

Should this item be pulled from the Consent Agenda the following motion is suggested:

POSSIBLE MOTION

I MOVE TO 1) approve the use of funds from Blue Lake proceeds in the amount of \$516,286.26 for Capital Project #90672 to complete the replacement of Medvejie Substation and 2) authorize the Municipal Administrator to execute a purchase order to ABB Inc. in the amount of \$82,500 for purchase and installation of a circuit breaker for the Medvejie Substation Project.



Memorandum

July 18, 2015

To: Mark Gorman, Municipal Administrator
From: Jeff Wheeler, Acting Utility Director - Electric Department
Tony Bird, T&D System Manager – Electric Department
Subject: Transfer of Funds to Complete Medvejie Substation

Request

The City and Borough of Sitka Electric Department requests additional appropriation in the amount of \$516,286.26 for Capital Project #90672 – Medvejie Substation.

Purpose:

This request would transfer funding to the complete replacement of a critical part of our infrastructure and insure the continued reliable supply of electricity to a significant component of our local economy.

Background:

Medvejie Substation which supplies power to the NSRAA hatchery in Bear Cove has been designated a priority for replacement to replace its failing electrical equipment and to update environmental compliance issues. A replacement power transformer was purchased 5 years ago and put in storage while other vital infrastructure improvements were transpiring and until we could identify a funding source. We have estimated total costs to complete this work to be \$594,748.10.

Recommendation:

Recommend Assembly approve the use of funds from Blue Lake Bond proceeds in the amount of \$516,286.26 for Capital Project #90672 to complete replacement of Medvejie Substation. The appropriation increase is included in the budget ordinance.

Cc: Jay Sweeney, CFAO
Sara Peterson, Municipal Clerk

Sara Peterson

Subject: FW: Medevejie estimate for completion

From: Anthony [<mailto:anthonym@cityofsitka.com>]
Sent: Tuesday, June 23, 2015 10:12 AM
To: jeffw@cityofsitka.com
Cc: 'Andy Eggen'; retha@cityofsitka.com; 'Erin Clay'
Subject: Medevejie estimate for completion

Jeff,

The completion of the Medevejie substation will require the materials quote provided by Mr. Carson of Northstar Engineering, as well as labor for installation of the new apparatus and associated materials. The labor costs must also include removal of the old substation and associated structures made obsolete by the new facility. We will also require a crane to be on site for transformer setting in the containment. This crane will not be available in Sitka and must be brought in from Juneau. At this time it appears labor will be the number one cost associated with this project. I have listed below the estimated costs for completion.

MATERIALS ESTIMATE

1. The estimated costs to finish the design and provide engineering support during construction are as follows:

May and June Engineering Services Presently Not Billed- \$13,500

Fence and Grounding Plan and Details- \$2,200

Addition of Station Service Transformer, 100 A Pad Switch with CTs, and 480 V Transformer to Plans- \$2,200

Site Visit and Grounding Study- \$4,400

Transformer and AC Station Service Wiring Diagrams- \$3,300

Engineering Support during Construction and Testing- \$4,400

TOTAL \$29,500

2. The estimated costs of major equipment that is required for the project are:

Turner Three Way 69 kV Switches- Already Purchased

ABB 72PM31-12 Circuit Breaker with SEL 787 Relay- \$72,000

69 kV Voltage Transformer- Existing Trench VT removed from Jarvis Street

69 kV V Type Disconnect Switches- \$8,900

125 VDC Battery Power System- \$8500

63SP Sudden Pressure Relief Device with Seal-In Relay and Tank Cover Installation- \$5,000

900/910 rapid pressure rise relay with the 909 seal-in relay for this application. relays and the new tank cover would be about \$4,000

100 A Three Phase Pad Mounted 15 kV Switch with CTs- \$22,000 (Stainless Steel Enclosure)

Station Service and Three Phase 480 V Power Transformers- \$3,293.52 + \$15,429.90

100 A AC Panel with Outdoor Enclosure- \$1,000

Sump Pump, Piping and Valves- \$1,000

Oil Stop Valve System- \$4,000 (I will send some sales literature)

TOTAL \$145,123.42

3. The grand total for remaining major equipment and engineering services is estimated to be:

GRAND TOTAL \$174,623.42

LABOR ESTIMATE

6 weeks for installation of new substation and removal of old substation and associated structures. \$240,000

CRANE ESTIMATE

Crane to be mobilized from Juneau, \$28,000

FENCING

Fencing to include associated gates signage and grounding \$32,000

WASHED ROCK

Rock used for containment and pad 6" thick to 3' outside perimeter of substation fence. \$21,000

CONTINGENCY 20%

TOTAL ESTIMATE \$594,748.10

Anthony Bird

T&D System Manager

City of Sitka,

105 Jarvis St.

Sitka, AK 99835

anthonym@cityofsitka.com

907-747-4008



Memorandum

July 18, 2015

To: Mark Gorman, Municipal Administrator
From: Jeff Wheeler, Acting Utility Director - Electric Department
Tony Bird, T&D System Manager – Electric Department
Subject: Circuit Breaker – Medvejie Substation (90672)

Request:

In accordance with SGC 3.16.060(I) the City and Borough of Sitka Electric Department requests approval to purchase a 69,000 volt circuit breaker from ABB Inc. We have received budgetary pricing for a 72PM31-12 C100 breaker in the amount of \$72,000. I further request a contingency of \$10,500 to cover shipping, installation and commissioning assistance. Total cost, including contingency is \$82,500. The lead time for this equipment is 5 to 6 months.

Purpose:

This high voltage breaker is specialized equipment for our Medvejie Substation Project and is a standardized component of our enhanced and more reliable substations. The upgraded control and coordination between our various substations is achievable with this specific manufacturer's equipment and the other relaying and control apparatus that we will be installing with it. The acquisition of this critical component is necessary for the completion of this project.

Background:

Medvejie Substation which supplies power to the NSRAA hatchery in Bear Cove has been designated a priority for replacement to replace its failing electrical equipment and to update environmental compliance issues.

Fiscal Note:

Sufficient funds are available in the Medvejie Substation project 90672 pending approval of additional funding requested.

Recommendation:

Recommend Assembly authorize the Municipal Administrator to execute a purchase order on behalf of the Assembly to ABB for breaker type 72PM31-12 C100 in the amount of \$82,500 for the Medvejie Substation Project.