

Nancy Stoner and General Counsel Scott Fulton on Feb. 9. to discuss Puerto Rico's Via Verde project.

Although we all likely know, I've asked OCIR to re-engage the Governor's office on more specifics on what they would like to cover.



**Fw: Via Verde & Pedro Nieves - DC meeting request.**  
Carl Soderberg to: Jose Font, Teresita Rodriguez

02/02/2011 09:07 AM

Please prepare briefing document for Judith's review on or before tomorrow noon.  
----- Forwarded by Carl Soderberg/R2/USEPA/US on 02/02/2011 09:10 AM -----

**From:** Judith Enck/R2/USEPA/US  
**To:** Peter Brandt/R2/USEPA/US@EPA, George Pavlou/R2/USEPA/US@EPA, Barbara Finazzo/R2/USEPA/US@EPA, Carl Soderberg/R2/USEPA/US@EPA, Jose Font/R2/USEPA/US@EPA, Teresita Rodriguez/R2/USEPA/US@EPA, Kevin Bricke/R2/USEPA/US@EPA, Grace Musumeci/R2/USEPA/US@EPA, Bonnie Bellow/R2/USEPA/US@EPA, "shore berry" <shore.berry@epa.gov>  
**Date:** 02/01/2011 09:23 PM  
**Subject:** Re: Via Verde & Pedro Nieves - DC meeting request.

Please work on a background memo for nancy or scott or whomever agrees to take the meeting. I would like to review it first. Thanks  
Sent by EPA Wireless E-Mail Services  
Peter Brandt

----- Original Message -----

**From:** Peter Brandt  
**Sent:** 02/01/2011 05:02 PM EST  
**To:** Judith Enck; George Pavlou; Barbara Finazzo; Carl Soderberg; Jose Font; Teresita Rodriguez; Kevin Bricke; Grace Musumeci; Bonnie Bellow; shore.berry@epa.gov  
**Subject:** Via Verde & Pedro Nieves - DC meeting request.

Hi,

Pedro Nieves and Daniel Galan of DPNR, through Governor Fortuño's DC office, has requested a meeting with Acting Administrator for Water Nancy Stoner and General Counsel Scott Fulton on Feb. 9. to discuss Puerto Rico's Via Verde project.

Although we all likely know, I've asked OCIR to re-engage the Governor's office on more specifics on what they would like to cover.

**Re: Via Verde & Pedro Nieves - DC meeting request.** 

**Judith Enck** to: Peter Brandt, George Pavlou, Barbara Finazzo, Carl Soderberg, Jose Font, Teresita Rodriguez, Kevin Bricke, Grace Musumeci, Bonnie Bellow, shore berry

02/01/2011 09:23 PM

History: This message has been forwarded.

Please work on a background memo for nancy or scott or whomever agrees to take the meeting. I would like to review it first. Thanks  
Sent by EPA Wireless E-Mail Services  
Peter Brandt

----- Original Message -----

**From:** Peter Brandt

**Sent:** 02/01/2011 05:02 PM EST

**To:** Judith Enck; George Pavlou; Barbara Finazzo; Carl Soderberg; Jose Font; Teresita Rodriguez; Kevin Bricke; Grace Musumeci; Bonnie Bellow; shore.berry@epa.gov  
**Subject:** Via Verde & Pedro Nieves - DC meeting request.

Hi,

Pedro Nieves and Daniel Galan of DPNR, through Governor Fortuño's DC office, has requested a meeting with Acting Administrator for Water Nancy Stoner and General Counsel Scott Fulton on Feb. 9. to discuss Puerto Rico's Via Verde project.

Although we all likely know, I've asked OCIR to re-engage the Governor's office on more specifics on what they would like to cover.



**Via Verde & Pedro Nieves - DC meeting request.**

**Peter Brandt** to: Judith Enck, George Pavlou, Barbara Finazzo, Carl Soderberg, Jose Font, Teresita Rodriguez, Kevin Bricke, Grace Musumeci, Bonnie Bellow, shore.berry

02/01/2011 06:02 PM

Hi,

Pedro Nieves and Daniel Galan of DPNR, through Governor Fortuño's DC office, has requested a meeting with Acting Administrator for Water Nancy Stoner and General Counsel Scott Fulton on Feb. 9. to discuss Puerto Rico's Via Verde project.

Although we all likely know, I've asked OCIR to re-engage the Governor's office on more specifics on what they would like to cover.



**Fw: PREPA Via Verde Natural Gas Project**  
Carl Soderberg to: Teresita Rodriguez

01/31/2011 08:08 AM

please evaluate quickly

----- Forwarded by Carl Soderberg/R2/USEPA/US on 01/31/2011 08:07 AM -----

**From:** M-CORDERO@PREPA.COM  
**To:** Judith Enck/R2/USEPA/US@EPA, Carl Soderberg/R2/USEPA/US@EPA  
**Date:** 01/27/2011 03:52 PM  
**Subject:** PREPA Via Verde Natural Gas Project

Ms. Enck:

Enclosed please find our response to the EPA letter of December 21, 2010. The enclosure mentioned in the letter occupies a lot of memory space, so it will be sent by express mail, along with the original of the letter, tomorrow.  
Thank you.

Miguel A. Cordero López, PE  
Executive Director  
Puerto Rico Electric Power Authority  
GPO 364267  
San Juan, PR 00936-4267



(787) 521-4671  
Fax (787) 521-4665  
[m-cordero@prepa.com](mailto:m-cordero@prepa.com)

Verified by Puerto Rico Electric Power Authority McAfee Email and Web Security System (SCM1). carta epa.pdf





MIGUEL CORDERO LOPEZ.vcf



GOVERNMENT OF PUERTO RICO  
**Puerto Rico Electric Power Authority**

Miguel A. Cordero López, P.E.  
Executive Director & CEO

m-cordero@prepa.com

January 27, 2011

Sent Via E-Mail: enck.judith@epa.gov

Ms. Judith Enck  
Regional Administrator  
U.S. Environmental Protection Agency, Region 2  
290 Broadway, 27th Floor  
New York, NY 10007-1866

Dear Ms. Enck:

**RE: Puerto Rico Electric Power Authority  
Via Verde Natural Gas Project  
Public Notice Number SAJ-2010-02881 (IP-EWG)**

Regarding the Environmental Protection Agency's (EPA) December 21, 2010 letter (EPA letter) expressing concerns about the Joint Permit Application (JPA) for the proposed construction of the Via Verde Project (Project), the Puerto Rico Electric Power Authority (PREPA) states that this project is urgently needed to respond to the energy infrastructure crisis that Puerto Rico faces at this time. The project will allow PREPA to generate electricity by burning the much cleaner and cost effective fuel natural gas instead of fuel oils. Electric power produced in Puerto Rico costs 21 cents per kilowatt/hour compared to an average cost in the United States of only 9 cents, a situation that is directly undermining Puerto Rico's economy. The shift from oil to natural gas-based power that would be enabled by the Via Verde project would allow PREPA to reduce criteria pollutants by a significant 64%, which would greatly improve air quality for Puerto Rico. Also, greenhouse gas emissions will be reduced by up to 30%. The Government of Puerto Rico, accordingly, has identified Via Verde, along with the development of renewable generation, as top priority for the island.

The JPA was filed with the United States Army Corps of Engineers, Antilles Office (USACE) on September 20, 2010. USACE issued a public notice (USACE PN) of the JPA on November 19, 2010. Pursuant to Puerto Rico Law 416 (PR Law 416), dated September 22, 2004, which establishes a NEPA-like environmental evaluation process for the Project, PREPA conducted a detailed environmental study of the Project, including the opportunity for public comment and participation at three public hearings, and drafted an environmental impact statement (EIS). This environmental study culminated in the release of a final version of the EIS (Final EIS) on November 29, 2010, which was approved by the Puerto Rico Environmental Quality Board (EQB) as the Final EIS (DIA-F) for the Project. (See Enclosure, Electronic Copy of Final EIS.)



G.P.O. BOX 364267 SAN JUAN, PUERTO RICO 00936-4267 PHONE: (787) 521-4666 FAX: (787) 521-4665

*\*We are an equal opportunity employer and do not discriminate on the basis of race, color, gender, age, national or social origin, social status, political ideas or affiliation, religion; for being or perceived to be victim of domestic violence, sexual aggression or harassment; for physical or mental disability or veteran status or for genetic information.\**

The EPA letter, filed in response to the USACE PN, makes several points concerning the environmental study of the Project. Prior to addressing them individually, though, we note that the EPA letter appears to be based on an evaluation of only the First Draft of the EIS (*Borrador de Declaración de Impacto Ambiental Preliminar, DIA-P*). In fact, the First Draft of the EIS was revised twice in preparing the Final EIS, with PREPA incorporating changes based on and responding to public comments received at three public hearings, via the public press, and through direct input from relevant federal and state government agencies. PREPA assures that the EPA's concerns have been addressed in the Final EIS, which was published on the webpage of the EQB and PREPA, and that the Project does not require any further environmental studies or analyses. Notwithstanding this, PREPA will address each individual comment included in the EPA letter.

#### **A Final EIS already has been Completed for the Project**

The EPA letter states that an environmental impact statement (EIS) rather than an environmental assessment (EA), needs to be prepared for this Project, in order to properly evaluate its environmental impacts. PREPA strongly disagrees with this statement, since it has already conducted a highly detailed and professional NEPA-like environmental study, pursuant to PR Law 416, and prepared a comprehensive EIS for the Project, not an EA. This environmental impact study process has been used in Puerto Rico consistently for the last forty years by all state and federal agencies evaluating projects requiring governmental approval, as codified by federal and state agencies. The evaluation performed by the federal agencies has historically been carried out under the *Federal and Commonwealth Joint Permit Application for Water Resource Alterations in Waters, Including Wetlands, of Puerto Rico (JPA)*.

In conducting the environmental evaluation for both, the EIS, pursuant to PR Law 416, and the JPA, pursuant to Clean Water Act, PREPA carefully evaluated environmental impacts from the Project and determined the nature and level of mitigation efforts required. Recognized professionals were contracted to perform the required scientific studies and surveys. Also, PREPA listened, analyzed and considered all comments received through state and local administrative and judicial processes, and via the public press. The resulting analyses and determinations were incorporated into both, the Final EIS and the Project design and specifications. Also, pursuant to the Clean Water Act, PREPA will address all new comments received through the USACE PN prior to USACE's final evaluation of the JPA.

In particular, the Final EIS includes a Socioeconomic Study (Chapter 7), undertaken pursuant to the EPA Region 2, Interim Environmental Justice Policy and the President's Executive Order Number 12898, that is intended to satisfy the same need as is met by the Environmental Justice Analysis required under NEPA, which is consistent with the position of EPA Region 2 to use a socioeconomic analysis in lieu of the Environmental Justice Analysis for ethnically homogeneous populations like those in Puerto Rico.<sup>1</sup>

---

<sup>1</sup> United States EPA Region 2 Interim Policy on Identifying EJ Areas, December, 2000

We note that USACE determined, in page 5 of the USACE PN, that an EIS under NEPA is not necessary for the Project. We agree. We believe that the Final EIS completed pursuant to PR Law 416 (which addresses the specific concerns expressed in the EPA letter) definitively obviates the need for conducting a new EIS under NEPA, as this largely would duplicate the work already completed and unnecessarily delay the benefits of this important Project.

### **Alternatives to the Project**

The EPA letter states that a more thorough alternatives analysis, including the use of other fuel sources and the construction of an alternative terminal near one of the north coast power plants (with the installation of a shorter length pipeline between Arecibo and Toa Baja), should be considered for the JPA. We understand that 40 CFR 1502.14 provides that an EIS should examine all reasonable alternatives to the Project, with reasonable alternatives including those that are practical or feasible from the technical and economic standpoint and using common sense.<sup>2</sup> We conducted just this type of evaluation of alternatives, as described in Chapter 4 of the Final EIS, and also included in the JPA.

With regard to our Final EIS Chapter 4 alternatives analysis, we note that PREPA cannot reasonably consider the use of other fuels for electric generation, such as coal or nuclear fuels. The use of coal for PREPA's large generating units was not considered due to the limitations imposed by laws already enacted in Puerto Rico, like PR Law 82 of July 19, 2010, among others, and to EPA's new Prevention of Significant Deterioration and Title V Greenhouse Gas Tailoring Rule, of November, 2010, which regulate carbon dioxide (CO<sub>2</sub>) and other greenhouse gas emissions. Even using the newest clean technology for burning coal, the amount of CO<sub>2</sub> emissions is around 30% lower when natural gas is burned instead of coal. CO<sub>2</sub> sequestering technology for coal-burning power plants is far from fully developed.

Regarding nuclear fuels, it must be noted that harvesting energy from this type of fuel is expressly excluded by the Puerto Rico Energy Policy established by the Governor's Executive Order OE-1993-57. It must also be noted that the alternatives analysis does consider the use of renewable energy sources to meet PREPA's generating needs, as was requested during the public comment period, and that Puerto Rico's substantial plans to develop renewable generation is discussed in detail in Chapter 4 of the Final EIS, Section 4.4, which was not included in the Preliminary EIS.

### **Horizontal Drilling in Karst Areas**

EPA expresses concerns regarding the use of Horizontal Directional Drilling (HDD) in karst areas, due to past experiences that are not specified. EPA also requests that PREPA establishes mechanisms to monitor drilling operations, so that any escape of drilling mud is detected immediately, as well as to identify steps to be taken to minimize potential impacts of an escape.

---

<sup>2</sup> Council on Environmental Quality, <http://ceq.hss.doe.gov/nepa/regs/40/1-10.HTM#2>, as recovered from the Internet on December 22, 2010.

It must be clarified that the utilization of the HDD technology as described in the *DIA - F* will be mostly geared to cover construction of the *Vía Verde* Pipeline on areas associated with river and highway crossings. Special precautions and care must be taken to ensure that contractors adhere to prudent practices to avoid the accidental release of bentonite mud within the above-mentioned areas.

It is recognized that contractors must take due care and adhere to prudent practices to avoid the accidental release of bentonite mud. The North American Society for Trenchless Technology (NASTT) provides guidance for the analysis and design of tooling essential in reducing the incidence of hydro fractures (frac-outs) in karst environments. Hydro fracture or "frac outs" result when the fluid pressures built up in the borehole exceed the overburden effect of the surround soil medium. Several drilling factors and procedures will be monitored to preclude the development of hydro fractures. Eight significant factors will be evaluated at each HDD. These include: annular space; back ream rate; borehole pressure; depth of cover; reamer type; reamer diameter; soil composition; and soil density.

To ensure that the HDD operations to be conducted in association with the *Vía Verde* pipeline will comply with all regulatory permits and standards, proper preconstruction geotechnical investigations will be conducted on the *in situ* soil formations along the proposed installation route. Tooling used in HDD installations will be matched to the soil medium to be encountered. The Frac-Out Plan (Draft included in the approved FEIS) will be updated to stipulate lined pits and all environmental details depicted for the sedimentation ponds.

In summary, the HDD operation to be utilized on the *Vía Verde* pipeline will include proper preconstruction geotechnical investigations, limit drill fluid application rates, utilize an appropriate type reamer to reduce the extent and magnitude of the drilling fluid dispersed, carefully monitor drilling mud pressures increased until the midpoint of the installation is attained, and insure proper containment, recycling, and/or reuse of drilling muds. All HDD operations for the *Vía Verde* pipeline will be conducted in accordance with the guidelines and recommendations of the NASTT for karst environments. Regardless, PREPA is willing to include any specific recommendations provided by the USCOE aimed to improve the Frac-Out Plan included in the FEIS.

Construction associated with the *Vía Verde* pipeline within the Manati karst area will be undertaken in accordance with the procedures established in the FEIS Chapter #6 pages 6-18. The construction approach within this area will include the utilization of small construction equipment, as well as pulling the pipeline into the required open trenches. Together with the above PREPA will either avoid entirely the "Mogotes" hills located within said area, or will use the bore technique to go under nice them. *Vía Verde* pipeline alignment will be adjusted as required to prevent any impact to the karst area hill potential habitat for plants listed in the endangered species list.

The approaches mentioned above address all concerns presented by the Fish and Wildlife Service (FWS), as well as other federal regulatory agencies.

### Compensation and Mitigation Offsets

EPA indicates concerns regarding the adequacy of the compensation to offset any impacts to jurisdictional areas; the need for specific plans to address mitigation in advance; and criteria identified in the USACE PN for "determining whether mitigation sites will be successful." PREPA addressed each of these issues in the Final EIS, where it committed to a mitigation ratio of 3:1 regarding forested and wetland areas. This ratio is greater than the one that would be the minimum accepted by EPA (1:1). These commitments are included on pages 6-2, 6-6, and 6-18 of the Final EIS. This document also considers the compensation to the offset of protected habitats that are part of a Work Plan that was jointly developed and agreed upon by USACE, PREPA and the FWS. PREPA is developing the required mitigation plans and will submit them in the near future for the USACE review and needed action.

### Endangered Species Impact

The EPA letter states that a formal Endangered Species Act consultation has been required. However, as of the date of this letter, PREPA has not been notified of any such determination, which we understand falls within the jurisdiction of USACE. Based on the information gathered by field surveyors, including those from FWS, such action is not warranted. Moreover, comments on the Project by the Puerto Rico Department of Natural and Environmental Resources (DNER) indicate that they do not believe that the Project would pose a significant impact to resources covered by the Endangered Species Act (ESA). Thus, to our knowledge, USACE has not modified its original determination to use an informal consultation process under ESA.

In closing, PREPA reemphasizes the seminal importance of the Via Verde Project to Puerto Rico, both environmentally and economically. Once fully implemented, this project will allow PREPA to eliminate over 129 MM pounds of regulated pollutant emissions into the environment, or 64% of our current total and up to 30% of CO<sub>2</sub> emissions. In addition, transitioning away from oil-fired generation will free our people and businesses from being hostage to the international price of oil, which rise has rendered our manufacturing and other business sectors virtually uncompetitive, contributed to the devastating 15% unemployment rate currently being suffered by our workforce, and been punishing our families, half of whom live below the federal poverty line, with energy costs so high that many are unable to afford basic electric service.

PREPA is committed to continue to scrupulously examine the environmental impact of the Project, as shown by our public study process and the release of our Final EIS. PREPA respectfully requests to meet with you and your staff to discuss the concerns expressed in the EPA letter at the soonest possible time, in order that you can be assured of the quality and completeness of our environmental examination.

Cordially,



Enclosure

**Fw: SAJ-2010-02881 Via Verde Meeting (UNCLASSIFIED)**  
Carl Soderberg to: Teresita Rodriguez

01/18/2011 10:51 AM

Recomiendo que vayas con Jose Soto.

----- Forwarded by Carl Soderberg/R2/USEPA/US on 01/18/2011 10:54 AM -----

**From:** "Garcia, Edgar W SAJ" <Edgar.W.Garcia@usace.army.mil>  
**To:** "lisamarie carrubba" <Lisamarie.Carrubba@noaa.gov>, Carl Soderberg/R2/USEPA/US@EPA, "Carlos A. Rubio" <carubio@prshpo.gobierno.pr>, "Miguel Bonini" <mbonini@prshpo.gobierno.pr>, <Felix\_Lopez@fws.gov>, <jaime.torres@dot.gov>, <iyutka53@aol.com>, <carlos.machado@dot.gov>, <Marelisa\_Rivera@fws.gov>, <rafael\_gonzalez@fws.gov>, <daniel\_paganrosa@yahoo.com>, "Carlos Monroig" <c-monroig-tdcar@prepa.com>, <Edwin\_Muniz@fws.gov>, Jose Solo/R2/USEPA/US@EPA, <larryevans@bcpeabody.com>, <flopez1075@prepa.com>, "MADELINE RAMOS CARO" <M-RAMOS@PREPA.COM>  
**Cc:** "Castillo, Sindulfo SAJ" <Sindulfo.Castillo@usace.army.mil>, "Collazo, Osvaldo SAJ" <Osvaldo.Collazo@usace.army.mil>, "Garcia, Edgar W SAJ" <Edgar.W.Garcia@usace.army.mil>  
**Date:** 01/18/2011 10:29 AM  
**Subject:** SAJ-2010-02881 Via Verde Meeting (UNCLASSIFIED)

Classification: UNCLASSIFIED  
Caveats: NONE  
Ladies and Gentlemen:

Your agency is cordially invited to our Interagency Meeting on the Via Verde Natural Gas Pipe Line project.

As previously agreed at the end of October 2010 with each agency, the meeting is necessary to discuss the technical status of the project in relation to each agency area of jurisdiction. It is urged that only personnel and or supervisors directly related to the project be present for this meeting as space would be limited.

We are scheduling subject meeting at the US Army Corps of Engineers (USACOE) Patio Conference Room on Tuesday February 1, 2011 at 9:30AM.

The USACOE is located at the following address:

Stop 7½  
400 Ave Fernández Juncos, San Juan, PR 00901-3223

For a Map use the following link:

[http://maps.google.com/maps?f=q&source=s\\_q&hl=en&geocode=&q=18.462660+-66.094082&sll=37.0625,-95.677068&sspn=30.819956,56.337891&ie=UTF8&t=h&z=16](http://maps.google.com/maps?f=q&source=s_q&hl=en&geocode=&q=18.462660+-66.094082&sll=37.0625,-95.677068&sspn=30.819956,56.337891&ie=UTF8&t=h&z=16)

Please confirm who will be attending from your agency by email at your earliest convenience.  
Respectfully,

Edgar W. García  
Project Manager  
Army Corps of Engineers  
Jacksonville District  
Antilles Regulatory Section  
Tel: (787) 729-6905 Ext. 3059  
Fax: (787) 729-6906

Classification: UNCLASSIFIED  
Caveats: NONE

**Re: Via Verde Letter - Revised After Phone Call**  
**Barbara Finazzo to: Teresita Rodriguez**

12/22/2010 05:26 PM

History: This message has been replied to.

Thanks, Tere. Have a happy holiday.  
Sent by EPA Wireless E-Mail Services

**Re: Via Verde Letter - Revised After Phone Call**   
Barbara Finazzo to: Teresita Rodriguez

12/22/2010 07:19 AM

History: This message has been replied to.

Can you please send me a signed version of the letter that Carl sent yesterday? Thanks again.  
Sent by EPA Wireless E-Mail Services  
Teresita Rodriguez

----- Original Message -----

From: Teresita Rodriguez  
Sent: 12/20/2010 05:42 PM AST  
To: Barbara Finazzo  
Cc: Carl Soderberg; Grace Musumeci; Jose Soto; Daniel Montella  
Subject: Via Verde Letter - Revised After Phone Call  
Hi Barbara,

Attached you'll find a version of the Via Verde letter which we believe incorporates the points discussed during the phone conversation. Please, let us know if you are in agreement or if further discussion is needed before your and Carl's call with George P. tomorrow morning.

Thanks,

Tere

[attachment "Via Verde consensus language 2.docx" deleted by Barbara Finazzo/R2/USEPAUS]



**Enclosed VIA VERDE LETTER**

Sandra Mendez to: Teresita Rodriguez, Jose Soto

12/21/2010 09:58 AM



VIA VERDE LETTER.pdf



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
OFFICE OF REGIONAL COUNSEL  
CENTRO EUROPA BUILDING, SUITE 207  
1492 PONCE DE LEON AVENUE, STOP 22  
SAN JUAN, PR 00907-4127

December 21, 2010

Mr. José M. Rosado  
Deputy District Engineer for the Antilles  
U.S. Army Corps of Engineers  
Antilles Office  
400 Fernandez Juncos Ave,  
San Juan, PR 00901-3299

**RE: Public Notice Number SAJ-2010-02881 (IP-EWG)**

Dear Mr. Rosado:

We are in receipt of the above Public Notice (PN) describing the Puerto Rico Electric Power Authority's (PREPA) request to obtain Department of the Army authorization for construction of a natural gas pipeline project that will pass through the municipalities of Peñuelas, Adjuntas, Utuado, Arecibo, Barceloneta, Manatí, Vega Alta, Vega Baja, Dorado, Toa Baja, Cataño, Bayamón, and Guaynabo, Puerto Rico. The pipeline, known as Via Verde, would be approximately 92 miles long and 24 inches in diameter with a right-of-way 150 feet wide. The total project area is approximately 1,672 acres and the pipeline would traverse 235 rivers and wetlands, resulting in an estimated impact to 369 acres of jurisdictional waters of the United States. The applicant's stated purpose for this project is to deliver an alternate fuel source to three existing electric power generating facilities located in Peñuelas, Arecibo, and Toa Baja.

After evaluating the information contained in the November 19, 2010 PN, the Environmental Protection Agency (EPA) believes that the applicant has not adequately demonstrated the need for the proposed pipeline in accordance with the Clean Water Act Section 404(b)(1) Guidelines requirements. The applicant must better document the need for a natural gas pipeline by presenting a more thorough alternatives analysis. Such analysis should evaluate other fuel sources other than natural gas since the stated purpose does not specify fuel type, the construction of an alternative terminal near one of the north coast power plants and the installation of a shorter length pipeline between Arecibo and Toa Baja.

EPA also has concerns regarding the use of directional drilling, particularly in karst terrain areas. In the past and on other projects in the Caribbean, directional drilling has resulted in major impacts when the drilling mud leaked into the surrounding environment. Due to the nature of karst terrain, we are concerned that any spill of drilling mud may contaminate groundwater or reach other aquatic resources which were not evaluated as part of this review.

If PREPA complies with the needs requirement of the Clean Water Act Section 404(b)(1) guidelines, the risks of directional drilling must be thoroughly analyzed. In conjunction with such analysis, PREPA must establish appropriate mechanisms to monitor

Internet Address (URL) • <http://www.epa.gov>

Recycled/Recyclable • Printed with Vegetable Oil Based Inks on Recycled Paper (Minimum 25% Postconsumer)

the drilling operations so that any escape of drilling mud is detected immediately as well as identify steps to be taken to minimize potential impacts of an escape.

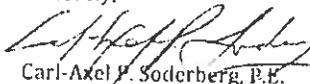
Furthermore, PREPA has not proposed adequate compensation to offset any impacts to jurisdictional areas which would result from the proposed project. While PREPA has proposed the use of horizontal directional drilling and vertical wall trenching, among other measures, to avoid and minimize impacts to wetlands, additional analysis to identify the nature and extent of both temporary and potentially permanent impacts at each jurisdictional area will be needed. We acknowledge that PREPA has offered to be vigilant of such impacts in order to immediately determine whether mitigation is required at any area along the project corridor; but, specific plans to address the need for mitigation must be identified in advance. EPA is also concerned about the criteria identified in the PN for determining whether mitigation sites will be successful. Finally with regard to mitigation, EPA believes that any compensatory mitigation required for permanent impacts should be at a minimum of a 1:1 ratio.

After carefully considering the challenges associated with this project, EPA recommends that an environmental impact statement (EIS) rather than an environmental assessment (EA) be prepared for this project. As highlighted in the PN, the project covers a large area and impacts many rivers and wetlands. Though the wetlands to be traversed are diverse in nature, all provide the important functions of flood water storage and filtration of contaminants that would otherwise reach other aquatic resources. These indirect impacts associated with the loss of wetlands also need to be evaluated. The PN states that the impacts of the project are expected to be temporary in nature; however, the impacts to threatened and endangered species could be extensive, as demonstrated by the fact that a formal versus informal Endangered Species Act (ESA) consultation is being undertaken for the project.

In summary, EPA believes that the Via Verde project could have substantial impacts to aquatic resources and that adequate compensatory mitigation has not been offered to offset such impacts. Furthermore, an EIS is needed to properly evaluate the project's impacts. Therefore, it is EPA's position that a permit for this project be held in abeyance until our concerns are addressed.

If you have any questions regarding this matter, please contact me at (787) 977-5801 or have your staff contact José Soto of the Multimedia Permits and Compliance Branch at (787) 977-5829.

Sincerely,



Carl-Axel P. Soderberg, P.E.

Director

Caribbean Environmental Protection Division

cc: USFWS - Boquerón, PR  
DNER - San Juan, PR  
PRPB - San Juan, PR  
PRIQB-San Juan, PR

**Re: Via Verde Letter - Revised After Phone Call**   
Barbara Finazzo to: Teresita Rodriguez  
Cc: Carl Soderberg, Grace Musumeci, Jose Soto, Daniel Montella

12/20/2010 08:18 PM

This looks ok to me. Will bring a copy for George. Thanks all for working this thru. It is appreciated.

Barbara  
Sent by EPA Wireless E-Mail Services  
Teresita Rodriguez

----- Original Message -----

From: Teresita Rodriguez  
Sent: 12/20/2010 05:42 PM AST  
To: Barbara Finazzo  
Cc: Carl Soderberg; Grace Musumeci; Jose Soto; Daniel Montella  
Subject: Via Verde Letter - Revised After Phone Call

Hi Barbara,

Attached you'll find a version of the Via Verde letter which we believe incorporates the points discussed during the phone conversation. Please, let us know if you are in agreement or if further discussion is needed before your and Carl's call with George P. tomorrow morning.

Thanks,

Tere

[attachment "Via Verde consensus language 2.docx" deleted by Barbara Finazzo/R2/USEPA/US]



Via Verde consensus language 1.docx  
Grace Musumeci to: Teresita Rodriguez

12/20/2010 04:46 PM

Hi Teri. I didn't write down what you had suggested so I may have missed the mark on that second paragraph. Please review the attached version which is what I took from the conversation.  
Thanks,  
Grace



- Via Verde consensus language 1.docx

Mr. José M. Rosado  
Deputy District Engineer for the Antilles  
U.S. Army Corps of Engineers  
Antilles Office  
400 Fernandez Juncos Ave,  
San Juan, PR 00901-3299

RE: Public Notice Number SAJ-2010-02881 (IP-EWG)

Dear Mr. Rosado:

We are in receipt of the above Public Notice (PN) describing the Puerto Rico Electric Power Authority's (PREPA) request to obtain Department of the Army authorization for construction of a natural gas pipeline project that will pass through the municipalities of Peñuelas, Adjuntas, Utuado, Arecibo, Barceloneta, Manati, Vega Alta, Vega Baja, Dorado, Toa Baja, Cataño, Bayamón, and Guaynabo, Puerto Rico. The pipeline, known as Via Verde, would be approximately 92 miles long and 24 inches in diameter with a right-of-way 150 feet wide. The total project area is approximately 1,672 acres and the pipeline would traverse 235 rivers and wetlands, resulting in an estimated impact to 369 acres of jurisdictional waters of the United States. The applicant's stated purpose for this project is to deliver an alternate fuel source to three existing electric power generating facilities located in Peñuelas, Arecibo, and Toa Baja.

After evaluating the information contained in the November 19, 2010 PN, the Environmental Protection Agency (EPA) believes that the applicant could better document the need for a natural gas pipeline by presenting a more thorough alternatives analysis. Such analysis should at least mention fuel sources other than natural gas since the purpose appropriately does not specify fuel type. EPA also has concerns regarding the use of directional drilling, particularly in karst terrain areas. In the past and on other projects in the Caribbean, directional drilling has resulted in major impacts when the drilling mud leaked into the surrounding environment. Due to the nature of karst terrain, we are concerned that any spill of drilling mud may contaminate groundwater or reach other aquatic resources which were not evaluated as part of this review.

If PREPA successfully demonstrates the need for the Via Verde pipeline and complies with the Clean Water Act Section 404 (b)(1) guidelines, the risks of directional drilling must be thoroughly analyzed. In conjunction with such analysis, PREPA must establish appropriate mechanisms to monitor the drilling operations so that any escape of drilling mud is detected immediately as well as identify steps to be taken to minimize potential impacts of an escape.

Furthermore, PREPA has not proposed adequate compensation to offset any impacts to jurisdictional areas which would result from the proposed project. While PREPA has proposed the use of horizontal directional drilling and vertical wall trenching, among other measures, to avoid and minimize impacts to wetlands, additional analysis to identify the nature and extent of both temporary and potentially permanent impacts at each jurisdictional area will be needed. We acknowledge that PREPA has offered to be vigilant of such impacts in order to immediately determine whether mitigation is required at any area along the project corridor; but, specific plans to address the need for mitigation must be identified in advance. EPA is also concerned about the criteria identified in the PN for determining whether mitigation sites will be successful. Finally with regard to mitigation, EPA believes that any compensatory mitigation required for permanent impacts should be at a minimum of a 1:1 ratio.

After carefully considering the challenges associated with this project, EPA recommends that an environmental impact statement (EIS) rather than an environmental assessment (EA) be prepared for this project. As highlighted in the PN, the project covers a large area and impacts many rivers and wetlands. Though the wetlands to be traversed are diverse in nature, all provide the important functions of flood water storage and filtration of contaminants that would otherwise reach other aquatic resources. These indirect impacts associated with the loss of wetlands also need to be evaluated. The PN states that the impacts of the project are expected to be temporary in nature; however, the impacts to threatened and endangered species could be extensive, as demonstrated by the fact that a formal versus informal Endangered Species Act (ESA) consultation is being undertaken for the project.

In summary, EPA believes that the Via Verde project could have substantial impacts to aquatic resources and that adequate compensatory mitigation has not been offered to offset such impacts. Furthermore, it is EPA's position that an EIS is needed to properly evaluate the project's impacts.

If you have any questions regarding this matter, please contact me at (787) 977-5870 or have your staff contact José Soto of the Multimedia Permits and Compliance Branch at (787) 977-5829.

Sincerely,

Carl-Axel P. Soderberg  
Director

cc: USFWS - Boquerón, PR  
DNER - San Juan, PR  
PRPB - San Juan, PR

**bcc:** J. Soto  
D. Montella  
G. Musumeci

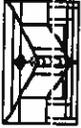


**VIA VERDE**

**Carl Soderberg to: Teresita Rodriguez**

**12/20/2010 01:07 PM**

**No me enviaron copia de la nueva version de la carta.**



**Fw: VIA Verde comment letter - REVISED**  
Daniel Montella to: Teresita Rodriguez

12/20/2010 11:26 AM

History: This message has been forwarded.

FYI. (! forgot - that I think Jose is out today)

- Dan

----- Forwarded by Daniel Montella/R2/USEPA/US on 12/20/2010 10:25 AM -----

From: Daniel Montella/R2/USEPA/US  
To: Jose Soto@EPA  
Date: 12/20/2010 09:36 AM  
Subject: Fw: VIA Verde comment letter - REVISED

I'm in all day (& acting for Mario D), so keep us advised. Note that if we want time to think about this a bit more, we could send a 3a letter, it buys us up to 25 more days with no obligation to go to the 3b level

- Dan

----- Forwarded by Daniel Montella/R2/USEPA/US on 12/20/2010 09:34 AM -----

From: David Pohle/R2/USEPA/US  
To: Daniel Montella/R2/USEPA/US@EPA  
Date: 12/17/2010 02:03 PM  
Subject: Fw: VIA Verde comment letter - REVISED

Please see below.

----- Forwarded by David Pohle/R2/USEPA/US on 12/17/2010 02:03 PM -----

From: Jose Soto/R2/USEPA/US  
To: David Pohle/R2/USEPA/US@EPA  
Date: 12/17/2010 01:42 PM  
Subject: Re: VIA Verde comment letter - REVISED

Right. But Carl has raised hell with the letter, so a lot may change by Monday. I believe Jose Font spoke to Barbara Finazzo already, and they agreed to discuss the letter some more... I'll keep you and Dan in the loop, but I don't see anything happening before Monday morning.

-----David Pohle/R2/USEPA/US wrote: -----  
To: Jose Soto/R2/USEPA/US@EPA  
From: David Pohle/R2/USEPA/US  
Date: 12/17/2010 01:29PM  
Subject: Re: VIA Verde comment letter - REVISED

Jose,

I presume you are making these changes. Correct?

Dave

Daniel Montella---12/17/2010 09:35:31 AM---From: Daniel Montella/R2/USEPA/US To: David Pohle/R2/USEPA/US@EPA, Jose Soto/R2/USEPA/US@EPA, Robert Montgomerie/R2/USEPA/US@EP

From: Daniel Montella/R2/USEPA/US  
To: David Pohle/R2/USEPA/US@EPA, Jose Soto/R2/USEPA/US@EPA, Robert Montgomerie/R2/USEPA/US@EPA  
Date: 12/17/2010 09:35 AM  
Subject: Re: VIA Verde comment letter - REVISED

Today's my flex day, so I don't want to spend the day editing a letter, so here are my thoughts:

This para is more of a NEPA issue, so I defer to our nepa people, we are generally not supposed to question the inherent "need" for something, like a pipeline, mall, or road, but instead focus of the range of alternatives available in which to accomplish the basic purpose.

After evaluating the available information, we believe that the applicant has failed to adequately address the need to construct the proposed pipeline. While we strongly endorse the use of alternative energy sources that result in lesser environmental impacts, we believe that other green sources of energy that minimize PREPA's dependence on fossil fuels, such as eolic and solar energy, should also be explored. EPA understands the potential limitations of these technologies in Puerto Rico due to space issues and the high demand for electric power. We also understand PREPA's desire to continue operating existing power plants rather than construct

new, expensive facilities. However, the use of liquefied natural gas (LNG) as an alternative to bunker fuel must be carefully weighed due to its handling and safety issues, which in this case pose significant challenges due to the distance and varied topography to be traversed by the proposed pipeline.

**Typo in this sentence (extra space):** If PREPA, manages to successfully demonstrate the need for the project and to bring the project to compliance with Section 404 (b)(1) guidelines, the risks of directional drilling should be thoroughly analyzed

**On the subject of mitigation, you might consider citing the new regs if we think the proposal is not in compliance them.**

Furthermore, PREPA has failed to propose adequate compensation to offset any impacts to jurisdictional areas which would result from the proposed project. The wetlands to be traversed by the project are diverse, but all provide important functions such as flood water storage and the filtering of contaminants which may otherwise reach other aquatic resources. While PREPA has conceptually proposed the use of horizontal directional drilling and vertical wall trenching, among other measures, as means to avoid and minimize impacts to wetland areas, we believe that additional analysis to identify the nature and extent of both temporary and potentially permanent impacts at each jurisdictional area are needed in order to fully evaluate the project. While PREPA has offered to be vigilant of such impact in order to immediately determine whether compensatory mitigation is required at any area along the project corridor, there is no specific plan to address the need for such compensatory mitigation areas, nor is there an adequate plan to establish them, other than lowering elevations and establishing herbaceous wetland vegetation. EPA is concerned about this proposal, since there is no way to determine how the process of identifying the need for compensatory mitigation will be carried out. In a similar manner, we are also concerned about the measures to be taken to determine whether any mitigation site will be successful based on the criteria identified in the public notice. Furthermore, EPA believes that any compensatory mitigation required for permanent impacts should be at a minimum of a 1:1 ratio as for mitigation

in the summary. I think that we might appear to be overstepping 404 a bit if we simply question the "justification" for alternate fuel. Unless we clearly make the call from a NEPA angle, I'd look at questioning the alt analysis, or say that the project purpose is so narrow as to preclude the proper examination of alts. Otherwise we open the door to the Corps discounting our comment as "outside of 404" w/o a 404(q) letter, they have no obligation of any further coordination with us

In summary, we consider that the project purpose, as stated by PREPA ("to deliver an alternate fuel source to three existing electric power generating facilities") has not been fully justified by the applicant.

- Dan

-----David Pohle/R2/USEPA/US wrote: -----  
To: Daniel Montella/R2/USEPA/US@EPA  
From: David Pohle/R2/USEPA/US  
Date: 12/16/2010 05:43PM  
Subject: Re: VIA Verde comment letter - REVISED

OK. Thanks. I was thinking that this is an RA letter.

Daniel Montella---12/16/2010 05:38:46 PM---they would finalize it, not us, but they would fax us a concurrence page for us to concur on (Mario)

From: Daniel Montella/R2/USEPA/US  
To: David Pohle/R2/USEPA/US@EPA  
Date: 12/16/2010 05:38 PM  
Subject: Re: VIA Verde comment letter - REVISED

they would finalize it, not us, but they would fax us a concurrence page for us to concur on (Mario) & then fax back. I'll look at the letter tonight/tomorrow morning, but I don't see the need to rush it out to door tomorrow

- Dan

-----David Pohle/R2/USEPA/US wrote: -----  
To: Daniel Montella/R2/USEPA/US@EPA  
From: David Pohle/R2/USEPA/US  
Date: 12/16/2010 05:31PM  
Subject: Re: VIA Verde comment letter - REVISED

If you intended to send me the letter to have it finalized, you accidentally did not include the attachment.

Daniel Montella---12/16/2010 05:17:19 PM---I understand he might prefer to have all comments by Sunday, 12/19, but our

deadline is 12/20. The

From: Daniel Montella/R2/USEPA/US  
To: Jose Soto/R2/USEPA/US@EPA  
Cc: Carl Soderberg/R2/USEPA/US@EPA, Grace Musumeci/R2/USEPA/US@EPA, Jose Font/R2/USEPA/US@EPA, Mario DeVicario/R2/USEPA/US@EPA, Stephanie Lamster/R2/USEPA/US@EPA, Teresita Rodriguez/R2/USEPA/US@EPA, David Pohle/R2/USEPA/US@EPA, Robert Montgomerie/R2/USEPA/US@EPA  
Date: 12/16/2010 05:17 PM  
Subject: Re: VIA Verde comment letter - REVISED

I understand he might prefer to have all comments by Sunday, 12/19, but our deadline is 12/20. The 404(q) MOA, (<http://water.epa.gov/lawsregs/guidance/wetlands/disproa.cfm>) which governs all PN responses - not just 404(q) letters, specifically says in Section 1, paragraph 7, (concerning all timeframes referred to in the MOA, including PN comment periods) that "...if the end of the specified time period falls on a weekend or a holiday, the last calendar day will be the first business day following the weekend or holiday."

- Dan

-----Jose Soto/R2/USEPA/US wrote: -----

To: Carl Soderberg/R2/USEPA/US@EPA, Jose Font/R2/USEPA/US@EPA, Teresita Rodriguez/R2/USEPA/US@EPA,  
Daniel Montella/R2/USEPA/US@EPA  
From: Jose Soto/R2/USEPA/US  
Date: 12/16/2010 03:30PM  
Cc: Mario DeVicario/R2/USEPA/US@EPA, Stephanie Lamster/R2/USEPA/US@EPA, Grace  
Musumeci/R2/USEPA/US@EPA  
Subject: VIA Verde comment letter - REVISED

Attached is a revised copy of the Via Verde comment letter. I received a message from Sindulfo Castillo at the Corps stressing the December 19 deadline. I hope the letter can be finalized by close-of-business tomorrow.

Dan, If you agree to this version, would you be so kind as to begin the concurrence process at your end? Thanks!

If you have any comments or need any additional information, please contact me at your convenience.

Jose Soto  
Multimedia Permits and Compliance Branch  
Phone: (787) 977-5829

AWL (Wed & Fri): 939-717-4858 or 787-250-8743

(See attached file: Via verde 2.docx)

[attachment "Via verde 2.docx" removed by Daniel Montella/R2/USEPA/US][attachment "Wd0000003.doc" deleted by David Pohle/R2/USEPA/US]



AWL end notification - No highlights because I had nothing, plus Via Verde is driving me nuts!  
Jose Soto to: Teresita Rodriguez

12/17/2010 04:56 PM

Have a good weekend!

Re: VIA Verde comment letter - REVISED

Daniel Montella

to:

Jose Soto

12/16/2010 06:17 PM

Cc:

Carl Soderberg, Grace Musumeci, Jose Font, Mario DelVicario, Stephanie Lamster, Teresita Rodriguez, David Pohle, Robert Montgomerie

Show Details

I understand he might prefer to have all comments by Sunday, 12/19, but our deadline is 12/20. The 404(q) MOA, (<http://water.epa.gov/lawsregs/guidance/wetlands/dispmoa.cfm>) which governs all PN responses - not just 404(q) letters, specifically says in Section 1, paragraph 7, (concerning all timeframes referred to in the MOA, including PN comment periods) that "...if the end of the specified time period falls on a weekend or a holiday, the last calendar day will be the first business day following the weekend or holiday."

- Dan

-----Jose Soto/R2/USEPA/US wrote: -----

To: Carl Soderberg/R2/USEPA/US@EPA, Jose Font/R2/USEPA/US@EPA, Teresita Rodriguez/R2/USEPA/US@EPA, Daniel Montella/R2/USEPA/US@EPA  
From: Jose Soto/R2/USEPA/US  
Date: 12/16/2010 03:30PM  
Cc: Mario DelVicario/R2/USEPA/US@EPA, Stephanie Lamster/R2/USEPA/US@EPA, Grace Musumeci/R2/USEPA/US@EPA  
Subject: VIA Verde comment letter - REVISED

Attached is a revised copy of the Via Verde comment letter. I received a message from Sindulfo Castillo at the Corps stressing the December 19 deadline. I hope the letter can be finalized by close-of-business tomorrow.

Dan, If you agree to this version, would you be so kind as to begin the concurrence process at your end? Thanks!

If you have any comments or need any additional information, please contact me at your convenience.

Jose Soto  
Multimedia Permits and Compliance Branch  
Phone: (787) 977-5829  
AWL (Wed & Fri): 939-717-4858 or 787-250-8743

(See attached file: Via verde 2.docx)

[attachment "Via verde 2.docx" removed by Daniel Montella/R2/USEPA/US]

Re: VIA Verde comment letter - REVISED

Stephanie Lamster

to:

Jose Soto

12/16/2010 05:23 PM

Cc:

Carl Soderberg, Daniel Montella, Grace Musumeci, Jose Font, Mario DelVicario, Teresita Rodriguez  
Show Details

Hi Jose,

I think the following changes should be made before the letter goes out:

- At the top of the second page it says "while PREPA sustains..." I think a better word than "sustains" would be "maintains" so it would read: "while PREPA maintains...."

- In the third paragraph on the second page, the sentence that says "While PREPA has offered to be vigilant of such impact..." I think it should say "impacts" (as opposed to impact).

Dan, I neither Grace nor myself will be in the office tomorrow so it is probably best to keep us off the concurrence.

Thanks,  
Stephanie

\*\*\*\*\*

Stephanie Lamster Brandt  
Endangered Species Coordinator  
U.S. Environmental Protection Agency  
Region 2  
(212) 637-3465

-----Jose Soto/R2/USEPA/US wrote: -----

To: Carl Soderberg/R2/USEPA/US@EPA, Jose Font/R2/USEPA/US@EPA, Teresita Rodriguez/R2/USEPA/US@EPA, Daniel Montella/R2/USEPA/US@EPA  
From: Jose Soto/R2/USEPA/US  
Date: 12/16/2010 03:30PM  
Cc: Mario DelVicario/R2/USEPA/US@EPA, Stephanie Lamster/R2/USEPA/US@EPA, Grace Musumeci/R2/USEPA/US@EPA  
Subject: VIA Verde comment letter - REVISED

Attached is a revised copy of the Via Verde comment letter. I received a message from Sindulfo Castillo at the Corps stressing the December 19 deadline. I hope the letter can be finalized by close-of-business tomorrow.

Dan, If you agree to this version, would you be so kind as to begin the concurrence process at your end? Thanks!

If you have any comments or need any additional information, please contact me at your convenience.

Jose Soto  
Multimedia Permits and Compliance Branch

Phone: (787) 977-5829  
AWL (Wed & Fri): 939-717-4858 or 787-250-8743

*(See attached file: Via verde 2.docx)*

[attachment "Via verde 2.docx" removed by Stephanie Lamster/R2/USEPA/US]



**VIA Verde comment letter - REVISED**

**Jose Soto** to: Carl Soderberg, Jose Font, Teresita Rodriguez, Daniel Montella  
Cc: Mario DeVicario, Stephanie Lamster, Grace Musumeci

12/16/2010 04:28 PM

Attached is a revised copy of the Via Verde comment letter. I received a message from Sindulfo Castillo at the Corps stressing the December 19 deadline. I hope the letter can be finalized by close-of-business tomorrow.

Dan, if you agree to this version, would you be so kind as to begin the concurrence process at your end? Thanks!  
If you have any comments or need any additional information, please contact me at your convenience.

Jose Soto  
Multimedia Permits and Compliance Branch  
Phone: (787) 977-5829  
AWL (Wed & Fri): 939-717-4858 or 787-250-8743



Via verde 2.docx

Mr. José M. Rosado  
Deputy District Engineer for the Antilles  
U.S. Army Corps of Engineers  
Antilles Office  
400 Fernandez Juncos Ave,  
San Juan, PR 00901-3299

Dear Mr. Rosado:

This is in response to permit application number SAJ-2010-02881 (IP-EWG) by Eng. Francisco E. Lopez on behalf of the Puerto Rico Electric Power Authority (PREPA) requesting authorization for the construction and installation of a 92 miles long, 24-inch diameter steel natural gas pipeline. The proposed pipeline would traverse the island of Puerto Rico from Peñuelas to Arecibo, continuing to the municipalities of Toa Baja and San Juan. The project area has been estimated to traverse approximately 1,672 acres. The proposed pipeline would cross 235 rives and/or wetland areas, resulting in an estimated impact to 369 acres of jurisdictional waters of the United States. This project is intended to deliver an alternate fuel source to three existing power plants.

Based upon our review of the information contained in the Public Notice for the project, it is the Environmental Protection Agency's (EPA) opinion that the applicant has not fully justified the need to impact aquatic resources along the proposed route, nor has he proposed adequate compensation for such impacts. Furthermore, EPA believes that an EIS is necessary to fully evaluate the impacts of this extensive project.

After evaluating the available information, we believe that the applicant has failed to adequately address the need to construct the proposed pipeline. While we strongly endorse the use of alternative energy sources that result in lesser environmental impacts, we believe that other green sources of energy that minimize PREPA's dependence on fossil fuels, such as eolic and solar energy, should also be explored. EPA understands the potential limitations of these technologies in Puerto Rico due to space issues and the high demand for electric power. We also understand PREPA's desire to continue operating existing power plants rather than construct new, expensive facilities. However, the use of liquefied natural gas (LNG) as an alternative to bunker fuel must be carefully weighed due to its handling and safety issues, which in this case pose significant challenges due to the distance and varied topography to be traversed by the proposed pipeline.

In addition to a proper justification for the use of LNG as an alternative fuel source, EPA has determined that other alternatives which may result in lesser impacts to

wetland areas appear to be available. While PREPA sustains that the construction of terminals to receive liquid natural gas (LNG) from tankers near the power plants were evaluated, no supporting data to determine the practicability of such alternative was presented. Since a facility for the delivery of LNG already exists at Peñuelas, PREPA should evaluate whether the construction of an alternative terminal near one of the north coast power plants, along with the installation of a shorter length of pipeline between Arecibo and Toa Baja, would satisfy the project purpose with less impacts to aquatic resources. While EPA agrees that impacts from the construction of a marine LNG terminal may also be significant, EPA estimates that suitable sites which may result in fewer impacts could be available and should be explored. In the case that a suitable location for such a facility is determined to be feasible, PREPA must also analyze impacts to the aquatic resources of the area and determine a way to offset such impacts through compensatory mitigation.

Upon our evaluation of the proposed project, concerns regarding the use of directional drilling methods to minimize impacts to jurisdictional waters of the United States arose, particularly in karst terrain areas. In the past, directional drilling has resulted in major impacts to the environment in other projects in the Caribbean when the drilling mud leaked into the surrounding environment. Due to the nature of karst terrain, we are concerned that any spill of drilling mud may contaminate groundwater or reach other jurisdictional waters which were not evaluated as part of this review. If PREPA, manages to successfully demonstrate the need for the project and to bring the project to compliance with Section 404 (b)(1) guidelines, the risks of directional drilling should be thoroughly analyzed. In conjunction with such analysis, PREPA must establish appropriate mechanisms to monitor the drilling operations so that any escape of drilling mud is detected immediately and steps are taken to minimize potential impacts.

Furthermore, PREPA has failed to propose adequate compensation to offset any impacts to jurisdictional areas which would result from the proposed project. The wetlands to be traversed by the project are diverse, but all provide important functions such as flood water storage and the filtering of contaminants which may otherwise reach other aquatic resources. While PREPA has conceptually proposed the use of horizontal directional drilling and vertical wall trenching, among other measures, as means to avoid and minimize impacts to wetland areas, we believe that additional analysis to identify the nature and extent of both temporary and potentially permanent impacts at each jurisdictional area are needed in order to fully evaluate the project. While PREPA has offered to be vigilant of such impact in order to immediately determine whether compensatory mitigation is required at any area along the project corridor, there is no specific plan to address the need for such compensatory mitigation areas, nor is there an adequate plan to establish them, other than lowering elevations and establishing herbaceous wetland vegetation. EPA is concerned about this proposal, since there is no way to determine how the process of identifying the need for compensatory mitigation will be carried out. In a similar manner, we are also concerned about the measures to be taken to determine whether any mitigation site will be successful based on the criteria identified in the public notice. Furthermore, EPA believes that any compensatory mitigation required for permanent impacts should be at a minimum of a 1:1 ratio.

After carefully considering the challenges associated with this project, EPA strongly feels that an Environmental Impact Statement (EIS) would be more appropriate than an Environmental Assessment (EA) for the proposed Via Verde Natural Gas Pipe Line. As highlighted in the public notice, the project covers 1,672 acres and will traverse 235 rivers and wetlands, covering 369 acres of jurisdictional waters of the United States. Additionally, 32 threatened or endangered species occur throughout Puerto Rico. The public notice states that the impacts of the project are expected to be temporary in nature, however the impacts on threatened and endangered species could be extensive, as demonstrated by the fact that a formal versus informal Endangered Species Act consultation will be completed for the project. In light of the fact that the consultation has not been completed, and given the span and scope of the project, EPA feels that an EIS is necessary to evaluate the full impact of the project.

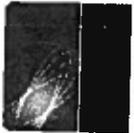
In summary, we consider that the project purpose, as stated by PREPA ("to deliver an alternate fuel source to three existing electric power generating facilities") has not been fully justified by the applicant. EPA also believes that the Via Verde project could have substantial and unacceptable impacts to the aquatic resources in its right of way, and that adequate compensatory mitigation has not been offered to offset such impacts. Furthermore, it is EPA's opinion that an EIS is needed in order to properly evaluate the project's impacts. Therefore EPA recommends the denial of a permit for this project in its current form.

If you have any questions regarding this matter, please contact me at (787) 977-5870 or have your staff contact José Soto, of the Multimedia Permits and Compliance Branch, at (787) 977-5829.

Sincerely,

Car-Axel P. Soderberg  
Director

cc: USFWS - Boquerón, PR  
DNER - San Juan, PR  
PRPB - San Juan, PR



**PREPA's Via Verde comment letter - URGENT!!!**

Jose Soto to: Carl Soderberg, Daniel Montella, Stephanie Lamster

Cc: Jose Font, Teresita Rodriguez

12/16/2010 12:59 PM

Hello to all!

Working for a 40th anniversary event last week, I lost track of the timing for the Via Verde comment letter. Luckily, we are still within the allotted time frame, which will expire on December 19. Since that date falls on a weekend, I believe we should try to send this by tomorrow afternoon. Please review the attached draft and provide any comments as soon as possible so that we can begin the concurrence process and have the letter signed by Carl. Thanks!

Jose Soto  
Multimedia Permits and Compliance Branch  
Phone: (787) 977-5829



via verde.docx

Mr. José M. Rosado  
Deputy District Engineer for the Antilles  
U.S. Army Corps of Engineers  
Antilles Office  
400 Fernandez Juncos Ave,  
San Juan, PR 00901-3299

Dear Mr. Rosado:

This is in response to permit application number SAJ-2010-02881 (IP-EWG) by Eng. Francisco E. Lopez on behalf of the Puerto Rico Electric power Authority (PREPA) requesting authorization for the construction and installation of a 92 miles long, 24-inch diameter steel natural gas pipeline. The proposed pipeline would traverse the island of Puerto Rico from Peñuelas to Arecibo, continuing to the municipalities of Toa Baja and San Juan. The project area has been estimated to approximately 1,672 acres. The proposed pipeline would cross 235 rives and/or wetland areas, resulting in an estimated impact to 369 acres of jurisdictional waters of the United States. This project is intended to deliver an alternated fuel source to three existing power plants.

Based upon our review of the information contained in the Public Notice, it is the Environmental Protection Agency's (EPA) opinion that the applicant has not fully justified the need to impact aquatic resources along the proposed route, nor has he proposed adequate compensation for such impacts. Furthermore, EPA believes that an EIS is necessary to fully evaluate the impacts of this extensive project.

After evaluating the available information, we believe that the applicant has failed to adequately address the need to construct the proposed pipeline. While we strongly endorse the use of alternative energy sources that result in lesser environmental impacts, we believe that other green sources of energy that minimize PREPA's dependence on fossil fuels, such as eolic and solar energy, should also be explored. EPA understands the potential limitations of these technologies in Puerto Rico due to space issues and the high demand for electric power. We also understand PREPA's desire to continue operating existing power plants rather than construct new, expensive facilities. However, the use of liquefied natural gas (LNG) as an alternative to bunker fuel must be carefully weighted due to its handling and safety issues, which in this case pose significant challenges due to distance and varied topography to be traversed by the proposed pipeline.

In addition to a proper justification for the use of LNG as alternative fuels source, EPA has determined that other alternatives which may result in lesser impacts to wetland

areas appear to be available. While PREPA sustains that the construction of terminals to receive liquid natural gas (LNG) from tankers near the power plants were evaluated, no supporting data to determine the practicability of such alternative was presented. Since a facility for the delivery of LNG already exists at Peñuelas, PREPA should evaluate whether the construction of an alternative terminal near one of the north coast power plants, along with the installation of a shorter length of pipeline between Arecibo and Toa Baja, would satisfy the project purpose with less impacts to aquatic resources. While EPA agrees that impacts from the construction of a marine LNG terminal may also be significant, EPA estimates that suitable sites which may result in fewer impacts could be available and should be explored. In the case that a suitable location for such a facility is determined to be feasible, PREPA must also analyze impacts to the aquatic resources of the area and determine a way to offset such impacts through compensatory mitigation.

Upon our evaluation of the proposed project, concerns regarding the use of directional drilling methods to minimize impacts to jurisdictional waters of the United States arose, particularly in karst terrain areas. In the past, directional drilling has resulted in major impacts to the environment in other projects in the Caribbean when the drilling mud leaked into the surrounding environment. Due to the nature of karst terrain, we are concerned that any spill of drilling mud may contaminate groundwater or reach other jurisdictional waters which were not evaluated as part of this review. If PREPA, manages to successfully demonstrate the need for the project and to bring the project to compliance with Section 404 (b)(1) guidelines, the risks of directional drilling should be thoroughly analyzed. In conjunction with such analysis, PREPA must establish appropriate mechanisms to monitor the drilling operations so that any escape of drilling mud is detected immediately and steps are taken to minimize and restore potential impacts.

Furthermore, PREPA has failed to propose adequate compensation to offset any impacts to jurisdictional areas which would result from the proposed project. The wetlands to be traversed by the project are diverse, but all provide important functions such as flood water storage and the filtering of contaminants which may otherwise reach other aquatic resources. While PREPA has conceptually proposed the use of horizontal directional drilling and vertical wall trenching, among other measures, as means to avoid and minimize impacts to wetland areas, we believe that additional analysis to identify the nature and extent of both temporary and potentially permanent impacts at each jurisdictional area are needed in order to fully evaluate the project. While PREPA has offered to be vigilant of such impact in order to immediately determine whether compensatory mitigation is required at any area along the project corridor, there is no specific plan to address the need for such compensatory mitigation areas, nor is there an adequate plan to establish them, other than lowering elevations and establishing herbaceous wetland vegetation. EPA is concerned about this proposal, since there is no way to determine how the process of identifying the need for compensatory mitigation will be carried out. In a similar manner, we are also concerned about the measures to be taken to determine whether any mitigation site will be successful based on the criteria exposed in the public notice. Furthermore, EPA believes that any compensatory mitigation required for permanent impacts should be at a minimum of a 1:1 ratio.

After carefully considering the challenges associated to this project, EPA strongly feels that an Environmental Impact Statement (EIS) would be more appropriate than an Environmental Assessment (EA) for the proposed Via Verde Natural Gas Pipe Line. As highlighted in the public notice, the project covers 1,672 acres and will traverse 235 rivers and wetlands, covering 369 acres of jurisdictional Water of the United States. Additionally, the project may affect 32 threatened or endangered species throughout Puerto Rico. The public notice states that the impacts of the project are expected to be temporary in nature, however the impacts on threatened and endangered species could be extensive, as demonstrated by the fact that a formal versus informal Endangered Species Act consultation will be completed for the project. In light of the fact that the consultation has not been completed, and given the span and scope of the project, EPA feels that an EIS is necessary to evaluate the full impact of the project.

In summary, we consider that the project purpose, as stated by PREPA ("to deliver an alternate fuel source to three existing electric power generating facilities") has not been fully justified by the applicant. EPA also believes that the Via Verde project could have substantial and unacceptable impacts to the aquatic resources in its right of way, and that adequate compensatory mitigation has not been offered to offset such impacts. Furthermore, it is EPA's opinion that an EIS is needed in order to properly evaluate the project's impacts. Therefore EPA recommends the denial of a permit for this project in its current form.

If you have any questions regarding this matter, please contact me at (787) 977-5870 or have your staff contact José Soto, of the Multimedia Permits and Compliance Branch, at (787) 977-5829.

Sincerely,

Car-Axel P. Soderberg  
Director

cc: USFWS - Boquerón, PR  
DNER - San Juan, PR  
PRPB - San Juan, PR

Corps Via Verde Letter  
Teresita Rodriguez to: Bonnie Bellow

04/27/2011 02:05 PM

This is the letter the Corps sent us in response to our April 1, 2011 letter.



Response to EPA Ltr.pdf



REPLY TO  
ATTENTION OF

DEPARTMENT OF THE ARMY  
JACKSONVILLE DISTRICT CORPS OF ENGINEERS  
P.O. Box 4970  
JACKSONVILLE, FLORIDA 32232-0019

APR 13 2011

Regulatory Division

Mr. Carl-Axel P. Soderberg  
Caribbean Environmental Protection Division  
Centro Europa Building, Suite 417  
1492 Ponce de Leon Avenue, Stop 22  
San Juan, PR 00907-4127

Dear Mr. Soderberg:

This letter acknowledges yours dated April 1, 2011, regarding the Via Verde Natural Gas Pipe Line proposal currently under review by Department of the Army permit application number SAJ-2010-02881. We were extremely surprised by the conclusions made by your agency considering that much information is still forthcoming on this project. We take exception to the contents of the letter, the analysis therein contained, and its conclusions.

It appears the EPA was provided with privileged information by the PREPA, as expressed repeatedly in your letter. It concerns me that the Corps was not involved in any of the exchanges of information and/or meetings that took place between the applicant and your agency, as the Corps has primary and ultimate authority over the Via Verde application. The applicant has not submitted all required information to properly address the alternative analysis, avoidance and minimization, compensatory mitigation, public interest, endangered species, historical properties, and impacts to federal projects. With that said, the Corps considers it to be premature to render a decision if the NEPA process could be concluded with a mitigated FONSI or an EIS, or even to imply that this project is permissible.

Thus I am requesting that privileged information in the hands of EPA be provided to the Corps. Please feel free to call me reference this subject at your convenience.

Sincerely,

Donald W. Kirford  
Chief, Regulatory Division

cc:  
FHWA  
FWS  
NMFS - ESA  
NMFS - EFH  
SHPO  
EPA Region 2

**Via Verde comment letters**  
Teresita Rodriguez to: Bonnie Bellow

04/27/2011 02:03 PM

Hi Bonnie,

Attached you will find the two comment letters EPA has sent to the Corps regarding the Via Verde project. I will also forward the Corps April 13, 2011 letter in a separate email. Please, let me know if you have any questions or need additional information.



VIA VERDE.pdf



VIA VERDE LETTER.pdf



**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY**  
CARIBBEAN ENVIRONMENTAL PROTECTION DIVISION  
CENTRO EUROPA BUILDING, SUITE 417  
1492 PONCE DE LEON AVENUE, STOP 22  
SAN JUAN, PR 00907-4127

APR 01 2011

Sindulfo Castillo  
Chief, Antilles Regulatory Section  
Jacksonville District Corps of Engineers  
400 Fernández Juncos Avenue  
San Juan, Puerto Rico 00901-3299

Re: Vía Verde Natural Gas Pipeline; SAJ-2010-02881 (IP-EWG)

Dear Mr. Castillo:

This is in further reference to the Vía Verde Natural Gas Pipeline project proposed by the Puerto Rico Electric Power Authority (PREPA). Since our December 23, 2010 letter, additional information has been provided by PREPA and its consultants to address the U.S. Environmental Protection Agency's (EPA's) concerns. In addition, the applicant met with EPA representatives on several occasions to present and/or discuss such additional information, including chapters four and six of the local Environmental Impact Statement (EIS) for the project, plus several summary sections.

In our previous letter, EPA objected to the issuance of a Department of the Army permit for the project based on the lack of a detailed alternatives analysis, concerns regarding the use of directional drilling, the lack of suitable compensatory mitigation to address wetlands impacts, and the need to complete a federal Environmental Impact Statement (EIS) for the project. The comments provided herein are based on a thorough review of the additional information furnished by the applicant and its consultants.

To address the alternatives analysis issue, PREPA provided information on the alternatives contained in the local EIS prepared for the project. These included a no action alternative, the construction of a natural gas import terminal on the north coast of the island, tanker and buoy systems and/or transfer platforms for receipt of natural gas at PREPA's Palo Seco, San Juan and Cambalache plants, gravity based systems, floating storage and re-gasification units, and several terrestrial alignments for a natural gas pipeline system. While this represents a significant milestone in the review of alternatives for the project, the documents provided included an additional option: the use of natural gas at PREPA's existing Costa Sur and Aguirre power generating facilities on the south coast of Puerto Rico, combined with the conversion of the nearby Las Mareas Port facility to receive liquefied natural gas (LNG) as means to achieve significant energy production using an alternative fuel. This project, formerly known as the "Gasoducto del Sur", was previously considered by PREPA as means to address the diversification of the electric power supply methods in Puerto Rico. The project was briefly

mentioned in response to comments from the U.S. Army Corps of Engineers and the Puerto Rico Engineers and Surveyors Association. EPA believed that PREPA's dismissal of this alternative was inconsistent with the current project's overall project purpose, since it would provide PREPA with an alternative fuel option for two major generating facilities with lesser environmental impacts. However, after evaluating additional information furnished by the applicant's environmental consultant, it appears that *Gasoducto del Sur* was geared to provide natural gas to the combined cycle units located at the Aguirre Power Plant with a 592 MW operational capacity. On the other hand, Via Verde would provide natural gas and an increase in PREPA's operational capabilities to a total of 1,519 MW. Moreover, the Via Verde Project would provide PREPA with the flexibility to operate the most efficient power generating units on the island, which are located on the north coast, through the monitoring of each unit's rated capacity, individual fuel consumption and the type of fuel that fosters the lowest power generating costs. The Via Verde project would thus allow a more efficient use of such power generating units, allowing reductions in the transmission losses, as observed in other PREPA electric power transfer systems. EPA also defers to PREPA's expertise on the fact that "*Gasoducto del Sur*" may destabilize the island's electrical system, resulting in frequent collapses of the electric network of Puerto Rico. Upon further consideration of the supplied information, EPA believes that the alternatives analysis issues have been addressed by the applicant.

In regards to EPA's concerns about the use of directional drilling in wetlands and karst terrain, PREPA provided additional information regarding best management practices, the monitoring to be performed and the presence of specialized personnel during drilling operations to monitor the process and stop work immediately if any escape of bentonite mud into karst formations and/or waters of the United States is suspected. In addition, during a March 2, 2011 meeting at the Corps of Engineers, PREPA's consultants announced that directional drilling operations in karst terrain would be greatly reduced, since the pipeline route would be altered to circumvent haystack hills ("*mogotes*"), light equipment would be used, and a pipeline pull method would be required to further reduce impacts. We commend PREPA on these impact reduction measures, and now believe that best management practices, combined with adequate monitoring by qualified personnel should minimize any undesirable impacts from directional drilling. EPA recommends that a special condition to the Corps of Engineers permit, requiring the presence of a trained independent geologist/engineer with expertise on karst terrain in the field at all times during drilling operations to closely monitor the process and stop work if any issues or abnormalities are detected be included. We also urge the Corps to consider additional special conditions requiring the avoidance of major karst formations during pipeline construction.

In our previous letter, we commented on the unsuitability of the initially proposed compensation for unavoidable impacts to aquatic resources. Additional information supplied by PREPA to address this issue includes, among others, a commitment to coordinate with the Department of Natural and Environmental Resources (DNER) to develop suitable on-site mitigation in a 3:1 ratio for any unavoidable impacts to aquatic resources. While PREPA has repeatedly stated that a suitable mitigation plan would be developed in a timely manner, EPA believes that such plan must be reviewed and accepted by the Corps of Engineers, EPA and all

natural resource agencies before construction of the project begins. In addition, questions remain regarding the concept of "temporary impacts". PREPA expresses that after placing the pipeline, areas would be immediately brought back to initial conditions so that natural re-colonization by prevailing vegetation begins. However, sections of the local Environmental Impact Statement (EIS) prepared for the project indicate a willingness to enhance areas by suppressing invasive and/or nuisance species at locations such as Caño Tiburones or other ecologically valuable areas. If PREPA plans to pursue such wetlands enhancement options, the areas need to be identified, quantified, and a specific plan to address local conditions must be developed. Additional details on the management/maintenance methods to be used need to be clarified. EPA believes that any mitigation and/or wetlands enhancement plans should include performance/success rates to evaluate their suitability and long term viability. Furthermore, please be advised that on January 14, 2011 the Council on Environmental Quality (CEQ) provided guidance for departments and agencies of the Federal government on mitigation and monitoring of activities. As highlighted in this guidance, "Mitigation measures included in the project design are integral components of the proposed action, are implemented with the proposed action, and therefore should be clearly described as part of the proposed action." Therefore, EPA believes that a more robust description of the mitigation and monitoring plans needs to be developed to ensure that this federal objective is fulfilled. The guidance further states that "Mitigation commitments needed to lower the level of impacts so that they are not significant should be clearly described in the mitigated FONSI [finding of no significant impact] document and in any other relevant decision documents related to the proposed action." Therefore, any Corps-issued Environmental Assessment coupled with a FONSI for this project should include that information. We look forward to receiving and reviewing the mitigation plan documents as they become available.

One additional remaining concern for EPA is the proposed project's right-of-way (ROW). At various times throughout the documents supplied by PREPA, the ROW is described as being 100, 150 or 50 feet wide. The applicant's consultant has provided a brief description of the ROW categories, but we would appreciate a written, detailed explanation of the concept and its implementation along the final pipeline route in order to include it in the project review file for future reference.

In summary, we believe PREPA has addressed most of our major concerns regarding the Via Verde Natural Gas Pipeline project. However, additional information is required to fully comply with the Clean Water Act, Section 404(b)(1) Guidelines requirements. We, therefore, condition our approval of the proposed project to receiving, for review and approval, a comprehensive mitigation plan which addresses compensation for both, temporary and permanent impacts to wetlands and a detailed explanation of the project's variable right-of-way before project construction activities begin. In addition, we request that the permit includes a special condition requiring the presence of independent qualified personnel during drilling operations to closely monitor the process and stop work if any issues or abnormalities are detected.

If you have any questions or require additional information on this matter, please contact Ms. Teresita Rodríguez, Chief of the Multimedia Permits and Compliance Branch (MPCB), at 787-977-5864 or Mr. José Soto, of the MPCB, at 787-977-5829.

Sincerely,



Carl-Axel B. Soderberg  
Director

CC: USFWS-Cabo Rojo, PR  
DNER- San Juan, PR  
PRPB- San Juan, PR  
PREQB- San Juan, PR



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
OFFICE OF REGIONAL COUNSEL  
CENTRO EUROPA BUILDING, SUITE 207  
1492 PONCE DE LEON AVENUE, STOP 22  
SAN JUAN, PR 00907-4127

December 21, 2010

Mr. José M. Rosado  
Deputy District Engineer for the Antilles  
U.S. Army Corps of Engineers  
Antilles Office  
400 Fernandez Juncos Ave,  
San Juan, PR 00901-3299

**RE: Public Notice Number SAJ-2010-02881 (IP-EWG)**

Dear Mr. Rosado:

We are in receipt of the above Public Notice (PN) describing the Puerto Rico Electric Power Authority's (PREPA) request to obtain Department of the Army authorization for construction of a natural gas pipeline project that will pass through the municipalities of Peñuelas, Adjuntas, Utuado, Arecibo, Barceloneta, Manatí, Vega Alta, Vega Baja, Dorado, Toa Baja, Cataño, Bayamón, and Guaynabo, Puerto Rico. The pipeline, known as Vía Verde, would be approximately 92 miles long and 24 inches in diameter with a right-of-way 150 feet wide. The total project area is approximately 1,672 acres and the pipeline would traverse 235 rivers and wetlands, resulting in an estimated impact to 369 acres of jurisdictional waters of the United States. The applicant's stated purpose for this project is to deliver an alternate fuel source to three existing electric power generating facilities located in Peñuelas, Arecibo, and Toa Baja.

After evaluating the information contained in the November 19, 2010 PN, the Environmental Protection Agency (EPA) believes that the applicant has not adequately demonstrated the need for the proposed pipeline in accordance with the Clean Water Act Section 404(b)(1) Guidelines requirements. The applicant must better document the need for a natural gas pipeline by presenting a more thorough alternatives analysis. Such analysis should evaluate other fuel sources other than natural gas since the stated purpose does not specify fuel type, the construction of an alternative terminal near one of the north coast power plants and the installation of a shorter length pipeline between Arecibo and Toa Baja.

EPA also has concerns regarding the use of directional drilling, particularly in karst terrain areas. In the past and on other projects in the Caribbean, directional drilling has resulted in major impacts when the drilling mud leaked into the surrounding environment. Due to the nature of karst terrain, we are concerned that any spill of drilling mud may contaminate groundwater or reach other aquatic resources which were not evaluated as part of this review.

If PREPA complies with the needs requirement of the Clean Water Act Section 404(b)(1) guidelines, the risks of directional drilling must be thoroughly analyzed. In conjunction with such analysis, PREPA must establish appropriate mechanisms to monitor

the drilling operations so that any escape of drilling mud is detected immediately as well as identify steps to be taken to minimize potential impacts of an escape.

Furthermore, PREPA has not proposed adequate compensation to offset any impacts to jurisdictional areas which would result from the proposed project. While PREPA has proposed the use of horizontal directional drilling and vertical wall trenching, among other measures, to avoid and minimize impacts to wetlands, additional analysis to identify the nature and extent of both temporary and potentially permanent impacts at each jurisdictional area will be needed. We acknowledge that PREPA has offered to be vigilant of such impacts in order to immediately determine whether mitigation is required at any area along the project corridor; but, specific plans to address the need for mitigation must be identified in advance. EPA is also concerned about the criteria identified in the PN for determining whether mitigation sites will be successful. Finally with regard to mitigation, EPA believes that any compensatory mitigation required for permanent impacts should be at a minimum of a 1:1 ratio.

After carefully considering the challenges associated with this project, EPA recommends that an environmental impact statement (EIS) rather than an environmental assessment (EA) be prepared for this project. As highlighted in the PN, the project covers a large area and impacts many rivers and wetlands. Though the wetlands to be traversed are diverse in nature, all provide the important functions of flood water storage and filtration of contaminants that would otherwise reach other aquatic resources. These indirect impacts associated with the loss of wetlands also need to be evaluated. The PN states that the impacts of the project are expected to be temporary in nature; however, the impacts to threatened and endangered species could be extensive, as demonstrated by the fact that a formal versus informal Endangered Species Act (ESA) consultation is being undertaken for the project.

In summary, EPA believes that the Via Verde project could have substantial impacts to aquatic resources and that adequate compensatory mitigation has not been offered to offset such impacts. Furthermore, an EIS is needed to properly evaluate the project's impacts. Therefore, it is EPA's position that a permit for this project be held in abeyance until our concerns are addressed.

If you have any questions regarding this matter, please contact me at (787) 977-5801 or have your staff contact José Soto of the Multimedia Permits and Compliance Branch at (787) 977-5829.

Sincerely,



Carl-Axel P. Soderberg, P.E.  
Director

Caribbean Environmental Protection Division

cc: USFWS - Boquerón, PR  
DNER - San Juan, PR  
PRPB - San Juan, PR  
PREQB-San Juan, PR

**Fw: [POSSIBLE SPAM] Casa Pueblo to EPA - 'Via Verde'**  
Teresita Rodriguez to: Iglesias.Ariel

04/11/2011 10:17 AM

----- Forwarded by Teresita Rodriguez/R2/USEPA/US on 04/11/2011 10:17 AM -----

**From:** Carl Soderberg/R2/USEPA/US  
**To:** Teresita Rodriguez/R2/USEPA/US@EPA  
**Cc:** Jose Font/R2/USEPA/US@EPA  
**Date:** 04/11/2011 08:47 AM  
**Subject:** Fw: [POSSIBLE SPAM] Casa Pueblo to EPA - 'Via Verde'

preparar contestacion

----- Forwarded by Carl Soderberg/R2/USEPA/US on 04/11/2011 08:46 AM -----

**From:** Judith Enck/R2/USEPA/US  
**To:** Carl Soderberg/R2/USEPA/US  
**Date:** 04/10/2011 10:43 AM  
**Subject:** Fw: [POSSIBLE SPAM] Casa Pueblo to EPA - 'Via Verde'

Sent by EPA Wireless E-Mail Services

**From:** Arturo Massol [amassol@gmail.com]  
**Sent:** 04/10/2011 09:39 AM AST  
**To:** Judith Enck  
**Cc:** <Enrique.Fernandez@mail.house.gov>; <Sindulfo.Castillo@usace.army.mil>; Gerson Beauchamp <gerson@ece.uprm.edu>; CASA PUEBLO <casapueb@coqui.net>  
**Subject:** [POSSIBLE SPAM] Casa Pueblo to EPA - 'Via Verde'

Dear Judith Enck:

The EPA analysis that endorses the 'Via Verde' project is supported by a number of arguments that contain errors, omissions, and a misguided investigation. Either by accident or alternative motivations, EPA has failed with its responsibility by

endorsing a clearly corrupted proposal (just check the local headlines of the past week while additional issues are still to come).

We are requesting an investigation including the direct role of Carl Soderberg and strongly request EPA to remove its conditional endorsement for the Via Verde project immediately. Neither EPA or the USCOE has the necessary information to reach any kind of endorsement for this proposal, on the contrary, the denial of the Joint Permit seems to be the only path.

Your ambiguous position is currently use by the local government to justify an expedite process of contracting without the necessary permits. Please see enclosed letter.

Do not hesitate to contact us for further information.

Arturo Massol-Deyá, Ph.D.  
Gerson Beauchamp, Ph.D. Electrical Engineer



Alexis Massol-González, Goldman Prize Winner 2002 [letterEPA\\_April\\_08.pdf](#)