



## Pre-Inspection Checklist For New and or Existing Receipt Point

The following checklist items are required to be completed prior to booking an initial inspection. Once this checklist has been completed, please email scanned copy to **Measurement Technical Services**; [mts@nrm.ca](mailto:mts@nrm.ca)

<b><u>CONTACT INFORMATION</u></b>	
Date:	
Site Description (LSD):	
Receipt Point Owner: (RPO Company Name)	
Latitude and Longitude of tap (GPS):	
On Site Inspector – Name & Phone #:	
Instrumentation Contractor: Name & Phone #: Company name, contact name & Phone #:	
<b><u>GENERAL REQUIREMENTS</u></b>	
<b>All piping and vessels, including laterals downstream of meter facilities, need to be purged after hydro tested and fully dried to lower than 4lbs/mmcf before site inspection</b>	
<b>All equipment shall be compliant as detailed in the Raw Gas Transmission (RGT) Measurement Policy. Please refer to <a href="http://www.fieldservices-midstream.com">http://www.fieldservices-midstream.com</a> for any additional information</b>	
The metering facility shall be properly housed in a heated building	Is the building heated?  Yes <input type="checkbox"/> ; No <input type="checkbox"/>
NorthRiver Midstream (NRM) requires that the Over Pressure Protection (OPP) system must be completely stand alone, and of electric, pneumatic or mechanical fail safe design and be fully operational. OPP system must not be controlled using a PLC	Does the OPP system use a PLC controller?  Yes <input type="checkbox"/> ; No <input type="checkbox"/>
Pressure Control (PC) shall be set to limit the pressure to no more than 100% of the NRM pipeline Maximum Operating Pressure (MOP) and Over Pressure Protection shall be set to limit the pressure to no more than 110% of the NRM pipeline MOP respectively	Have the Pressure Control and Over Pressure Protection devices been tested to trip at set point and not exceed NRM MOP?  Yes <input type="checkbox"/> ; No <input type="checkbox"/>
PC and OPP systems shall be specifically designated to protect NRM piping	Are there any valves capable of over-riding, bypassing or isolating the PC/OPP device?  Yes <input type="checkbox"/> ; No <input type="checkbox"/>  If so, please secure the valve in the normal operating position with an NRM car seal

<p>The Pressure Control and Over Pressure Protection devices shall be functional and calibrated prior to start up. The NRM technician will be dispatched to site, to inspect and witness the verification</p> <p>A copy of the completed calibration certificates, including all required signatures, with correct traceability to the PC/OPP devices and tags numbers must be emailed after the site inspection Email scanned copy to: <a href="mailto:mts@nrm.ca">mts@nrm.ca</a></p>	<p>Are the Pressure Control and Over Pressure Protection devices calibrated?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p>Are calibration forms fully and accurately completed to meet compliance?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>All Receipt Points shall have a sample point located upstream of the gas meter run, extending to the center 1/3 of the pipe. It shall be located such that samples are taken from a fully developed flowing stream, 5 pipe diameters downstream of any obstruction (elbows, tees, meter runs, etc.)</p>	<p>Probe installed as per specifications?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>

<b><u>INSTRUMENT REQUIREMENTS</u></b>	
<p>Recent calibrating equipment used in the field shall meet all the required specifications as outlined in the RGT measurement policy</p> <p>For pressure equipment, a dry pressure source such as nitrogen shall be used for calibration. Liquid mediums are not to be used for calibration</p>	<p>Does the Instrumentation Contractor have the proper calibration equipment on site as well as a copy of the certificate verifying annual certification?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>The Receipt Point operator's instrumentation contractor shall conduct the verification and calibration of the EFM device prior to the site inspection by NRM personnel</p>	<p>Has the Instrumentation contractor completed the calibration of the EFM devices?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p>Is a copy of the EFM calibration available on site?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>The Instrumentation contractor shall have the correct software, and is able to communicate with the EFM device</p>	<p>EFM available on site?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p>EFM communications software available?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p>Has the EFM configuration file been sent back to NRM?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>In order to properly verify the EFM flow calculations, the Instrumentation contractor shall have AGA calculation software available on site. (Preferably Flowcheck)</p>	<p>Does the Instrumentation Contractor have AGA calculation software available?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>The gas and/or liquid composition programmed into the EFM device shall be updated with the most recent analysis</p>	<p>Is there a recent gas analysis available on site?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>

<p>NRM requires that the atmospheric pressure based on the actual elevation be programmed into the electronic flow measurement device</p>	<p>Has the site elevation been calculated?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>The Instrumentation contractor shall have the correct software, and is able to communicate with the RTU device</p>	<p>RTU available on site?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p>RTU communications software available?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p>
<p>Receipt point owners must install a communications link between the EFM and RTU devices to the nearest NRM communications hub</p> <p>NRM will provide a SCADA Address</p> <p>Producer must contact the area Team Leader two weeks in advance to arrange the SCADA commissioning, including a point to end device check</p> <p>SCADA on call: (250) 794-4238</p>	<p>Are communications commissioned and operating?</p> <p>Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p><b>EFM</b> <input type="checkbox"/></p> <p>Type _____</p> <p>Address: _____</p> <p><b>Radio</b> <input type="checkbox"/></p> <p>SRT-Microwave <input type="checkbox"/>; MDS-UHF <input type="checkbox"/></p> <p>or</p> <p>Phone (dial up) <input type="checkbox"/></p> <p>Cell <input type="checkbox"/>; Landline <input type="checkbox"/></p> <p>Switch: _____</p> <p>Address: _____</p> <p>Phone Number: _____</p> <p><b>RTU</b> <input type="checkbox"/> N/A <input type="checkbox"/></p> <p>Radio <input type="checkbox"/></p> <p>SRT-Microwave <input type="checkbox"/>; MDS-UHF <input type="checkbox"/></p> <p>or</p> <p>Phone (dial up) <input type="checkbox"/></p> <p>Cell <input type="checkbox"/>; Landline <input type="checkbox"/></p> <p>Switch: _____</p> <p>Address: _____</p> <p>Phone Number: _____</p>

<p>Before contacting NRM to dispatch a measurement technician to conduct the site inspection, all instruments and analyzers are to be wired, powered up and communicating on the SCADA system</p> <p>NRM will only dispatch personnel to site after they have verified on SCADA all required equipment is communicating on SCADA</p>	<p>EFM Powered and Wired? Yes <input type="checkbox"/>; No <input type="checkbox"/>; N/A <input type="checkbox"/></p> <p>Transmitters Powered and Wired? Yes <input type="checkbox"/>; No <input type="checkbox"/>; N/A <input type="checkbox"/></p> <p>RTU Powered and Wired? Yes <input type="checkbox"/>; No <input type="checkbox"/>; N/A <input type="checkbox"/></p> <p>Panel Powered, Wired and Function Tested? Yes <input type="checkbox"/>; No <input type="checkbox"/>; N/A <input type="checkbox"/></p> <p>Moisture Analyzer Powered, Wired and Function Tested? Yes <input type="checkbox"/>; No <input type="checkbox"/>; N/A <input type="checkbox"/></p>
<p>NRM requires that the piping at the Receipt Point will be pressurized at the time of arrival</p> <p>Gas must meet applicable moisture of less than 4 lbs/mmcf., and NRM's hydrocarbon dewpoint specifications</p>	<p>Is facility piping at sales pressure? Yes <input type="checkbox"/>; No <input type="checkbox"/></p> <p>Expected Pressure = _____</p> <p>Moisture Dewpoint = _____</p> <p>Hydrocarbon Dewpoint = _____</p>
<p>For sour sites, an H2S free instrument air or nitrogen purge must be provided for the moisture analyzer head unit, enclosed in a NEMA or XP case depending on location</p>	<p>Is there an Instrument air or nitrogen purge for the analyzer housing? Air <input type="checkbox"/>; Nitrogen <input type="checkbox"/>; None <input type="checkbox"/>; N/A(Sweet) <input type="checkbox"/></p>
<p>NRM requires two weeks' notice from the producer to schedule a measurement technician to perform the initial inspection and verification</p> <p><b>Please contact the area Team Leader or designate to schedule NRM Technicians to inspect the site</b></p> <p><b>Team Leaders / Supervisors</b> Fort St. John: Kevin Habb 250-262-3651 Fort Nelson: Denise Barry 250-233-6346</p> <p><b>Designate - Area Business Specialist</b> Steven Vig 250-262-3478 Doug Gulevich 250-262-3421</p>	<p>Area Team Leader contacted 2 weeks prior to start up? Yes <input type="checkbox"/> No <input type="checkbox"/></p>

<p>Manufacturer or blend of corrosion inhibitor</p> <p><b>Please inform the area Team Leader/Supervisor each time pigging into our system will occur:</b></p> <p><b>Team Leaders</b>  Fort St. John: Kevin Habb 250-262-3651                    Steven Vig 250-262-3478  Fort Nelson: Denise Barry 250-233-6346</p>	<p>Manufacturer/blend_____</p> <p>Quantity_____</p> <p>Frequency_____</p>
<b><u>MTS COMMENTS</u></b>	<b><u>FIELD TECHNICIAN NOTES</u></b>

Please return completed Pre-Inspection Checklist to [mts@nrm.ca](mailto:mts@nrm.ca)

**Completed by:** \_\_\_\_\_ **Date:** \_\_\_\_\_

**Signature:** \_\_\_\_\_