Unraveling The CT EPA Regulations

Triumvirate Environmental

November 12, 2009



Rountdtable Series

Today's Speaker's

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Today's Topics

≥EPCRA

Air

- Greenhouse Gas Initiatives requirement
 - States New England
 - EPA Greenhouse Gas Initiative
- CT DEP Proposed Regulation Amendments

⊔Hazardous Waste

- CT DEP Hazardous Waste Regulations
- Proposed Universal Waste Addition of Pharmaceuticals
- EPA Lab Rule



Today's Topics

- □ Oil SPCC Dec 2008 Amendments
 □ Industrial Storm Water
- □ Aquifer Protection Planning
- **CT & EPA Audit Policy Interim Approach**



Emergency Planning & Community Right-to-Know Act



EPCRA – Chemical Inventory Reporting

⊔Tier I and Tier II Forms

- Removed from CFR, now on EPA website
- NAICS code required
- Chemical or common name on MSDS must be provided

❑Hazardous Chemical Inventory Reporting for Chemicals in Mixtures

 Threshold quantity determination for EHSs must be total quantity of pure form and in mixtures



EPCRA – Toxic Chemical Release Inventory Reporting (TRI)

- **∠**Effective as of the July 1, 2009 filing deadline
- **∖**All reports on persistent, bioaccumulative, and toxic (PBT) chemicals <u>must</u> be submitted on "Form R"
- ▶For all other chemicals, Form A may be used if the annual reporting amount is 500 lbs or less and less than 1 million pounds manufactured, processed or otherwise used.

(3,500 additional facilities nationwide are now required to report)



Air Emissions Greenhouse Gas Initiatives



Regional Greenhouse Gas Initiative

Solution >>> The Regional Greenhouse Gas Initiative, Inc.
(RGGI, Inc.) –

- Non-profit corporation
- CO2 Budget Trading Programs ten participating states

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- Market based
- Fossil fuel electricity generators

Regional Greenhouse Gas Initiative

Section Secti

- Development and maintenance of a data reporting system to track CO2 allowances
- Implementation of a platform to auction CO2 allowances
- Monitoring the market
- Providing technical assistance for emissions offset projects
- Providing technical assistance to evaluate proposed changes to the states' RGGI programs

Solution Series Series



Ten States Involved with RGGI

VConnecticut **N**Delaware **⊻**Maine **⊻**Maryland **Massachusetts New Hampshire № ∠New Jersey New York** NRhode Island **∀**Vermont

Substant States The first mandatory cap-and-trade program in the United States to reduce global warming gas emissions.



Cap-and-Trade System

⊠Market-based cap and trade

- Set amount of allowances for CO₂ emissions are issued through auctions
- 1 allowance= X tons of CO₂ emissions

□Facilities can buy, sell and trade allowances for current market value

- Incentive to abate emissions and sell allowances for \$
- Companies that can't afford to abate; purchase more allowances

Service Servi

☑<u>RESULT:</u> Emitters are forced to permanently lower emissions



Greenhouse Gases – CT State



CT DEP Carbon Dioxide Project – July 2008

❑CT – Control of Carbon Dioxide Emissions/Carbon Dioxide Budget Trading Program and Emission Offset Projects

•Will allow both allowance set-asides and auction revenues

Subscreases use of energy efficiency, renewable energy and cleaner generation

∠Voluntary renewable set-aside provision



Greenhouse Gases - EPA



Final EPA Greenhouse Gas Initiative

❑Reporting threshold is 25,000 metric tons of CO2 per facility per year

□- Schools/Universities are <u>not</u> exempted

□- An estimated 13,000 facilities will be required to report

→- Industries include suppliers of fossil fuel and industrial chemicals, manufacturers of motor vehicles and engines, and large direct emitters of greenhouse gases

☑First report due in 2011 for calendar year 2010, except for vehicle and engine manufacturers which would begin reporting for model year 2011

Settimated cost for private sector is \$160 million for the first year and \$127 million each subsequent year (\$13K/facility)

△April 24, 2009 was the Deadline for Written Comments



CT DEP Proposed Revision SIP- July 27, 2009

≥Proposed State Implementation Plan (SIP) Revisions

- Visibility protection requirements
 - Also satisfies the Regional Haze Rule
- Update to Reasonably available control technology requirements

❑Connecticut attainment deadline of 2010❑Public Hearing was held on August 27, 2009



MassDEP Mandatory Greenhouse Gas Reporting Emergency Regulation – Dec. 2008

EPA Emergency Generators – Fuel Criteria

- October 1, 2010 Stationary Compression Ignition Internal Combustion Engines (CI ICE) sources with a displacement of less than 30 liters/cylinder
 - must use non-road diesel fuel that meets sulfur content, octane index, and maximum aromatic content requirements (40 CFR 80.510(b))



U.S. EPA & CT DEP Hazardous/Universal Waste Rules



Hazardous Waste Identification

❑CT DEP requires generators to document all waste characterizations

- Must be done annually or whenever the generation process changes.
- Must be a documented evaluation that shows "a clear demonstration of the waste characterization".
- If using "knowledge of process", must document that information, including Material Safety Data Sheets (MSDSs), disposal facility waste profile sheets and analyses, raw product technical specifications, and other similar documents
- All test results and "knowledge of process" information for each waste must be kept for at least three years, including nonhazardous wastes.



State Waste Codes- CT DEP

- Solution Notice Series Series
- Sum Science S
 - CR01- PCBs and contaminated materials
 - CR02- Oil and petroleum can no longer be used
 - CR03- Oil and petroleum can no longer be used
 - CR04- Free flowing hazardous materials
 - CR05- Any solid or semi-solid chemical from public uses



State Waste Codes-Cont.

❑CR01- Any material containing or contaminated with PCBs, conc. 50ppm

Solution Sector Sector

Sector S

Subscription Sector Se

- Toxic
- Hazardous to handle
- May contaminate ground or surface water

❑CR05- Any chemical solid or semi-solid that comes from commercial, industrial, agricultrual, or community related activities



State Manifest Requirements

❑Applicability- A generator who transports, or offers for transportation, hazardous waste for off-site treatment, storage or disposal

□In addition to federal requirements, small quantity generators in CT are:

- Subject to manifest requirements; and
- Are not exempted from manifest requirements when they have a contractual agreement with a reclaimer.

Must make a legible photocopy of the top page of the completed manifest and send to CT DEP within seven (7) days

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Inspection Requirements

❑Applicablity- Inspection requirements apply to all SQGs, LQGs, and TSDFs

Nust inspect facility for any deficiencies which may cause or lead to a release of hazardous waste or which may pose a threat to human health

❑A written inspection schedule needs to be created and maintained onsite



Written Inspection Schedule

Schedule needs to include all of the following:

- monitoring equipment
- safety and emergency equipment
- security devices
- operating and structural equipment
- containers
- container storage areas
- containment systems
- tanks and ancillary equipment
- loading and unloading areas



Written Inspection Schedule Cont.

Plan needs to;

✓Identify the types of problems to be looked for during an inspection

Specify the frequency of inspection for all items on the schedule

 containers, container storage areas, containment systems, and battery storage areas must be inspected weekly; tanks and loading/unloading areas subject to spills must be inspected daily; and it is advised that safety and emergency equipment be inspected at least monthly

 Yremedy any deterioration or malfunction of equipment or structures which the inspection reveals; and

⊻record inspections in an inspection log or summary.



Inspection Summary

⊔The inspection summary must include the following;

- Date and time of the inspection
- Name of the inspector
- Notation of observations made; and
- The date and type of any repairs or other remedial actions.



Federal RCRA Training-LQG

- **△Applies to Large Quantity Generators only**
- **New employees must be trained within 6 months**
- **∠Must be repeated annually**
- **∠**Requires specific recordkeeping,
- Solution Number Num



State RCRA Training Requirements

- Solution States Can Extend these Federal LQG Training Requirements to Smaller Generators
- Subscription Series Se
- **❑Connecticut- SQGs and CESQGs**



Main Accumulation Closure Rules

❑ Applies to generators who plan to discontinue storing hazardous waste

- Includes those relocating a waste storage area within their facility
- ☑ Must characterize any residual contamination, clean it up, and verify that the clean-up is complete.
- ↘ Recommended, or in some cases required to;
 - Document all of your closure activities, including photographs
 - Maintain analytical results of samples
 - Maintain copies of manifests if decontamination activities generated waste



Universal Waste

The EPA identifies four categories of Universal Waste:

- Mercury-containing lamps (e.g., fluorescent, UV, metal halide, sodium);
- Dry cell and sealed batteries (e.g., gel-cell lead acid, lithium, mercury, button batteries silver oxide, nickel-cadmium);
- Mercury-containing thermostats; and
- Pesticides collected as part of a pesticide collection program
- State Universal Waste Rules may add additional categories of universal waste



Universal Waste-CT

❑Cathode ray tubes- CRTs

 monitors, oscilloscopes, radar screens, picture tubes-due to lead content in the glass

□Electronic Scrap- used electronic equipment



Ct Waste Oil Regulations

Non-RCRA hazardous waste

Designated CR02 or CR03

Liquid Non-RCRA Hazardous Wastes must be treated and disposed of by a permitted CGS Section 22a-454 Waste Facility

May qualify to be burned on-site in a boiler, industrial furnace, or space heater

•Must be in accordance with Connecticut's recycling regulations.

•The DEP Bureau of Air Management must be contacted prior



Federal Oil SPCC Regulations

Finalized - 11/10/2009



Oil SPCC – 2008 Amendments

- **∖**Amends the facility security requirements
- Solution Soluti Solution Solution Solution Solution Solution Solution Solu
- Sector-specific changes for agriculture and oil production facilities
- Solution Series Amends integrity testing requirements for certain types of animal fat or vegetable oil



Oil SPCC – Dec. 2008 Amendments

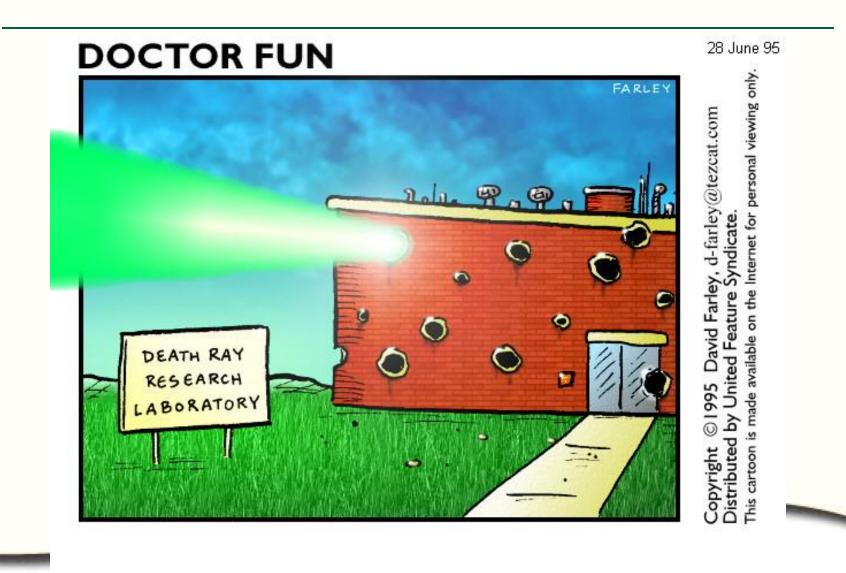
UPDATE: Effective date extended to JANUARY 14, 2010; comment period ended May 1, 2009

Streamlining and additional flexibility

- Tier I Qualified Facilities <10,000 gallon AST and largest tank no greater than 5000 gallons may use EPA Plan Template and Self-Certify
- Amends the definition of "facility"
- Amends the facility diagram requirement
- Defines "loading/unloading rack"
- Amends the general secondary containment requirement
- Exempts non-transportation-related tank trucks from sized secondary containment requirements



Let's take a short break



U.S. EPA Hazardous/Universal Waste Rule Amendments



EPA Proposed Amendment to the Universal Waste Rule – Addition of Pharmaceuticals

- **▶Proposed Dec. 2, 2008**
- Substance Science Sci
- **□Defines "pharmaceutical"**

Waste determination:

- P-listed
- U-listed
- Characteristic

⊔Could affect:

- Pharmacies
- Hospitals
- Physician's offices
- Other healthcare practitioners
- Outpatient care centers
- Ambulatory health care services
- Residential care facilities
- Veterinary clinics
- Reverse distributors



EPA Proposed Amendment to the Universal Waste Rule – Addition of Pharmaceuticals

≥Exceptions

- Syringes containing residue of a P- or U- listed drug hazardous waste only if the residue exhibits a hazardous waste characteristic
- Epinephrine salts
- Medicinal nitroglycerin

∠Accumulation time limit

Small and large quantity handlers

Storage and labeling Storage and labeling

UTracking shipments

⊔Employee training



U.S. EPA – "Lab Rule" Adoption



EPA "Lab Rule"

□Dec. 1, 2008 – Part 262 Subpart K

Solutional RCRA Solution Standards for labs in "eligible academic entities" Standards for labs in "eligible academic entities"

- Colleges and universities, teaching hospitals, or non-profit research institutions with formal affiliation agreement with a college or university
- Only applicable in laboratory areas

⊔Based on Laboratories XL Project (Boston College, UMV, UMass)



EPA "Lab Rule"

∠Example provisions

- Accumulation of unwanted chemicals/chemical waste for up to 6 months
- Excludes annual lab clean-outs from hazardous waste generator status determination
- Flexible container labeling and accumulation start date marking standards
- Delegation of hazardous waste determination responsibilities form lab personnel to trained individuals

❑Optional standard - requires written Laboratory Management Plan



EPA "Lab Rule"

State	Regulatory Agency	Lab Rule Promulgation Forecast		
		Likely to Adopt by 2010	Not Likely to Adopt	Haven't Decided
Northeast Region				
Massachusetts	Department of Environmental Protection			
Maine	Department of Environmental Protection		\checkmark	
Vermont	Department of Environmental Conservation	\checkmark		
New Hampshire	Department of Environmental Services		\checkmark	
Connecticut	Department of Environmental Protection	\checkmark		
Rhode Island	Department of Environmental Management			\checkmark
New York	Department of Environmental Conservation			\checkmark
New Jersey	Department of Environmental Protection			



Storm Water Updates State and Federal



EPA Multi-Sector General Permit – Stormwater from Industrial Activities (Sept. 2008)

- **≥Notice of Intent additional information required**
- **凶**Monitoring and reporting
 - Benchmark monitoring values updated
 - Benchmark monitoring schedule changes
 - Storm event criteria changes
 - Benchmark exceedence corrective action requirements



EPA Multi-Sector General Permit – Stormwater from Industrial Activities (Sept. 2008)

MSGP Corrective Actions

- Conditions Requiring Review and Revision to Eliminate Problem
- Conditions Requiring Review to Determine if Modifications are Necessary
- Deadlines

Water-Quality Based Control Measures

Non-Numeric Technology Based Effluent Limits

❑CT – Stormwater Construction General Permit 10/1/08



CTDEP Wastewater Discharge Permitting

❑ Regulates discharges to waters of the state

 Includes surface waters, ground waters and Publicly Owned Treatment Works

∠Applicability

•Any person or municipality that discharges water, substances, or materials into the waters of the state is required to obtain a permit prior to commencing the discharge.

Both individual and general permits ∠



Ground Water Discharge Permit

- Regulates discharges to ground water from any source, including but not limited to large septic systems, agricultural waste management systems, and all waste landfills.
 - Administered by CTDEP
- ❑ Required to evaluate the hydraulic characteristics of the site.



Pre-treatment Permit Program-CTDEP

- ☑ Regulates discharges to a POTW
- ❑ All wastewaters that are hauled directly to a POTW will require either;
 - pre-treatment permit, or;
 - regulated under the POTW's permit.
 - must submit permit renewal at least 180 days prior to expiration.
- अ May be required to receive prior approval from the affected POTW.
 - large discharges may be required to assess the hydraulic, organic and toxic loading impacts upon the affected POTW.



Storm Water – Industrial Activities

❑CT – General Permit Renewal extended until Sept. 30, 2010.

New General Permit – Release Pending Q1, 2010

KEY CHANGES:

- New registration and fee of required
 - <50 Employees = \$500 and >50 Employees = \$1000
- 10 Industrial Sectors added with Specific Requirements
- Stormwater Pollution Prevention Plan must be publicly available.
- Monthly Inspection Required (Maintain Documentation)
- Quarterly Sampling and Visual Inspection
- Semi-Annual Sampling and Laboratory Analysis Req'd
- PE or CHMM must review and sign-off on SWPPP.
- Effluent Limitations for Specific SIC Coded Industries



Aquifer Protection Plans

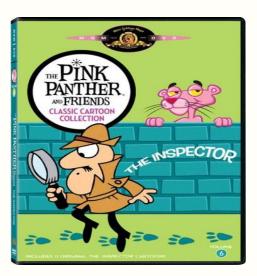
- ❑ Administered by CTDEP, municipalities and water companies
- ☑ Protects major public water supply wells in sand and gravel aquifers
- **凶** Establishes Aquifer Protection Areas
- Restrict development of certain new land use activities that use, store, handle or dispose of hazardous materials
 - existing regulated land uses to register and follow best management practices



CTDEP & EPA – Audit Policies

❑ CTDEP RCRA Assistance Program

• Goal: Perform 5+ Voluntary Audits in 2010 for SQG and CESQG





Develop a Compliance Calendar

└ Compliance Calendar

- Will track all of your facilities regulatory requirements
- Ensures accountability for completion of projects
- Track trainings
- Ensures continuous compliance





Questions?

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