

Project Information

Project Name:	Substation Condition Assessment	Electrical Engineer of Record:
Project #:	30934	Spark Power High Voltage Services Inc.
Description:	Amendment Memo	1315 North Service Road East
Document:	Memo #1	Oakville, Ontario L6H 1A7

Revision Log

Revision	Date	Prepared by:	Reviewed by:	Approved by:	Description
01	2021-04-30	RSG	-	-	Issued to Client
02	2021-05-06	HH	-	-	Issued to Client

Since the completion of Revision 1 of the Substation Condition Assessment in March 2020, Rideau St. Lawrence Distribution has completed minor upgrades and repair work which has had a minor impact in improving the condition of their substations. These upgrades or work has included:

- Identification of spare fuse inventory located at the Prescott, ON office.
- Completed ground connection repairs within substations at Morrisburg MS1, Morrisburg MS2, Iroquois MS, and Prescott MS4
- Provided device nomenclature and
- Repaired the flexible bus leads at Cardinal MS1
- Replaced the ground mat at Prescott MS3

These repairs have resulted in the following changes in total station scores:

Station	Original Station Score	New Station Score
Cardinal MS1	2.6	2.9
Cardinal MS2	3.1	No change
Iroquois MS	3.3	No change
Morrisburg MS1	3.1	3.2
Morrisburg MS2	2.7	No change
Prescott MS1	3.8	No change
Prescott MS2	3.3	No change
Prescott MS3	2.8	3.2
Prescott MS4	3.0	No change



The remaining recommendations for station improvements remain intact and should be pursued in accordance with the table of priorities provided in the Condition Assessment as the repairs noted above have not impacted station priorities.

In discussion with operations personnel, the following options have been outlined at a high level:

- Adding an additional transformer T2 at Morrisburg MS1, with additional feeders out of the substation & a tie system to Bus 1
- Decommissioning of Morrisburg MS2 and relocation of T1 to Prescott MS1.

We believe that these options are prudent and would result in significant improvement to those applicable stations while correcting the immediate priorities of multiple distribution areas, although we acknowledge that further discussion with Rideau St. Lawrence staff is pending and other alternatives may exist.