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BEFORE THE ENERGY RESOURCES CONSERVATION AND DEVELOPMENT
COMMISSION OF THE STATE OF CALIFORNIA

In the Matter of
McLaren Backup Generating Facility

Docket Number 17-SPPE-01

Closing Argument of Helping Hand Tools (2HT)

Introduction

The McLaren Backup Generating Facility (MBGF) is unlike other Generating Plants that the CEC analyzes. First the McLaren Data Center has no annual NO_x, VOC, CO, SO₂ or Toxic Air Contaminant (TAC) limits in emergency operation. The MBGF has no SCR to control NO_x emissions. The MBGF has no continuous emission monitors (CEMS) to record the projects NO_x and CO emissions. The MBGF has no CO catalyst to control CO, VOC and TAC emissions. The MBGF does not even require any emission testing by the air district.¹ The project's emission stacks are only 14.55 meters limiting dispersion. Under emergency operations the project has no GHG limits. Essentially this is an uncontrolled power plant. The MBGF emits criteria air pollutants at an alarming rate. In 50 hours of operation the project can emit 40 tons of NO_x.

Modeling Emergency Operation Is Not Speculative

Despite the unusual attributes of MBGF, the CEC Staff refuses to model the projects air quality impacts and public health risks during emergency operations, a circumstance which is

¹ Exhibit 27 Page 6 of 31

precisely within the MBGF project's function. The CEC staff claims that modeling emergency operations of the MBGF is speculative. The CEC staff states that they cannot estimate a duration of the emergency operation, the number of engines that will be utilized, or the meteorological conditions likely to affect operations of MBGF.²

The applicant's air quality expert has already demonstrated that modeling the emergency operations of the project's CO emission is not only not speculative but is required. The applicant simply "***assumed all 50 emergency generators are in use at the same time during the worst meteorological conditions for the respective averaging periods.***"³ CEC Staff performs this modeling exercise in every siting case to determine if any air quality standard is exceeded, meeting the standard for a significant impact under CEQA.

The Washington State Department of Ecology routinely models impacts of multiple emergency generators in use when issuing permits to data centers in Quincy Washington.⁴ The Washington State Department of Ecology recently performed a health risk assessment for the Vantage data center project in Quincy. The results demonstrated that when operating all of the projects diesel generators, "*the maximum short-term ambient NO₂ concentration was estimated to be 1,411 µg/m³, 1-hour average.*"⁵ This represents three times the California State Standard for NO₂ and this project only has only 17 three megawatt back up diesel generators as opposed to Vantages proposed Santa Clara Data Center with its 50 diesel generators. The modeling of the back-up diesel generators in emergency mode is necessary to determine if the project will exceed ambient air quality standards⁶ or lead to excessive health risks to an admitted environmental justice community. The health risk assessment done for the project includes only the operation of one diesel generator at a time. The BAAQMD has not yet reviewed and approved that health

² As the hearing officer suggested, Staff could model the impacts utilizing the May 29, 2016 outage at Vantages existing Santa Clara data center. Staff merely needs to model maximum emissions from 60% of the 47 diesel engines at the McLaren Project for 19 hours and 40 % of the diesel engines emissions for 12 hours during the worst meteorological conditions to simulate the 2016 outage.

³ Exhibit 21 TN 223484 Vantage Data Centers Revised SPPE application Air Quality and Public health. Page 22 of 155

⁴ Exhibit 301, 303

⁵ Exhibit 301 Revised Health Impact Assessment Review Document for Vantage Data Center Quincy, Washington Prepared by Air Quality Program Olympia, Washington May 11, 2017 Page 5 of 25, Exhibit 305 Page 3

⁶ The Federal and State 1-hour NO₂ standard are likely to be violated Exhibit 301 Revised Health Impact Assessment Review Document for Vantage Data Center Quincy, Washington Prepared by Air Quality Program Olympia, Washington May 11, 2017 Page 5 of 25

risk assessment and there is likely to be restrictions imposed on just the testing of just one engine due to health risks.

The Santa Clara Data Center located across the street from the MBGF has operating limits on normal testing of just one engine due to excessive health risks. BAAQMD limited the “combined reliability-related operation for all 32 diesel backup generators to 700 hours in any consecutive 12-month period.”⁷ BAAQMD also required that, “*Selective catalytic reduction (SCR) units will be installed on each engine*”⁸ The proposed MBGF has no SCR to limit NOx emissions.

The Microsoft Data Center located across the other street from the MBGF also had normal testing of its diesel generators severely limited. As stated in the engineering analysis performed by BAAQMD, “*Currently permitted emissions at P# 19686 result in unacceptable health-risks under both District Rule 2,5 New Source Review of Toxic Air Contaminants and California H & SC §44300 Air Toxics "Hot Spots" Information and Assessment Act of 1987.*”⁹ Because the cancer risk was so high from just the testing of one generator at a time BAAQMD lowered the annual allowed hours of testing of each generator from 50 hours per year to 20 hours per year. BAAQMD also severely limited the times during the day that the generators could be tested.¹⁰

If just the periodic testing of one diesel generator at a time can create a health risk at a location across the street from the MBGF the operation of 50 diesel generators operating at once will lead to air quality violations and excessive health risks. To meet the burden of proof that there will be no exceedances of health-based standards for criteria air pollutants and toxic air contaminants the applicant must evaluate the health risks and the air quality impacts of all 50 diesel generators operating at once. It has been previously recommended by the executive director Melissa Jones for data center applications.¹¹ Emergency operation of multiple diesel generators at data centers is performed routinely by the Washington State Department of Ecology as evinced by Exhibits 301 and 303. They have even placed annual limits on

⁷ Exhibit 300 Page 4 See also Exhibit 304 Attachment 4 Energy Commission Decision SANTA CLARA SC-1 DATA CENTER, PHASE 2 Page 11 of 141

⁸ Exhibit 304 Energy Commission Decision SANTA CLARA SC-1 DATA CENTER, PHASE 2 Page 57 of 141

⁹ Exhibit 302 Page 3 of 10

¹⁰ Exhibit 302 Microsoft Data Center Engineering Evaluation Plant 19686 Application 24737

¹¹ Attachment 1

emergency operation of backup generators at the Microsoft data center in Quincy Washington because of projected health impacts.¹²

The potential for the generators to operate simultaneously should be analyzed in an AFC level document in accordance with CEQA. Such analysis would identify the project's emergency emissions, quantify their impacts, require feasible mitigation, and assess the potential health risks from the operation of 50 diesel engines operating at once. Without modeling the project's emergency operations, the applicant has not met the burden of proof and demonstrated that the project has no significant environmental impacts- especially NO₂ and PM 2.5 exceedances- which would preclude its approval as an SPPE application.

Cumulative Impacts

CEC Staff always performs a cumulative analysis of a projects emission impacts combined with other nearby projects. In this case Staff performed no cumulative analysis of emergency operations or normal operations. Across the street from the McLaren data center is the City of Santa Clara power plant located a 560 Roberts Avenue. According to the information provided by BAAQMD to the applicant in the revised application the Santa Clara power plants health risk is 421 in a million.¹³ In 2016 the power plant emitted 52.9 tons of NO_x. What are the criteria air pollutant impacts and health risks from the impacts of testing the emergency generators in conjunction with the CAP and TAC emissions from the Santa Clara power plant located across the railroad tracks from the MBGF. The NO₂ impacts from testing just one emergency engine has been estimated by the applicant to be 163.9 (µg/m³) which is 86% of the national NO₂ standard. What would be the NO₂ impact if the Santa Clara power plant and the operations of the MBGF were included in the cumulative analysis. Likely it would be an exceedance of the national NO₂ standard.

McLarens air quality witness attempted to quantify the cumulative health risk according to the BAAQMD's cumulative health risk assessment guidelines. The effort failed because the air quality witness failed to include the health risks from several projects located across the street from the McLaren data center in Table 15 of her testimony. McLaren's air quality witness testified at the evidentiary hearing that the cumulative impact assessment need not include the Santa Clara power plant in the cumulative health risk assessment because it was farther than

¹² Exhibit 303 Page 11 of 39

¹³ Exhibit 21 Page 62 of 155

1,000 feet from the sensitive receptor of concern. A close look at the witness's testimony in Table B (presented below) which is the stationary source report supplied by BAAQMD for the project reveals that the Santa Clara Power Plant lies within 600 feet of the maximumly exposed receptor¹⁴ and the project should have been included in Table 15. The applicant's cumulative health risk excluded diesel emission from CALTRAIN operations even though the project is located next to the train tracks. The cumulative analysis and all analyses performed by applicant and CEC Staff in this entire proceeding ignore the Santa Clara Data Center and its 32 backup diesel generators in their entirety. An AFC level cumulative air quality and health risk assessment is needed to prove that this project does not have a significant impact on the environment.

Table B Section 1: Requestor fills out these columns based on Google Earth data				Table B Section 2: BAAQMD returns form with additional information in these columns as needed																
Distance from Receptor (feet)	Plant # or Gas Dispensary #	Facility Name	Street Address	Screening Level Cancer Risk (1)	Screening Level Hazard Index (1)	Screening Level PM2.5 (1)	Permit # (2)	Source # (2)	Fuel Code (3)	Type of Source(s) (4)	HISA Ap # (5)	HISA Date (6)	HISA Engineer (7)	HISA Cancer Risk in a million	Age Sensitivity Factor (8)	HISA Adjusted Cancer Risk	HISA Chronic Health (9)	HISA PM2.5 Risk	Status/Comments	
220	9200	US Foam Inc	630 Martin Ave	0.05	0	22.6													0	emissions attached; consider site-specific modeling
220	11324	Los Altos Garbage Company	690 Martin Ave	0	0	0													0	no risk/concentration; no further study needed
520	G6575	Vargas Gardening Service	495 Robert Ave	1.9*	0.009*	na*													0	*note that I added screening values for total lead on web yet; consider using provided screening values
550	11223	BB Auto Body	518 Roberts Ave	0	0	0													0	no risk/concentration; no further study needed
600	621	City of Santa Clara, Silicon Valley Power	560 Robert Ave	421	4.27	55													0	emissions attached; consider site-specific modeling

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GHG Emissions

The MBGF in normal operation is estimated to emit 5044 Metric Tons Per Year of CO2.¹⁶ The applicant and staff have made no estimate of the possible GHG emissions that could be emitted under emergency operation. Under emergency operation the project has absolutely no GHG emission limits!!! The project needs to have an annual fuel consumption limit to keep the project from emitting significant amounts of GHG emissions in emergency operation.

BAAQMD wrote a letter to the City of Santa Clara regarding the Mitigated Negative Declaration for the McLaren Data Center Project on March 8, 2017. The letter states: *"The MND concludes that this GHG impact will be less than significant impact because the project "would not conflict with the Santa Clara CAP (Climate Action Plan) or other plans, policies or*

¹⁴ Exhibit 21 Page 59 of 155 See also Page 62 of 155 which list the Santa clara Power Plant as a facility impacting sensitive receptors.

¹⁵ Exhibit 21 Page 59 of 155

¹⁶ Exhibit 200 Page 106 of 329

*regulations adopted for the purpose of reducing the emissions of GHG" (p. 81). The Air District and the State of California have established a long- term GHG reduction goal of 40% below 1990 levels by 2030. The MND itself notes on page 72 that the project is not eligible to use the CAP to evaluate full- build emissions to determine its significance under CEQA, because the CAP is based on 2020 GHG reduction goals and this project will not be completed before 2023. Therefore, the MND does not appear to provide the substantial evidence needed to justify a less than significant impact determination."*¹⁷ It appears that BAAQMD considers the GHG emissions from the data center which include the MBGF a significant impact.

*BAAQMD in its comments on the Santa Clara Climate Action plan stated, "Staff recommends that this measure also encourage and incentivize data centers to utilize alternatives to diesel powered back-up generators to reduce GHG emissions and other air pollutant from the testing and use of diesel generators."*¹⁸

Operation of the project in emergency mode is reasonably foreseeable.

During the evidentiary hearing staff presented a witness from Silicon Valley Power (SVP). The Silicon Valley Power witness testified that there was no way that this data center would be called upon to utilize its generators because SVP rarely if ever had interruptions of service to a data center. The SVP representative even claimed that a major earthquake would not affect its service to the McLaren data center. All that sounds reassuring but the evidence demonstrates otherwise.¹⁹ Vantage data centers other Santa Clara Campus has been operating for 8 years. On May 29, 2016 the Vantage data center experienced a 12 hour outage which caused four of the six generators to run for 19 hours.²⁰ The other two generators operated for 12 hours.

¹⁷ Exhibit 200 Page 108 of 329

¹⁸ www.baaqmd.gov/~media/Files/Planning%20and%20Research/CEQA%20Letters/Santa%20Clara%20CAP%20letter_11_20_13.ashx?la=en

¹⁹ The applicant admits, "it is not possible to predict the duration of an electricity outage, historical losses of electricity exceeding days have been experienced." Exhibit 1 Page 88 of 88

²⁰ Exhibit 201 Page 31 of 31

Silicon Valley Power lists its outages on its website. The current outage information shows 41 outages occurred since January 1, 2017 a period of 20 months or about two a month.²¹ No information is given on whether data centers were involved.

The McLaren Backup Generating Facility Does Not Qualify for SPPE Treatment

The McLaren Data Center was evaluated by the City of Santa Clara before it was submitted to the Energy Commission. The project description states, “*At full build-out, the project will include thirty-two (32) 3-megawatts (MW) capacity Tier-2 emergency generators with diesel particulate filters (DPF) (a total backup capacity of 96 MW)*”²² The original configuration of the data center clearly qualified for SPPE treatment. The applicant correctly applied Section 2003 and determined that the generating capacity was 96 MW.

On December 26, 2017 Vantage submitted its SPPE application to the Commission. The SPPE application increased the number of generators from 32 three MW generators to 47 three MW generators. At that point Vantage data center veered from the Commissions Section 2003 generating capacity calculations and now calculated the generating capacity of the MBGF by the expected maximum load of the data center which was speculated to be 98.7 MW. The SPPE application stated, “*In other words the maximum generating capacity of the MBGF is limited by the combined load of the 3 MDC buildings since the MBGF is exclusively interconnected to the MDC and is not capable of delivering electricity to any other user or to the electrical transmission system. In the case of the MBGF, the maximum load for the 3 MDC buildings combined at total buildout and 100 percent tenant occupancy will not exceed 100 MW and the continuous steady state generating capacity of all the generators would not exceed 98.7 MW for a prolonged electricity outage.* This was a convenient calculation to qualify the MBGF for SPPE treatment as the data center load was speculated to be under 100 MW. The actual generating capacity at that time was 141 MW utilizing the Commission Rules of Practice and Procedure Title 20 Section 2003.”²³

²¹ <http://www.siliconvalleypower.com/svp-and-community/outages-and-alerts/outages/outage-history> Hearing Officer asked for this document to be entered as an exhibit.

²² Exhibit 3 Page 164 of 414

²³ Exhibit 1 Page 10 of 88

On May 21, 2018 Vantage Data Center submitted a revised SPPE application. The new application replaced the three-megawatt generators with 2.75 MW generators and added three-line safety-generators rated at 600 kw each. The revised application stated, *“With this new configuration, the total projected critical demand of the MDC has been increased from 54 MW to 69 MW and the total projected building and supporting facility demand increased from 76 MW to a demand not to exceed 100 MW.”*²⁴ Unfortunately for the applicant the record reflects that *“The mechanical contractor has projected peak PUE of 1.5 for this facility.”*²⁵ As 2HT pointed out in their Response to the Committee Questions²⁶ that with a PUE of 1.5 the project would not qualify for SPPE treatment because the servers required 69 MW bringing total project demand to 103.5 MW which would not allow the project to utilize SPPE treatment. No worries though the applicant just came up with a witness at the evidentiary hearing who swears that the project maximum PUE would be 1.43 not 1.5 just easing the projects demand under 100 MW. (1.43 X69 MW= 98.67) to qualify for SPPE treatment.

The major problem is that the McLaren PUE witness admitted at the evidentiary hearing that he was not an engineer and the McLaren projects engineer’s testimony is that the project will have a PUE of 1.5. Further the engineer’s testimony states,

“Exact load profile predictions are difficult. Actual data hall demands vary greatly depending on the requirements of each client. They determine the maximum load per data hall. The load profile presented in this letter represents those clients who utilize the maximum amount of resources available to them in the shortest possible time frame.”²⁷

The engineer’s testimony is that the load profile predictions are uncertain so the total underpinning of McLaren’s assertion that the total load for the data center will be under 100 MW is speculative and depends on clients, *“who utilize the maximum amount of resources available*

²⁴ Exhibit 20 Page 14 of 39

²⁵ Exhibit 4 Page 153 of 1100

²⁶ Exhibit 305 Page 2

²⁷ Exhibit 4 Page 155 of 1100

to them in the shortest possible time frame.”²⁸ CEC Staff’s engineer came to the same conclusion,

“The project’s PUE depends on customer demand and, as such, is more difficult to manage for a multi-tenant data center like the project, as compared to a single-user data center. The average data center PUE in 2014 was 1.7, down from 1.89 in 2011. With a PUE of 1.5, the project would be below the 2014 average PUE .”²⁹

In reality the demand of the data center is irrelevant to the calculation of maximum generating capacity. The Energy Commission has been consistent in how it computes generating capacity from back up diesel generators at data centers. Most recently the Commission asserted jurisdiction over 36 three megawatt back up diesel generators located across the street from the MBGF at the Santa Clara Data Center. The applicant for the Santa Clara Data Center tried to evade Energy Commission jurisdiction by claiming that the design of the data center would limit the 36 back up diesel generators output to 49.1 megawatts thereby removing it from Energy Commission Jurisdiction.³⁰ This is exactly the same argument McLaren is using to qualify for SPPE treatment. In that case the CEC Executive Director Melissa Jones sent the Santa Clara Data Center applicant a letter explaining that the 32 diesel generators had a combined output of 91.8 MW and informed the applicant that the Energy Commission had jurisdiction. The executive director recommended an AFC proceeding ***“Moreover, the potential for the generators to operate simultaneously should be analyzed in a comprehensive environmental document in accordance with the California Environmental Quality ACT. Such analysis would identify the projects emission, assess their impacts, identify feasible mitigation, and assess the potential health risks from this concertation of diesel***

²⁸ Exhibit 4 Page 155 of 1100

²⁹ Exhibit 202 Page 19 of 31

³⁰ CEC Staff incorrectly testified in this proceeding that, “In the case of the Santa Clara data center, there was no scenario in which generating capacity would be anywhere near 100 MW, so it was not necessary for staff to prepare a detailed analysis.” (Exhibit 205 Page 5 of 6) Just the opposite was true a detailed analysis was conducted to determine if the Sant Clara Data Center was over 50 MW not under 100 MW. CEC staff used Section 2003. See Attachment 1

engines.”³¹ The Executive director Melissa Jones provided clear direction to the San Clara data center applicant that design limitations related to the data center demand do not determine generating capacity. The executive director Melissa Jones correctly applied Section 2003 to arrive at the generating capacity of the Santa Clara data center.³²

The Final Decision for the Santa Clara Data Center³³ correctly applies Section 2003 of Title 20. The decision calculates the generating capacity as follows, “Each backup generator has a capacity to generate 2,250 kilowatts, or 2.25 megawatts (MW), a total capacity of 72 MW.”³⁴ Staff’s proposal to utilize an ad hoc formula³⁵ to compute the generating capacity of the MBGF at the data center design value has no support in the regulations and no support in any Energy Commission decision on a data center siting case. An underground ad hoc regulation must be consistent if nothing else.

Environmental Justice

The first step in a CEC environmental justice analytical process involves focused outreach to, and involvement of, the racial/ethnic minority and low-income population in the decision making process. The CEC Staff failed to perform any outreach or communicate information about the project to the environmental justice community as required by USEPA guidelines and California Resource Agency requirements.³⁶ The Commission failed to hold the traditional Informational Hearing and Site Visit.³⁷ Staff never filed an issues identification report for the

³¹ Attachment 1 Page 1 - Appendix F Pages 315-317 of 376 Project to Add 16 Emergency Backup Generators to the Santa Clara SC-1 Data Center Santa Clara, California Application for Small Power Plant Exemption Submitted to the California Energy Commission Submitted by Xeres Ventures LLC November 2011

https://www.energy.ca.gov/sitingcases/santaclara/documents/applicant/SPPE_Application/Appendices_A-H.pdf Pages 315 of 376

³² Attachment 1

³³ Exhibit 304

³⁴ Exhibit 304 Page 40 of 142

³⁵ CEC Staff Witness Matt Layton

³⁶ The California Resources Agency developed an Environmental Justice Policy that applies to all of its Departments, Boards, Commissions, Conservancies and Special Programs. The Energy Commission has been integrating environmental justice into its siting process since 1995, as part of its thorough California Environmental Quality Act (CEQA) analysis of applications for siting power plants and related facilities. The cornerstone of the Energy Commission approach is based on wide-reaching public outreach efforts by the Siting, Transmission & Environmental Protection Division, the Hearing Office, Media & Public Communications Office, in addition to the Public Adviser’s Office, to notify, inform and involve community members, including non-English speaking people.

This comprehensive method to identifying and addressing EJ concerns requires the early involvement of affected communities and other stakeholders. Additionally, approaches to effectively address EJ issues require partnership and coordination. Most significantly, in efforts to pool all available knowledge and bring it into the process, the Public Adviser’s focuses outreach in power plant siting cases to involve local, affected community members, and stakeholders with a background and understanding of a particular area.

http://www.energy.ca.gov/public_adviser/environmental_justice_faq.html

³⁷ Title 20 § 1709.7. Informational Hearing, Site Visit, and Schedule

public.³⁸ CEC Staff never held any meetings for the public in Santa Clara to provide and exchange information with the public.³⁹ No document handling memo was sent out to the librarians informing the public where the proceedings documents could be accessed. No hearings were held in Santa Clara. No workshop was conducted in Santa Clara for an opportunity to discuss the findings of the preliminary initial study. No final initial study was even published so no workshop was conducted. No project materials were provided to the public in Spanish or other appropriate foreign languages. All of the customary procedures for Energy Commission proceedings designed to engage the public were not performed.

Conclusion

The CEC cannot approve this project as an SPPE. The applicant needs to file an AFC for this proceeding as the project does not qualify for SPPE treatment as the generating capacity is over 100 MW. The applicant has not borne the burden of proof that the project operating in emergency mode with all 50 diesel backup engines running will not cause a significant impact to the environmental justice community located just 400 feet from the project. The CEC has failed to provide outreach to the environmental justice community as required by state and federal environmental justice guidelines.

(a) Within 45 days after the acceptance of a notice of intent or application for certification, the presiding member shall hold one or more informational hearings and site visits as close as practicable to the proposed sites. Notice of the first informational hearing shall comply with section 1209, shall include information on how to participate in the proceeding, and shall be provided to all persons identified by the applicant under section (a)(1)(E) of the information requirements in Appendix B.

³⁸ Title 20 § 1709.7. Informational Hearing, Site Visit, and Schedule (b) At least five days before the first informational hearing, the staff shall file a written statement summarizing the major issues that the staff believes will be presented in the case.

³⁹ Title 20 § 1207.5. Staff Meetings; Purposes.

(a) At any time, staff may initiate voluntary meetings with the applicant, other parties, interested agencies, stakeholders, or the public on matters relevant to a proceeding. Such meetings may include workshops, site visits, or other information exchanges.

Attachment 1

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Project to Add 16 Emergency Backup Generators to the Santa Clara SC-1 Data Center
Santa Clara, California Application for Small Power Plant Exemption Submitted to the
California Energy Commission Submitted by Xeres Ventures LLC November 2011

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https://www.energy.ca.gov/sitingcases/santaclara/documents/applicant/SPPE_Application/01_SPPE_Application.pdf

CALIFORNIA ENERGY COMMISSION

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April 21, 2008

Mr. W. Tate Cantrell, Jr.
Vice President, Data Center Technologies
DuPont Fabros Technology, Inc.
1212 New York Avenue, NW
Suite 900
Washington, DC 20005

RE: Diesel Backup Generators (Xeres Permit S-1 through S-32)

Dear Mr. Cantrell:

The California Energy Commission has received information regarding 32 low-use diesel backup generators that we understand Xeres Ventures, LLC, plans to install to support a data center at 535 Reed Street in Santa Clara, California. We also understand each backup generator has a rated capacity of 2.87 megawatts, which would make the total generating capacity at the site be 91.8 megawatts. We also understand Xeres is seeking a permit from the Bay Area Air Quality Management District, as well as a use permit from the City of Santa Clara.

The purpose of this letter is to inform you that the Energy Commission has permitting jurisdiction over the 32 diesel generators. As a general matter, the Energy Commission has jurisdiction over any site for a thermal power plant with a generating capacity of 50 megawatts or more. (Pub. Resources Code §§ 25110, 25120, 25500.) Here, the 32 generators, each to use diesel as a source of thermal energy to generate electricity, constitute a thermal power plant with more than 50 megawatts in generating capacity.

The aggregation of all 32 generators is based on their common location for a computer server campus and their common purpose to provide power conditioning and backup power to the data center that is also planned for the site. The issue of whether to aggregate the backup generators and view them as a thermal power plant under the Energy Commission's jurisdiction is one we have dealt with on more than one occasion. In all these cases, including a few in which the power plants were to be located a mile or more apart and two others which also involved diesel backup generators for a data center, the Energy Commission's Chief Counsel concluded the Commission has jurisdiction based on aggregating the proposed power plants, including backup diesel generators.

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The factors supporting aggregation include such matters as the separate generating units: (a) being served by common structures, for example, a common control room or a common gas line, (b) if lacking a common control room, nevertheless being triggered to operate by the same event, for example, grid failure, (c) being under common ownership or subject to a common permit to operate, (d) being proposed as part of a foreseeable plan of development and, thus, constituting a "project" under the California Environmental Quality Act for purposes of environmental review by the permitting agency, and (e) being installed to serve a common industrial or commercial host.

Here, the generators will be located on one site proposed for the development of a data center. The generators are considered by the Air District to be components of a single project. The generators have the common purpose of serving as power conditioning and backup generators for a computer server campus being developed by a single project proponent. Their operation is likely to be triggered by the same event, for example, lightning storms or grid failure. Moreover, the potential for the generators to operate simultaneously should be analyzed in a comprehensive environmental document in accordance with the California Environmental Quality Act. Such analysis would identify the project's emissions, assess their impacts, identify feasible mitigation, and assess the potential health risks from this concentration of diesel engines.

For all these reasons, we believe the Energy Commission has permitting authority over the 32 generators, regardless of whether the power will be sold to the grid or used exclusively on-site. Thus, to receive a valid permit for the 32 diesel generators, Xeres must file with the Energy Commission either an application for a small power plant exemption (for a thermal power plant of 50 to 100 megawatts) or an application for certification. We believe an application for certification would be most appropriate, given the potential for adverse impacts from the use of diesel fuel in as many as 32 generators operating at one time.

In either case, the Energy Commission, as a matter of statute, serves as lead agency under the California Environmental Quality Act. As lead agency, it is responsible for preparing the appropriate environmental document for public review and consideration in deciding whether to approve the application. In the case of a small power plant exemption, the project is exempted from the Commission's jurisdiction and permitted at the local level. In the case of an application for certification, the project is permitted by the Energy Commission. During the certification process, the Commission and its staff work with the Air District, which is required under the Commission's regulations to issue a determination of compliance with the District's rules. The conditions of the District's determination, provided within the timeline of the Commission's proceeding, are incorporated into and become enforceable through the Commission's final decision.

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If Xeres wishes to claim otherwise about the Commission's jurisdiction, or seek a formal opinion from the Energy Commission, you may file a request for a jurisdictional determination under the Commission's regulations, specifically, section 1230 et seq. in Title 20 of the California Code of Regulations.

In any event, the staff of the Energy Commission is interested in working with you, DuPont Fabros Technology, Inc., and Xeres in a productive manner. Please do not hesitate to contact Arlene Ichien at (916) 654-3959 or by e-mail at aichien@energy.state.ca.us if you have any questions whatsoever.

Sincerely,



ARLENE L. ICHIEN
Assistant Chief Counsel



MELISSA JONES
Executive Director

cc: Michael J Tollstrup, Air Resources Board
Tamiko Endow, Bay Area Air Quality Management District
Gerardo Rios, US Environmental Protection Agency
Terrance O'Brien, California Energy Commission