RESOLUTION NO. 6400

WHEREAS, the Sarpy County Station Unit 4B (SC4B) power turbine was inspected and found to be in need of repair to ensure a reliable and resilient supply of electricity for the District’s customers; and

WHEREAS, the District’s Engineer has certified that the original equipment manufacturer, Pratt & Whitney Power Systems, Inc. (Pratt & Whitney), is the only available source of supply for the parts and services needed to repair the “B” power turbine because the repair work involves proprietary information held by Pratt & Whitney and only Pratt & Whitney has the tooling, parts, and technical expertise to perform the necessary repairs; and

WHEREAS, pursuant to Nebraska Revised Statute Section 70-637 (as amended), and upon approval of the Engineer’s Certification by the Board of Directors, the District may negotiate and enter into a contract or contracts related to such project without sealed bidding.

NOW, THEREFORE, BE IT RESOLVED by the Board of Directors of the Omaha Public Power District that:

1. The Engineer’s Certification that Pratt & Whitney Power Systems, Inc. is the only available source of supply for the parts and services needed to repair the “B” power turbine at Sarpy County Station Unit 4 is hereby approved.

2. Management is hereby authorized and directed to negotiate and enter into the necessary contract or contracts with Pratt & Whitney to supply parts and specialized services for the repair of the Sarpy County Station Unit 4B power turbine, subject to review and approval of the final contract(s) by the District’s General Counsel.

3. The notice required by Nebraska Revised Statutes Section 70-637 shall be published in the Omaha World Herald, or other similar newspaper of general circulation.
BOARD OF DIRECTORS

November 10, 2020

ITEM

Sarpy County Station Unit 4B Power Turbine Repairs

PURPOSE

Provide services to repair Sarpy County Station Unit 4B power turbine.

FACTS

a. Sarpy County Station Unit 4B was inspected in October, 2020 and found to have power turbine damage that must be repaired before the unit may be returned to service.

b. The needed refurbishment, design modification, and repair work is proprietary and only the original equipment manufacturer, Pratt & Whitney Power Systems, Inc., is known to have the tooling, parts and expertise to perform the necessary repairs.

c. The District’s engineer has certified the proprietary nature of the work and that Pratt & Whitney Power Systems, Inc. is the only available source of supply for this work.

ACTION

Approval of the Engineer’s Certificate and authorization for Management to negotiate and enter into a contract with Pratt & Whitney Power Systems, Inc. for repair of the Sarpy County Station Unit 4B power turbine.

RECOMMENDED:  

Mary J. Fisher  
Vice President – Energy Production and Nuclear Decommissioning

APPROVED FOR BOARD CONSIDERATION:

Timothy J. Burke  
President and Chief Executive Officer

Attachments: Letter of Recommendation  
Engineer’s Certificate  
Legal Opinion  
Resolution
DATE: October 26, 2020

FROM: S.A. Eidem

TO: M.J. Fisher

SUBJECT: Sarpy County Station Unit 4 "B" Power Turbine Repairs

1.0 GENERAL

OPPD utilizes regular internal inspections of the combustion turbine fleet to detect damage that, if not addressed, could lead to catastrophic failure of the major components. Sarpy County Station Unit 4 (SC4) was removed from service on October 5th, 2020 to perform this internal inspection. The inspection revealed significant damage to the internal rotating and stationary components of the “B” power turbine, one of the two power turbines required to run SC4 at full rated load. The damage was caused by internal component(s) of the power turbine breaking free and moving through the unit during operation.

The “B” power turbine has been removed from service to prevent further damage or failure and will be sent to the original equipment manufacturer for disassembly, inspection, and evaluation of the repairs required. Until the “B” power turbine is repaired, the unit can only operate at half capacity, approximately 24 MW.

The availability of the full accredited capacity of SC4 is critical for the District to meet obligations within the Southwest Power Pool integrated market as well as local system reliability.

Under the current plan, the unit will be disassembled, inspected, and repaired to restore the “B” power turbine. In addition, the root cause for the damage to the unit will be further investigated and addressed.

Contracts for parts, field assistance, and specialized services are expected to exceed $500,000.

Compliance with the sealed bidding requirements of the Nebraska Statutes is impractical and not in the public’s best interest. PW Power Systems, the original equipment manufacturer, has proprietary information regarding repair of these components. They are the only vendor with the tooling and technical expertise to perform the necessary repairs. While the exact cost of repair will not be known until a complete disassembly and detailed inspection has been performed, the estimated total cost of the repairs is $1,600,000.
2.0 RECOMMENDATION

An Engineer’s Certificate of the above statements has been prepared. Approval of that Certification is recommended. We request the Board of Directors to approve the Engineer’s Certification and to authorize management to negotiate a sole source contract with PW Power Systems for the repair of the SC4 “B” power turbine.

Scott A. Eidem
S.A. Eidem, P.E.
Director, Engineering Services
Energy Production and Nuclear Decommissioning
ENGINEER’S CERTIFICATE

Sarpy County Station Unit 4 was taken out of service for routine inspections on October 5th, 2020. During that inspection, components of the “B” power turbine were discovered to be damaged. The power turbine has been removed from service and will be inspected by the original equipment manufacturer, Pratt & Whitney Power Systems, Inc. (Pratt & Whitney) to determine a repair scope. Once the evaluation is complete and necessary repairs are identified, the District will need to issue a contract to make these repairs. As long as the power turbine is out of service, Sarpy County Unit No. 4 will only be able to generate electricity at half capacity.

The undersigned professional engineer employed by the Omaha Public Power District certifies that Pratt & Whitney, the original equipment manufacturer, is the only available source of supply for the parts and services needed to repair the “B” power turbine, because the repair work involves proprietary information held by Pratt & Whitney. Additionally, only Pratt & Whitney has the tooling, parts, and technical expertise to perform the necessary repairs.

Pursuant to Section 70-637 of the Revised Statutes of Nebraska, the Board of Directors is requested to approve this Engineer’s Certificate and authorize Management to negotiate and enter into a contract to repair and/or replace the damaged power turbine parts for Sarpy County Station Unit 4 without compliance with the sealed bidding requirements of Sections 70-637 of the Revised Statutes of Nebraska.

I, Clinton J. Zavadil (registered Professional Engineer in the State of Nebraska), certify the above to be true and correct to the best of my knowledge and belief.

Clinton J. Zavadil, P.E.  
10/28/2020  
Date
October 26, 2020

Omaha Public Power District
444 South 16th Street
Omaha, NE 68102

RE: Engineer's Certificate for repair of Sarpy County Station Unit No. 4 "B" power turbine

Ladies and Gentlemen:

We have reviewed the Engineer's Certificate of Clinton J. Zavadil, P.E., a professional engineer employed by the District. Mr. Zavadil's Engineer's Certificate explains that the "B" power turbine of Sarpy County Station Unit No. 4 was inspected in October 2020 and found to have been damaged, and now requires repair.

Mr. Zavadil's Engineer's Certificate certifies that Pratt & Whitney Power Systems, Inc. ("Pratt & Whitney") is the original equipment manufacturer for the Unit No. 4 power turbine and is the only available source of supply for the parts and services needed to repair the turbine. He further certifies that Pratt & Whitney has proprietary information, tooling, parts, and technical expertise that make it the only available source for the performance of the necessary repairs.

Section 70-637(6) of the Nebraska Revised Statutes authorizes the District to purchase replacement parts or services for generating units from original equipment manufacturers without advertising for sealed bids, upon appropriate certification by an engineer for the District. In our opinion, Mr. Zavadil's Engineer's Certificate meets the requirements of Section 70-637(6) and may be approved by the Board of Directors.

Section 70-637(6) requires that a written statement containing the Engineer's Certificate and a description of the purchase from the original equipment manufacturer must be submitted to the District's Board of Directors for approval at the next scheduled meeting of the Board. After receipt of the Certificate, but not necessarily before the Board review, the District must publish notice of such purchase once a week for at least three (3) consecutive weeks in one or more newspapers of general circulation in the District and in any other periodicals that may have been selected by the Board.
The District may proceed to complete this sole source purchase subject to compliance with Section 70-637(6) as outlined above. We recommend review and approval of the contract with the manufacturer by the District's General Counsel.

Very truly yours,

Stephen M. Bruckner
FOR THE FIRM