Pipeline and Hazardous Materials Safety Admin., DOT § 195.559

§ 195.551 What do the regulations in this subpart cover?

This subpart prescribes minimum requirements for protecting steel pipelines against corrosion.

§ 195.553 What special definitions apply to this subpart?

As used in this subpart—

Active corrosion means continuing corrosion which, unless controlled, could result in a condition that is detrimental to public safety or the environment.

Buried means covered or in contact with soil.

Direct assessment means an integrity assessment method that utilizes a process to evaluate certain threats (i.e., external corrosion, internal corrosion and stress corrosion cracking) to a pipeline segment’s integrity. The process includes the gathering and integration of risk factor data, indirect examination or analysis to identify areas of suspected corrosion, direct examination of the pipeline in these areas, and post assessment evaluation.

Electrical survey means a series of closely spaced pipe-to-soil readings over a pipeline that are subsequently analyzed to identify locations where a corrosive current is leaving the pipeline.

External corrosion direct assessment (ECDA) means a four-step process that combines pre-assessment, indirect inspection, direct examination, and post-assessment to evaluate the threat of external corrosion to the integrity of a pipeline.

Pipeline environment includes soil resistivity (high or low), soil moisture (wet or dry), soil contaminants that may promote corrosive activity, and other known conditions that could affect the probability of active corrosion.

You means operator.

§ 195.555 What are the qualifications for supervisors?

You must require and verify that supervisors maintain a thorough knowledge of that portion of the corrosion control procedures established under §195.402(c)(3) for which they are responsible for insuring compliance.

§ 195.557 Which pipelines must have coating for external corrosion control?

Except bottoms of aboveground breakout tanks, each buried or submerged pipeline must have an external coating for external corrosion control if the pipeline is—

(a) Constructed, relocated, replaced, or otherwise changed after the applicable date in §195.401(c), not including the movement of pipe covered by §195.424; or

(b) Converted under §195.5 and—

(1) Has an external coating that substantially meets §195.559 before the pipeline is placed in service; or

(2) Is a segment that is relocated, replaced, or substantially altered.

§ 195.559 What coating material may I use for external corrosion control?

Coating material for external corrosion control under §195.557 must—

(a) Be designed to mitigate corrosion of the buried or submerged pipeline;

(b) Have sufficient adhesion to the metal surface to prevent under film migration of moisture;
§ 195.561 When must I inspect pipe coating used for external corrosion control?

(a) You must inspect all external pipe coating required by §195.557 just prior to lowering the pipe into the ditch or submerging the pipe.
(b) You must repair any coating damage discovered.

§ 195.563 Which pipelines must have cathodic protection?

(a) Each buried or submerged pipeline that is constructed, relocated, replaced, or otherwise changed after the applicable date in §195.401(c) must have cathodic protection. The cathodic protection must be in operation not later than 1 year after the pipeline is constructed, relocated, replaced, or otherwise changed, as applicable.
(b) Each buried or submerged pipeline converted under §195.5 must have cathodic protection if the pipeline—
(1) Has cathodic protection that substantially meets §195.571 before the pipeline is placed in service; or
(2) Is a segment that is relocated, replaced, or substantially altered.
(c) All other buried or submerged pipelines that have an effective external coating must have cathodic protection.1 Except as provided by paragraph (d) of this section, this requirement does not apply until December 29, 2003.

§ 195.565 How do I install cathodic protection on breakout tanks?

After October 2, 2000, when you install cathodic protection under §195.563(a) to protect the bottom of an aboveground breakout tank of more than 500 barrels (79.5m³) capacity built to API Specification 12F, API Standard 620, or API Standard 650 (or its predecessor Standard 12C), you must install the system in accordance with API Recommended Practice 651. However, installation of the system need not comply with API Recommended Practice 651 on any tank for which you note in the corrosion control procedures established under §195.402(c)(3) why compliance with all or certain provisions of API Recommended Practice 651 is not necessary for the safety of the tank.

§ 195.567 Which pipelines must have test leads and what must I do to install and maintain the leads?

(a) General. Except for offshore pipelines, each buried or submerged pipeline or segment of pipeline under cathodic protection required by this subpart must have electrical test leads for external corrosion control. However, this requirement does not apply until December 27, 2004 to pipelines or pipeline segments on which test leads were not required by regulations in effect before January 28, 2002.
(b) Installation. You must install test leads as follows:
(1) Locate the leads at intervals frequent enough to obtain electrical measurements indicating the adequacy of cathodic protection.
(2) Provide enough looping or slack so backfilling will not unduly stress or break the lead and the lead will otherwise remain mechanically secure and electrically conductive.
(3) Prevent lead attachments from causing stress concentrations on pipe.
(4) For leads installed in conduits, suitably insulate the lead from the conduit.
(5) At the connection to the pipeline, coat each bared test lead wire and

1A pipeline does not have an effective external coating material if the current required to cathodically protect the pipeline is substantially the same as if the pipeline were bare.