LINING INSPECTION

49 CFR, 180.407(f)

Name of Owner/Carrier: _____ Test Date:_____

Address:_____

Owner Unit #: _____ Tank serial #:_____ MAWP: _____ psi

Tank manufacturer: _____ Specification: MC/DOT _____Tank capacity: ___gal.

Cargo Tank: Insulated: ❑ Lined: ❑ Lining type: _____

Tank Service: LPG ❑ Anhydrous Ammonia ❑ Corrosive ❑ Dedicated ❑ Other ❑

REMARKS

Cargo Tank continued qualification: ❑ Returned to service ❑ Withdrawn from service

Inspector's Name: _____ CT Registration #: _____

Inspector's Address: _____

I CERTIFY THAT THE INSPECTION/ TEST NOTED ON THIS FORM WAS PERFORMED BY ME AND ALL REQUIRED ENTRIES WERE PROPERLY RECORDED.

_____ _____

Registered Inspector's Signature Date

_____ _____

Cargo Tank Owner or Authorized Representative's Signature Date

(f) Lining Inspection

The integrity of the lining on all lined cargo tanks, when lining is required by this subchapter, must be verified at least once each year as follows:

(i) Rubber (elastomeric) lining must be tested for holes as follows:

(ii) Equipment must consist of:

A high frequency spark tester capable of producing sufficient voltage to ensure proper calibration;

(A) A probe with an "L" shaped 2.4mm (0.09 inch) diameter wire with up to a 30.5 cm (12 inch) bottom leg (end bent to a 12.7 mm (0.5 inch) radius), or equally sensitive probe; and

(B) A steel calibration coupon 30.5 cm x 30.5 cm (12 inches x 12 inches) covered with the same material and thickness as that to be tested. The material on the coupon shall have a test hole to the mental substrate made by puncturing the material with a 22 gauge hypodermic needle or comparable piercing tool.

(iii) The probe must be passed over the surface of the calibration coupon in a constant uninterrupted manner until the hole is found. The hole is detected by the white or light blue spark formed. (A sound lining causes a dark blue or purple spark.) The voltage must be adjusted to the lowest setting that will produce the minimum of 12.7 mm (0.5 inch) spark measured from the top of the lining to the probe. To assure that the setting on the probe has not changed, the spark tester must be calibrated periodically using the test calibration coupon, and the same power source, probe, and cable length.

(iv) After calibration, the probe must be passed over the lining in an uninterrupted stroke.

(v) Holes that are found must be repaired using equipment and procedures prescribed by the lining manufacturer or lining installer.

(2) Linings made of other than rubber (elastomeric material) must be tested using the equipment and procedures prescribed by the lining manufacturer or lining installer.

(3) Degraded or defective areas of the cargo tank liner much be removed and the cargo tank wall below the defect must be inspected. Corroded areas of the tank wall must be thickness tested in accordance with paragraphs (i)(2), (i)(3), (i)(5), and (i)(6) of this section.

(4) The inspector must record the results of the lining inspection as specified in § 180.417(b).