

**VELCO Operating Committee
MINUTES (Draft)**

May 17, 2012, 11 a.m. – 3 p.m.
GMP, Montpelier, VT

Participating members: Ken Couture (Green Mountain Power), Ken Mason (VPPSA-Lyndonville Electric Department), Ken Nolan (Burlington Electric Department), Kevin Perry (VT Electric Cooperative), Paul Renaud (VELCO), Greg White (Central Vermont Public Service-Phone) and Jeff Wright & Kevin Perry (VT Electric Cooperative).

Other VELCO participants: Allen Stamp (phone), Mike Loucy, Thad Omand (phone), Hantz Pr sum .

Mr. Dunn chaired the meeting.

Minutes approval

- Mr. Wright moved, Mr. Mason seconded and the minutes were approved without discussion or dissent.

Report on the Root Cause Investigation (RCI) on the Jay Substation Accident

- Mr. Renaud, who is leading the VELCO-VEC joint RCI on the recent accident at the Jay Substation, gave a brief update on the events of the accident. The main part of the investigation is complete. Additional items, such as OSHA/VOSHA regulations, are being evaluated. He reviewed a picture of the Jay site. He reviewed the preliminary findings, causal factors and corrective actions. Mr. Wright mentioned the meeting with VOSHA about the applicability of the 1920.269 standard.

Metering update

- Mr. Omand gave the metering update. He reviewed the status of the True-Up agreement. The agreement has been signed by all but one party who must have his Board approval before signing. VELCO intends to file the document at FERC next week and approval is expected in sixty days. Repayment is expected to take place in August and September. Mr. Couture will let the group know when GMP will make the repayment.
- Loss issue at Highgate. This weekend saw lower losses while the converter was out of service. This suggests that ISO is probably correct that VT is not paying for losses on the Highgate to Border T-line (5-6 MW). The inclusion of these losses into Vermont's load would increase state's transmission costs by about \$1.2 M per year. Mr. Omand will work with VELCO Planning to verify the losses when the converter is off to confirm the ISO's theory. No changes will be made in the method of calculation until Vermont gets clarity on what is included in the loss calculation.
- The **Vermont Electric Cooperative block load issue**. VELCO is presently working to set up a meeting with ISO-NE to understand their calculations. Resolution may decrease VEC's transmission bill if ISO agrees the load is not connected to New England. Documentation has been obtained that Vermont's approach to the billing is based on a written agreement with ISO-NE established in 2003.

Next meetings

June 20, 11 a.m. – 3 p.m.
GMP, Montpelier Office

NOTE DATE CHANGE:

June 20, 11 a.m. – 3 p.m.
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- Mr. Couture described joint communication among CVPS, National Grid and GMP in which NGrid raised the issue of a metering change of which they were not aware at the time the change was made. NGrid made a 90-day settlement request to ISO-NE to correct the error. Mr. Omand stated that VELCO is now working on the commissioning process to be sure all the entities involved are aware of changes at the time they are made. Each utility will need to complete the process when they implement changes on the system that impact the statewide load calculation.
- Readsboro purchase: It was discovered that when CVPS purchased Readsboro on September 1, 2011 an error was made in the load calculation. CVPS transferred the new GMP/CVPS tie to be handled as part of its load calculation similar to other ties. GMP's calculation was not updated to be handled similarly. Therefore, both GMP and CVPS have been reported the former Readsboro load as part of their load. GMP will make the correction and April and May will be resettled. The amount of MWHs is too small for an ISO-NE RBA and the correction will be included in the upcoming true-up agreement resettlement. ISO meter reading working group has requested the assigned meter readers document the costs to transition to 5-minute settlement for generation, imports and potentially all load. The impact will include reprogramming meters to collect 5-minute intervals, parties involved will need to collect, store, perform their calculations and transmit data to VELCO and VELCO will have to modify the settlement software to obtain the data, reconcile the portions that are 5 minute versus hourly data, perform the load calculation and submit to ISO-NE. Mr. Wright asked about the benefits of making this change. Mr. Omand indicated that it provides a way for ISO to incentivize or penalize generators performance against orders that are issued every five minutes. Cost/benefit analysis has not been done. ISO is going to evaluate the merits with the change expected to happen in 2014. Generation <5 MW will be exempt but all others will have to modify metering to comply with new standard.

VT/NH Needs Assessment and NTA Study

- Mr. Pr sum  provided an update on the VT/NH needs assessment. He indicated that discussions with ISO on their load forecast which indicates that Vermont's load will decline over the next ten years. This forecast differs from VELCO's which indicates that Vermont's load will increase at about 0.5% a year. The biggest reason for the difference between the two forecasts is the amount of savings associated with energy efficiency programs (see bullet below for more detail). VELCO and ISO are having ongoing conversations about the differences to see if the two can be reconciled. To date the ISO has not been open to making changes to their forecast. Using ISO's forecast may defer or eliminate the need for transmission or NTAs to address reliability deficiencies. There was a discussion about load growth and distributed generation showing up in Vermont. Mr. Couture indicated that GMP is seeing six to eight 1 to 2 MW solar projects. Solar providers are being very aggressive in deploying equipment in Vermont.
- Mr. Pr sum  presented ISO-NE's current energy efficiency forecast and discussed the discrepancy between the ISO-NE and VELCO approaches to forecasting load with respect to how energy efficiency is taken into account. He described how VELCO collaborated extensively with VEIC and DPS to produce a consensus forecast, and that stakeholders had agreed with a forecast that discounts 50 percent of the future funded energy efficiency because ITRON's forecasting method picks up a portion of the energy efficiency. ISO-NE, by contrast, is subtracting the full amount of future funded energy efficiency, resulting in what VELCO believes is some amount of double-counting. This presents a problem in planning efforts going forward. The ISO forecast will likely control, but practically speaking, the Connecticut River project is needed under either forecast. For other areas, the current Vermont NTA study will not be finished until the end of the year, and VELCO will work with ISO-NE to resolve the forecast discrepancies during that

period. Under the revised forecast, the northwest Vermont solutions will not be needed in the first ten years under this load projection.

- Mr. Presume indicated that the NTA Study is about one month behind schedule. He indicated that gathering the data is taking more time than expected and is the primary cause for the delay. The group plans to meet with ISO to discuss what it will take to have ISO accept an NTA to avoid a transmission system upgrade. Mr. Nolan reviewed the work that has taken place to evaluate the role of demand response.
- Mr. Presume provided a presentation on VELCO/DU Planning Coordination. He noted the strong relationship between the transmission and subtransmission systems and how the entire system is presently being modeled in New England. This has elevated the importance of ensuring that the model is accurate. Areas for improvement are in getting information on historical and projected loads, and changes to system topology. There was a discussion on how to document changes to the subtransmission system. Mr. Dunn suggested that the operating coordination group could look at this issue and suggest ways to improve the exchange of data. Mr. Presume will work with Mr. Haas on ways to improve coordination and will report back to the Committee in June.

Telecommunications: Fiber and Radio Projects

- Mr. Stamp provided an update on the Fiber Project. Work is ongoing in CVPS, GMP and VEC systems. Some work that was expected to be deferred until 2013 will now be done in 2012. The VEC Hinesburg Tap, VEC Pleasant Valley and GMP Middlesex to Madbush areas are now set to be constructed in 2013. Mr. Dunn asked question about coordinating the 2013 work. Mr. Stamp indicated that discussion is underway with VEC and GMP about how the work will be conducted. One option is that make-ready work will be done by the owning DU and Eustis will install the fiber.
- Mr. Loucy indicated that final design for the fiber electronics is nearly complete. The design has been shared with GMP, CVPS, Stow and VEC. Mr. Loucy provided an update on discussions about co-build options (i.e., locations where a TelCo builds for VELCO in the TelCo's system). Mr. Wright noted that deployment of fiber increases cyber security risk. At the July meeting the committee would like to have presentation about cyber security (Tel Comm. Operating committee). Mr. Nolan noted AMI generated data is also involved. Coordination among the VELCO and DUs on cyber security is complex with the eEnergy working group addressing cyber security as required by the DOE grant and security issues needing to be addressed with the new network being deployed.
- Mr. Nelson presented the meeting slides on the statewide radio project. 30 sites are permitted and VELCO is waiting on the CPG for Sharon site. Wells condemnation was awarded on May 17. This will permit VELCO to construct the Wells site. He indicated that drive-test data is matching the modeling data very closely because of the system's 200 MHz design. CVPS is beginning to use the system and WEC is beginning testing.
- Mr. Mason indicated VPPSA's continued interest in the system. Mr. Mason asked when VELCO will have radios available for testing. Mr. Nelson will determine the status of the radios (portable and mobile). Mr. Mason asked about Burlington Communication services. Mr. Nelson indicated that Burlington Communications can provide full service for the new radios. There was a discussion about when Burke site will be available.

Future agenda items (including carry-over items from February minutes)

- Regular/periodic updates:
 - Billing and power accounting report (including change of control process).

- NTA study update.
- VT Control Center Operating Forum (quarterly).
- Radio project update.
- Fiber project update.
- Effect of merger on Operating Committee membership.
- Report on the progress and/or results of the Jay accident RCI.
- ISO-NE black start program changes (Dave Haas).
- Before the Operating Committee: CVPS, Lyndonville and VELCO to meet on Higgins Hill Substation issue.

Next meeting:

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11 a.m. – 3 p.m.

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