

## Administration and Inspection Activities for Geomembrane

(As Specified in OPSS 1863)

### 1863.01 SCOPE

This CAIS covers the construction administration and inspection requirements for Geomembrane as specified in OPSS 1863, April 2026.

### 1863.02 REFERENCES

The references listed in OPSS 1863 shall apply to this CAIS, in addition to the following standards, specifications, forms, or publications.

#### Ontario Provincial Standard Specifications, Material

OPSS 1863 Geomembrane

### 1863.03 DEFINITIONS

For the purpose of this CAIS, the definitions shall be as specified in OPSS 1863.

### 1863.04 DESIGN AND SUBMISSION REQUIREMENTS

#### 1863.04.01 Submission Requirements

##### 1863.04.01.01 Submission Requirements

Administrative Activities:

1	-	Receive and Review the Manufacturer's submission with the required information as specified in OPSS 1863 prior to the use of a geomembrane in the Work.	-
2	-	Receive the manufacturer's requirements for storage, transportation, and installation of geomembranes at least 14 Days prior to transportation of the geomembrane to the Working Area	-
3	-	Check the manufacturer's quality control (QC) documentation when required.	-

**1863.05 MATERIALS**

**1863.05.01 Geomembrane**

Administrative Activities:

1	-	Check that the geomembrane material complies with the requirements of the Contract Documents and OPSS 1863.	-
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**1863.06 EQUIPMENT- Not used**

**1863.07 PRODUCTION**

**1863.07.01 General**

Administrative Activities:

1	-	Check that the quantity of geomembrane supplied for the Work has sufficient material to satisfy the installation limits specified by the Contract Documents and the testing requirements of OPSS 1863.	-
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**1863.07.03 Physical Requirements of Seams**

Inspection Activities:

1	-	Check that seams within the geomembrane panels are not welded in the field.	100%
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**1863.07.04 Protection during Shipment and Storage**

Inspection Activities:

1	-	Check that geomembranes are protected from excessive UV exposure and deleterious materials until they are installed. Geomembranes shall be wrapped in an opaque protective covering free of tears and punctures.	25%
2	-	Check that geomembranes intended to be covered by soil, rock, earth, or other materials are not exposed to direct sunlight for more than 72 hours following the removal of the protective wrap.	25%
3	-	Check that geomembranes in the Working Area are protected from a maximum temperature indicated by the manufacturer specifications.	25%
4	-	Check that installation or unrolling of geomembranes does not occur at temperatures below 0 °C, unless permitted by the manufacturer's specifications.	25%

Administrative Activities:

1		Check that packaging of geomembrane during shipment and material storage prior to installation is in accordance with ASTM D7865 and the manufacturer's specifications	-
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**1863.07.05 Identification**

Inspection Activities:

1	-	Check that each geomembrane panel and the exterior of its packaging are clearly labeled after fabrication in accordance with ASTM D7865 and OPSS 1863. The label shall include:  a) The manufacturer or supplier name; b) Product number, type; c) Panel number; and d) Date of manufacture.	100%
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**1863.08 QUALITY ASSURANCE**

**1863.08.01 Inspection**

Inspection Activities:

1	-	When requested by the Owner, carry out inspections to Check that the geomembrane supplied is as specified in the Contract Documents.	100%
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**1863.08.02 Sampling**

**1863.08.02.01 General**

Inspection Activities:

1	M	Check that all required sampling is carried out according to the Contract Documents.	100%
2	M	Check that samples taken from the geomembrane are representative of the type, material, and physical properties of the entire geomembrane panel.	100%
3	M	Ensure that each sample is stored in accordance with OPSS 1863 while in the Contract Administrator's possession.	100%
4	M	Check that each sample is identified in accordance with OPSS 1863. Identification shall include all information required in OPSS 1863, and shall be placed in a moisture-proof envelope directly attached to or within each UV-protective container.	100%

5	M	Maintain continuous possession of the samples until they are sealed and delivered to the Owner's designated laboratory.	100%
6	M	Check that all samples are completely dry, free of damage, dust, or other contamination, at all times.	100%

Administrative Activities:

1	-	Arrange for delivery of all samples to the Owner's designated laboratory, as specified in the Contract Documents.	-
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**1863.08.02.02 Sampling of Geomembrane**

Inspection Activities:

1	-	Check that the sampling is in accordance with OPSS 1863.	100%
2	-	Check that samples of geomembranes are taken such that they satisfy the requirements of ASTM D5199 or ASTM 5994/D5994M, ASTM D1004, and ASTM D4833/D4833M.	100%
3	-	If samples are taken from a rolled geomembrane, Check that at least one full lat of the material from that roll is discarded prior to sampling	100%

Administrative Activities:

1	-	Establish the sampling frequency in accordance with OPSS 1863.	-
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**1863.08.02.03 Sampling of Fabricated Geomembrane Panel Seams**

Inspection Activities:

1	-	Check that the samples taken are according to ASTM D6392 for HDPE and LLDPE geomembranes or ASTM D7408 for PVC geomembranes	100%
2	-	Check that the location where the destructive sample is taken is repaired according to the Defects and Deficiencies subsection	100%

**1863.08.03 Acceptance**

**1863.08.03.01 General**

Administrative Activities:

1	M	Check that acceptance of the geomembrane is according to OPSS 1863.	-
2	M	Notify the Contractor of acceptance at full price or rejectable material.	-

**1863.08.03.02 Geomembrane**

Administrative Activities:

1	M	Receive and Review all test results from the Owner's designated laboratory for acceptance based on the requirements of OPSS 1863.	-
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**1863.08.03.03 Fabricated Geomembrane Seams**

Administrative Activities:

1	M	Receive and Review all test results from the Owner's designated laboratory for acceptance based on the requirements of OPSS 1863.	-
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**1863.08.04 Referee Testing**

Administrative Activities:

1	-	Check that a written request to invoke referee testing is received within 5 Business Days following notification that a sample representing a lot of geomembrane does not meet the requirements of this specification.	-
2	-	Ensure the Contractor's notification includes the type of geomembrane and the specific attribute(s) for which referee testing is requested.	
3	-	Perform the necessary components of the referee testing process as specified in CAIS 100, MTO Contract Administration General Conditions (CAGC) and the specification.	-

**1863.08.05 Defects and Deficiencies**

Inspection Activities:

1	-	Check all geomembrane for any defects and deficiencies as specified in the Contract Documents. Check that all defects and deficiencies are documented and repaired as specified in the Contract Documents or rejected.	100%
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Administrative Activities:

1	-	Reject any geomembrane that is rejectable as specified in the Contract Documents. Notify MTO's Quality Assurance Section.	-
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WARRANT: Always with OPSS 1863, Material Specification for Geomembrane