasteners to be installed on aerospace parts	(h)(5)
	Liquid surface coating application operations using air brushes with a coating capacity of ≤ 2 ounces for the application of a stencil coating	(h)(6)
	Metal inspection tanks that: a) do not utilize a suspension of magnetic or fluorescent dye particles in volatile organic solvent, and b) have a liquid surface area $< 5 \text{ ft}^2$ and c) are not equipped with spray type flow or a means of solvent agitation	(o)(5)
	Bakery ovens used for baking yeast leavened products where the combined rated heat input capacity is < 2 million Btu/hr	(o)(37)
Exemi	otions based on Production Rates (Emission Limits)	
	Printing or graphic arts presses located at a stationary source which emits a total of <15 lbs/day of VOC's subject to Rule 67.16, on each day of operation	(d)(7)
	Solder levelers, hydrosqueegees, wave solder machines, and drag solder machines which use < 10 lbs/day of any material containing VOCs	(d)(23)
	Fire extinguishing equipment, using halons with a charge of < 50 lbs. of a Class I or Class II ozone depleting compound.	(d)(31)
	Coffee roasting equipment with a manufacturer's rating of ≤ 15 lbs/hr	(d)(45)
	Equipment used to manufacture bio-agricultural products for exclusive use in field testing required to obtain FDA, EPA, USDA and /or Cal-EPA approval, provided the uncontrolled emissions of VOCs from all such operations < 5 ton/yr.	(d)(49)(iii)
	Oil quenching tanks which use < 20 gal/yr of make-up oil	(d)(56)
	Equipment that is used to conduct research and develop new or improved processes/products, and is operated by technically trained personnel under the supervision of a research director, and is not used in the manufacture of products for sale or exchange for commercial profit, and all emissions are < 15 lbs/day.	(4)(49)
П	Powder coating operations, except metalizing gun operations, where surface preparation or cleaning	(d)(48) (d)(62)
	solvent usage is < 0.5 gal/day	
	Equipment used to transfer fuel to & from amphibious ships for maintenance purposes, provided total annual transfers < 60,000 gal/yr.	(f)(2)
	Stationary storage tanks (excluding tanks subject to Rule 61.9) used exclusively for the storage of liquid organic solvents used as dissolvers, viscosity reducers, reactants, extractants, cleaning agents or thinners provided that emissions < 15 lbs/day.	(e)(3)
	Liquid surface coating or adhesive application operations (portable or stationary) where not more than 20 gallons per year of material containing organic compounds are applied	(h)(1)
	Liquid surface coating application operations exclusively using materials with a VOC content of $< 20 \text{ g/L}$ where $< 30 \text{ gal/day}$ of such materials are applied.	(h)(2)
	Foam manufacturing or application operations which emit < 5 lbs/day of VOCs	(i)(1)
	Reinforced plastic fabrication operations using resins such as epoxy and/or polyester which emit < 5 lbs/day of VOCs	(i)(2)
	Plastics manufacturing or fabrication operations which emit < 5 lbs/day of VOCs	(i)(3)
	Cold solvent degreasers used for educational purpose and which emit < 5 lbs/day of VOCs	(i)(4)

	TITLE V APPLICATION	
	Insignificant Activity List (FORM 1401-G)	
	Golf grip application stations which exclusively use liquid materials with an initial boiling point of 450°F (232°C), or greater and which emit < 5 lbs/day of VOCs.	(i)(5)
	Batch-type waste-solvent recovery stills with batch capacity of ≤ 7.5 gallons for onsite recovery provided the still is equipped with a safety device & VOC emissions are < 5 lbs/day	(i)(6)
	Peptide and DNA synthesis operations which emit < 5 lbs/day of VOCs	(i)(7)
	Equipment used for washing or drying articles fabricated from metal, cloth, fabric or glass, provided that no organic solvent is employed in the process and that no oil or solid fuel is burned and none of the products being cleaned has residues of organic solvent and VOC emissions are <5 lbs/day	(i)(8)
	Hot wire cutting of expanded polystyrene foam which emit < 5 lbs/day of VOCs.	(i)(9)
	Any coating and/or ink manufacturing operations located at a stationary source, which emit < 15 lbs/day of VOCs.	(o)(9)
	Any operation producing materials for use in cosmetic or pharmaceutical products and/or manufacturing cosmetic or pharmaceutical products by chemical processes, which emit < 15 lbs/day of VOCs	(o)(12)
\boxtimes	Refrigeration units except those used as, or with, air pollution control equipment with a charge of < 50 lbs of a Class I or II ozone depleting compound.	(o)(18)
	Atmospheric organic gas sterilizer cabinets where ethylene oxide emissions are < 5 lbs/yr	(0)(28)
	Aerosol can puncturing/crushing operations which vents all emissions through a properly operated/maintained carbon canister, provided < 500 cans/day are processed.	(o)(29)(ii)
	Solvent wipe cleaning operations using a container applicator that minimizes emissions to the air where the uncontrolled emissions of VOCs < 5 ton/yr, or the total purchase of solvents < 1,500 gal/yr, or the total	(o)(32)

Equipment approved for use by the EPA for recovering and/or recycling CFCs provided such equipment is

Stationary IC engines rated at ≤ 200 bhp installed and operated before November 15, 2000, which operate

(0)(33)

(o)(34)(ii)

purchase of solvents containing a single HAP < 350 gal/yr.

< 200 hr/yr.

charged with < 50 lbs. of a Class I or II ozone depleting compound.

SDAPCD Rev. 6/05 Page 3 of 3

San Diego County Air Pollution Control District 10124 OLD GROVE ROAD SAN DIEGO CA 92131-1649 (858) 586-2600 FAX (858) 586-2601

TITLE V APPLICATION Applicable Requirements Summary Checklist (FORM 1401-H1)

District Use Only	NEDS#
Company Name	San Diego Gas & Electric (PEC)

APPLICABLE REQUIREMENTS: Applicable requirements which apply to an entire facility are listed first. The applicant should check appropriate boxes on the form and attach emission unit specific permit number lists where necessary. Where streamlining is employed, note on this form. If information does not fit in the space allotted, attach documentation and reference it on this form. Type or print legibly.

ıre	tive									1										
Futt	Effective Date																Si II	П		
																			4	
																			_	
												11=								
														\dashv						
								-												
									_		_									
							_	_					-							
	2													\dashv						
en. Engine									1					_	_					
IKSG #7			_			×								2						
HKSG #1						×														•
			×	×	×		×	×	×	×	×	×	×	×	×	×	×	×	_	
Monitoring, Records, Reports	Rule Section																		=	
Test Method	Rule Section													(g)	(e)			2.		
		ption	ruct	4.	es	Continuous Emission Monitoring Requirements											ance			
	RULE DESCRIPTION	Descri	o Con	perate	Faciliti	Requir			ation						00		y Vari		п	
	CRIP	nent I	ority t	it to C	sting I	oring]			teriora						ing V		ergenc		nt Pla	
	DES	quirer	Auth	Perm	& Te	Monit		11	ant De						ontair		s: Eme		tailme	_
1	TOLE	le Rec	1 – (a)	1-(b)	pling	ssion I	ation	iew	gnifice	SI	SI			atings	ials C	54	ditions		e Curi	nt Pla
	Ľ	olicab	quire	quire	of San	s Emi	nform	se Rev	of Si	ndition	nission		ntion	ral Co	Mate		n Con	ontrol	Sourc	ateme
		y Apr	Permits Required – (a) Authority to Contruct	Permits Required – (b) Permit to Operate	Provision of Sampling & Testing Facilities	innoni	Emission Information	New Source Review	Prevention of Significant Deterioration	Permit Conditions	Visible Emissions	Nuisance	Circumvention	Architectural Coatings	Storage of Materials Containing VOC	Abrasive Blasting	Breakdown Conditions: Emergency Variance	Burning Control	Stationary Source Curtailment Plan	Traffic Abatement Plan
		Facility Applicable Requirement Description	Perm	Perm	Prov	Cont	Emis	New	Prev	Perm	Visit	Nuis	Circ	Arch	Stor	Abra	Brea	Burn	Stati	Trafi
1	RULE		10(a)	10(b)	19	19.2	19.3	NSR	D	_	50	_	0	0.	67.17	_	000	_	=	132
	RU		ě	Ιğ	=	19	19	SZ	PSD	21	5	51	09	67.0	5.	71	86	101	131	=

Page 2 of 9

								171						
RULE	RULE DESCRIPTION	Test Method or Rule Section	Monitoring, Records, Reports, Rule Section	Villios T	GT/HRSG #1	Emergen. Engine							Future Effective Date	ire live
	Equipment Specific Applicable Requirement Description		-		ta .					١.				
50	Visible Emissions			×	×	×								
(51)	Nuisance			×		/								
) 25	Particulate Matter	Method 5		0,1	SS	×	39							
53	Specific Contaminants	Method 5		0,	SS	×	=							
53.1	Scavenger Plants			1										
54	Dust and Fumes	Method 5		S	11							-		
58	Incinerator Burning													
59	Control of Waste Disposal - Site Emissions	(e)	(c) & (f)											
09	Circumvention													
61.1	Receiving & Storing VOCs at Bulk Plants & Terminals	(p)	(c)(7)											
61.2	Transfer of VOCs into Mobil Transport Tanks	(c)(10)												
61.3	Transfer of VOCs into Stationary Storage Tanks		(c)(2)(iii)											
61.4	Transfer of VOCs into Vehicle Fuel Tanks													
61.5	Visible Emissions Standards for Vapor Control Equip.		VE											
61.7	Spillage & Leakage of VOCs							-					-	
61.8	Certification Requirements for Vapor Control Equip.				_									
62	Sulfur Content of Fuels			-	S	×								
64	Reduction of Animal Matter													
99	Organic Solvents	(b)	(0)											
67.1	Alternative Emission Control Plans (AECP)	(c)	(b)											
67.2	Dry Cleaning - Petroleum Solvent	(£)	(e)											
67.3	Metal Parts Coating	(g)	(f)				U.							
67.4	Can & Coil Coating	(g)	(f)							- 1 1	_			
67.5	Paper, Film and Fabric Coating	(£)	(e)					_						
67.6	Solvent Cleaning Operation	(£)												
67.7	Cutback & Emulsified Asphalt	(£)	(e)							15				
6.79	Aerospace Coating Operations	(g)	(t)											
67.10	Kelp Processing and Bio-Polymer Mfg.	(t)	(e)											
67.11	Wood Products Coating Operations (not in SIP)							_						

Future Effective Date											9												
	-													=			1						
																						DC 1	
Emergen. Engine															×	×			×	×	×	×	
Facility GT/HRSG #1 GT/HRSG #2										8		S	S	S					×	X	× ×	×	
Monitoring, Records, Reports, Rule Section	(f)		(f)		(f)	(f)				(e)		(e) & (g)	(e) & (g)	(e) & (g)	(e)	(e)							
Test Method or Rule Section	(g)	(e)	(g)	(e)	(g)	(g)				(f)		(f)	(f)	(t)	(f)	(f)			.1				
RULE DESCRIPTION	Polyester Resin Operations	Pharmaceutical & Cosmetic Manufacturing	Graphic Arts Operations	Open VOC Containers	Marine Coating Operations	Coating and Printing Inks Mfg. Operations	Motor Venicie & Mobile Equipment Kellinishing Operations	Adhesive Material Application Operations	Expandable Polystyrene Foam Products Manufacturing Operations (not in SIP)	Bakery Ovens	Fuel Burning Equipment - NOx	Boilers	Stationary Gas Turbine Engines - RACT	Stationary Gas Turbine Engines – BARCT (not in SIP)	Stationary Internal Combustion Engines - RACT	Stationary Internal Combustion Engines – BARCT (not in SIP)	Orchard Heaters	Abrasive Blasting	Applicability, Definitions, Emission Calculations, Emission Offsets and Banking, Exemptions, and Other Requirements (SIP Version 7/5/79)	NSR - General Provisions (Version 11/4/98) (not in SIP)	Standards for Authority to Construct Best Available Control Technology (SIP Version 7/5/79)	NSR – Non-major Stationary Sources (Version 11/4/98) (not in SIP)	Standards for Authority to Construct - Air Ouality
RULE	67.12	67.15	67.16	67.17	67.18	61.19	67.20	67.21	67.22	67.24	89	69.2	69.3	69.3.1	69.4	69.4.1	70	71	20.1	20.1	20.2	20.2	

Regulation X - Standards for Performance for Electric Utility Surandards of Performance for Industrial - Des Standards of Performance for Stonge Vessels for Randards of Performance for Stonge Ve	Future Effective Date
RULE DESCRIPTION Major Stationary Source and PSD ary Source (Version 11/4/98) (not in SIP) rds for Authority to Construct - Major s (SIP Version 7/5/79) rds for Permit to Operate Air Quality is (SIP Version 7/5/79) I Provisions I Provisions Tationary Sources (NSPS) Tationary Source (NSPS) Tationary Sources (NSPS) Tationary Sources (NSPS) Tationary Sources (NSPS) Tationary Sources (NSPS) Tationary Source (NSPS) Tationary Sources (NSPS) Tationary Sourc	Date
Major Stationary Source and PSD ary Source (Version 11/4/98) (not in SIP) Portable Emission Units (Version 16 for Authority to Construct - Major Portable Emission Units (Version 7/5/79) Plants (SIP Version 7/5/79) Plants (SIP Version 7/5/79) Is (SIP Version 7/5/79) It is (SIP Version 7/5/79) Is (SIP Version 7/5/79) Is (SIP Version 7/5/79) It is (SIP Version 7/	
S C C C C	
Portable Emission Units (Version 9) (not in SIP) Plants (SIP Version 7/5/79) rds for Permit to Operate Air Quality is (SIP Version 7/5/79) Attion X - Standards of Performance for Fossil-Fuel Fired Generators rds of Performance for Fossil-Fuel Fired Generating Units Constructed After rds of Performance for Industrial- rds of Performance for Storage Vessels for	
rds for Permit to Operate Air Quality is (SIP Version 7/5/79) rds for Permit to Operate Air Quality is (SIP Version 7/5/79) rds for Permit to Operate Air Quality is (SIP Version 7/5/79) rds for Permit to Operate Air Quality rds for Performance for Performance for Fossil-Fuel Fired Senerations Rule # Rule # Rule # Rule # Rule # 260.13 260.13 260.13 260.14 260.45 260.46 260.48 260.48 260.48 260.49 260.49 260.49 260.49 260.49 260.49 260.49 260.49 260.49 260.49 260.49 260.49 260.40 26	
is (SIP Version 7/5/79) Ition X - Standards of Performance for Rule # tationary Sources (NSPS) I Provisions rds of Performance for Fossil-Fuel Fired Generating Units Constructed After ber 18, 1978 rds of Performance for Industrial- rds of Performance for Industrial- rds of Performance for Storage Vessels for rds of Per	
trion X - Standards of Performance for Fationary Sources (NSPS) I Provisions rds of Performance for Fossil-Fuel Fired Generating Units Constructed After ber 18, 1978 rds of Performance for Industrial- rds of Performance for Incinerators rds of Performance for Storage Vessels for um Liquids Constructed after June 11, and Prior to May 19, 1978 tationary Sources (NSPS) Rule # Rule # Rule # Rule # Rule # Rule # Constructed Scorate Constructed After Constructed After Constructed after June 11, and Prior to May 19, 1978 rds of Performance for Storage Vessels for and Liquids Constructed after June 11, and Prior to May 19, 1978 rds of Performance for Storage Vessels for and Liquids Constructed after June 11, and Prior to May 19, 1978 rds of Performance for Storage Vessels for and Liquids Constructed after June 11, and Prior to May 19, 1978 rds of Performance for Storage Vessels for and Liquids Constructed after June 11, and Liquids Constr	
I Provisions I Constructed After I Constructed After I Sof Performance for Industrial- I Sof Performance for Incinerators I Constructed after June 11, and Prior to May 19, 1978 I Sof Performance for Storage Vessels for and I storids Constructed after June 11, and Prior to May 19, 1978 I Sof Performance for Storage Vessels for and Prior to May 19, 1978 I Sof Performance for Storage Vessels for and Prior to May 19, 1978 I Sof Performance for Storage Vessels for and Prior to May 19, 1978 I Sof Performance for Storage Vessels for and Prior to May 19, 1978 I I Sof Performance for Storage Vessels for and Prior to May 19, 1978 I I I I I I I I I I I I I I I I I I I	
I Provisions rds of Performance for Fossil-Fuel Fired Generators rds of Performance for Electric Utility Generating Units Constructed After rds of Performance for Industrial- rds of Performance for Incinerators rds of Performance for Storage Vessels for um Liquids Constructed after June 11, rds of Performance for Storage Vessels for	
rds of Performance for Fossil-Fuel Fired Generators rds of Performance for Electric Utility Generating Units Constructed After Leber 18, 1978 rds of Performance for Industrial- rds of Performance for Incinerators rds of Performance for Asphalt Concrete rds of Performance for Storage Vessels for um Liquids Constructed after June 11, und Prior to May 19, 1978 rds of Performance for Storage Vessels for	
rds of Performance for Electric Utility Generating Units Constructed After ber 18, 1978 the of Performance for Industrial- crial-Institutional Steam Generating crist of Performance for Incinerators rds of Performance for Asphalt Concrete rds of Performance for Storage Vessels for turn Liquids Constructed after June 11, and Prior to May 19, 1978 Telegonate of Storage Vessels for trial of Performance for Storage Vessels fo	
Generating Units Constructed After 260.48a 260.49a 260.49a 260.49a 260.49b 260.47b S 260.47b S 260.45b 260.48b 260.48b 260.46b 260.48b 260.46b 260.49b 260.49b 260.46b 260.49b 260.49b 260.54 260.53 260.54 260.53 260.93 2	
rds of Performance for Industrial- ercial-Institutional Steam Generating 260.45b 260.48b rds of Performance for Incinerators 260.54 260.53 rds of Performance for Asphalt Concrete 260.93 rds of Performance for Storage Vessels for um Liquids Constructed after June 11, and Prior to May 19, 1978 rds of Performance for Storage Vessels for rds of Performance for Storag	
rds of Performance for Industrial- ercial-Institutional Steam Generating 260.46b rds of Performance for Incinerators 260.54 rds of Performance for Asphalt Concrete 260.93 rds of Performance for Storage Vessels for um Liquids Constructed after June 11, and Prior to May 19, 1978 rds of Performance for Storage Vessels for rds of Performance for Storage Vessels for multiquids Constructed after May 18, 1978 rds of Performance for Storage Vessels for rds of Performance for rds of Performance for rds of Performance for rds of Performance	
rds of Performance for Incinerators 260.54 rds of Performance for Asphalt Concrete 260.93 rds of Performance for Storage Vessels for um Liquids Constructed after June 11, nd Prior to May 19, 1978 rds of Performance for Storage Vessels for rds of Performance for Storage Vessels for multiquids Constructed after May 18	
rds of Performance for Asphalt Concrete 260.93 rds of Performance for Storage Vessels for um Liquids Constructed after June 11, nd Prior to May 19, 1978 rds of Performance for Storage Vessels for rds of Performance for Storage Vessels for	
rds of Performance for Storage Vessels for um Liquids Constructed after June 11, nd Prior to May 19, 1978 rds of Performance for Storage Vessels for um 1 iquids Constructed after May 18	
Standards of Performance for Storage Vessels for Performance for Performance for Storage Vessels for Performance for Performan	
1978 260.115a 260.115a	
Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for which Construction	
Reconstruction, or Modification Commenced 260.113b 260.116b	

Page 5 of 9

	Future Effective Date			= 0									20					1				
									16													
							"		8													
																						_
	Emergen. Engine																			12.		
	GT/HRSG #2	4						S			4							8				
	Facility GT/HRSG #1							S										π,				
3	Monitoring, Records, Reports, Rule Section				260.153		260.314	260.334	260 434		260.445	260.454	260.464	260.544 260.545 260.546	260.585							
	Test Method or Rule Section		260.123	260.133	260.154	260.303	260.313	260.335	260.433	200.20	260.444	260.453	260.463	260.543	260.583							
	RULE DESCRIPTION		Standards of Performance for Secondary Lead Smelters	Standards of Performance for Secondary Brass and Bronze Ingot Production Plants	Standards of Performance for Sewage Treatment Plants	Standards of Performance for Grain Elevators	Standards of Performance for Surface Coating Metal Furniture	Standards of Performance for Stationary Gas Turbines	Standards of Performance for the Graphic Arts Indianary Publication Reformance Printing	Ctandards of Derformance for the Dressure	Sensitive Tape and Label Surface Coating Operations	Standard of Performance for the Industrial	Standards of Performance for Metal Coil Surface	Standards of Performance for the Rubber Tire	Standards of Performance for Flexible Vinyl and Urethane Coating and Printing	Standards of Performance for Petroleum Dry Cleaners	New Source Performance Standards (40 CFR 60)	Portland Cement Plants	Small Industrial -Commercial -Institutional Steam Generators > 10 MM Btu but < 100 MM Btu.	Municipal Waste Combustors	Nitric Acid Plants	
	RULE	Subnart				S dd					% % %				-		TX.				Ö	

Page 6 of 9

	Future Effective Date																						7					
-																	-3											
														\dashv														
																					4							
																						ř						
																										>		
																							-					
	Emergen. Engine					-	_																					
	GT/HRSG #2																											
	GT/HRSG #1																											
	Facility																											
	Monitoring, Records, Reports, Rule Section		17						:													1			M			
	Test Method or Rule Section		;																									
	NOL			cilities				lants									ng Plants	ınts	ıck Surface			Roofing	e Synthetic ing Industry.	Industry			ner Mfg. Ind.	troleum
	RULE DESCRIPTION		Oxygen Process Furnaces	Oxygen Process Steelmaking Facilities	Primary Copper Smelters	Primary Zinc Smelters	Primary Lead Smelters	Primary Aluminum Reduction Plants	Phosphate Fertilizer Industry	Phosphate Fertilizer Industry	Coal Preparation Plants	Ferroalloy Production Facilities	Steel Plants	Kraft Pulp Mills	Glass Manufacturing Plants	Lime Manufacturing Plants	Lead-Acid Battery Manufacturing Plants	Metallic Mineral Processing Plants	Automobile and Light-Duty Truck Surface Coating Operations	Phosphate Rock Plants	Ammonium Sulfate Manufacture	Asphalt Processing and Asphalt Roofing Manufacture	Equipment Leaks of VOC in the Synthetic Organic Chemicals Manufacturing Industry.	Beverage Can Surface Coating Industry	Bulk Gasoline Terminals	New Residential Wood Heaters	VOC Emissions from the Polymer Mfg. Ind.	Equipment Leaks of VOC in Petroleum Refineries.
	RULE	Subpart	N Oxy	Na	P Prir	Q Prir	R Prir	S Prir	T&U Pho	V,W,X Pho	\vdash	Z Fen	AA, AAa Stee	BB Kra	CC Gla	HH Lim	KK	LL Mel	Aut MM Cos	NN Pho	PP Am	Asp UU Ma		WW Bev	XX Bul	AAA Nev	OV DDD VO	GGG Ref

Page 7 of 9

TITLE V APPLICATION Applicable Requirements Summary Checklist (FORM 1401-H1) - continued

Future Effective Date																		
				- 12														
				- 1														
				ं														
																	3.	
	-																	
	-																_	
							- 0											
14	-																	
	-					19							-					
	-	-					=					-2						
Emergen. Engine	-	_																
GT/HRSG #2				_	_											-		
Facility GT/HRSG #1	-			_											-			
	-																	
Monitoring, Records, Reports, Rule Section			7									į				OUS AIR		
Test Method or Rule Section	-			×												S FOR HAZARDOUS AIR		
RULE DESCRIPTION		Synthetic Fiber Production Facilities	Onshore Natural Gas Processing: VOC Equipment Leaks and SO ₂ Emissions.	Synthetic Fiber Production Facilities	Onshore Natural Gas Processing: VOC Equipment Leaks and SO ₂ Emissions.	VOC Emissions from Synthetic Organic Chemical Manufacturing Industry Distillation Operations.	Standard of Performance for Nonmetallic Mineral Processing Plants	Wool Fiberglass Insulation Mfg. Plants	VOC Emissions from Petroleum Refinery Wastewater Systems.	VOC Emissions from the Synthetic Organic Chemical Manufacturing Industry (SOCMI) Reactor Processes.	Magnetic Tape Coating Facilities	Industrial Surface Coating Surface, Surface Coating of Plastic Parts for Business Machines.	Calciners and Dryers in Mineral Industries.	Polymeric Coating of Supporting Substances Facilities.	Standards of Performance for Municipal Solid Waste Facilities	REGULATION XI - NATIONAL EMISSION STANDARDS FOR POLLUTANTS (NESHAPS)	General Provisions	Beryllium Extraction Plants; Ceramic Plants, Foundries, Incinerators, Propellant Plants, and Machine Shops that Process Beryllium Containing Material; and Rocket Motor Firing Test Sites.
RULE	Subpart	ННН	KKK, LLL	ННН	KKK, LLL	Z	000	PPP	000	RRR	SSS	LLL	nnn	^^^	WMM	SUBPART	A	C, D

Page 8 of 9

Applicable Requirements Summary Checklist (FORM 1401-H1) - continued TITLE V APPLICATION

Future Effective Date											August 1					
Test Monitoring, Method or Records, Racility GT/HRSG #1 Rule Reports, CT/HRSG #2 Section Rule Section																
RULE DESCRIPTION		Mercury Ore Processing; Manufacturing Processes Using Mercury Chloralkali Cells; and Sludge Incinerators.	Ethylene Dichloride Mfg. Via Oxygen, HCl and Ethylene; Vinyl Chloride Mfg.; and Polyvinyl Chloride Mfg.	Asbestos Mills; Roadway Surfacing with Asbestos Tailings; Manufacture of Products Containing Asbestos; Demolition; Renovation; and Spraying and Disposal of Asbestos Waste.	_		Dept. of Energy; Nuclear Regulatory Commission Licensed Facilities; Other Federal Facilities; and Elemental Phosphorus Plants. (Radionuclide)	Fugitive Process, Storage, and Transfer Equipment Leaks; Coke By-Product Recovery Plants; Benzene Storage Vessels; Benzene Transfer Operations; and Benzene Waste Operations.	Glass Manufacturer; Primary Copper Smelter; Arsenic Trioxide and Metallic Arsenic Production Facilities.	Pumps, Compressors, Pressure Relief Devices, Connections, Valves, Lines, Flanges, Product Accumulator Vessels, etc. in VHAP Service.	MACT Standards (40 CFR 63)	Amendment: Reopening, Averaging Issue	Coke Ovens	Ethylene Oxide Sterilizers	Industrial Process Cooling Towers	
RULE	Subpart	ш	ĹŢ	Σ	SUBPART	B,Q,R,	H,I,K	J,L,Y, BB,FF	N.O.P		SUBPART	F,G, H,I	L	0	0	Ĺ

Page 9 of 9

Applicable Requirements Summary Checklist (FORM 1401-H1) - continued TITLE V APPLICATION

Future Effective Date																					P						
														1					in the state of th								
								-	-																		
Emergen. Engine																						3.					
GT/HRSG #2																								×			
Facility GT/HRSG #1																		-					×	×			
Monitoring, Records, Reports, Rule Section																											
Test Method or Rule Section																			(TCM)					É	82)	В	
RULE DESCRIPTION		Halogenated Solvent Cleaning Degreasing	Secondary Lead Smelters	Marine Tank Loading/Unloading	Petroleum Refineries	Off-Site Waste and Recovery Operations	Magnetic Tape	Aerospace (Coatings)	Shipbuilding for Ship Repair (Surface Coating)	Wood Furniture Industry (Coatings)	Printing and Publishing	Municipal Solid Waste Landfills		+	+	Surface Coating of Plastic Parts	Reciprocating Internal Combustion Engines	Stationary Combustion Turbines	California Airborne Toxic Control Measures (ATCM) 17 CCR	Hexavalent Chromium ATCM for Chrome Plating and Chromic Acid Anodizing Operations	ATCM for Emissions of Perchloroethylene from Dry Cleaning Operations		40 CFR Part 68 RMP	Title IV - Acid Rain (40 CFR 72)	Title VI-Ozone Depleting Compounds (40 CFR 82)	Servicing of Motor Vehicle Air Conditioners	
RULE	Subpart	L	X	Y	CC	DD	EE	DD	II	JJ	KK	AAAA	חחחחח		MMIMIM	PPPP	ZZZZ	YYYY		\$93102	893109					В	

TITLE V APPLICATION LIST OF PERMITS BY EQUIPMENT CATEGORY (FORM 1401-H2)

Company Name	District Use Only
San Diego Gas & Electric (SDG&E)	NEDS #
Facility Address: 2300 Harveson Place, SD1473	SITE ID #
Escondido, CA 92029	

PERMITTED EMISSION UNITS BY EQUIPMENT CATEGORY

In the emission unit (equipment) category order entered on Form 1401-H1, Applicable Requirements Summary Checklist, list emission units by permit number for the specific emission unit (equipment) category. Under the column labeled status place an "O" if operational, "N" if non-operational, or "S" if the equipment is new and currently operating under a startup authorization. If more space is required, use additional forms. Please type or print legibly.

Emission Unit Category	Application/ Permit No.	Status of Emission Unit
Gas Turbine #1 & HRSG #1	APCD2010-PTO- 000623	0
Gas Turbine #2 & HRSG #2	APCD2010-PTO- 000625	0
Emergency IC Engine	APCD2011-PTO- 000873	0

Pag	Je.	1	of 1
ı az	20	T	OTI

		TITLE V APPLICATION	
		Certification Statement (FORM 1401-I)	
•	55		

		Company Name	District Use Only
San Di	iego Gas & I	Electric (Elect. Generation)	NEDS #
Facility A	ddress: 23	00 Harveson Place, SD1473	SITE ID #
Escondic	do, CA 9202	9	
_	ulty of perju box for con	ry, identify the following: (Read each s firmation.)	tatement carefully and
Applicable	Not Applicable	identified in this application will continuit with which the source is in compliance	d after reasonable inquiry, the source(s) nue to comply with the applicable requirement . The applicable requirement(s) with which the re identified in Form 1401-L, Schedule of
\boxtimes		Based on information and belief forme identified in this application will comprequirement(s) on a timely basis.	d after reasonable inquiry, the source(s) ly with the future-effective applicable
		identified in the Schedule of Complian	d after reasonable inquiry, the source(s) ce application form that is/are not in ement(s), will comply in accordance with the
			d after reasonable inquiry, information on nts, all accompanying reports, and other nte, and complete.
\boxtimes		All fees required by Regulation III, Ru	le 40 have been paid.
Signature	Casl of Responsib	S. Laket	
		· Omeiui	
	Carl LaPeter Print Name of Responsible Official		Telepone No. of Responsible Official
Print Nam Plant M	e of Respons		

TITLE V APPLICATION
Multiple Applicable Requirements Streamlining (FORM 1401-O)

Company Name	District Use Only
SAN DIEGO GAS & ELECTRIC (ELECTRIC GENERATION)	NEDS#
Facility Address: 2300 HARVESON PLACE, SD1473, ESCONDIDO, CA 92029	SITE ID#

MULTIPLE APPLICABLE REQUIREMENTS STREAMLINING

If more space is required, use additional forms. Please type or print legibly.

Application No(s) Permit No(s)	Multiple Applicable Requirements	Streamlined Requirements	Attachment Number
976846	GT/HRSG #1; See Attachment O-1	See Attachment O-1	O-1
984082	GT/HRSG #2; See Attachment O-1	See Attachment O-1	O-1
· Jacob			
			+
0.100			
		1	
district and the second			
		T	

Page	1	of	1_	
0				

Attachment O-1, Palomar Energy Center Multiple Applicable Requirements Streamlining - Gas Turbine (with Duct Burner) (Permit Nos. APCD2010-PTO-000623-V1 and APCD2010-PTO-000625)

Table 1. Summary of Multiple Applicable Requirements (Updated: July 2017)

Subject	Permit Condition (Permit Nos. APCD2010- PTO-000623 and APCD2010-PTO-000625)	SDAPCD Rule	Federal Requirement
NOx Emission Rates (Gas Turbine)	SDAPCD NSR; Condition Nos: 5, 10, 14, 15, 16, 18	SDAPCD Rule 69.3(d)(1)(i) SDAPCD Regulation X, Subpart GG	40 CFR Part 60 §60.332(a)(1)
NOx Emission Rates (Duct Burner)	SDAPCD NSR; Condition Nos: 5, 10, 14, 15, 16, 18	SDAPCD Regulation X, Subpart Db	40 CFR Part 60 §60.44b(l)(1)
NOx Control Work Practices	SDAPCD NSR; Condition Nos.: 4, 20, 32, 34	None	None
NOx Emissions Monitoring Requirements: Continuous Emissions Monitoring System	SDAPCD NSR; Condition Nos.: 4, 37, 38	SDAPCD Rule 69.3(e)(1) and (2), (g)	40 CFR Part 75 §75.10(a)(2) and §75.12(c)
NOx Emissions Recordkeeping Requirements	SDAPCD NSR; Condition No. 20	SDAPCD Rule 69.3(e)(3) and (5) SDAPCD Regulation X, Subpart A, Rule 260.4(b), 260.7(c)	40 CFR Part 75 §75.57(a), (b), and (d) 40 CFR Part 60 §60.4(b) 40 CFR Part 60 §60.7(c)
SOx Emission Rates	SDAPCD NSR; Condition No. 2	SDAPCD Rule 53(d)(1) SDAPCD Regulation X, Subpart GG	40 CFR Part 60 § 60.333(a)
SOx Emissions Work Practices, Monitoring and Recordkeeping Requirements	SDAPCD NSR; Condition No. 2	SDAPCD Regulation X, Subpart A, Rule 260.4(b), 260.7 (c)	40 CFR Part 60 §60.4(b) 40 CFR Part 60 §60.7(c)
Sulfur Content of Fuels	SDAPCD NSR; Condition No. 2	SDAPCD Rule 62(b)(1) SDAPCD Regulation X, Subpart GG	40 CFR Part 60 § 60.333(b)
Sulfur Content of Fuels Work Practices, Monitoring and Recordkeeping Requirements	SDAPCD NSR; Condition No. 2	SDAPCD Regulation X, Subpart A, Rule 260.4(b), 260.7 (c)	40 CFR Part 60 §60.4(b) 40 CFR Part 60 §60.7(c)

Multiple requirements were identified pertaining to the gas turbine: (1) NOx emission limits, (2) SOx emission limit from and (3) sulfur content of fuel. The following is a discussion of the applicable requirements, determination of the most stringent emission limit and associated monitoring and record keeping requirements, and proposed streamlined requirements.

NOx requirements for the HRSG are specific to the duct burner. However, the duct burner is inherent to the combined-cycle gas turbine configuration. MARS are presented only for NOx emission limits in the table of contents, while it is assumed that all other MARS associated with the gas turbine inherently demonstrates compliance for the duct burner MARS via NSR conditions and therefore all other requirements are subsumed.

(A) NOx EMISSIONS FROM GAS TURBINE (with or without Duct Burner)

ер О #	Requirement Requirement		
• SDAPCD NSR; Condition 5 - When the unit is combusting fuel (operating), the concentration of oxides of Nitrogen (NOx), calculated as nitrogen dioxide (NO2) and measured in the exhaust stack, shall not exceed 2.0 parts per million by volume on a dry basis (ppmvd) corrected to 15% oxygen, except during periods of startup, shutdown, low load operation, or tuning.		2	
2	• SDAPCD NSR; Condition 10 - When the unit is operating, the concentration of Oxides of Nitrogen (NOx), calculated as Nitrogen Dioxide (NO2) and measured in the exhaust stack, shall not exceed 42 ppmvd corrected to 15% oxygen, calculated over each clock hour period, except for periods of Startup and Shutdown, as defined in Rule 69.3. All CEMS calculations, averages shall be performed in accordance with the CEMS protocol approved by the District.	42	
n/a	• SDAPCD NSR; Condition 14 - When operating with the duct burner at or below 19.5 MMBTU/hr heat input, mass emissions from each unit shall not exceed the following limits, except during periods of startup, shutdown, low load operation, or tuning. A 3 clock-hour averaging period for these limits shall apply to CEMS data except for NOx emissions during non-transient hours when a 1 clock-hour averaging period shall apply.	~2 ppm @ rated Hear Input	
	Pollutant - Emission Limit, Ibs/hr A) Oxides of Nitrogen, NOx (calculated as NO2) - 13.4 B) Carbon Monoxide, CO -16.3 C) Volatile Organic Compounds, VOC - 4.0		
	CONDITION WILL NOT BE STREAMLINED		
n/a	• SDAPCD NSR; Condition 15 - When operating with the duct burner firing above 19.5 MMBTU/hr heat input, mass emissions from each unit shall not exceed the following limits, except during periods of startup, shutdown, low load operation, or tuning. A 3 clock-hour averaging period shall apply to CEMS data	~2 ppm @ rated Hea Input	
	Pollutant - Emission Limit, lbs/hr A) Oxides of Nitrogen, NOx (calculated as NO2) - 14.9 B) Carbon Monoxide, CO -18.1 C) Volatile Organic Compounds, VOC - 7.3		
	CONDITION WILL NOT BE STREAMLINED		

#	Requirement	Equivalent Limit (ppm)
n/a	• SDAPCD NSR; Condition 16 - Total combined NOx emissions from both units shall not exceed 400 pounds per hour, calculated as Nitrogen Dioxide and measured over each 1-clock-hour period. These limits shall apply during all times during which one or both units are operating, including, but not limited to, emissions during periods of startup, shutdown, low load operation and tuning. In addition, Unit No. 1 shall not begin operating while Unit No. 2 is already operating in a startup period nor shall Unit No. 2 begin operating while Unit No. 1 is already operating in a startup period unless the unit already operating in a startup period meets all of the following in the clock-minute immediately preceding the clock-minute that the other unit begins operating: (A) has been operating with a gross electrical output from the combustion turbine of 64 MW or more during the preceding 10 consecutive clock-minute period; (B) the concentration of NOx, calculated as NO2 and measured in the exhaust stack, does not exceed 2.0 ppmvd corrected to 15% oxygen, and (C) the concentration of CO measured in the exhaust stack does not exceed 4.0 ppmvd corrected to 15% oxygen. (Rule 20.3(d)(2)(i)0	n/a
	CONDITION WILL NOT BE STREAMLINED	
n/a	• SDAPCD NSR; Condition 18 - Total aggregate emissions of oxides of nitrogen (NOx), calculated as nitrogen dioxide, from all stationary emission units at this stationary source, except emissions or emission units excluded from the calculation of aggregate potential to emit as specified in Rule 20.1 (d) (1), shall not exceed 104.3 tons in each rolling 12-calendar month period.	n/a
	CONDITION WILL NOT BE STREAMLINED	
3	• SDAPCD Rule 69.3(d)(1)(i) Emissions concentration of oxides of nitrogen (NOx) from any unit subject to this rule, calculated as nitrogen dioxide at 15% oxygen on a dry basis, shall not exceed 42 parts per million by volume (ppmv) when operated on a gaseous fuel.	42
4	• SDAPCD Regulation X, Subpart GG (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by	159
5	• SDAPCD Regulation X, Subpart Db (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	54
6	• 40 CFR Part 60 Subpart GG, §60.332(a)(1) No owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any stationary gas turbine, any gases which contain nitrogen oxides in excess of: STD = 0.0075 * [(14.4)/Y]+F	159
	Calculation of Limit Y = 9.87 kJ/watt-hr per the turbine manufacturer F = 0.005 for natural gas with nitrogen content of 0.2610%. Therefore, the emission limit is: STD = 0.0075*[(14.4/9.87]+0.005 = 0.159 % by volume @ 15% O2 STD = 159 ppmdv @ 15% O2	

#	Requirement	Equivalent Limit (ppm)
7	• 40 CFR Part 60 Subpart Db, §60.44b(a)(4)(i) Except as provided under paragraphs (k) and (l) of this section, on and after the date on which the initial performance test is completed or is required to be completed under §60.8, whichever date comes first, no owner or operator of an affected facility that is subject to the provisions of this section and that combusts only coal, oil, or natural gas shall cause to be discharged into the atmosphere from that affected facility any gases that contain NOx (expressed as NO2) in excess of the following limits:	54
	Fuel/steam generating unit type (4) Duct burner used in a combined cycle system: (i) Natural gas and distillate oil Note: Nitrogen oxide emission limits (expressed as NO2) heat input 86 ng/J or 0.20 lb/MMBtu	
	This requirement applies to the Duct Burner. Convert Limit to ppm @ 15% O2 for Comparison to Other Limits From 40CFR75, Formula 19-1 NOx (lb/MMBtu) = NOx (ppm @ 15% O2) * 1.194*10**-7*8710*(20.9/(20.9-15)	
	NOx (ppm @ 15% O2) = NOx ((lb/MMBtu) *(20.9-15)/(20.9*(1.194*10**-7*8710)) NOx (ppm @ 15% O2) = 0.2*5.9/(20.9*1.194*10**-7*8710) = 54.3 Limit = 54.3 ppm @ 15% O2	

#	# Requirement	
4	•SDAPCD Regulation X, Subpart GG	O2) 159
6	•40 CFR Part 60 Subpart GG, §60.332(a)(1)	159
5	•SDAPCD Regulation X, Subpart Db	54
7	•40 CFR Part 60 Subpart Db, §60.44b(a)(4)(i)	42
3	•SDAPCD Rule 69.3(d)(1)(i)	42
2	•SDAPCD NSR; Condition 10	42
1	•SDAPCD NSR; Condition 5	2
REA	AMLINED REQUIREMENTS	
	The NOx emission limit from Requirement #1 (SDAPCD NSR permit Condition No. 5) is the lowest limit, but it is not unambiguously the most stringent requirement because of the exclusions for low load and tuning operations. Requirement #2 (SDAPCD NSR permit Condition No. 10) is the most stringent of the remaining requirements. Therefore, Requirements #3-#7 can be subsumed by Requirement #2 (SDAPCD NSR permit Condition No. 10). Requirements #1 and #2 (SDAPCD NSR permit Conditions Nos. 5 and 10) collectively represent the most stringent requirements of the multiple requirements and are therefore the streamlined requirements. The other requirements are subsumed.	

Requirement	Condition No.
• SDAPCD NSR; Condition 4 - For purposes of determining compliance based on source testing, the average of three subtests shall be used.	4
For purposes of determining compliance with emission limits based on the CEMS, data collected in accordance with the CEMS protocol shall be used and averaging periods shall be as specified herein.	4
• SDAPCD NSR; Condition 20 - The permittee shall maintain records, on at least a calendar quarterly basis, of total aggregate mass emissions of NOx in tons from all stationary emission units at this stationary source, except emissions or emission units excluded from the calculation of aggregate potential to emit as specified in Rule 20.1 (d) (l), for each rolling 12-calendar month period. These records shall be made available for inspection within 30 calendar days after the end of each calendar quarter.	20
• SDAPCD NSR; Condition 32 - This unit shall be source tested to demonstrate compliance with the NOx emission standards of this permit, using District approved methods. The source test and the NOx Relative Accuracy Test Audit (RATA) tests shall be conducted in accordance with the applicable RATA frequency requirements of 40 CFR75, appendix B, sections 2.3.1 and 2.3.3.	32
• SDAPCD NSR; Condition 34 - If source testing will be performed by an independent contractor and witnessed by the District, a source test protocol shall be submitted to the District for written approval at least 30 days prior to source testing. The source test protocol shall comply with the following requirements:	34
A. Measurements of NOx and O2 emissions shall be conducted in accordance with U.S. Environmental Protection Agency (EPA) methods 7E and 3A, respectively, and District Test, method 100, or alternative methods approved by the District.	34
E. Source testing shall be performed with both the combustion turbine and duct burner in operation. Each duct burner shall operate with a minimum heat input of 97 MMBTU/hr.	34
F. Source testing shall be performed at the most frequently used load level, as specified in 40 CFR Part 75 Appendix A Section 6.5.2.1.d, provided it is not less than 80% of the unit's rated load unless it is demonstrated to the satisfaction of the district that the unit cannot operate under these conditions. If the demonstration is accepted, the the emissions source testing shall be performed at the highest achievable continuous level power level.	34
• SDAPCD Rule 69.3: None	n/a
• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
• 40 CFR Part 60 Subpart GG: None	n/a
MLINED REQUIREMENTS	
The streamlined work practice requirement will be the work practices associated with the most stringent emission limit in the SDAPCD NSR permit. The work practices contained in the SDAPCD NSR permit are considered to be the streamlined requirements.	n/a

Requirement	Condition No.
• SDAPCD NSR; Condition 4 - For purposes of determining compliance with emission limits based on the CEMS, data collected in accordance with the CEMS protocol shall be used and averaging periods shall be as specified herein.	4
• SDAPCD NSR; Condition 37 - The Oxides of Nitrogen (NOx) and Oxygen (O2) CEMS shall be certified and maintained in accordance with applicable federal regulations including the requirements of Sections 75.10 and 75.12 of Title 40, Code of Federal Regulations Part 75 (40 CFR 75), the performance specifications of Appendix A of 40 CFR 75, the quality assurance procedures of Appendix B of 40 CFR 75 and the CEMS protocol approved by the District.	37
• SDAPCD NSR; Condition 38 - Continuous emission monitoring system (CEMS) shall be installed and properly maintained and calibrated to measure, calculate and record the following, in accordance with the District approved CEMS protocol: A. Hourly average concentration of Oxides of Nitrogen (NOX) corrected to 15% oxygen, in	38
parts per million (ppmvd); C. Percent oxygen (O2) in the exhaust gas (%), for each clock hour period; D. Average concentration of Oxides of Nitrogen (NOX) for each continuous rolling 3-hour period, in parts per million (ppmv) corrected to 15% oxygen; E. Hourly and Monthly mass emissions of Oxides of Nitrogen (NOX), in pounds; F. Rolling 12 month mass emissions of Oxides of Nitrogen (NOX), in tons;	
• SDAPCD NSR; Condition 38 - The CEMS shall be in operation in accordance with the District approved CEMS monitoring protocol at all times when the combustion turbine is in operation.	38
SDAPCD Rule 69.3(e)(1) and (2), (g) Continuous monitoring for operational characteristics of the unit and NOx emissions reduction system including: i) exhaust gas flow rate; ii) exhaust gas temperature; iii) ammonia injection rate; iv) water injection rate; and v) stack-gas oxygen content.	
An owner or operator of any unit with a continuous emission monitoring system (CEMS) which has been installed to measure NOx emissions pursuant to any federal regulation shall certify, calibrate and maintain the CEMS in accordance with applicable federal regulations including the reporting requirements of Sections 60.7(c), 60.7(d), and 60.13 of Title 40, Code of Federal Regulations Part 60 (40 CFR 60), performance specifications of Appendix B of 40 CFR 60, quality assurance procedures of Appendix F of 40 CFR 60, and a protocol approved in writing by the Air Pollution Control Officer.	n/a
Any required source testing shall be performed at no less than 80% of the power rating. A unit subject to the requirements of Section (d) shall be tested for compliance at least annually before the Permit to Operate renewal date, unless otherwise specified in writing by the Air Pollution	n/a

2	• 40 CFR Part 75, §75.10(a)(2) To determine NOx emissions, the owner or operator shall install, certify, operate, and maintain, in accordance with all the requirements of this part, a NOx-diluent continuous emission monitoring system (consisting of a NOx pollutant concentration monitor and an O2 or CO2 diluent gas monitor) with an automated data acquisition and handling system for measuring and recording NOx concentration (in ppm), O2 or CO2 concentration (in percent O2 or CO2) and NOx emission rate (in lb/mmBtu) discharged to the atmosphere;			
	• 40 CFR Part 75, §75.12(c) The owner or operator shall calculate hourly, quarterly, and annual NOx emission rates (in lb/mmBtu) by combining the NOx concentration (in ppm), diluent concentration (in percent O2 or CO2), and percent moisture (if applicable) measurements according to the procedures in Appendix F to this part.	n/a		
STREAM	The streamlined monitoring requirements will be the monitoring requirements associated with the most stringent emission limit in the SDAPCD NSR permit. The monitoring requirements contained in the SDAPCD NSR permit are considered to be the streamlined requirements. Any other monitoring requirements are subsumed.	n/a		
Stan Fi	ve: Evaluate recordkeeping / reporting			
Step I 1	Requirement	Condition No.		
	• SDAPCD NSR; Condition 20 - The permittee shall maintain records, on at least a calendar quarterly basis, of total aggregate mass emissions of NOx in tons from all stationary emission units at this stationary source, except emissions or emission units excluded from the calculation of aggregate potential to emit as specified in Rule 20.1 (d) (l), for each rolling 12-calendar month period.	20		
	• SDAPCD NSR; Condition 20 - These records shall be made available for inspection within 30 calendar days after the end of each calendar quarter.	20		
	• SDAPCD Rule 69.3(e)(3) and (5) Maintain an operating log and record actual times and duration of all startups, shutdowns and fuel changes, and the type and quantity of each fuel used; maintain all records required by Section (e) for a minimum of two calendar years. These records shall be maintained on the premises and made available to the District on request.	n/a		
	• SDAPCD Regulation X, Subpart A, Rule 260.4(b), 260.7(c) (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a		
	 40 CFR Part 75 §75.57(a), (b), and (d) Maintain for each affected unit a file of all measurements, data, reports, and other information required by this part at the source in a form suitable for inspection for at least three (3) years from the date of each record. The owner or operator shall record for each hour the required information on unit operating time, heat input rate, and load, separately for each affected unit. The owner or operator shall record the applicable information required for NOx emissions monitoring for each affected unit for each hour or partial hour during which the unit operates. 	n/a		

 40 CFR Part 60 §60.4(b), §60.7(c) -Administrator to delegate to each State, when appropriate, the authority to implement and enfortant standards of performance for new stationary sources located in such State. All information required to be submitted to EPA must also be submitted to the appropriate State Agency of any State to which this authority has been delegated (provided, that each specific delegation may except sources from a certain Federal or State reporting requirement). - Each owner or operator required to install a continuous monitoring device shall submit excess emissions and monitoring systems performance report and-or summary report form to the Administrator semiannually, except when: more frequent reporting is specifically required or the Administrator, on a case-by-case basis, determines that more frequent reporting is necessary to accurately assess the compliance status of the source. All reports shall be postmarked by the 30 day following the end of each six-month period. 	n/a s ne
STREAMLINED REQUIREMENTS	2.
The recordkeeping requirements in the SDAPCD NSR permit and 40 CFR Part 75 §75.57(a), (and (d) are the most stringent and therefore the streamlined requirements. The other requirements are subsumed.	

(B) SOx EMISSIONS FROM GAS TURBINE

	One: Identification of multiple requirements	Equivalent
#	Requirement	Limit (% volume SO2 @ 15% O2)
1	• SDAPCD NSR; Condition 2	0.000038
	The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	
	NOTE: PUC/SDG&E Rule 30(I)(2)(e) limits the Total Sulfur in PUC quality natural gas to 0.75 grain per 100 scf. This inherently limits the SOx emissions as calculated below.	
	Convert Limit to % Volume @ 15% O2 for Comparison to Other Limits	
	From 40CFR75, Appendix D, Formula 1-Dh ER (lb SO2/MMBtu) = $[2.0/7000]x[10EE6]x[Stotal/GCV]$ where $Stotal$ = Total sulfur in fuel, $gr/100$ scf and GCV = Gross Calorific Value, $Btu/100$ scf $ER = (2.0/7000)x10EE6x(0.75/(1020x100)) = 0.0021$ lb/MMBtu	
	SO2 (% volume @ 15% O2) = SO2 (lb/MMBtu) *[(20.9-15)/(20.9)]*[VM/(MW*Fd)] where VM= Molar Volume=359 dscf/mole, MW=Molecular Weight of SO2=64, Fd=8710 dscf/MMBtu SO2 (% volume @ 15% O2) = 0.21 * (5.9/20.9)*359/(64*8710) SO2 (% volume @ 15% O2) = 0.000038 % Equivalent Limit = 0.000038% volume SO2 @ 15% O2	
2	• SDAPCD Rule 53(d)(1) A person shall not discharge into the atmosphere from any single source of emission whatsoever Sulfur compounds calculated as sulfur dioxide (SO2) in excess of 0.05 percent, by volume, on a dry basis.	0.05
3	• SDAPCD Regulation X, Subpart GG (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	0.015
4	• 40 CFR Part 60 Subpart GG §60.333(a) No owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any stationary gas turbine any gases which contain sulfur dioxide in excess of 0.015 percent by volume at 15 percent oxygen and on a dry basis.	0.015
Step 7	Two: Determine most stringent SOx emission limit	
#	Requirement	Equivalent Limit (% volume SO2 @ 15% O2)
2	• SDAPCD Rule 53(d)(1)	0.05

3	SDAPCD Regulation X, Subpart GG	0.015
4	• 40 CFR Part 60 Subpart GG §60.333(a)	0.015
1	• SDAPCD NSR; Condition 2	0.000038
TREA	MLINED REQUIREMENTS	
	The SOx emission limit resulting from the SDAPCD NSR permit Condition 2 is the most stringent of the multiple requirement and is therefore the streamlined requirement. All other requirements are subsumed.	
tep 7	Three: Evaluate work practice requirements	
	Requirement	Condition No.
	• SDAPCD NSR; Condition 2 The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	2
	• SDAPCD Rule 53: None	n/a
	• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
	• 40 CFR Part 60 Subpart GG: None	n/a
TREA	MLINED REQUIREMENTS	
	The work practice of only firing PUC quality natural gas directly supports the emission limit inherent in the SDAPCD NSR permit (and most stringent limit). The work practice in the SDAPCD NSR permit Condition 2 is considered to be the streamlined requirement. Any other work practice requirements are subsumed.	
tep I	Four: Evaluate monitoring requirements	
	Requirement	Condition No.
	• SDAPCD NSR; Condition 2 The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	2
	• SDAPCD Rule 53: None	n/a
	• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
	• 40 CFR Part 60 Subpart GG: None	n/a

REAMLINED REQUIREMENTS	
The streamlined monitoring requirement will be the monitoring requirement associated with the most stringent limit. The recordkeeping requirement associated with the SDAPCD NSR Permit Condition 2 will be the streamlined requirement. All other recordkeeping requirements are subsumed. NOTE: The monitoring of the sulfur content and heating value is performed by the supplier/deliverer of the natural gas and records of these values are supplied to the end user.	
ep Five: Evaluate recordkeeping / reporting	
Requirement	Condition No.
• SDAPCD NSR; Condition 2 The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	2
• SDAPCD Rule 53: None	n/a
• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
• 40 CFR Part 60 Subpart GG: None	n/a
• SDPACD Regulation X Subpart A, Rule 260.4(b), 260.7(c) (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
• 40 CFR Part 60 §60.4(b), §60.7(c) - Administrator to delegate to each State, when appropriate, the authority to implement and enforce standards of performance for new stationary sources located in such State. All information required to be submitted to EPA must also be submitted to the appropriate State Agency of any State to which this authority has been delegated (provided, that each specific delegation may except sources from a certain Federal or State reporting requirement). - Each owner or operator required to install a continuous monitoring device shall submit excess emissions and monitoring systems performance report and-or summary report form to the Administrator semiannually, except when: more frequent reporting is specifically required or the Administrator, on a case-by-case basis, determines that more frequent reporting is necessary to accurately assess the compliance status of the source. All reports shall be postmarked by the 30th day following the end of each six-month period.	n/a
NOTE: The SDAPCD has been delegated authority to implement and enforce NSPS requirements and therefore is the agency to which all information required under NSPS is submitted. **TREAMLINED REQUIREMENTS**	n/a
The streamlined recordkeeping requirement will be the the recordkeeping requirement associated	
with the most stringent limit. The recordkeeping requirement associated with the SDAPCD NSR permit Condition 2 will be the streamlined requirement. All other recordkeeping requirements are subsumed.	_

(C) SULFUR CONTENT IN FUEL FOR GAS TURBINE

#	One: Identification of multiple requirements Requirement	Equivalent Limit (grain Sulfur/100 scf NG)
1	• SDAPCD NSR; Condition 2	0.75
	The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee	
	shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values	
	(Btu/scf) of the natural gas and provide such records to the District personnel upon request.	
	NOTE:	
	PUC/SDG&E Rule 30(I)(2)(e) limits the Total Sulfur in PUC quality natural gas to 0.75 grain per 100 scf.	
2	• SDAPCD Rule 62(b)(1)	10
	A person shall not operate any stationary fuel-burning equipment subject to this rule unless any gaseous fuel used contains no more than 10 grains of sulfur compounds, calculated as hydrogen sulfide, per 100 cubic feet of dry gaseous fuel (0.23 grams of sulfur compounds, calculated as hydrogen sulfide, per cubic meter of dry gaseous fuel), at standard conditions.	
3	• SDAPCD Regulation X Subpart GG	241
3	(See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	241
4	• 40 CFR Part 60 Subpart GG §60.333(b)	241
	No owner or operator subject to the provisions of this subpart shall burn in any stationary gas	
	turbine any fuel which contains total sulfur in excess of 0.8 percent by weight (8000 ppmw).	
	Convert to Grains Sulfur/100 SCF Natural Gas for Comparison to Other Limits	
	0.8 percent weight total sulfur = 0.008 lb Sulfur/lb Natural Gas	
	$(0.008 \text{ lb Sulfur/lb NG}) \times (0.043 \text{ lb NG/scf NG}) \times (7000 \text{ grain Sulfur/lb Sulfur}) \times (100 \text{ scf NG/100 scf NG}) = 241 \text{ grains Sulfur / 100 scf NG}$	
ten T	wo: Determine most stringent limit for sulfur content in fuel	
#	Requirement	Equivalent Limit (grain Sulfur/100 sci
4	• 40 CFR Part 60 Subpart GG §60.333(b)	NG) 241
3	SDAPCD Regulation X Subpart GG	241
2	• SDAPCD Rule 62(b)(1)	10
1	• SDAPCD NSR; Condition 2	0.75
	MLINED REQUIREMENTS	5.75
INEA	The most stringent limit is the SDAPCD NSR permit Condition 2 limit requiring PUC natural gas	
	firing. All other requirements are subsumed.	

Requirement	Condition Number
• SDAPCD NSR; Condition 2 The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	2
• SDAPCD Rule 62: None	n/a
• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
• 40 CFR Part 60 Subpart GG: None	n/a
REAMLINED REQUIREMENTS	
The work practice of only firing PUC quality natural gas directly supports the emission limit inherent in the SDAPCD NSR permit (and most stringent limit). The work practice in the SDAPCD NSR permit Condition 2 is considered to be the streamlined requirement. Any other work practice requirements are subsumed.	
ep Four: Evaluate monitoring requirements	
Requirement	Condition Number
• SDAPCD NSR; Condition 2 The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	2
• SDAPCD Rule 62: None	n/a
• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
• 40 CFR Part 60 Subpart GG: None	n/a
REAMLINED REQUIREMENTS	
The streamlined monitoring requirement will be the monitoring requirement associated with the most stringent limit. The recordkeeping requirement associated with the SDAPCD NSR permit Condition 2 will be the streamlined requirement. All other recordkeeping requirements are subsumed. NOTE:	
The monitoring of the sulfur content and heating value is performed by the supplier/deliverer of the natural gas and records of these values are supplied to the end user.	

	Requirement	Condition Number
	• SDAPCD NSR; Condition 2 The unit shall be fired on Public Utility Commission (PUC) quality natural gas. The permitee shall maintain quarterly records of sulfur content (grains/100 dscf) and the lower heating values (Btu/scf) of the natural gas and provide such records to the District personnel upon request.	2
	• SDAPCD Rule 62: None	n/a
	• SDAPCD Regulation X, Subpart GG: None (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
	• 40 CFR Part 60 Subpart GG: None	n/a
	• SDAPCD Regulation X Subpart A, Rule 260.4(b), 260.7(c): (See below for 40 CFR 60 applicable requirement; Rule is the equivalent of 40 CFR 60 incorporated by reference.)	n/a
	• 40 CFR Part 60 §60.4(b), §60.7(c) - Administrator to delegate to each State, when appropriate, the authority to implement and enforce standards of performance for new stationary sources located in such State. All information required to be submitted to EPA must also be submitted to the appropriate State Agency of any State to which this authority has been delegated (provided, that each specific delegation may except sources from a certain Federal or State reporting requirement). - Each owner or operator required to install a continuous monitoring device shall submit excess emissions and monitoring systems performance report and-or summary report form to the Administrator semiannually, except when: more frequent reporting is specifically required or the Administrator, on a case-by-case basis, determines that more frequent reporting is necessary to accurately assess the compliance status of the source. All reports shall be postmarked by the 30th day following the end of each six-month period. NOTE: The SDAPCD has been delegated authority to implement and enforce NSPS requirements and therefore is the agency to which all information required under NSPS is submitted.	n/a
TREA	MLINED REQUIREMENTS	
	The streamlined recordkeeping requirement will be the the recordkeeping requirement associated with the most stringent limit. The recordkeeping requirement associated with the SDAPCD NSR Permit Condition 2 will be the streamlined requirement. All other recordkeeping requirements are subsumed.	

TITLE V APPLICATION	
Permit Shield (FORM 1401-Q)	

Company Name	District Use Only
SAN DIEGO GAS & ELECTRIC (ELECTRIC GENERATION)	NEDS#
Facility Address: 2300 HARVESON PLACE, SD1473, ESCONDIDO, CA 92029	SITE ID#

REQUEST FOR PERMIT SHIELD If more space is required, use additional forms. Please type or print legibly.

Application No(s) Permit No(s)	Requirements to be Shielded	Basis	Attachment Number
	SDCAPCD RULE 52 (Particulate	Not applicable, per Section (a),	
TVP-00038	Matter)	Rule 53 applies turbines	
	SDCAPCD RULE 53(d)(1)	Subsumed. (See Attachment O-1	
TVP-00038	(Specific Contaminants)	re: MARS)	O-1
	SDCAPCD RULE 54 (Dust &	Not applicable as Section (b)	
TVP-00038	Fumes)	exempts gaseous fuesl burning	(3
*	SDAPCD Rule 62 (Sulfur Content	Subsumed. (See Attachment O-1	
TVP-00038	of Fuels)	re: MARS)	O-1
	SDCAPCD RULE 68 (Fuel Burning	Not applicable per R69.3 (not	
TVP-00038	Equipment - NOx)	subject to R68 and R69.3)	
	SDCAPCD RULE 69.2 (Boilers,	Not applicable - exemption per	
TVP-00038	Heaters, Steam Generators)	69.2(b)(ii)	
	SDCAPCD RULE 69.3 (Stationary	Subsumed. (See Attachment O-1	
TVP-00038	Gas Turbines	re: MARS)	O-1
	SDCAPCD Reg X, Subpart Db	Subsumed. (See Attachment O-1	
TVP-00038	(Steam Generating Units)	re: MARS)	O-1
	SDCAPCD Reg X, Subpart GG	Subsumed. (See Attachment O-1	
TVP-00038	(Stationary Gas Turbine)	re: MARS)	O-1
	40 CFR 60, Subpart Db - NSPS for	Subsumed. (See Attachment O-1	
TVP-00038	Steam Generating Units	re: MARS)	O-1
	40 CFR 60, Subpart GG - NSPS for	Subsumed. (See Attachment O-1	
TVP-00038	Stationary Gas Turbine	re: MARS)	O-1
	40 CFR 64 Compliance Assurance	CAM not required per Rule 69.3	
TVP-00038	Monitoring (CAM)	and CEMS installation	

Page_	1	of	1	
Page	1	ot	1	

TITLE V APPLICATION	
Abatement Devices (FORM 1401-M)	

Company Name	District Use Only
San Diego Gas & Electric (Electric Generation)	NEDS#
Facility Address: 2300 Harveson Pl, Escondido, CA 92029	SITE ID#

LIST OF ABATEMENT DEVICES

In numerical order, list all abatement devices, the abatement device, name or description, and the emission unit or operation abated. If more space is required, use additional forms. Please type or print legibly.

Permit No(s)	Abatement Device Name or Description	Emission Unit(s) or Operation(s) Abated		
000623	Selective Catalytic Reduction System and Oxidation Catalyst	Gas Turbine		
000625	Selective Catalytic Reduction System and Oxidation Catalyst	Gas Turbine		
A100000				
=				
		*1		
3.3543				
		120		
		100		

Page <u>1</u> of <u>1</u>

Facility Name: SDG&E - Palomar Energy Center

Facility ARB ID: 100362 Facility Reporting Year: 2015

Confidential Data Indication Set to "No" by Reporter

Certification Statement: The designated representative or alternate designated representative must sign (i.e., agree to) this certification statement. If you are an agent and you click on "SUBMIT", you are not agreeing to the certification statement, but are submitting the certification statement on behalf of the designated representative or alternate designated representative who is agreeing to the certification statement. An agent is only authorized to make the electronic submission on behalf of the designated representative, not to sign (i.e., agree to) the certification statement.

Facility Representatives

Designated Representative: HASHIM NAVROZALI

Agent: Greg Hauser

Facility Location

Physical Address: 2300 Harveson Place

City: Escondido State / Province: CA ZIP / Postal Code: 92029

Country:

Latitude: 33.1194 Longitude: -117.1174

County: SAN DIEGO Air Basin: SAN DIEGO

District: SAN DIEGO COUNTY APCD

Mailing Address: 8315 CENTURY PARK COURT, CP21E

City: SAN DIEGO State / Province: CA ZIP / Postal Code: 92123

Country: USA

Payment Information (required if subject to AB 32 Cost of

Implementation Fee Regulation)

Responsible Party for Payment: HASHIM NAVROZALI Responsible Party Email: hnavrozali@semprautilities.com

Responsible Party Phone: 858-650-4087

Billing Address: 8315 CENTURY PARK COURT, CP21E

City: SAN DIEGO State / Province: CA ZIP / Postal Code: 92123

Country: USA

Owners / Operators

Name: SAN DIEGO GAS & ELECTRIC

GHG Ouantity

CO2 equivalent emissions, excluding biogenic (subparts C –

AA): 1,151,864.1218 Metric Tons

Exempt biogenic CO2 emissions (subparts C - AA): 0 Metric

Tons

CO2 equivalent emissions from fuel supplier categories,

excluding biogenic (subparts MM - NN): 0 Metric Tons

Exempt biogenic CO2 emissions from fuel supplier categories

(subparts MM - NN): 0 Metric Tons

CO2 emissions from CO2 Suppliers (excluding biogenic)

(subpart PP): 0 Metric Tons

Exempt biogenic CO2 emissions from CO2 Suppliers (subpart

PP): Metric Tons

CO2 equivalent emissions from electric power entities:

0 Metric Tons

Covered CO2 equivalent emissions: 1,151,864.1218 Metric

Tons

De Minimis CO2 equivalent emissions: 0 Metric Tons

Maximum allowable De Minimis emissions: 20,000 Metric

Tons

General Facility Reporting Information

NAICS Codes

Primary: 221112 (Fossil Fuel Electric Power Generation)

Second Primary:

Additional:

U.S. Parent Companies

Parent Company Name: SEMPRA ENERGY INC

Address: 488 8th Avenue, San Diego, CA 92101

Percentage of Ownership Interest: 100%

GHG Report Start Date: 2015-01-01 GHG Report End Date: 2015-12-31

Explanation of any calculation methodology changes during

the reporting year:

EPA e-GGRT Facility IDs

521655

Full or Abbreviated GHG Report: Full

Company or Entity qualifies for Small Business Status: No Are you applying for legacy contract transition assistance

under the cap-and-trade program [95894]?: No

Electricity Purchases/Acquisitions for Reporting Facilities (95104(d))

Electricity Provider's Name: San Diego Gas & Electric

Provider's ARB ID: 3004

Purchases/Acquisitions (MWh): 41,880

Natural Gas Purchases/Acquisitions for Reporting Facilities [95115(k), 95103(a)(1)]

Natural Gas Supplier Name: San Diego Gas and Electric -

Local Distribution

Supplier's ARB ID: 104085 Customer Number: None

Purchases/Acquisitions (MMBtu): 21,344,650

Was this natural gas received directly from an interstate

pipeline? No

Increases and Decreases in Facility Emissions [95104(f)]:

Have facility emissions increased or decreased more than five percent in relation to the previous data year? Yes

Change in production: Yes

Changes in facility operations in order to comply with:

The cap-and-trade regulation: No Other air pollution regulations: No

Other regulations, not related to air pollution or

greenhouse gases: No Changes in efficiency due to: Process or material changes: No The addition of control equipment: No

Other efficiency measures: No

Other reason(s) for increase or decrease: No Provide a narrative description of how each reason identified in section 95104(f)(2) caused the increase or decrease in emissions. Include in this description any changes in your air permit status: GHG emissions increased in 2015 due to higher demand for produced energy. Note: This section is not subject to the third-party

verification requirements

Electricity Generation

Facility has the capacity to generate electricity: Yes

CEC ID (if applicable): G0681 EIA ID (if applicable): 55985 FERC OFID (if applicable): N/A

CAISO ID (if applicable): PLOMR_2_PL1X3

Total Facility Nameplate Generating Capacity: 550 MW Facility Type: Stand-alone electricity generating facility Facility's Energy Disposition: Grid-dedicated facility

Disposition of Generated Electricity [95112(a)(4)]

Generated Electricity for Grid Disposition [95112(a)(4)(A)] Unit, System Or Group Name CT1 & CT2

Retail Provider/Marketer Name San Diego Gas & Electric (SDG&E)

Electricity Provided or Sold (MWh) 3,002,949 Generated electricity used for other on-site industrial processes that are not in support of or a part of the power generation system: 0 MWh

Reported emissions include emissions from a cogeneration/bigeneration unit: No

Parasitic Steam Use: Generated thermal energy used for supporting power production (excluding steam used directly for generating electricity) [95112(a)(5)(B)]:

Generated thermal energy for on-site industrial applications not related to electricity generation [95112(a)(5)(C)]:

Description of the excluded data and an estimated magnitude of the excluded product(s) using best available methods [95103(I)]:

Subpart D: Electricity Generation

Gas Information Details

Gas Name	Gas Quantity (Metric Tons)
Methane	21.34465
Nitrous Oxide	2.134465
Carbon Dioxide	1,150,754.20
Exempt Biogenic Carbon dioxide	ve energy of the
Total CO2e	1,151,864.12

Annual CO2 emissions from sorbent injection: 0 (Metric Tons)

Total Covered CO2e Emissions: 1,151,864.1218 (Metric Tons)

Emissions shown above that are claimed as De Minimis (CO2e): 0 Metric Tons

Unit Details

Unit Name: CT1

Unit Type: Electricity Generator

Unit Description: Natural Gas Combustion Turbine, combined

cycle

Part 75 Methodology: Appendix G, Equation G-4

Methodology Start Date: 2013-01-01 Methodology End Date: 2015-12-31 Is this unit/stack/pipe in the Acid Rain Program? Yes Is this configuration a Part 75 unit? Yes

Electricity Generating Unit Information

Nameplate Generating Capacity: 275 MW
Prime Mover Technology: Combined Cycle

Type of Thermal Energy Generation: Electricity only EGU

95112(b)(2): Gross Generation: 1,585,010 MWh 95112(b)(2): Net Generation: 1,520,182 MWh

95112(b)(3): Total Thermal Output (for Cogeneration or

Bigeneration):

95112(b)(8): Other Steam Used for Electricity Generation:

Additional Comments and Information:

Total Annual CO2 Mass Emissions

Annual CO2 Emissions Including Biomass: 585,190 metric

tons

Annual CO2 Emissions (Fossil Fuels Only): 585,190 metric

tons

Annual CO2 emissions generated from sorbent injection: 0 metric tons

Annual Exempt Biogenic CO2 Emissions: 0 metric tons

Missing Data Information

Total number of source operating hours in the reporting year

that fuel flow rate was missing: 0

Total number of source operating hours in the reporting year

that high heating value was missing: 0

Fuel-Specific CH4 and N20 Emissions Information

Fuel: Natural Gas

Annual Mass or Volume of Fuel Combusted: 10,396,067,530

short tons, scf. or gallons

CH4 Emissions: 10.85435 metric tons
N20 Emissions: 1.085435 metric tons

Total CO2e for CH4: 227.94135 metric tons
Total CO2e for N2O: 336.48485 metric tons

Equation Inputs

Cumulative Annual Heat Input from fuel combustion:

10,854,350 mmBtu

Fuel Specific CH4 Emission Factor: 0.001 kg/mmBtu Fuel Specific N2O Emission Factor: 0.0001 kg/mmBtu

Unit Name: CT2

Unit Type: Electricity Generator

Unit Description: Natural gas combustion turbine, combined cycle

Part 75 Methodology: Appendix G, Equation G-4

Methodology Start Date: 2013-01-01 Methodology End Date: 2015-12-31

Is this unit/stack/pipe in the Acid Rain Program? Yes

Is this configuration a Part 75 unit? Yes

Electricity Generating Unit Information

Nameplate Generating Capacity: 275 MW
Prime Mover Technology: Combined Cycle

Type of Thermal Energy Generation: Electricity only EGU

95112(b)(2): Gross Generation: 1,547,974 MWh 95112(b)(2): Net Generation: 1,482,767 MWh

95112(b)(3): Total Thermal Output (for Cogeneration or

Bigeneration):

95112(b)(8): Other Steam Used for Electricity Generation:

Additional Comments and Information:

Total Annual CO2 Mass Emissions

Annual CO2 Emissions Including Biomass: 565,564.2 metric

tons

Annual CO2 Emissions (Fossil Fuels Only): 565,564.2 metric

tons

Annual CO2 emissions generated from sorbent injection: 0

metric tons

Annual Exempt Biogenic CO2 Emissions: 0 metric tons

Missing Data Information

Total number of source operating hours in the reporting year

that fuel flow rate was missing: 0

Total number of source operating hours in the reporting year

that high heating value was missing: 0

Fuel-Specific CH4 and N2O Emissions Information

Fuel: Natural Gas

Annual Mass or Volume of Fuel Combusted: 10,045,113,430

short tons, scf, or gallons

CH4 Emissions: 10.4903 metric tons
N20 Emissions: 1.04903 metric tons

Total CO2e for CH4: 220.2963 metric tons
Total CO2e for N2O: 325.1993 metric tons

Equation Inputs

Cumulative Annual Heat Input from fuel combustion:

10,490,300 mmBtu

Fuel Specific CH4 Emission Factor: 0.001 kg/mmBtu
Fuel Specific N2O Emission Factor: 0.0001 kg/mmBtu

Time And Date Report Generated: 04/06/2016 14:03

GHG POTENTIAL TO EMIT ESTIMATES FOR PALOMAR ENERGY CENTER

Total Actual Emissions for the 2015 Calendar Year (Pursuant to the Mandatory AB32 GHG Report to CARB – see attached summary):

Unit - CT1

Total GHG (CO2e) = 585,754 metric tons = 645,683 short tons

The GHG emissions reported for 2015 were based on a turbine run time of 6,413 hours

The Permits to Operate (PTO) for CT1 does not have any annual run time limit for the turbine

The GHG Potential to Emit for CPEP can be estimated by prorating the emissions to the maximum operating scenario of 8,760 hrs/yr as calculated below:

GHG Potential to Emit = (645,683 tons/yr) x (8,760 hrs / 6,413 hrs) = 881,987 tons CO2e per year

Unit - CT2

Total GHG (CO2e) = 566,110 metric tons = 624,029 short tons

The GHG emissions reported for 2015 were based on a turbine run time of 6,207 hours

The Permits to Operate (PTO) for CT2 does not have any annual run time limit for the turbine

The GHG Potential to Emit for CPEP can be estimated by prorating the emissions to the maximum operating scenario of 8,760 hrs/yr as calculated below:

GHG Potential to Emit = (624,029 tons/yr) x (8,760 hrs / 6,207 hrs) = 880,698 tons CO2e per year

Total PTE (CT1 & CT2 combined): 881,987 + 880,698 = 1,762,685 tons CO2e per year



P.O. Box 129007, San Diego, CA 92112-9007

ACCOUNTS PAYABLE

Wachovia Bank, N.A. Savannah, GA 31603

64-975

VENDOR NO	CHECK NO	DATE	AMOUNT
442	1387499	06/26/17	*****\$8,945.00

PAY:

EIGHT THOUSAND NINE HUNDRED FORTY-FIVE USD

TO THE ORDER OF:

AIR POLLUTION CONTROL DISTRICT SAN DIEGO COUNTY 10124 OLD GROVE RD SAN DIEGO CA 92131 Som Frehmen

VOID AFTER SIX MONTHS

THE BACK OF THIS DOCUMENT HAS A WATERMARK - HOLD AT ANGLE TO VIEW

#O1387499# #O61209756#207990041647?#



FOR QUESTIONS REGARDING THESE PAYMENTS, PLEASE CALL (858) 503-5480 PLEASE RETAIN THIS STATEMENT FOR YOUR RECORDS

ACCOUNTS PAYABLE

P.O. Box 129007, San Diego, CA 92112-9007

NAME	Vendor No	Check No	Date	Amount
AIR POLLUTION CONTROL DISTRICT	442	1387499	06/26/17	****\$8,945.00

YOUR							
REFERENCE	DATE		ITEM	VOUCHER	GROSS		AMOUNT PAIL
PERMOT RENEWA	AL 06/1	9/17		1900382777	8,945.00	0.00	8,945.00