



BHMG ENGINEERS
BHMG SERVICE CORP.

Engineers Serving Utilities

September 28, 2015

Mr. Jason Bird
Supt of Electric Operations
Rochelle Municipal Utilities
700 West Second Ave.
Rochelle, IL 61068

Ref: Relay Replacement at Twombly

Dear Mr. Bird;

Rochelle Municipal Utilities has expressed interest in having the distribution relays and transformer relays replaced at the Twombly Substation. The existing relays currently being used are DPU 2000 distribution relays and TPU 2000 transformer relays. This particular model of relay was discontinued by ABB about 10 years ago and now repair of the units has gone away.

BHMG's proposal as described herein is to replace the existing relays at Twombly with new SEL feeder and transformer relays. Existing communications to the ABB relays are done thru ASCII communications protocols to an SEL 2030. The existing 2030 communications processor is sending information to PJM and Com Ed for the 138kV portion of the substation. BHMG recommends adding in an SEL-RTAC, which would be used as a data concentrator and stacked for SCADA communications. OSI would need to be employed by RMU to update the SCADA master. Electrical feeder circuits might need to be tied together in the system and the Cities line department will be responsible for tying the circuits together to perform the required replacement.

Estimated Cost For Replacement of Relays at Twombly **\$106,283.00**

BHMG appreciates this opportunity to provide RMU these services. Should any questions arise, please contact me at your convenience.

Sincerely:

Barnes, Henry, Meisenheimer & Gende, Inc.

A handwritten signature in cursive script, appearing to read 'Chuck E Fiessinger'.

Chuck E Fiessinger, P.E.
Vice-President