TITLE 252. DEPARTMENT OF ENVIRONMENTAL QUALITY CHAPTER 616. INDUSTRIAL WASTEWATER SYSTEMS

SUBCHAPTER 1. INTRODUCTION

252:616-1-2. Definitions

The following words and terms, when used in this Chapter, shall have the following meaning, unless the context clearly indicates otherwise:

"Beneficial use" means in the context of land application the use of sludge or wastewater through land application for the purpose of soil conditioning, crop vegetative fertilization, or erosion control, or the use of wastewater for dust suppression where fugitive dust control would otherwise be an air quality problem, in a manner which does not pollute or tend to pollute waters of the state of Oklahoma, the environment or pose a risk to human health.

"Berm" means a man-made barrier designed to control waste and/or stormwater within a surface impoundment or to retard or contain runoff in a given area.

"Bypass" means the intentional or unintentional diversion of waste streams from any portion of a facility.

"**Cathodic protection**" means protecting a metal from electrochemical corrosion or rusting by using it as the cathode of a cell with a sacrificial anode.

"Cell" means a part of a surface impoundment system that shares a vertical concrete wall with another part of the surface impoundment area.

"DEQ" means the Oklahoma Department of Environmental Quality.

"Engineer" means a professional engineer registered in the state of Oklahoma.

''Flow-through surface impoundment'' means a surface impoundment designed and constructed with an outfall structure which allows the controlled discharge of wastewater out of the impoundment.

"**Freeboard**" means the vertical distance from the surface water or sludge/solids level to the overflow elevation (outfall structure or the lowest part of the surrounding berm) in a surface impoundment.

''Hydraulic conductivity'' means the coefficient of proportionality that describes the rate at which a fluid can move through a permeable medium. It is a function of both the medium and of the fluid flowing through it; also defined as the quantity of water that will flow through a unit cross-sectional area of porous material per unit of time under a hydraulic gradient of 1.00 (measured at right angles to the direction of flow) at a specified temperature.

"Industrial wastewater treatment permit" shall include any permit for construction, operation, treatment, storage or disposal required under this Chapter.

"Land application" means the controlled application of treated industrial wastewater or sludge onto the land surface for beneficial use.

"Liner" means a barrier which is designed, constructed and installed in a surface impoundment and which has appropriate chemical and physical properties to ensure that such structures control the seepage or release of waste and wastewater from the impoundment.

"Monitoring well" means all borings, wells, piezometers, or other means of retrieving a soil, waste, wastewater or vapor sample from the subsurface.

"Oklahoma Water Quality Standards" means the rules promulgated by the Oklahoma Water Resources Board <u>DEQ</u> and contained in OAC 785:45 252:730 which classify waters of the state, designate beneficial uses for which the various waters of the State shall be maintained and protected, and prescribe the water quality standards required to sustain designated uses.

"OPDES" means the Oklahoma Pollution Discharge Elimination System Act at 27A O.S. § 2-6-201 *et seq.*

"**Operator**" means the person responsible for the maintenance and operation of a surface impoundment, or disposal or wastewater treatment system and responsible for keeping records and providing reports to the DEQ.

"**Outfall**" means the point where monitoring shall occur for the purpose of evaluating compliance with rules, permits or orders of the DEQ.

"**Person**" means any individual, company, corporation, government agency, municipality, or any other entity.

"**Permeability**" means the rate at which liquids pass through soil or other materials in a specified direction.

"**Receiving water**" means that portion of any waters of the State into which wastewater is or may be released, leached, or discharged.

"Sanitary wastewater" means and includes but is not limited to wastewater from drinking fountains, showers, toilets, lavatories, and kitchens.

"Surface impoundment" means a native soil or lined basin either below or above ground level which is designed, maintained and/or operated to store, recycle, treat and/or dispose of industrial wastewater or stormwater, and shall include but is not limited to lagoons, excavations, basins, diked areas, and pits.

"**Synthetic liner**" means a manufactured liner material composed of plastics, resins or other flexible materials, which is designed and manufactured to be used to control the seepage or release of waste through the liner material.

"Tank system" means any subsurface disposal system which involves the storage and treatment of wastewater.

"Total retention surface impoundment" means a surface impoundment designed and constructed without an outfall structure.

"U.S.C." means United States Code.

"Waste class" means the following classification of wastewater, including stormwater:

(A) Class I: containing or suspected to contain pollutants for which the toxicity, concentration and volume pose a significant risk of harm to humans, aquatic life, wildlife or the environment, either through high potential to migrate in groundwater or the likelihood, if discharged, to significantly degrade the beneficial uses of the receiving water as designated in the Oklahoma Water Quality Standards. These wastewaters require the most restrictive environmental protection measures.

(B) Class II: containing or suspected to contain pollutants for which the toxicity, concentration and volume pose a moderate risk of harm to humans, aquatic life, wildlife, or the environment, either through the potential to migrate in groundwater or a reasonable possibility, if discharged, to degrade the beneficial uses of the receiving water as designated in the Oklahoma Water Quality Standards.

(C) Class III: containing or suspected to contain pollutants which do not pose a substantial risk of harm to humans, aquatic life, wildlife, or the environment because of a relative immobility in groundwater or a general lack of direct toxicity, and which are not likely, if discharged, to degrade the beneficial uses of the receiving water as designated in the Oklahoma Water Quality Standards.

(D) Class IV: containing only sanitary wastewater from industrial facilities. Class IV wastewaters are not subject to this Chapter, but are governed by OAC 252:641 (under 5,000 gpd) or by OAC 252:656 (5,000 gpd or more).

(E) Class V: industrial wastewater not otherwise classified.

''Waste containment system'' means storage tanks, containers and other storage reservoirs, transfer lines, pumps, fittings, overfill prevention devices, and any associated anticorrosion measures and leak prevention or detection systems.

SUBCHAPTER 9. TANK SYSTEM STANDARDS

252:616-9-1. Authorized use of tank systems

The use of tank systems for all wastewater classifications is authorized as follows:

(1) Existing tank systems without subsurface absorption trenches or lateral lines can be used for the treatment of Class I, II, III, and V wastewater.

(2) Existing tank systems with subsurface absorption trenches or lateral lines are subject to the Underground Injection Control permitting process.

(3) To ensure the protection of groundwater in accordance with OAC 785:45-7 252:730, new tank systems shall not utilize subsurface absorption trenches or lateral lines for disposal or dispersal of industrial wastewater.

SUBCHAPTER 11. LAND APPLICATION STANDARDS

252:616-11-1. Restrictions

(a) **Beneficial use.** No person may land apply sludge or wastewater except for the purpose of beneficial use.

(b) **Manner.** Land apply sludge and wastewater in a manner to prevent surface runoff and to control objectionable odors. Incorporate sludge into the soil before the end of each working day (material from impoundments that is recovered as product is exempt). Do not store or land apply, or allow to runoff, sludge or wastewater to wetlands or waters of the State. Discharges to waters of the State are prohibited without a discharge permit under OAC 252:606.

(c) **Storage.** Store industrial sludge as specified in the MOP. Industrial sludge shall not be stored for greater than six (6) months without prior written approval from the DEQ and in no case for longer than one (1) year.

(d) **Endangered or threatened species.** Do not land apply if it is likely to adversely affect a threatened or endangered species listed under section 4 of the federal Endangered Species Act, 16 U.S.C. 1533(c), or the critical habitat of such species.

(e) **Topography.** A land application site shall have minimal slope or be contoured to prevent ponding and soil erosion. No application shall occur on land having a slope exceeding five percent (5%) unless erosion and runoff control provisions are implemented, except that land having a slope of ten percent (10%) or less. Land having a slope greater than ten percent (10%) may be utilized for land application only with Department approval. For land application for dust suppression on roadways, clean wastewater hauling vehicles prior to leaving the site with provisions for disposition of rinse water.

(f) Waste classification. Do not land apply Class I or II wastewaters.

(g) **Scenic river basin prohibition.** Do not land apply industrial sludge in a scenic river basin as defined by OAC 785:45 252:730 Oklahoma's Water Quality Standards.