

New York State Department of Environmental Conservation

Air Permit Application



Department of
Environmental
Conservation

DEC ID											
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Application ID											
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Application Type	
☒ State Facility	☐ Title V

Section I - Certification

Certification	
I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons directly responsible for gathering the information required to complete this application, I believe the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.	
Responsible Official Paul R. Amato	Title VP Engineering, Operations and EH+S
Signature	Date
Professional Engineer's Certification	
I certify under penalty of law that I have personally examined, and am familiar with, the statements and information submitted in this document and all its attachments as they pertain to the practice of engineering. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.	
Professional Engineer Ronald E. Schroeder	NYS License No. 073452
Signature	Date April 5, 2021

Section II - Identification Information

Type of Permit Action Requested	
☐ New	☐ Renewal
☐ Significant Modification	☐ Administrative Amendment
☐ * Minor Modification	
Application for the construction of a new facility ☒ Application involves the construction of new emission unit(s)	
Facility Information	
Name Dover Compressor Station	
Location Address 186 Dover Furnace Road	
City / * Town / Village Dover	Zip 12522
Owner/Firm Information	
Name Iroquois Gas Transmission System, L.P.	
Street Address One Corporate Drive, Suite 600	
City Shelton	State/Province CT
Country USA	Zip 06484
Owner Classification: ☐ Federal	☐ State
☐ Municipal	☒ Corporation/Partnership
☐ Individual	
Owner/Firm Contact Information	
Name James T. Barnes	Phone 203-944-7023
E-mail Address tim_barnes@iroquois.com	Fax 203-925-7213
Affiliation Company	Title Manager, Environmental Services
Street Address One Corporate Drive, Suite 600	
City Shelton	State/Province CT
Country USA	Zip 06484
Facility Contact Information	
Name James T. Barnes	Phone 203-944-7023
E-mail Address tim_barnes@iroquois.com	Fax 203-925-7213
Affiliation Company	Title Manager, Environmental Services
Street Address One Corporate Drive, Suite 600	
City Shelton	State/Province CT
Country USA	Zip 06484

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Section III - Facility Information

Continuation Sheet ____ of ____

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Facility Compliance Certification										☐ Continuation Sheet(s)
Rule Citation										
Title	Type	Part	Subpart	Section	Subdivision	Paragraph	Subparagraph	Clause	Subclause	
☐ Applicable Federal Requirement			☐ Capping		CAS Number		Contaminant Name			
☐ State Only Requirement										
Monitoring Information										
☐ Work Practice Involving Specific Operations ☐ Ambient Air Monitoring ☐ Record Keeping/Maintenance Procedures										
Compliance Activity Description										
Work Practice Type Code	Process Material				Reference Test Method					
	Code	Description								
Monitored Parameter					Manufacturer's Name/Model Number					
Code	Description									
Limit			Limit Units							
Upper	Lower		Code	Description						
Averaging Method			Monitoring Frequency				Reporting Requirements			
Code	Description		Code	Description		Code	Description			

Facility Emissions Summary				☐ Continuation Sheet(s)
CAS Number	Contaminant Name	Potential to Emit (tons/yr)	Actual Emissions (pounds/yr)	
0NY075 - 00 - 5	PM-10			
0NY750 - 02 - 5	PM-2.5			
007446 - 09 - 5	Sulfur Dioxide			
0NY210 - 00 - 0	Oxides of Nitrogen			
000630 - 08 - 0	Carbon Monoxide			
007439 - 92 - 1	Lead (elemental)			
0NY998 - 00 - 0	Total Volatile Organic Compounds			
0NY100 - 00 - 0	Total Hazardous Air Pollutants			
0NY750 - 00 - 0	Carbon Dioxide Equivalents			

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Section IV - Emission Unit Information

Emission Unit Description										☐ Continuation Sheet(s)
Emission Unit	-									

Building Information					☐ Continuation Sheet(s)	
Building ID	Building Name			Length (ft)	Width (ft)	Orientation

Emission Unit	Emission Unit Emissions Summary				☐ Continuation Sheet(s)
-					
CAS Number	Contaminant Name				
ERP (lbs/yr)	Potential to Emit		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS Number	Contaminant Name				
ERP (lbs/yr)	Potential to Emit		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS Number	Contaminant Name				
ERP (lbs/yr)	Potential to Emit		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS Number	Contaminant Name				
ERP (lbs/yr)	Potential to Emit		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	

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Emission Unit		Emission Unit Emissions Summary (continuation)			
-					
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	
CAS No.	Contaminant Name				
ERP (lbs/yr)	PTE Emissions		Actual Emissions		
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)	

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Emission Point Information							☐ Continuation Sheet(s)
Emission Point							
Ground Elevation (ft)	Height (ft)	Height Above Structure (ft)	Inside Diameter (in)	Exit Temp. (°F)	Cross Section		
					Length (in)	Width (in)	
Exit Velocity (FPS)	Exit Flow (ACFM)	NYTM (E) (KM)	NYTM (N) (KM)	Building	Distance to Property Line (ft)	Date of Removal	
Emission Point							
Ground Elevation (ft)	Height (ft)	Height Above Structure (ft)	Inside Diameter (in)	Exit Temp. (°F)	Cross Section		
					Length (in)	Width (in)	
Exit Velocity (FPS)	Exit Flow (ACFM)	NYTM (E) (KM)	NYTM (N) (KM)	Building	Distance to Property Line (ft)	Date of Removal	
Emission Point							
Ground Elevation (ft)	Height (ft)	Height Above Structure (ft)	Inside Diameter (in)	Exit Temp. (°F)	Cross Section		
					Length (in)	Width (in)	
Exit Velocity (FPS)	Exit Flow (ACFM)	NYTM (E) (KM)	NYTM (N) (KM)	Building	Distance to Property Line (ft)	Date of Removal	

Emission Source/Control Information								☐ Continuation Sheet(s)
Emission Source		Date of Construction	Date of Operation	Date of Removal	Control Type		Manufacturer's Name/Model Number	
ID	Type				Code	Description		
Design Capacity	Design Capacity Units			Waste Feed		Waste Type		
	Code	Description			Code	Description	Description	
Emission Source		Date of Construction	Date of Operation	Date of Removal	Control Type		Manufacturer's Name/Model Number	
ID	Type				Code	Description		
Design Capacity	Design Capacity Units			Waste Feed		Waste Type		
	Code	Description			Code	Description	Description	
Emission Source		Date of Construction	Date of Operation	Date of Removal	Control Type		Manufacturer's Name/Model Number	
ID	Type				Code	Description		
Design Capacity	Design Capacity Units			Waste Feed		Waste Type		
	Code	Description			Code	Description	Description	

Process Information										☐ Continuation Sheet(s)			
Emission Unit	-							Process					
Process Description													
Source Classification Code (SCC)	Total Throughput				Throughput Quantity Units								
	Quantity/Hr		Quantity/Yr		Code		Description						
☐ Confidential ☐ Operating at Maximum Capacity				Operating Schedule				Building		Floor/Location			
				Hours/Day		Days/Year							
Emission Point Identifier(s)													
Emission Source/Control Identifier(s)													
Emission Unit	-							Process					
Process Description													
Source Classification Code (SCC)	Total Throughput				Throughput Quantity Units								
	Quantity/Hr		Quantity/Yr		Code		Description						
☐ Confidential ☐ Operating at Maximum Capacity				Operating Schedule				Building		Floor/Location			
				Hours/Day		Days/Year							
Emission Point Identifier(s)													
Emission Source/Control Identifier(s)													

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Process Emissions Summary										☐ Continuation Sheet(s)			
Emission Unit	-									Process			
CAS Number	Contaminant Name				% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined				
Potential to Emit					Standard Units	Potential to Emit How Determined	Actual Emissions						
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)						
Emission Unit	-									Process			
CAS Number	Contaminant Name				% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined				
Potential to Emit					Standard Units	Potential to Emit How Determined	Actual Emissions						
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)						
Emission Unit	-									Process			
CAS Number	Contaminant Name				% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined				
Potential to Emit					Standard Units	Potential to Emit How Determined	Actual Emissions						
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)						

Emission Source Emissions Summary										☐ Continuation Sheet(s)			
Emission Source										Process			
CAS Number	Contaminant Name				% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined				
Potential to Emit					Standard Units	Potential to Emit How Determined	Actual Emissions						
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)						
Emission Source										Process			
CAS Number	Contaminant Name				% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined				
Potential to Emit					Standard Units	Potential to Emit How Determined	Actual Emissions						
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)						
Emission Source										Process			
CAS Number	Contaminant Name				% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined				
Potential to Emit					Standard Units	Potential to Emit How Determined	Actual Emissions						
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)						

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Section IV - Emission Unit Information

Process Emissions Summary (continuation)											
Emission Unit	-							Process			
CAS No.	Contaminant Name					% Throughput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined	
PTE					Standard Units	PTE How Determined	Actual				
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)				
Emission Unit	-							Process			
CAS No.	Contaminant Name					% Throughput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined	
PTE					Standard Units	PTE How Determined	Actual				
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)				
Emission Unit	-							Process			
CAS No.	Contaminant Name					% Throughput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined	
PTE					Standard Units	PTE How Determined	Actual				
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)				
Emission Unit	-							Process			
CAS No.	Contaminant Name					% Throughput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined	
PTE					Standard Units	PTE How Determined	Actual				
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)				
Emission Unit	-							Process			
CAS No.	Contaminant Name					% Throughput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined	
PTE					Standard Units	PTE How Determined	Actual				
(lbs/hr)	(lbs/yr)	(standard units)		(lbs/hr)			(lbs/yr)				



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Emission Unit Compliance Certification ☐ Continuation Sheet(s)

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☐ Applicable Federal Requirement	☐ State Only Requirement	☐ Capping
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Emission Unit	Emission Point	Process	Emission Source	CAS Number	Contaminant Name

Monitoring Information	
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☐ Continuous Emission Monitoring	☐ Monitoring of a Process or Control Device Parameters as a Surrogate
☐ Intermittent Emission Testing	☐ Work Practice Involving Specific Operations
☐ Ambient Air Monitoring	☐ Record Keeping/Maintenance Procedures

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Work Practice Type Code	Process Material		Reference Test Method
	Code	Description	

Monitored Parameter		Manufacturer's Name/Model Number
Code	Description	

Limit		Limit Units	
Upper	Lower	Code	Description

Averaging Method		Monitoring Frequency		Reporting Requirements	
Code	Description	Code	Description	Code	Description

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Request for Emission Reduction Credits									
☐ Continuation Sheet(s)									
Emission Source 									
Emission Reduction Description									
Contaminant Emission Reduction Data									
Baseline Period ____ / ____ / ____ to ____ / ____ / ____						Reduction			
						Date		Method	
CAS Number		Contaminant Name				ERC (lbs/yr)			
						Netting		Offset	
Facility to Use Future Reduction									
Name						Application ID			
						- - / 			
Location Address									
☐ City/ ☐ Town / ☐ Village						State		Zip	
Use of Emission Reduction Credits									
☐ Continuation Sheet(s)									
Emission Source 									
Proposed Project Description									
Contaminant Emissions Increase Data									
CAS Number		Contaminant Name				Project Emission Potential (lbs/yr)			
Statement of Compliance									
☐ All facilities under the ownership of this "owner/firm" are operating <u>in compliance</u> with all applicable requirements and state regulations including any compliance certification requirements under Section 114(a)(3) of the Clean Air Act Amendments of 1990, or are meeting the schedule of a consent order.									
Source of Emission Reduction Credit - Facility									
Name						Permit ID			
						- - / 			
Location Address									
☐ City/ ☐ Town / ☐ Village						State		Zip	
Emission Source		CAS Number		Contaminant Name		ERC (lbs/yr)			
						Netting		Offset	

Date of Document

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List of Exempt Activities

Instructions

Applicants for Title V facility permits must provide a listing of each exempt activity, as described in 6 NYCRR Part 201-3.2(c), that is currently operated at the facility. This form provides a means to fulfill this requirement.

In order to complete this form, enter the number and building location of each exempt activity. Building IDs used on this form should match those used in the Title V permit application. If a listed activity is not operated at the facility, leave the corresponding information blank.

Combustion

Rule Citation 201-3.2(c)	Description	Number of Activities	Building Location
(1)	Stationary or portable combustion installations where the furnace has a maximum heat input capacity less than 10 mmBtu/hr burning fuels other than coal or wood; or a maximum heat input capacity of less than 1 mmBtu/hr burning coal or wood. This activity does not include combustion installations burning any material classified as solid waste, as defined in 6 NYCRR Part 360, or waste oil, as defined in 6 NYCRR Subpart 225-2.		
(2)	Space heaters burning waste oil at automotive service facilities, as defined in 6 NYCRR Subpart 225-2, generated on-site or at a facility under common control, alone or in conjunction with used oil generated by a do-it-yourself oil changer as defined in 6 NYCRR Subpart 374-2.		
(3)(i)	Stationary or portable internal combustion engines that are liquid or gaseous fuel powered and located within the New York City metropolitan area or the Orange County towns of Blooming Grove, Chester, Highlands, Monroe, Tuxedo, Warwick, or Woodbury, and have a maximum mechanical power rating of less than 200 brake horsepower.		
(3)(ii)	Stationary or portable internal combustion engines that are liquid or gaseous fuel powered and located outside of the New York City metropolitan area or the Orange County towns of Blooming Grove, Chester, Highlands, Monroe, Tuxedo, Warwick, or Woodbury, and have a maximum mechanical power rating of less than 400 brake horsepower.		
(3)(iii)	Stationary or portable internal combustion engines that are gasoline powered and have a maximum mechanical power rating of less than 50 brake horsepower.		
(4)	Reserved.		
(5)	Gas turbines with a heat input at peak load less than 10 mmBtu/hour		

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Rule Citation 201-3.2(c)	Description	Number of Activities	Building Location
(6)	Emergency power generating stationary internal combustion engines, as defined in 6 NYCRR Part 200.1(cq), and engine test cells at engine manufacturing facilities that are utilized for research and development, reliability performance testing, or quality assurance performance testing. Stationary internal combustion engines used for peak shaving and/or demand response programs are not exempt.		
Combustion Related			
(7)	Non-contact water cooling towers and water treatment systems for process cooling water and other water containers designed to cool, store or otherwise handle water that has not been in direct contact with gaseous or liquid process streams.		
Agricultural			
(8)	Feed and grain milling, cleaning, conveying, drying and storage operations including grain storage silos, where such silos exhaust to an appropriate emissions control device, excluding grain terminal elevators with permanent storage capacities over 2.5 million U.S. bushels, and grain storage elevators with capacities above one million bushels.		
(9)	Equipment used exclusively to slaughter animals, but not including other equipment at slaughterhouses, such as rendering cookers, boilers, heating plants, incinerators, and electrical power generating equipment.		
Commercial - Food Service Industries			
(10)	Flour silos at bakeries, provided all such silos are exhausted through an appropriate emission control device.		
(11)	Emissions from flavorings added to a food product where such flavors are manually added to the product.		
Commercial - Graphic Arts			
(12)	Screen printing inks/coatings or adhesives which are applied by a hand-held squeegee. A hand-held squeegee is one that is not propelled though the use of mechanical conveyance and is not an integral part of the screen printing process.		
(13)	Graphic arts processes at facilities located outside the New York City metropolitan area or the Orange County towns of Blooming Grove, Chester, Highlands, Monroe, Tuxedo, Warwick, or Woodbury whose facility-wide total emissions of volatile organic compounds from inks, coatings, adhesives, fountain solutions and cleaning solutions are less than three tons during any 12-month period.		

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Rule Citation 201-3.2(c)	Description	Number of Activities	Building Location
(14)	Graphic label and/or box labeling operations where the inks are applied by stamping or rolling.		
(15)	Graphic arts processes which are specifically exempted from regulation under 6 NYCRR Part 234, with respect to emissions of volatile organic compounds which are not given an A rating as described in 6 NYCRR Part 212.		
Commercial - Other			
(16)	Gasoline dispensing sites registered with the department pursuant to 6 NYCRR Part 612.		
(17)	Surface coating and related activities at facilities which use less than 25 gallons per month of total coating materials, or with actual volatile organic compound emissions of 1,000 pounds or less from coating materials in any 12-month period. Coating materials include all paints and paint components, other materials mixed with paints prior to application, and cleaning solvents, combined. This exemption is subject to the following: (i) The facility is located outside of the New York City metropolitan area or the Orange County towns of Blooming Grove, Chester, Highlands, Monroe, Tuxedo, Warwick, or Woodbury; and (ii) All abrasive cleaning and surface coating operations are performed in an enclosed building where such operations are exhausted into appropriate emission control devices.		
(18)	Abrasive cleaning operations which exhaust to an appropriate emission control device.		
(19)	Ultraviolet curing operations.		
Municipal/Public Health Related			
(20)	Landfill gas ventilating systems at landfills with design capacities less than 2.5 million megagrams (3.3 million tons) and 2.5 million cubic meters (2.75 million cubic yards), where the systems are vented directly to the atmosphere, and the ventilating system has been required by, and is operating under, the conditions of a valid 6 NYCRR Part 360 permit, or order on consent.		
Storage Vessels			
(21)	Distillate fuel oil, residual fuel oil, and liquid asphalt storage tanks with storage capacities below 300,000 barrels.		

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Rule Citation 201-3.2(c)	Description	Number of Activities	Building Location
(22)	Pressurized fixed roof tanks which are capable of maintaining a working pressure at all times to prevent emissions of volatile organic compounds to the outdoor atmosphere.		
(23)	External floating roof tanks which are of welded construction and are equipped with a metallic-type shoe primary seal and a secondary seal from the top of the shoe seal to the tank wall.		
(24)	External floating roof tanks which are used for the storage of a petroleum or volatile organic liquid with a true vapor pressure less than 4.0 psi (27.6 kPa), are of welded construction and are equipped with one of the following: (i) a metallic-type shoe seal; (ii) a liquid-mounted foam seal; (iii) a liquid-mounted liquid-filled type seal; or (iv) equivalent control equipment or device.		
(25)	Storage tanks, including petroleum liquid storage tanks as defined in 6 NYCRR Part 229, with capacities less than 10,000 gallons, except those subject to 6 NYCRR Part 229 or Part 233.		
(26)	Horizontal petroleum or volatile organic liquid storage tanks.		
(27)	Storage silos storing solid materials, provided all such silos are exhausted through an appropriate emission control device. This exemption does not include raw material, clinker, or finished product storage silos at Portland cement plants.		
Industrial			
(28)	Processing equipment at existing sand and gravel and stone crushing plants which were installed or constructed before August 31, 1983, where water is used for operations such as wet conveying, separating, and washing. This exemption does not include processing equipment at existing sand and gravel and stone crushing plants where water is used for dust suppression.		
(29)(i)	Sand and gravel processing or crushed stone processing lines at a non-metallic mineral processing facility that are a permanent or fixed installation with a maximum rated processing capacity of 25 tons of minerals per hour or less.		

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Rule Citation 201-3.2(c)	Description	Number of Activities	Building Location
(29)(ii)	Sand and gravel processing or crushed stone processing lines at a non-metallic mineral processing facility that are a portable emission source with a maximum rated processing capacity of 150 tons of minerals per hour or less.		
(29)(iii)	Sand and gravel processing or crushed stone processing lines at a non-metallic mineral processing facility that are used exclusively to screen minerals at a facility where no crushing or grinding takes place.		
(30)	Reserved.		
(31)	Surface coating operations which are specifically exempted from regulation under 6 NYCRR Part 228, with respect to emissions of volatile organic compounds which are not given an A rating pursuant to 6 NYCRR Part 212.		
(32)	Pharmaceutical tablet branding operations.		
(33)	Thermal packaging operations, including, but not limited to, thermimage labeling, blister packing, shrink wrapping, shrink banding, and carton gluing.		
(34)	Powder coating operations.		
(35)	All tumblers used for the cleaning and/or deburring of metal products without abrasive blasting.		
(36)	Presses used exclusively for molding or extruding plastics except where halogenated carbon compounds or hydrocarbon solvents are used as foaming agents.		
(37)	Concrete batch plants where the cement weigh hopper and all bulk storage silos are exhausted through fabric filters, and the batch drop point is controlled by a shroud or other emission control device.		
(38)	Cement storage operations not located at Portland cement plants where materials are transported by screw or bucket conveyors.		
(39)(i)	Cold cleaning degreasers with an open surface area of 11 square feet or less and an internal volume of 93 gallons or less or, having an organic solvent loss of 3 gallons per day or less.		
39(ii)	Cold cleaning degreasers that use a solvent with a VOC content of five percent or less by weight, unless subject to the requirements of 40 CFR 63 Subpart T.		

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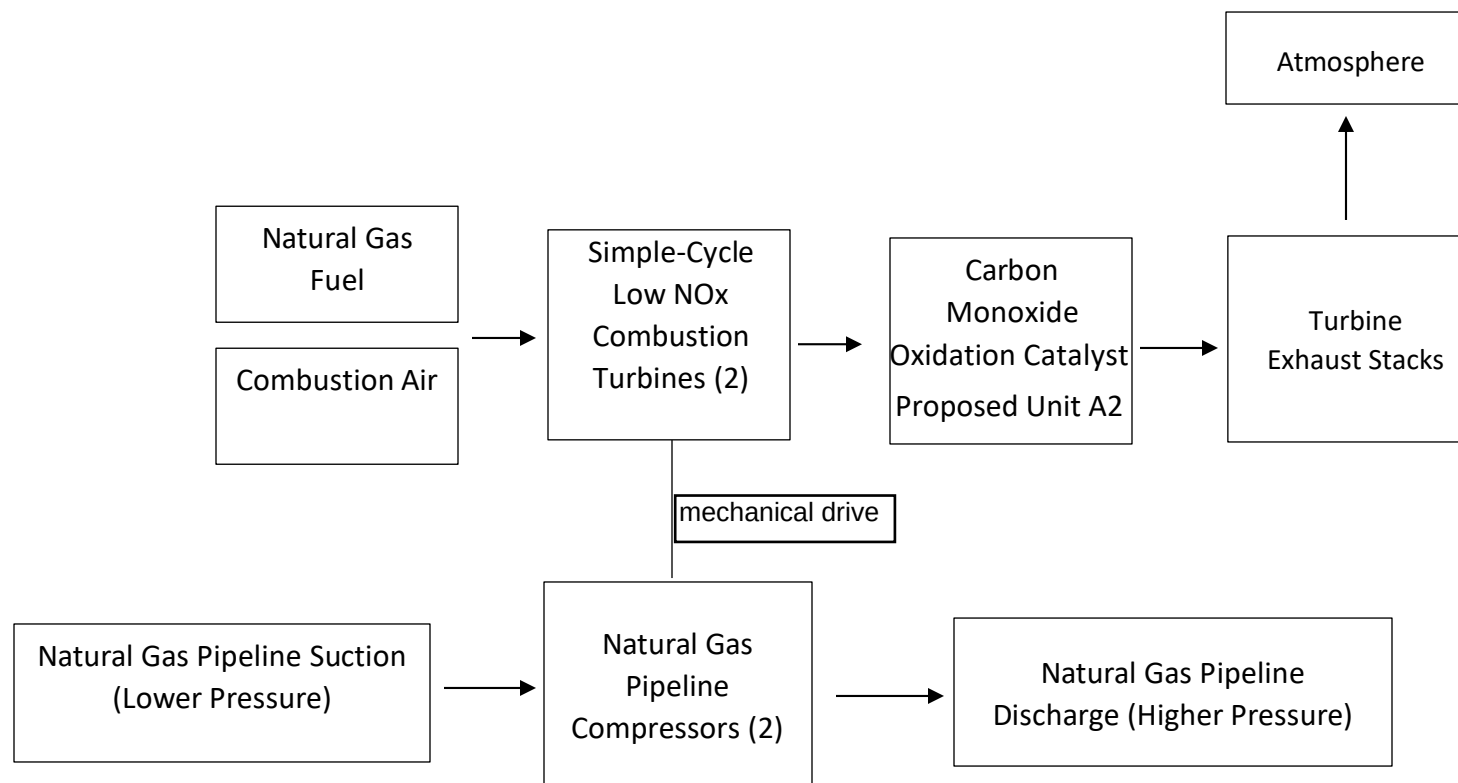
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Rule Citation 201-3.2(c)	Description	Number of Activities	Building Location
(39)(iii)	Conveyorized degreasers with an air/vapor interface smaller than 22 square feet (2 square meters), unless subject to the requirements of 40 CFR 63 Subpart T.		
(39)(iv)	Open-top vapor degreasers with an open-top area smaller than 11 square feet (1 square meter), unless subject to the requirements of 40 CFR 63 Subpart T.		
Miscellaneous			
(40)	Ventilating and exhaust systems for laboratory operations. Laboratory operations do not include processes having a primary purpose to produce commercial quantities of materials.		
(41)	Exhaust or ventilating systems for the melting of gold, silver, platinum and other precious metals.		
(42)	Exhaust systems for paint mixing, transfer, filling or sampling and/or paint storage rooms or cabinets, provided the paints stored within these locations are stored in closed containers when not in use.		
(43)	Exhaust systems for solvent transfer, filling or sampling, and/or solvent storage rooms provided the solvent stored within these locations are stored in containers when not in use.		
(44)	Research and development activities, including both stand-alone and activities within a major facility, until such time as the administrator completes a rule making to determine how the permitting program should be structured for these activities.		
(45)	The application of odor counteractants and/or neutralizers.		
(46)	Hydrogen fuel cells.		
(47)	Dry cleaning equipment that uses only water-based cleaning processes or those using liquid carbon dioxide.		
(48)	Manure spreading, handling and storage at farms and agricultural facilities.		

Process Flow Diagram

Process Flow Diagram
Simple-Cycle Natural Gas-Fueled Combustion Turbines
Iroquois Gas Transmission System, L.P.
Dover Compressor Station

Typical for existing turbine unit A1 and for proposed turbine unit A2



Backup Calculations

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Combined Station (Facility and Unit) Emission Rate Potential (ERP) - Uncontrolled TPY (Tons/Year)							
	NOx	CO	VOC	PM	SO2	HAPs	GHG
Turbine Unit A1	50.81	13.58	1.21	26.75	6.59	0.65	73,173
Turbine Unit A2	13.32	13.5	0.03	3.69	0.51	0.38	45,346
Replacement Emergency Generator	14.18	25.94	3.69	0.44	0.06	3.13	5,061
Existing Office/Control Room Heat Furnace	0.12	0.02	0.00	0.01	0.00	0.00	122.74
Existing and Proposed Seal Gas Leakage	NA	NA	3.5	NA	NA	0.00	783.92
Station Blowdowns and ESD	NA	NA	0.17	NA	NA	NA	45.80
Pipeline Liquids Tank	NA	NA	1.00	NA	NA	NA	0.00
Station Fugitive Leaks	NA	NA	0.002	NA	NA	NA	4.28
Existing Domestic Water Heater	0.06	0.01	0.00	0.01	0.00	0.00	63.93
Total	78.5	53.0	9.6	30.9	7.2	4.2	124,601
Turbines Only	64.1	27.1	1.2	30.4	7.1	1.0	118,519

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Combined Station (Facility and Unit) Emission Rate Potential (ERP) - Uncontrolled Pounds/Year							
	NOx	CO	VOC	PM	SO2	HAPs	GHG
Turbine Unit A1	101,616	27,156	2,429	58,507	13,174	1,309	146,346,460
Turbine Unit A2	26,630	26,981	54	7,982	1,022.21	758	90,692,000
Replacement Emergency Generator	28,351	51,882	7,371	873	127.43	6,258	10,121,981
Existing Office/Control Room Heat Furnace	231	49	8.84	28	1.39	3.84	245,486
Existing and Proposed Seal Gas Leakage	0.00	0.00	6,934	0.00	0.00	0.00	1,567,849
Station Blowdowns and ESD	0.00	0.00	337	0.00	0.00	0.00	91,608
Pipeline Liquids Tank	0.00	0.00	1,999	0.00	0.00	0.00	0
Station Fugitive Leaks	0.00	0.00	4	0.00	0.00	0.00	8,557
Existing Domestic Water Heater	120	25	5	14	0.72	2.00	127,857
Total	156,949	106,092	19,143	61,805	14,325	8,331	249,201,797
Turbines Only	128,246	54,137	2,484	60,890	14,196	2,067	237,038,460

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

**Combined Station (Facility and Unit) Emission Rate Potential (ERP) -
Uncontrolled Pounds/Hour**

	NOx	CO	VOC	PM	SO2	HAPs	GHG
Turbine Unit A1	11.60	3.10	0.28	0.11	1.50	0.15	16,706
Turbine Unit A2	3.04	3.08	0.01	0.04	0.117	0.087	10,353
Replacement Emergency Generator	3.24	5.92	0.84	0.10	0.015	0.714	1,155
Existing Office/Control Room Heat Furnace	0.03	0.01	0.001	0.003	0.000	0.000	28
Existing and Proposed Seal Gas Leakage	0.000	0.000	0.79	0.000	0.000	0.000	179
Station Blowdowns and ESD	0.000	0.000	0.04	0.000	0.000	0.000	10
Pipeline Liquids Tank	0.000	0.000	0.23	0.000	0.000	0.000	0.000
Station Fugitive Leaks	0.000	0.000	0.000	0.000	0.000	0.000	1.0
Existing Domestic Water Heater	0.01	0.003	0.001	0.002	0.000	0.000	15
Total	17.9	12.1	2.2	7.1	1.6	1.0	28,448
Turbines Only	14.6	6.2	0.28	7.0	1.6	0.24	27,059

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Combined Station (Facility and Unit) Potential TPY (Tons/Year)							
	NOx	CO	VOC	PM	SO₂	HAPs	GHG
Turbine Unit A1	50.81	13.58	1.21	26.75	6.50	0.65	73,173
Turbine Unit A2	13.32	0.9	0.03	3.69	0.51	0.38	45,346
Replacement Emergency Generator	0.81	0.74	0.21	0.02	0.004	0.18	289
Existing Office/Control Room Heat Furnace	0.12	0.02	0.00	0.01	0.00	0.00	122.74
Existing and Proposed Seal Gas Leakage	NA	NA	0.03	NA	NA	0.00	783.92
Station Blowdowns and ESD	NA	NA	0.02	NA	NA	NA	45.80
Pipeline Liquids Tank	NA	NA	1.00	NA	NA	NA	0.00
Station Fugitive Leaks	NA	NA	0.002	NA	NA	NA	4.28
Existing Domestic Water Heater	0.06	0.01	0.00	0.01	0.00	0.00	63.93
Existing Station	51.0	13.6	1.6	26.8	6.6	0.7	74,144
Total	65.1	15.3	2.8	30.5	7.1	1.2	119,829
Turbines Only	64.12	14.48	1.24	30.44	7.10	1.03	118,519
2023 Minor Modification	13.3	0.9	1.4	3.7	0.51	0.4	46,130

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Combined Station (Facility and Unit) Potential Pounds Year							
	NOx	CO	VOC	PM	SO2	HAPs	GHG
Turbine Unit A1	101,616	27,156	2,429	53,507	13,114	1,309	146,346,460
Turbine Unit A2	26,630	1,799	54	7,382	1,022.21	758	90,692,000
Replacement Emergency Generator	1,618	1,481	421	50	7.27	357	577,739
Existing Office/Control Room Heat Furnace	231	49	8.84	16	1.39	3.84	245,486
Existing and Proposed Seal Gas Leakage	0.00	0.00	693	0.00	0.00	0.00	1,567,849
Station Blowdowns and ESD	0.00	0.00	41	0.00	0.00	0.00	91,608
Pipeline Liquids Tank	0.00	0.00	1,999	0.00	0.00	0.00	0
Station Fugitive Leaks	0.00	0.00	4	0.00	0.00	0.00	8,557
Existing Domestic Water Heater	120	25	5	14	0.72	2.00	127,857
Existing Station	101,967	27,230	3,136	53,550	13,176	1,315	148,287,652
Total	130,216	30,509	5,655	60,982	14,205	2,430	239,657,555
Turbines Only	128,246	28,955	2,484	60,890	14,196	2,067	237,038,460

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Combined Station (Facility and Unit) Potential Pounds/Hour							
	NOx	CO	VOC	PM	SO2	HAPs	GHG
Turbine Unit A1	11.60	3.10	0.28	6.11	1.50	0.15	16,706
Turbine Unit A2	3.04	0.21	0.01	0.84	0.117	0.087	10,353
Replacement Emergency Generator	3.24	2.96	0.84	0.10	0.015	0.714	1,155
Existing Office/Control Room Heat Furnace	0.03	0.01	0.001	0.003	0.000	0.000	28
Existing and Proposed Seal Gas Leakage	0.000	0.000	0.000	0.000	0.000	0.000	179
Station Blowdowns and ESD	0.000	0.000	0.00	0.000	0.000	0.000	10
Pipeline Liquids Tank	0.000	0.000	0.23	0.000	0.000	0.000	0.000
Station Fugitive Leaks	0.000	0.000	0.000	0.000	0.000	0.000	1.0
Existing Domestic Water Heater	0.01	0.003	0.001	0.002	0.000	0.000	15
Existing Station	11.6	3.1	0.4	6.1	1.5	0.2	16,928
Total	17.9	6.3	1.4	7.1	1.6	1.0	28,448
Turbines Only	14.64	3.31	0.28	6.95	1.62	0.24	27,059

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Actual Emissions (Facility and Unit) Pounds/Hour							
	NOx	CO	VOC	PM	SO₂	HAPs	GHG
Turbine Unit A1	5.65	0.84	0.08	3.20	0.84	0.15	16,706
Turbine Unit A2	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Existing Emergency Generator	4.30	2.89	1.24	0.08	0.00	0.54	877
Existing Office/Control Room Heat Furnace	0.03	0.01	0.00	0.003	0.000	0.000	28.0
Existing and Proposed Seal Gas Leakage	0.000	0.000	0.08	0.000	0.000	0.000	428
Station Blowdowns and ESD	0.000	0.000	0.18	0.000	0.000	0.000	249
Pipeline Liquids Tank	0.000	0.000	0.000	0.000	0.000	0.000	0
Station Fugitive Leaks	0.000	0.000	0.000	0.000	0.000	0.000	3
Existing Domestic Water Heater	0.01	0.003	0.001	0.002	0.000	0.000	15
Total	10.0	3.7	1.6	3.3	0.8	0.7	18,305
Turbines Only	5.6	0.8	0.1	3.2	0.8	0.1	16,706

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Actual Emissions (Facility and Unit) Pounds/Year (2-year average)							
	NOx	CO	VOC	PM	SO2	HAPs	GHG
Turbine Unit A1	27,855	2,506	251	9,524	2,506	273	30,570,651
Turbine Unit A2	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Existing Emergency Generator	328.64	221.20	94.80	5.81	0.00	41.43	67,006
Existing Office/Control Room Heat Furnace	115.52	24.26	4.42	13.86	0.69	1.92	122,743
Existing and Proposed Seal Gas Leakage	0.000	0.000	1,448.45	0.000	0.000	0.000	783,925
Station Blowdowns and ESD	0.000	0.000	337.48	0.000	0.000	0.000	2,176,969
Pipeline Liquids Tank	0.000	0.000	0.00	0.000	0.000	0.000	0.000
Station Fugitive Leaks	0.000	0.000	3.78	0.000	0.000	0.000	24,411
Existing Domestic Water Heater	60.16	12.63	2.30	7.22	0.36	1.00	63,929
Total	28,359	2,764	2,142	9,551	2,507	318	33,809,633
Turbines Only	27,855	2,506	251	9,524	2,506	273	30,570,651

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Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Turbine Unit A2 Solar Model Taurus 70 - 10,802 SoLoNOx															
Altitude - MSL			434.8	Stack base elevation											
Stack Height (ft)			69.25	Matt Franklin 12-19-19 email table											
P/Po			0.99	Altitude (elevation) pressure correction for actual volume exhaust rate ACFM											
Stack Diameter (in)			72.0	Same as Brookfield A2											
Stack Diameter (ft)			6.0												
Restricted Stack exit area (FT2)			17.0												
Acoustic Baffle Restriction %			40%												
LHV (BTU/SCF)			926												
HHV (BTU/SCF)			1031.7												
Gas Specific Gravity			0.5806												
Fuel #/MMBTU			44.75												
Fuel Sulfur Grains/100 SCF			0.50	Iroquois Tariff = 1.25, 2019 actual <0.2 grains/100 SCF											
Fuel Sulfur Weight Percent			0.00155												
VOC weight % of UHC			0.4%												
MW VOC			45.8												
MW CO			28.0												
Turbine Unit A2 Performance and Emissions Data															
Ambient												LHV	LHV	HHV	HHV
Temp.	% load	Exh.#/hr	Exh Temp	HP	BTU/HR	Exh. MW	Vel. FPS	KJ/W-HR	NSPS	Exh ACFM	BTU/HR	SCF/HR	MMSCF/YR	SCF/HR	MMSCF/YR
100	100	180,763	999	8,566	7,888	28.10	113.82	11.16	193.6	115,850	6.76E+07	72,950	639	65,476	574
100	75	161,363	987	6,424	5,778	28.13	100.66	12.42	173.9	102,457	5.64E+07	60,896	533	54,657	479
100	50	145,775	1,016	4,283	3,857	28.15	92.69	15.65	138.1	94,347	4.74E+07	51,142	448	45,902	402
47	100	217,707	928	11,314	10,190	28.50	128.58	10.17	212.3	130,874	8.13E+07	87,848	770	78,848	691
47	75	198,326	910	8,485	8,030	28.53	115.49	11.36	190.1	117,554	6.81E+07	73,579	645	66,041	579
47	50	173,442	946	5,897	5,494	28.55	103.58	14.14	152.7	105,432	5.65E+07	61,054	535	54,799	480
0	100	233,696	854	11,968	10,777	28.58	130.29	10.01	215.7	132,624	8.43E+07	91,007	797	81,684	716
0	75	220,753	868	8,931	8,309	28.61	124.26	11.76	183.7	126,481	7.42E+07	80,138	702	71,928	630
0	50	195,366	885	5,954	5,494	28.63	111.30	14.57	148.3	113,289	6.13E+07	66,201	580	59,419	521

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Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

Turbine Unit A2 Performance and Emissions Data (continued)

Ambient Temp.	% load	NOx TPY	NOx #/HR	NOx #/yr	NOx #/MM	NOx GM/SEC	SO2 TPY	SO2 #/hr	SO2 #/MM	SO2 GM/SEC	PM TPY	PM #/hr	PM #/MM
100	100	10.38	2.37	20,761	0.04	0.30	0.410	0.0935	0.00138	0.0118	2.96	0.68	0.010
100	75	8.63	1.97	17,257	0.03	0.25	0.342	0.0781	0.00138	0.0098	2.47	0.56	0.010
100	50	7.27	1.66	14,542	0.04	0.21	0.287	0.0656	0.00138	0.0083	2.07	0.47	0.010
47	100	12.79	2.92	25,579	0.04	0.37	0.493	0.1126	0.00138	0.0142	3.56	0.81	0.010
47	75	10.69	2.44	21,374	0.04	0.31	0.413	0.0943	0.00138	0.0119	2.98	0.68	0.010
47	50	8.89	2.03	17,783	0.04	0.26	0.343	0.0783	0.00138	0.0099	2.48	0.57	0.010
0	100	13.32	3.04	26,630	0.04	0.38	0.511	0.1167	0.00138	0.0147	3.69	0.84	0.010
0	75	11.69	2.67	23,389	0.04	0.34	0.450	0.1028	0.00138	0.0130	3.25	0.74	0.010
0	50	9.68	2.21	19,360	0.04	0.28	0.371	0.0849	0.00138	0.0107	2.69	0.61	0.010

Turbine Unit A2 Performance and Emissions Data (continued)

Ambient Temp.	% load	CO TPY (controlled)	CO TPY (uncontrolled)	CO #/HR (uncontrolled)	CO #/HR (controlled)	CO #/Yr	CO #/MM	CO GM/SEC (controlled)	VOC TPY	UHC #/HR	VOC #/HR	VOC #/MM	VOC GM/SEC
100	100	0.70	10.51	2.40	0.16	1,402	0.002	0.02	0.02	1.37	0.005	0.0001	0.001
100	75	0.58	8.76	2.00	0.13	1,168	0.002	0.02	0.02	1.15	0.004	0.0001	0.001
100	50	0.49	7.36	1.68	0.11	981	0.002	0.01	0.01	0.96	0.003	0.0001	0.000
47.0	100	0.86	12.96	2.96	0.20	1,729	0.002	0.02	0.03	1.70	0.006	0.0001	0.001
47.0	75	0.72	10.86	2.48	0.17	1,448	0.002	0.02	0.02	1.42	0.005	0.0001	0.001
47.0	50	0.60	9.02	2.06	0.14	1,203	0.002	0.02	0.02	1.18	0.004	0.0001	0.001
0.0	100	0.90	13.49	3.08	0.21	1,799	0.002	0.03	0.03	1.76	0.006	0.0001	0.001
0.0	75	0.79	11.87	2.71	0.18	1,583	0.002	0.02	0.02	1.55	0.005	0.0001	0.001
0.0	50	0.65	9.81	2.24	0.15	1,308	0.002	0.02	0.02	1.28	0.005	0.0001	0.001

No vendor SO2 data. S + O2 = SO2 (2# SO2 for each # S in fuel - rate in MWs) => SO2 #/HR = 2 * % sulfur in fuel/100 * fuel #/MMBTU*BTU/HR/10^6

Vendor does not quote PM data. EPA AP-42 Table 3.1-1 (10/96) particulates factor #/MMBTU (solids + condensables) uncontrolled turbines=

Vendor unburned hydrocarbon (UHC) rates converted to VOC using VOC weight %.

Vendor guarantees 9 PPM NOx, 15 PPM CO and 15 PPM UHC between 50% and 100% load and above zero degrees Fahrenheit.

Vendor does not guarantee sub-zero emissions data, which is based on 120 PPM NOx, 150 PPM CO and 50 PPM UHC.

Dover Compressor Station Unit A1 (Existing)

Dover, New York Compressor Station

Iroquois Gas Transmission System, L.P.

ABB Cyclone (Alstom Power 6/27/01) (Rebranded Siemens SGT-400s)

Altitude - MSL	436	Stack base elevation	
Stack Height (ft)	49.6		
P/Po	0.99	Altitude (elevation) pressure correction for actual volume exhaust rate ACFM	
Stack Longer Width (Ft)	14.5		
Stack Shorter Width (Ft)	12.0		
Rectangular Dimensions (Ft)	12 x 14.5	Inches WxL	144.0 174.0
Restricted Stack exit area (FT ²)	27.65		
Acoustic Baffle Restriction (Ft ²)	146.4		
LHV (BTU/SCF)	910		
HHV (BTU/SCF)	1016		
Gas Specific Gravity	0.58		
Fuel #/MMBTU	48.65		
Fuel Sulfur Weight %	0.0008	Samples indicate < 0.0006 %	
Weight % VOCs	5.0%	Very conservatively based on actual Iroquois fuel gas < 0.4 VOC %	
MW VOC	44.0		
MW CO	28.0		

Ambient					Equi								LHV	LHV
Temp.	% load	Exh.#/hr	Exh Temp	HP	Megawatts	BTU/HP-HR	Exh. MW	Vel. FPS	KJ/W-HR	NSPS	Exh ACFM	BTU/HR	SCF/HR	MMSCF/YR
100	100	275,076	1,085	14,535	10.8	7,636	28.00	112.94	10.80	199.9	187,361	1.11E+08	121,966	1,068
100	75	246,060	1,026	10,902	8.1	8,220	28.00	97.17	11.63	185.7	161,197	8.96E+07	98,477	863
100	50	213,444	967	7,268	5.4	9,415	28.00	80.94	13.32	162.1	134,278	6.84E+07	75,196	659
48	100	325,620	1,005	18,257	13.6	7,060	28.50	124.54	9.99	216.2	206,614	1.29E+08	141,642	1,241
48	75	290,556	937	13,682	10.2	7,493	28.50	105.97	10.60	203.7	175,807	1.03E+08	112,741	988
48	50	251,136	870	9,128	6.8	8,443	28.50	87.20	11.95	180.8	144,667	7.71E+07	84,690	742
0	100	372,276	931	21,693	16.2	6,704	28.60	134.74	9.49	227.7	223,527	1.45E+08	159,816	1,400
0	75	321,912	855	16,267	12.1	7,043	28.60	110.12	9.97	216.7	182,684	1.15E+08	125,903	1,103
0	50	285,929	780	10,845	8.1	7,842	28.60	92.27	11.10	194.7	153,084	8.50E+07	93,456	819

Dover Compressor Station Unit A1 (Existing)

Turbine Performance and Emissions Data (continued)

Ambient	% load	NOx TPY	NOx #/HR	NOx #/yr	NOx #/MM	NOx GM/SEC		SO2 TPY	SO2 #/hr	SO2 #/MM	SO2 GM/SEC		PM TPY	PM #/hr	PM #/MM
Temp.															
100	100	47.74	10.90	95,484	0.10	1.37		4.82	1.10	0.0099	0.1387		20.42	4.66	0.042
100	75	42.92	9.80	85,848	0.11	1.24		4.29	0.98	0.0109	0.1236		16.49	3.76	0.042
100	50	37.23	8.50	74,460	0.12	1.07		2.76	0.63	0.0092	0.0795		12.59	2.87	0.042
48	100	22.78	5.20	45,552	0.04	0.66		5.74	1.31	0.0102	0.1652		23.71	5.41	0.042
48	75	50.37	11.50	100,740	0.11	1.45		5.04	1.15	0.0112	0.1450		18.87	4.31	0.042
48	50	42.49	9.70	84,972	0.13	1.22		3.29	0.75	0.0097	0.0946		14.18	3.24	0.042
0	100	50.81	11.60	101,616	0.08	1.46		6.09	1.50	0.0103	0.1897		26.75	6.11	0.042
0	75	57.24	13.07	114,486	0.11	1.65		5.72	1.31	0.0114	0.1648		21.08	4.81	0.042
0	50	27.75	6.34	55,495	0.07	0.80		3.60	0.82	0.0097	0.1036		15.64	3.57	0.042
Ambient	% load	CO TPY	CO #/HR	CO #/Yr	CO #/MM	CO GM/SEC	VOC TPY	UHC #/HR	VOC #/HR	VOC #/MM	VOC GM/SEC				
Temp.															
100	100	28.91	6.60	57,816	0.06	0.83	0.92	4.20	0.210	0.002	0.026				
100	75	52.12	11.90	104,244	0.13	1.50	2.04	9.30	0.465	0.005	0.059				
100	50	45.11	10.30	90,228	0.15	1.30	1.77	8.10	0.405	0.006	0.051				
48.0	100	13.58	3.10	27,156	0.02	0.39	1.07	4.90	0.245	0.002	0.031				
48.0	75	61.32	14.00	122,640	0.14	1.77	2.41	11.00	0.550	0.005	0.069				
48.0	50	53.00	12.10	105,996	0.16	1.53	2.08	9.50	0.475	0.006	0.060				
0.0	100	10.34	2.36	20,674	0.02	0.30	1.21	5.55	0.277	0.002	0.035				
0.0	75	69.81	15.94	139,621	0.44	2.01	2.75	12.57	0.628	0.005	0.079				
0.0	50	5.65	1.29	11,290	0.02	0.16	0.66	3.03	0.151	0.002	0.019				

EPA AP-42 Table 3.1-1 4/00 (revised from 10/96, 0.0419 #/MMBTU), particulates factor #/MMBTU (solids + condensables) uncontrolled turbines=

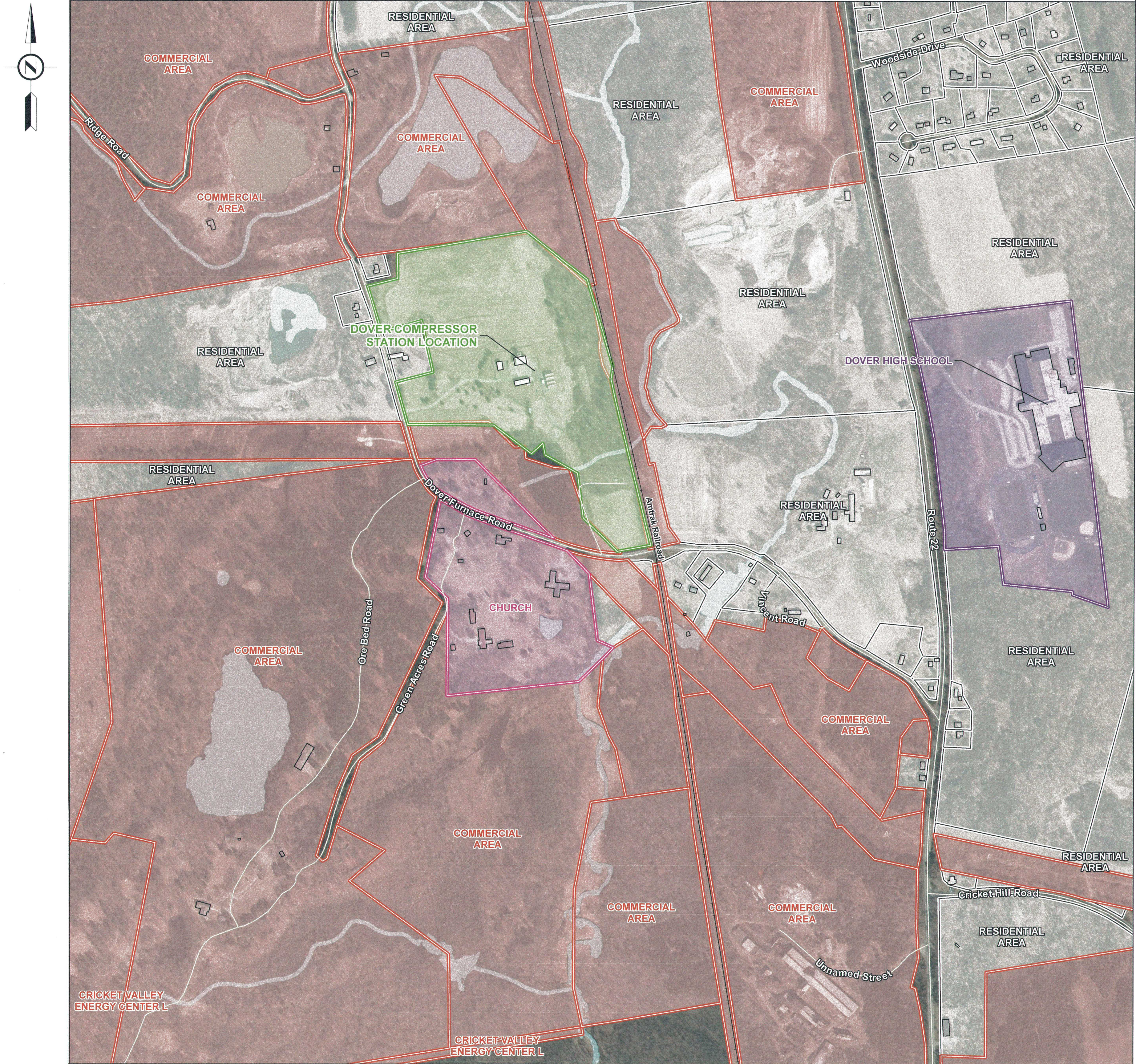
Less than 0.4 % non-methane and non-ethane volatile organic compounds. ABB unburned hydrocarbon (UHC) rates converted to VOC using VOC weight %.

Iroquois Pipeline Operating Company
ExC Project Air Permitting and Modeling Calculations
Dover Compressor Station

		NOx	CO	VOC	PM	SO2	HAPs	GHG
Existing Emergency Generator Emission Factors and Ratings (Waukesha-Pearce except for PM AP-42 factor)								
values		2.60	1.75	0.75	0.046	negl.	0.54	
units		gm/hp-hr	gm/hp-hr	gm/hp-hr	#/mmbtu	na	Lb/Hr	
mmbtu/hr		7.510						
max. hours/yr		500.000						
HP		751	560 KW per B Welch 1/8/01 email.					
Replacement Emergency Generator Emission Factors and Ratings								
values		3.24	2.96	0.84	0.100	0.01	0.71	above
units		Lb/Hr	Lb/Hr	Lb/Hr	Lb/Hr	Lb/Hr	Lb/Hr	
mmbtu/hr		9.896						
max. hours/yr		500						
HP		1468	KW	1,000	Btu/Hp-Hr	6,741		
Water/Glycol Boiler Emissions Factors and Ratings (AP-42 factors)								
values								
units		#/mmcf	#/mmcf	#/mmcf	#/mmcf	#/mmcf		
mmbtu/hr								
max. hours/yr								
Office/Control Room Furnace Emissions Factors and Ratings (AP-42 factors)								
values		100.00	21.00	3.83	12.00	0.60	above	above
units		#/mmcf	#/mmcf	#/mmcf	#/mmcf	#/mmcf		
mmbtu/hr		0.240	B Welch 1/8/01 email					
max. hours/yr		8760						
Domestic Water Heater Emissions Factors and Ratings (AP-42 factors)								
values		100.00	21.00	3.83	12.00	0.60	above	above
units		#/mmcf	#/mmcf	#/mmcf	#/mmcf	#/mmcf		
mmbtu/hr		0.125	B Welch 1/8/01 email					
max. hours/yr		8760						
Seal Gas Leakage								
values		NA	NA	0.00043	NA	NA		
units		NA	NA	#/SCF	NA	NA		
SCF NGas/HR		NA	NA	1,860	NA	NA		
Vent Recompression %		90%						

Location Map, Plot Plan and Reference Table Drawings

DUTCHESS COUNTY, NEW YORK



LOCATION PLAN 1" = 400'

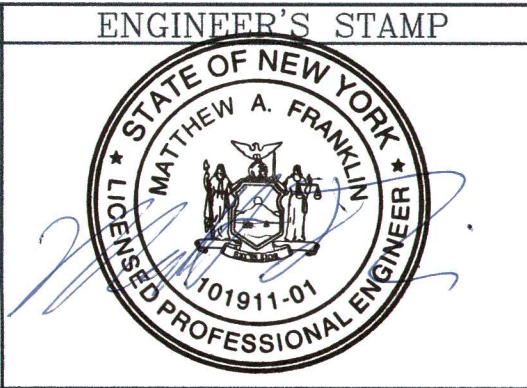
NOTES:
1. IT IS A VIOLATION OF SECTION 7209 OF ARTICLE 145 OF THE NEW YORK STATE EDUCATION LAW FOR ANY PERSON TO ALTER THIS DOCUMENT UNLESS ACTING UNDER THE DIRECTION OF A LICENSED PROFESSIONAL ENGINEER.

LEGEND:

- COMMERCIAL AREA
- COMPRESSOR STATION PROPERTY
- RESIDENTIAL AREA
- SCHOOL PROPERTY
- CHURCH

REFERENCE DRAWINGS	
DRAWING NO.	TITLE
ENV-DOR-D-21-11.56-001	AIR PERMITTING - PLAN
ENV-DOR-D-21-11.56-002	AIR PERMITTING - TABLES
C-DOR3-D-C-001	SITE CIVIL/PERMIT - DRAWING INDEX

PERMIT



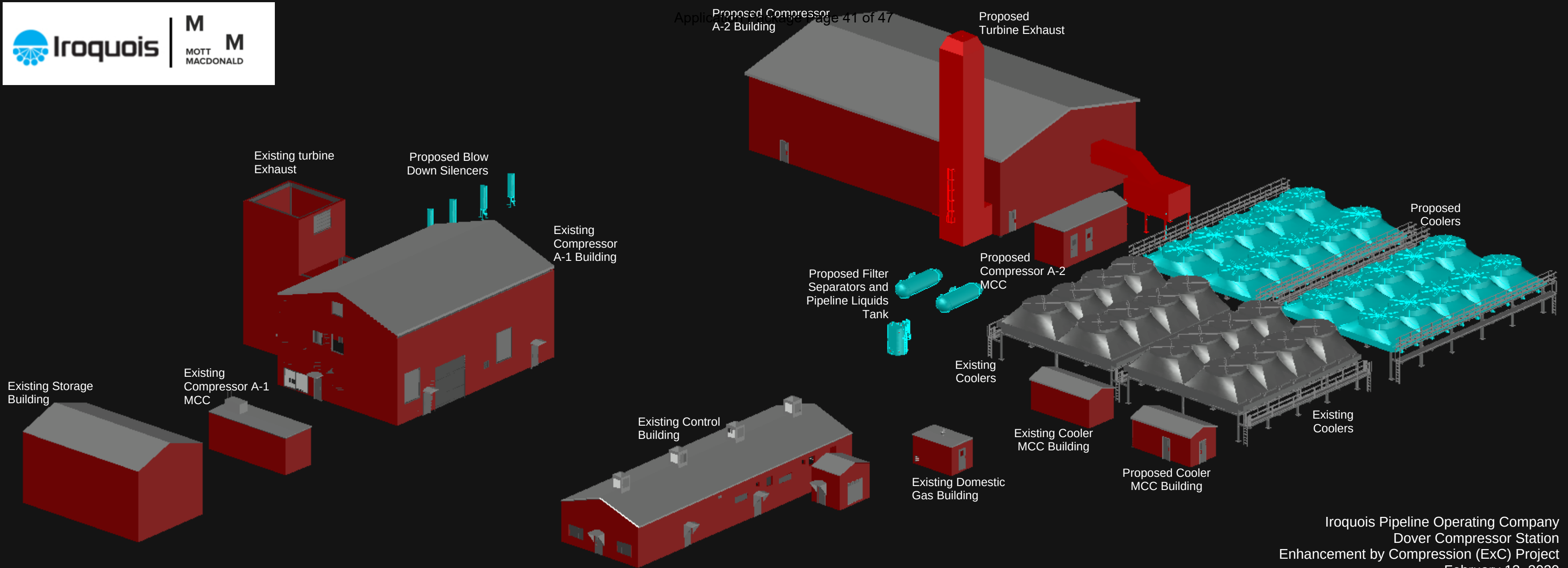
REVISIONS		BY	CHK'D	ENG	APP
REV.	DATE	DESCRIPTION	NRB	NRB	KVS
A	10/04/19	INITIAL REVIEW	RJR	NRB	KVS
B	10/21/19	ISSUED FOR REVIEW	RJR	NRB	KVS
C	12/16/19	ISSUED FOR 30% REVIEW - EXC PROJECT	RJR	NRB	KVS
D	01/31/20	ISSUED FOR PERMIT - EXC PROJECT	RJR	NRB	KVS
E	02/14/20	ISSUED FOR PERMIT - EXC PROJECT	RJR	NRB	KVS

M M
MOTT MACDONALD
134 CAPITAL DRIVE, SUITE D
WEST SPRINGFIELD, MA 01089

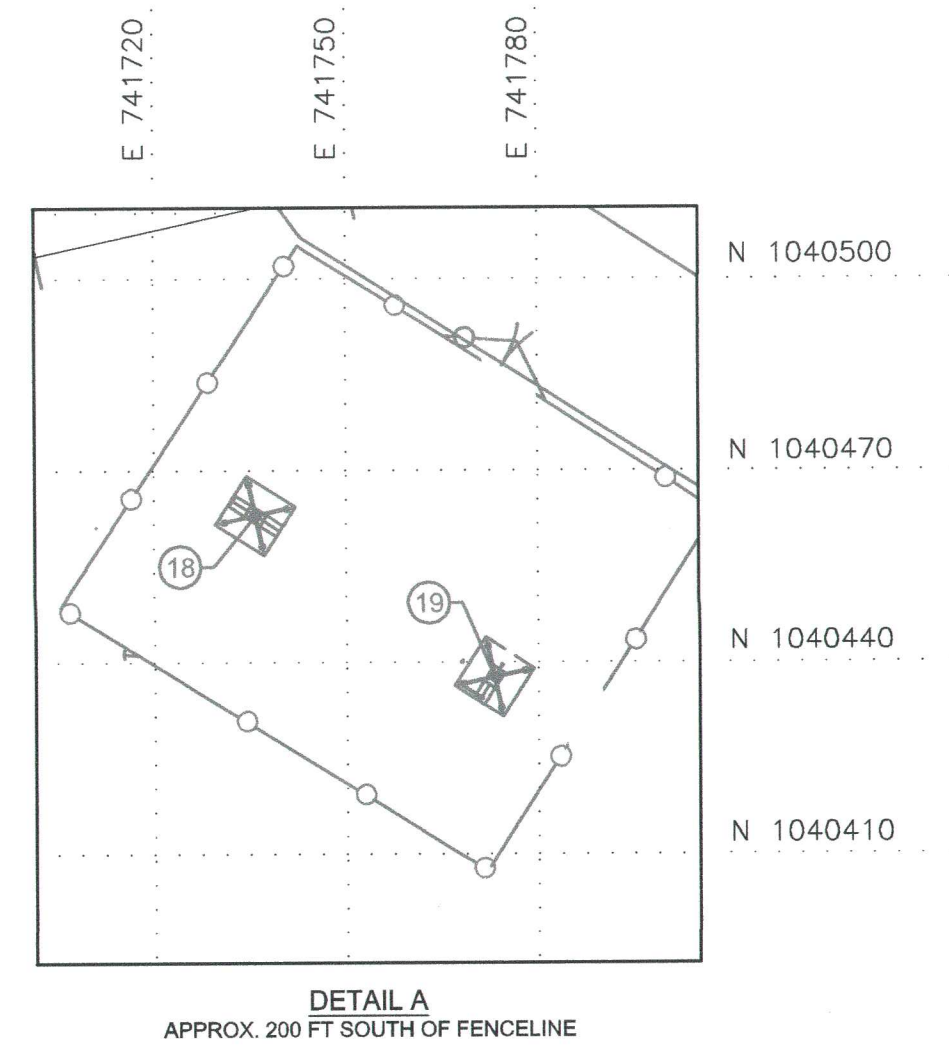
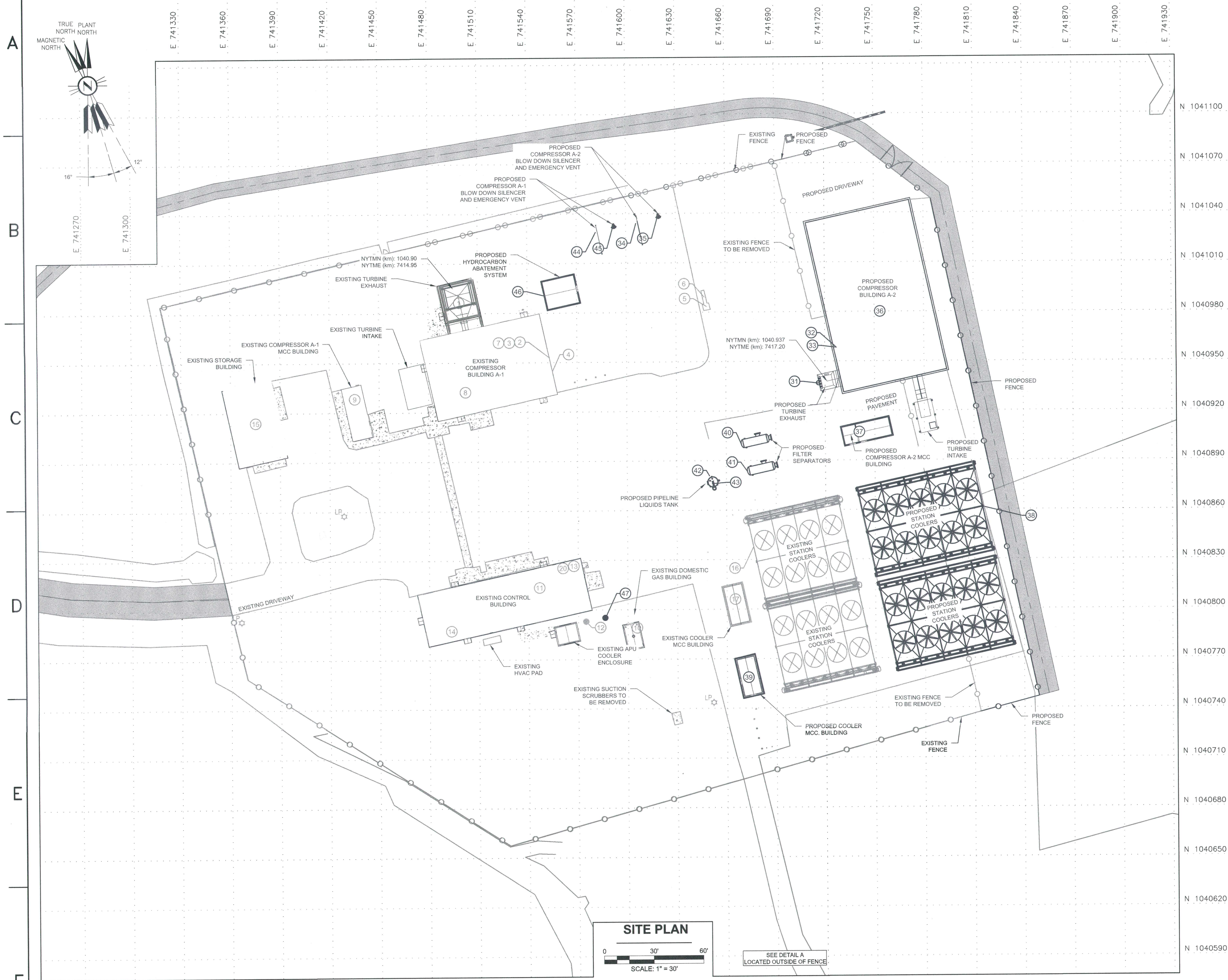
Iroquois
GAS TRANSMISSION SYSTEM
LIQUID PIPELINE OPERATING COMPANY
OPERATOR
APPROVED BY: _____
ENGINEERING MANAGER

DRAWN BY	RJR	DATE	10/04/19
CHECKED BY	NRB	DATE	10/04/19
DRAFT. SUP.	RJR	DATE	10/04/19
ENGR.	NRB	DATE	10/04/19
AFE#		VALVE SECTION	
FILE NO.		SCALE	1" = 400'

AIR PERMITTING - OVERVIEW MAP
ExC PROJECT
DOVER COMPRESSOR STATION
TOWN OF DOVER, DUTCHESS COUNTY, NEW YORK
DWG. NO.: ENV-DOR-D-21-11.56-003
REVISION E



DUTCHESS COUNTY, NEW YORK



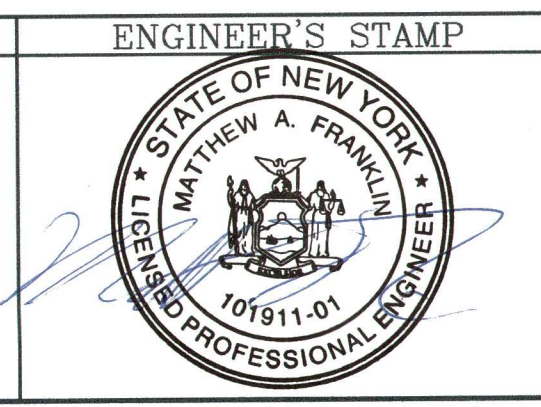
- NOTES:
- COORDINATES SHOWN PER NYTM NAD 83.
 - IT IS A VIOLATION OF SECTION 7209 OF ARTICLE 145 OF THE NEW YORK STATE EDUCATION LAW FOR ANY PERSON TO ALTER THIS DOCUMENT UNLESS ACTING UNDER THE DIRECTION OF A LICENSED PROFESSIONAL ENGINEER.

LEGEND:

#	PROPOSED ITEM NO.
#	EXISTING ITEM NO.
—	PROPOSED FACILITY
—	EXISTING FACILITY
—	PROPOSED FENCE
—	EXISTING FENCE
---	PROPERTY BOUNDARY
~~~~~	TREE LINE

DRAWING NO.	REFERENCE DRAWINGS	TITLE
ENV-DOR-D-21-11.56-002	AIR PERMITTING - TABLES	
ENV-DOR-D-21-11.56-003	AIR PERMITTING - OVERVIEW MAP	
C-DOR3-D-C-001	SITE CIVIL/PERMIT - DRAWING INDEX	

PERMIT



REV.	DATE	DESCRIPTION	BY	CHK'D	ENG	APP
A	10/04/19	INITIAL REVIEW	RJR	NRB	NRB	KVS
B	10/21/19	ISSUED FOR REVIEW	RJR	NRB	NRB	KVS
C	12/05/19	RE - ISSUED FOR REVIEW	DWS	SS	NRB	KVS
D	12/16/19	ISSUED FOR 30% REVIEW - EXC PROJECT	RJR	NRB	NRB	KVS
E	01/31/20	ISSUED FOR PERMIT - EXC PROJECT	RJR	NRB	NRB	KVS
F	02/14/20	ISSUED FOR PERMIT - EXC PROJECT	RJR	NRB	NRB	KVS

**MOTT MACDONALD**  
134 CAPITAL DRIVE, SUITE D  
WEST SPRINGFIELD, MA 01089

**Iraquois**  
GAS TRANSMISSION SYSTEM  
PROPOSED PIPELINE OPERATING COMPANY  
APPROVED BY: _____  
ENGINEERING MANAGER

DRAWN BY	RJR	DATE	10/04/19
CHECKED BY	NRB	DATE	10/04/19
DRAFT. SUP.	RJR	DATE	10/04/19
ENGR.	NRB	DATE	10/04/19
FILE NO.		SCALE	N.T.S.

AIR PERMITTING - PLAN	
ExC PROJECT	
DOVER COMPRESSOR STATION	
TOWN OF DOVER, DUTCHESS COUNTY, NEW YORK	REVISION
ENV-DOR-D-21-11.56-001	F



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F

DOVER C.S. EXISTING STRUCTURES

(2) ITEM #	(2) PERMIT ID #	(3) EXIT FLOW AREA	(4) STRUCTURE	DISTANCE TO NEAREST PROPERTY LINE	(5) HEIGHT	(5) WIDTH OR DIA.	(5) LENGTH	(6) FINISHED GRADE ELEV.
COMPRESSOR A-1								
1	00001	27.65 SQ. FT. *	TURBINE EXHAUST STACK	584.3'	49.66'	14.6'	17.0'	435.1'
2	00002	2.95 SQ. INCH *	PRIMARY BREATHER DRIVE-END	550.4'	42.25' ABOVE MSL	2.38"	N/A	435.1'
3	00003	2.95 SQ. INCH *	PRIMARY BREATHER NONDRIVE-END	550.4'	42.25' ABOVE MSL	2.38"	N/A	435.1'
4	00004	2.95 SQ. INCH *	SECONDARY SEAL GAS VENT	550.9'	42.25' ABOVE MSL	2.38"	N/A	435.0'
5	00005	2.28 SQ. FT. *	BLOW DOWN SILENCER	450.0'	11.5'	1.7"	N/A	433.8'
6	00006	12.7 SQ. INCH ***	EMERGENCY VENT	448.8'	10.5'	4.5"	N/A	433.8'
7	00007	11.8 SQ. INCH *	FUEL GAS SYSTEM VENT	550.4'	31.1' ABOVE MSL	2.38"	N/A	435.1'
8	00008	N/A	COMPRESSOR BUILDING	604.8'	31.7' EAVE 40' PEAK	50'	74.0'	435.1'
9	00009	N/A	COMPRESSOR MCC BUILDING	512.4'	N/A	12'	32.0'	434.7'
21	00021	N/A	TURBINE AIR INTAKE	545.7'	23.6'	10.8'	23.8'	435.1'
STATION								
10	00010	N/A	DOMESTIC GAS BUILDING	385.2'	9'-5" EAVE 9'-10" PEAK	10'	16.0'	435.7'
11	00011	N/A	CONTROL BUILDING	303.7'	13'-11 9/16" EAVE 20' PEAK	32'	101.0'	433.7'
12	00012	50.0 SQ. INCH ****	APU EXHAUST STACK *	368.8'	19.2'	4.00"	5.3'	434.2'
13	00013	12.7 SQ. INCH *	STORAGE / WORKSHOP HEATER EX. STACKS	392.5'	19'-2"	4.5"	N/A	433.9'
14	00014	7.4 SQ. INCH *	WATER CLOSET WATER HEATER EX. STACK	318.9'	19'-2"	3.5"	N/A	434.1'
15	00015	N/A	STORAGE BUILDING	439.3'	24.0'	30'	48.0'	434.1'
16	00016	N/A	COOLERS	407.6'	21.1'	55.5'	52.0'	434.0'
17	00017	N/A	COOLER MCC BUILDING	419.7'	10.0'	12'	24.0'	435.9'
18	00018	28.9 SQ. INCH *	EMERGENCY SUCTION VENT	101.5'	12.0'	8.6"	N/A	432.7'
19	00019	28.9 SQ. INCH *	EMERGENCY DISCHARGE VENT	117.1'	12.0'	8.6"	N/A	432.9'
20	00020	2.95 SQ. INCH *	UTILITY ROOM HEATER EX. STACK	392.5'	17'-0"	2"	N/A	434.1'

DOVER C.S. PROPOSED STRUCTURES

(2) ITEM #	(2) PERMIT ID #	(3) EXIT FLOW AREA	STRUCTURE	DISTANCE TO NEAREST PROPERTY LINE	(5) HEIGHT	(5) WIDTH OR DIA.	(5) LENGTH	(7) FINISHED GRADE ELEV.
COMPRESSOR A-2								
31	00031	28.30 SQ. FT. *	TURBINE EXHAUST STACK	393.4'	69.2'	10.0'	68.0'	433.2'
32	00032	2.95 SQ. INCH *	PRIMARY SEAL GAS VENT	381.7'	22.8'	2.38"	N/A	433.6'
33	00033	2.95 SQ. INCH *	SECONDARY SEAL GAS VENT	381.7'	22.8'	2.38"	N/A	433.6'
34	00034	7.07 SQ. FT. *	BLOWDOWN SILENCER	475.3'	15.9'	36"	N/A	434.0'
35	00035	12.7 SQ. INCH *	EMERGENCY VENT	462.2'	26.5'	4.50"	N/A	434.2'
36	00036	N/A	COMPRESSOR BUILDING	321.8'	25.7' EAVE 34.0' PEAK	64.0'	105.0'	433.6'
37	00037	N/A	COMPRESSOR MCC BUILDING	389.7'	10.6' EAVE 13.3' PEAK	12.0'	30.0'	423.7'
38	00038	N/A	COOLERS	323.4'	18.0'	111.0'	72.0'	432.1'
39	00039	N/A	COOLER MCC BUILDING	444.6'	10.0' EAVE 12.5' PEAK	12.0'	24.0'	433.0'
48	00048	N/A	TURBINE AIR INTAKE	337.1'	29.8'	9.0'	10.7'	433.5'
STATION								
40	00040	N/A	INLET FILTER-SEPARATOR	435.5'	11.1'	5.2'	18.6'	432.3'
41	00041	N/A	INLET FILTER-SEPARATOR	436.7'	11.1'	5.2'	18.6'	431.9'
42	00042	N/A	PIPELINE LIQUIDS TANK	477.1'	8.8' EAVE 9.3' PEAK	6.88"	N/A	432.8'
43	00043	12.7 SQ. INCH *****	PIPELINE LIQUIDS TANK VENT	477.1'	11.3'	4.50"	N/A	432.8'
COMPRESSOR A-1								
47	00047	1.07 SQ. FT. ****	APU EXHAUST STACK	369.8'	19.2'	3.50'	14.50'	434.2'
44	00044	7.07 SQ. FT. *	BLOW DOWN SILENCER	500.3'	15.9'	36"	N/A	434.1'
45	00045	12.7 SQ. INCH *	EMERGENCY VENT	489.8'	26.5'	4.50"	N/A	434.1'
46	00046	N/A	H.A.S. BUILDING	521.8'	10.0'	18.0'	20.5'	435.1'

NOTES:

1. TABLE CONTENT PER IGTS RESPONSE TO EXC RFI-P1-001 RECEIVED 7/19/2019, UNLESS OTHERWISE NOTED.

2. ITEM# AND PERMIT ID # BY MOTT MACDONALD.

3. EXIT FLOW AREA IS:  
-VERTICAL IF NOTED WITH *  
-HORIZONTAL IF NOTED WITH **  
-SLOPED 45° IF NOTED WITH ***  
-VERTICAL DOWNWARDS IF NOTED WITH ****

4. EXISTING STRUCTURE TO BE REMOVED IF NOTED WITH *

5. EXISTING DIMENSIONS ARE APPROXIMATE, PROPOSED DIMENSIONS ARE PRELIMINARY.

6. EXISTING FINISHED GRADE ELEVATIONS PER MOTT MACDONALD SURVEY DATA COLLECTED JULY 29 TO AUGUST 10, 2019.

7. PROPOSED FINISHED GRADE ELEVATIONS PER PRELIMINARY DESIGN.

8. HYDROCARBON ABATEMENT SYSTEM (H.A.S.) WILL ABSORB 90% FLOW OF PRIMARY SEAL GAS REDUCING OVERALL SITE EMISSIONS.

9. PROPOSED TURBINE EXHAUST STACK DESIGN WAS VERIFIED BY SOLAR TURBINES INC. ON NOVEMBER 26, 2019

10. IT IS A VIOLATION OF SECTION 7209 OF ARTICLE 145 OF THE NEW YORK STATE EDUCATION LAW FOR ANY PERSON TO ALTER THIS DOCUMENT UNLESS ACTING UNDER THE DIRECTION OF A LICENSED PROFESSIONAL ENGINEER.

REFERENCE DRAWINGS

DRAWING NO.	TITLE
ENV-DOR-D-21-11.56-001	AIR PERMITTING - PLAN
ENV-DOR-D-21-11.56-003	AIR PERMITTING - OVERVIEW MAP
C-DOR3-D-C-001	SITE CIVIL/PERMIT - DRAWING INDEX

PERMIT

ENGINEER'S STAMP

STATE OF NEW YORK  
MATTHEW A. FRANKLIN  
10/911-01  
LICENSED PROFESSIONAL ENGINEER

REVISIONS

REV.	DATE	DESCRIPTION	BY	CHK'D	ENG	APP
A	10/04/19	INITIAL REVIEW	RJR	NRB	NRB	KVS
B	10/21/19	ISSUED FOR REVIEW	RJR	NRB	NRB	KVS
C	12/05/19	RE - ISSUED FOR REVIEW	DWS	SS	NRB	KVS
D	12/16/19	ISSUED FOR 30% REVIEW - EXC PROJECT	RJR	NRB	NRB	KVS
E	01/31/20	ISSUED FOR PERMIT - EXC PROJECT	RJR	NRB	NRB	KVS
F	02/14/20	ISSUED FOR PERMIT - EXC PROJECT	RJR	NRB	NRB	KVS
-	-	-	-	-	-	-

M  
MOTT  
MACDONALD

134 CAPITAL DRIVE , SUITE D  
WEST SPRINGFIELD, MA 01089

Iroquois

GAS TRANSMISSION SYSTEM  
ROQUOIS PIPELINE OPERATING COMPANY  
OPERATOR

APPROVED BY:  
-  
ENGINEERING MANAGER

DRAWN BY	DATE
RJR	10/04/19
CHECKED BY	DATE
NRB	10/04/19
DRAFT, SUP.	DATE
RJR	10/04/19
ENGR.	DATE
NRB	10/04/19
AFE#	VALVE SECTION
-	-
FILE NO.	SCALE
-	N.T.S.

AIR PERMITTING - TABLES  
Exc PROJECT  
DOVER COMPRESSOR STATION

TOWN OF DOVER, DUTCHESS COUNTY, NEW YORK

DWG. NO.: ENV-DOR-D-21-11.56-002

REVISION  
F

PLOT DATE: 2/13/20



## **Refined Air Quality Modeling Analysis**

- Originally submitted February 28, 2020
- November 16, 2020 updated sulfur dioxide impacts submitted as a separate document with these amendments

**Iroquois Pipeline Operating Company  
Dover Compressor Station  
ExC Project  
Table 1 - PTE TPY**



<b>Existing Sources Potential to Emit (PTE) Tons/Year (TPY)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Turbine Unit A1 (no restrictions)	50.81	13.58	0.09	26.75	6.59	0.65	73,173
Existing Emergency Generator (without oxidation catalyst 500 hours per year) EXEMPT	1.08	0.72	0.31	0.09	0.00	0.14	219
Existing Office/Control Room Heat Furnace (no restrictions) EXEMPT	0.11	0.02	0.00	0.01	0.00	0.00	123
Existing Compressor Seal Gas Leakage (no restrictions or recovery) EXEMPT	0.00	0.00	1.73	0.00	0.00	0.00	784
Station Blowdowns and ESD (3-year average)	0.00	0.00	0.17	0.00	0.00	0.00	382
Existing Domestic Water Heater (no restrictions) EXEMPT	0.06	0.01	0.00	0.01	0.00	0.00	63.93
<b>Total</b>	<b>52.06</b>	<b>14.34</b>	<b>2.30</b>	<b>26.86</b>	<b>6.59</b>	<b>0.79</b>	<b>74,745</b>

<b>New Sources Potential to Emit (PTE) Tons/Year (TPY)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Turbine Unit A2 (no restrictions)	13.32	0.90	0.03	3.69	0.57	0.38	45,346
Replacement Emergency Generator (with oxidation catalyst 500 hours per year) EXEMPT	0.81	0.74	0.21	0.02	0.00	0.18	289
Pipeline Liquids Tank (300 gallons per year) EXEMPT	0.00	0.00	1.00	0.00	0.00	0.00	0.0
Proposed Compressor Seal Gas Leakage (no restrictions but with 90% recovery) EXEMPT	0.00	0.00	0.17	0.00	0.00	0.00	78.39
Station Blowdowns and ESD (same 3-year average as existing station)	0.00	0.00	0.02	0.00	0.00	0.00	45.80
<b>2023 Minor Modification</b>	<b>14.12</b>	<b>1.64</b>	<b>1.43</b>	<b>3.72</b>	<b>0.57</b>	<b>0.56</b>	<b>45,759</b>
Major Source Thresholds	100	100	50	100	100	25	100,000
% Major Source	14.1%	1.6%	2.9%	3.7%	0.6%	2.2%	0.5

<b>Total Facility Potential to Emit (PTE) Tons/Year (TPY)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Existing Station	52.06	14.34	2.30	26.86	6.59	0.79	74,745
Proposed Turbine	13.32	0.90	0.03	3.69	0.57	0.38	45,346
Changes due to replacing emergency engine and installing oxidation catalyst	-0.27	0.02	-0.10	-0.06	0.00	0.04	69.66
Proposed pipeline liquids collection tank	0.00	0.00	1.00	0.00	0.00	0.00	0.00
Proposed compressor's seal gas emissions	0.00	0.00	0.17	0.00	0.00	0.00	78.39
Changes due to recovering existing facility blowdown and seal gas emissions	0.00	0.00	-1.71	0.00	0.00	0.00	-1,041
<b>Combined Post-Project Emissions</b>	<b>65.10</b>	<b>15.25</b>	<b>1.70</b>	<b>30.49</b>	<b>7.16</b>	<b>1.22</b>	<b>119,197</b>
Major Source Thresholds	100	100	50	100	100	25	100,000
% Major Source	65.1%	15.3%	3.4%	30.5%	7.2%	4.9%	119.2%



**Iroquois Pipeline Operating Company  
Dover Compressor Station  
ExC Project  
Table 2 - PTE PPY**



<b>Existing Sources Potential (PTE) Pounds/Year (PPY)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Turbine Unit A1 (no restrictions)	101,616	27,156	171	53,507	13,174	1,309	146,346,460
Existing Emergency Generator (without oxidation catalyst 500 hours per year) EXEMPT	2,150	1,447	620	173	0	271	438,428
Existing Office/Control Room Heat Furnace (no restrictions) EXEMPT	227	48	9	27	1	4	245,486
Existing Compressor Seal Gas Leakage (no restrictions or recovery) EXEMPT	0	0	3,467	0	0	0	1,567,849
Station Blowdowns and ESD (3-year average)	0	0	337	0	0	0	763,079
Existing Domestic Water Heater (no restrictions) EXEMPT	118	25	5	14	1	2	127,857
<b>Total</b>	<b>104,112</b>	<b>28,676</b>	<b>4,609</b>	<b>53,722</b>	<b>13,176</b>	<b>1,586</b>	<b>149,489,158</b>

<b>New Sources Potential to Emit (PTE) Pounds/Year (PPY)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Turbine Unit A2 (no restrictions)	26,630	1,799	54	7,382	1,139	758	90,692,000
Replacement Emergency Generator (with oxidation catalyst 500 hours per year) EXEMPT	1,618	1,481	421	50	7	357	577,739
Pipeline Liquids Tank (300 gallons per year) EXEMPT	0	0	1,999	0	0	0	0
Proposed Compressor Seal Gas Leakage (no restrictions but with 90% recovery) EXEMPT	0	0	347	0	0	0	156,785
Station Blowdowns and ESD (same 3-year average as existing station)	0	0	41	0	0	0	91,608
<b>2023 Minor Modification</b>	<b>28,249</b>	<b>3,279</b>	<b>2,862</b>	<b>7,432</b>	<b>1,146</b>	<b>1115.6</b>	<b>91,518,131</b>

<b>Total Facility Potential to Emit (PTE) Pounds/Year (PPY)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Existing Station	104,112	28,676	4,609	53,722	13,176	1,586	149,489,158
Proposed Turbine	26,630	1,799	54.41	7,382	1,139	758	90,692,000
Changes due to replacing emergency engine and installing oxidation catalyst	-532	33.31	-200	-123	7.27	86.14	139,311
Proposed pipeline liquids collection tank	0.00	0.00	1,999	0.00	0.00	0.00	0.00
Proposed compressor's seal gas emissions	0.00	0.00	347	0.00	0.00	0.00	156,785
Changes due to recovering existing facility blowdown and seal gas emissions	0	0	-3,417	0	0	0	-2,082,535
<b>Combined Post-Project Emissions</b>	<b>130,210</b>	<b>30,508</b>	<b>3,393</b>	<b>60,981</b>	<b>14,322</b>	<b>2,430</b>	<b>238,394,719</b>

**Iroquois Pipeline Operating Company  
Dover Compressor Station  
ExC Project  
Tble 3 - PTE PPH**



<b>Existing Sources Potential to Emit (PTE) Pounds/Hour (PPH)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Turbine Unit A1 (no restrictions)	11.60	3.10	0.02	6.11	1.50	0.15	16,706
Existing Emergency Generator (without oxidation catalyst 500 hours per year) EXEMPT	4.30	2.89	1.24	0.35	0.00	0.54	877
Existing Office/Control Room Heat Furnace (no restrictions) EXEMPT	0.03	0.01	0.00	0.00	0.00	0.00	28.02
Existing Compressor Seal Gas Leakage (no restrictions or recovery) EXEMPT	0.00	0.00	0.40	0.00	0.00	0.00	179
Station Blowdowns and ESD (3-year average)	0.00	0.00	0.039	0.00	0.00	0.00	87.11
Existing Domestic Water Heater (no restrictions) EXEMPT	0.01	0.00	0.00	0.00	0.00	0.00	14.60
<b>Total</b>	<b>15.94</b>	<b>6.00</b>	<b>1.70</b>	<b>6.46</b>	<b>1.50</b>	<b>0.69</b>	<b>17,892</b>

<b>New Sources Potential to Emit (PTE) Pounds/Hour (PPH)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Turbine Unit A2 (no restrictions)	3.04	0.21	0.01	0.84	0.13	0.09	10,353
Replacement Emergency Generator (with oxidation catalyst 500 hours per year) EXEMPT	3.24	2.96	0.84	0.10	0.01	0.71	1,155
Pipeline Liquids Tank (300 gallons per year) EXEMPT	0.00	0.00	0.23	0.00	0.00	0.00	0.00
Proposed Compressor Seal Gas Leakage (no restrictions but with 90% recovery) EXEMPT	0.00	0.00	0.04	0.00	0.00	0.00	17.90
Station Blowdowns and ESD (same 3-year average as existing station)	0.00	0.00	0.005	0.00	0.00	0.00	10.46
<b>2023 Minor Modification</b>	<b>6.28</b>	<b>3.17</b>	<b>1.12</b>	<b>0.94</b>	<b>0.14</b>	<b>0.80</b>	<b>11,537</b>

<b>Total Facility Potential to Emit (PTE) Pounds/Hour (PPH)</b>							
	<b>NOx</b>	<b>CO</b>	<b>VOC</b>	<b>PM</b>	<b>SO2</b>	<b>HAPs</b>	<b>GHG</b>
Existing Station	15.94	6.00	1.70	6.46	1.50	0.69	17,892
Proposed Turbine	3.04	0.21	0.01	0.84	0.13	0.09	10,353
Changes due to replacing emergency engine and installing oxidation catalyst	-1.06	0.07	-0.40	-0.25	0.01	0.17	279
Proposed pipeline liquids collection tank	0.00	0.00	0.23	0.00	0.00	0.00	0.00
Proposed compressor's seal gas emissions	0.00	0.00	0.04	0.00	0.00	0.00	17.90
Changes due to recovering existing facility blowdown and seal gas emissions	0.00	0.00	-0.39	0.00	0.00	0.00	-238
<b>Combined Post-Project Emissions</b>	<b>17.92</b>	<b>6.27</b>	<b>1.18</b>	<b>7.06</b>	<b>1.65</b>	<b>0.95</b>	<b>28,304</b>