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# **State Minimum Standards History and Overview**

# Objectives

- **Review changes to California state law that had an impact on the development of state minimum standards for solid waste facilities and operations**
- **Review the changes in regulations over time**
- **Review the definition of state minimum standards.**
- **How to evaluate state minimum standards**
- **Discuss the Inventory Process and the Minor Violation Process**

# Waste and Culture

- **1890s** Most discards were **ash**, kitchen waste was burned, fed to dogs and pigs, or thrown into streets, gardens, and outdoor toilets
- **1950s** Baby boomers start, more money to buy new things, **Disposable products encouraged**  
People didn't think about recycling as resources seemed limitless.
- **1990s** More convenience, more time saving products and gadgets.  
Direct mail advertising. Bigger! And better!  
**More stuff to throw away**
- **2000s** **Green and Sustainability** is the way of thinking for consumers and manufacturers, energy, and cost savings



# California Statutes

- **Statutes of 1920s**

Boards of Supervisors are assigned to oversee **Garbage Disposal Districts** and to make and enforce regulations for collection and disposal of garbage

- **Statutes of 1930s**

Garbage Disposal Districts transferred to the newly formed **Health and Safety Code**. Authorized a Board of Supervisors to grant franchises, not to exceed 25 years

# First Sanitary Landfill: Fresno

- Fresno Landfill opened in 1937, closed in 1987
- Oldest “true” sanitary landfill in the United States
- Oldest compartmentalized municipal landfill in the western US
  - Employed trench and fill and the first to utilize compaction
  - Layering of refuse and dirt in trenches
  - Covering the filled areas daily
- On National Registry of Historical Places
- Currently a Superfund site, remediating groundwater contamination



# Statutes: 1970s – '80s

- **1970s**

Nejedly-Z'berg-Dills - 10 member State Solid Waste Management Board to adopt **minimum standards** for the protection of air, water, and land

State Department of Public Health **minimum standards** for protection of the public health

Local Enforcement Agencies established.



- **1980s**

Board to adopt **performance standards** as an alternative daily cover

Board study on **methane gas** and develop specification for gas migration systems and **maximum concentration standards**

State Solid Waste Management Board renamed California Waste Management Board

# Statutes: 1980s (cont.)

Solid Waste Disposal Site Cleanup and Maintenance Account requires closure and postclosure maintenance plans (Eastin Fund)

The Integrated Waste Management Act – CIWMB required to adopt **minimum standards** for SW handling and disposal to protect air, water, and land from pollution (AB 939)

Board to provide training to LEAs

California Waste Management Board renamed California **Integrated** Waste Management Board

# Statutes: 1990s

CIWMB to consult with air agencies on **regulations** for monitoring and control of **subsurface migration of landfill gas**

Landfill closure, postclosure **financial assurances**

**Standards** for the design, operation **shall not** include aspects solely of local concern or within the jurisdiction of air and water agencies

**Beneficial reuse** of materials at a landfill, including daily cover, constitutes **diversion through recycling**

New **regulations** for the use of alternative daily cover

Responsibility for **compost odors** moved to LEAs, air districts to report complaints to LEAs

# Statutes: 2000-2007

Inerts to surface mining reclamation not subject to tipping fees, CIWMB to develop **regulations**

LEAs required to hold a **public hearing** on permits

CIWMB required to adopt **regulations** to define “significant change”

Clarifications on **Cease and desist** orders

**Regulations** for temporary permits

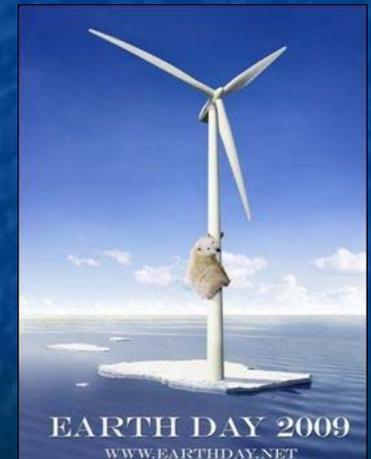
Greenhouse gas and climate change (AB 32)

# Statutes: 2008-2009

Enforcement provisions, repeal of the automatic stay,  
CIWMB can take **direct enforcement** action under  
certain circumstances, establishes **minor violations**

SB 63

<http://www.ciwmb.ca.gov/Statutes/Legislation/PriorityRpt/>



# Regulations

- Code of Federal Regulations
  - Resource Conservation and Recovery Act (1976)
    - Subtitle D
    - Subtitle D revisions (1991)
- California Code of Regulations,
  - Title 14 – solid waste handling, operations, facilities
  - Title 27 – landfills

# Regulations

- 1974  
State Minimum Standards
- 1977  
Implementation of RCRA
- 1978  
General updates to SMS
- 1991  
LEA requirements
- 1992  
Tire storage requirements

# Regulations: 1993-1999

Implementation of Sub Title D

Regulatory Tiers

Composting Operations

Contaminated Soils

Transfer Stations: Tiers

Asbestos-Containing Waste

Landfill Regulatory Reform – Created Title 27

Financial Assurances Enforcement

Ash Handling

Chipping, Grinding, and Vermicomposting

Alternative Daily Cover

Financial Assurances Mechanisms

Revise Transfer/Processing Stations

# Regulation: 2000-2007

Enforcement and Compliance Procedures

Nonhazardous, Nonputrescible, Industrial Wastes

Putrescible Wastes Transfer/Processing

Construction/Demolition Inert Debris

Tire Monofills

Revised Compostable Materials

Inventory of SW Facilities that Violate SMS

Revised Application for SW Facility Permit

Revise Alternative Daily Cover

Long-Term Landfill Gas Violations

Research, Development, and Demonstration (Landfill)

Active Disposal Site Gas Monitoring and Control

Permit Implementation

# Regulations: 2008-2009

Mammalian Tissue Composting

Temporary Solid Waste Facilities Permits

Revised Temporary Waiver of Terms

Closure and Postclosure Maintenance Costs Estimates

Revised Active Disposal Site Gas Monitoring and Control  
(Compliance Deadlines)

In Process

Long-Term Postclosure Maintenance and Corrective  
Action Cost Estimates and Financial Assurance  
Demonstrations for Landfills (Phase 2)

# Future Regulation Changes?

## Sections in Review\*

ADC

Food Waste and Composting

Organic disposal versus beneficial use

3 Part Test and Green Waste Contamination

Farm and Ranch Composting Tiers

Conversion Technologies

\*Supported by science, market sensitive, recognizes new technologies

# California Code of Regulations

## Title 27 - Landfill Requirements

Combined CIWMB and SWRCB

Active and Closed Sites

Full Permit Processing

## Title 14 – Other Facilities

Tires

LEA Certification

Transfer/Processing

Tire Monofill

C&D

Tiered Permits

Composting

Soil Processing

# What are SMS?

- **Title 14**

- **Section 17204. Intent of Standards.**

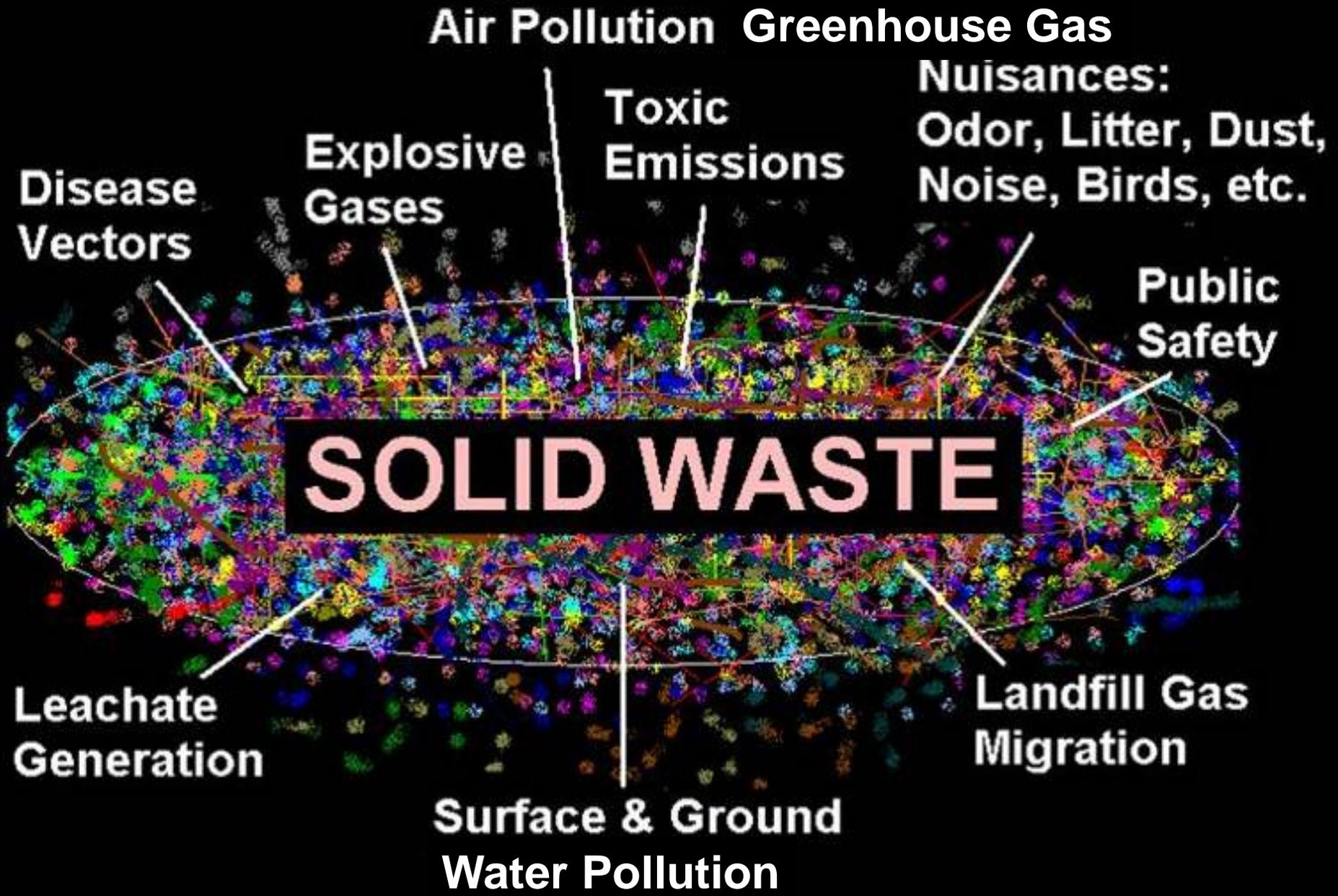
- Standards... describe required levels of **performance** rather than detailed requirements...operators and designers shall be **permitted flexibility** in meeting the objectives set by the standards...The enforcement agency may accept, modify, reject, or replace the operator's proposal, ....

- **Section 18361. (c) ... State minimum standards regulate the **design and operation** of solid waste facilities in order to **protect public health and safety and the environment** in Title 14 or Title 27**

# What are SMS?

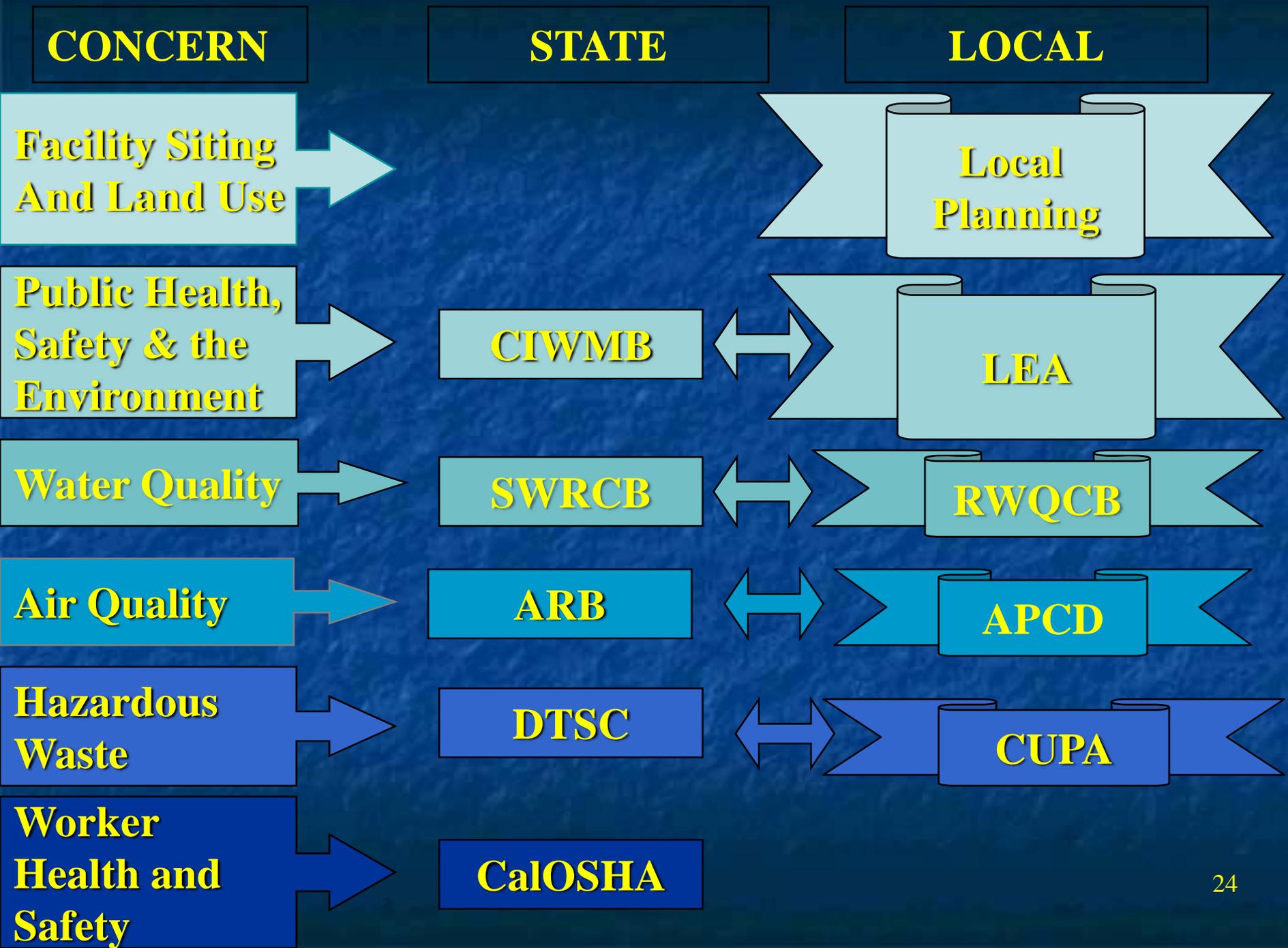
- **Title 27**

**Section 21064 -State Minimum Standards** means the following sections of this Subdivision for the purposes of implementing Public Resources Code Section 44104: 20510 to 20701, 20710 to 20937, 21100 to 21200, 21430 and 21600



# Regulatory Agencies

- **Local Government** - planning, collection, facility siting
- **CA Integrated Waste Management Board - Solid Waste Local Enforcement Agencies** – design and operation
- **State Water Resources Control Board - Regional Water Quality Control Boards** - Surface and ground water quality
- **CA Air Resources Board - Air Quality Management Districts, Air Pollution Control Districts** - Clean Air Act
- **Department of Conservation** - bottle, can recycling
- **Department of Toxic Substances Control - Certified Unified Program Agency** - hazardous waste
- **Department of Industrial Relations, Division of Occupational Safety and Health, Cal OSHA\*** - worker health and safety



# Focus of Standards

- **Most are performance based**
  - minimize, prevent, protect, adequate measures to minimize, controlled, maintained, appropriate, ensure, promote, sufficient quantities
- **Some are prescriptive**
  - must not exceed 1.25%                      must not exceed 5%
  - at least 6 inches                              remove in 48 hours
  - 1% putrecible                                  10% residual
  - maximum Acceptable Metal Concentrations
  - Constituent Concentration (mg/kg) on dry weight basis
  - density of fecal coliform

# Compliance First: Evaluating SMS

- **Proactive**

Education, mutual understanding, clear expectations, thresholds and limits

- **Consistency**

Day to day

Inspector to inspector

Site to site

Jurisdiction to jurisdiction

Local to state

- **Documentation and Communication**

Clear, complete, and evidenced inspection reporting

Regulation citation

History of compliance, continuity, before and after

Full description of compliance problem– time, date, location, detail observation

Photographs

# Inventory Process

- LEA notes same violation on two consecutive months' inspections.
- CIWMB sends Notice of Intent letter
- Operator has 90 days to correct violation
- If not corrected, added to the “Inventory of Solid Waste Facilities That Violate State Minimum Standards”
- Within 15 days of listing, a compliance schedule must be developed.

# SMS Compliance 2004

- 17258.2 Procedures for HHW
- 17258.29 Record Keeping
- 17407.2 Cleaning Frequency
- 17407.3 Drainage Control
- 17408.5 Nuisance Control
- 17409.2 Sanitary Facilities
- 17410.4 Vector, Bird, & Animal Control
- 17416.2 Lighting
- 17670 Safety Equipment
- 17867(a)(2) Vector/Odor
- 17867(a)(5) Unauthorized Access
- 17867(b)(1) Fire Prevention/Protection/Control
- 17867(b)(2) Telephone or Radio Comm.
- 17869(a) Inspection of Records
- 17869(b) Special Occurrences
- 17869(d) Feedstock and Compost
- 17863 Report of Composting Site Information
- 17863.4 Odor Impact Minimization Plan
- 17867.5 Personal Training
- 17869(a) Inspection of Records
- 20650 Grading Of Fill Surfaces
- 20919.5 Explosive Gas Control
- 20921 Gas Monitoring and  
Control Plan Content
- 20923 Gas Monitoring
- 20925 Perimeter Monitoring  
Network
- 21130 Emergency Response Plan
- 21135 Security at Closed Sites
- 21142 Final Grading
- 21145 Slope Stability
- 21150 Drainage/Erosion Control
- 21160 Gas Ctrl/Leachate Contact
- 21200 Change Of Ownership
- 21600 Report Of Disposal  
Site Information
- 21780 Submittal Closure Plans

# SMS Compliance 2009

17867(a)(3) Random Load Checks

17868.3(d) Temperature  
Monitoring

20520 Signs

20530 Site Security

20650 Grading Of Fill Surfaces

20680 Daily Cover

20700 Intermediate Cover

20830 Litter Control

20820 Drainage/Erosion Control

**20919.5 Explosive Gas Control**

**20921 Gas Monitoring and  
Control**

**21600 Report of Disposal  
Site Information**

**21780 Submittal Plan of Closure  
Plans**

# Minor Violation

- New - 2009
- By definition Minor Violation does not include:\*
  - A violation that results in injury to persons or property (significant threat)
  - A knowing, willful, or intentional violation
  - Chronic violation or recalcitrant violator
  - Results in an emergency response from a public agency
  - Enables the violator to benefit economically from the noncompliance

\*PRC 40150.2

# Minor Violation

- Process found in PRC 45003
- Minor Violation noted on Notice to Comply (NTC) form – identified as an enforcement action.
- Operator must correct by date specified – no more than 30 days
- Operator to sign & return NTC within 5 days or submit notice of disagreement to the EA by compliance date or no more than 30 days
- EA may note a violation on regular inspection report if the operator fails to comply
- NTC can not be appealed to the hearing panel



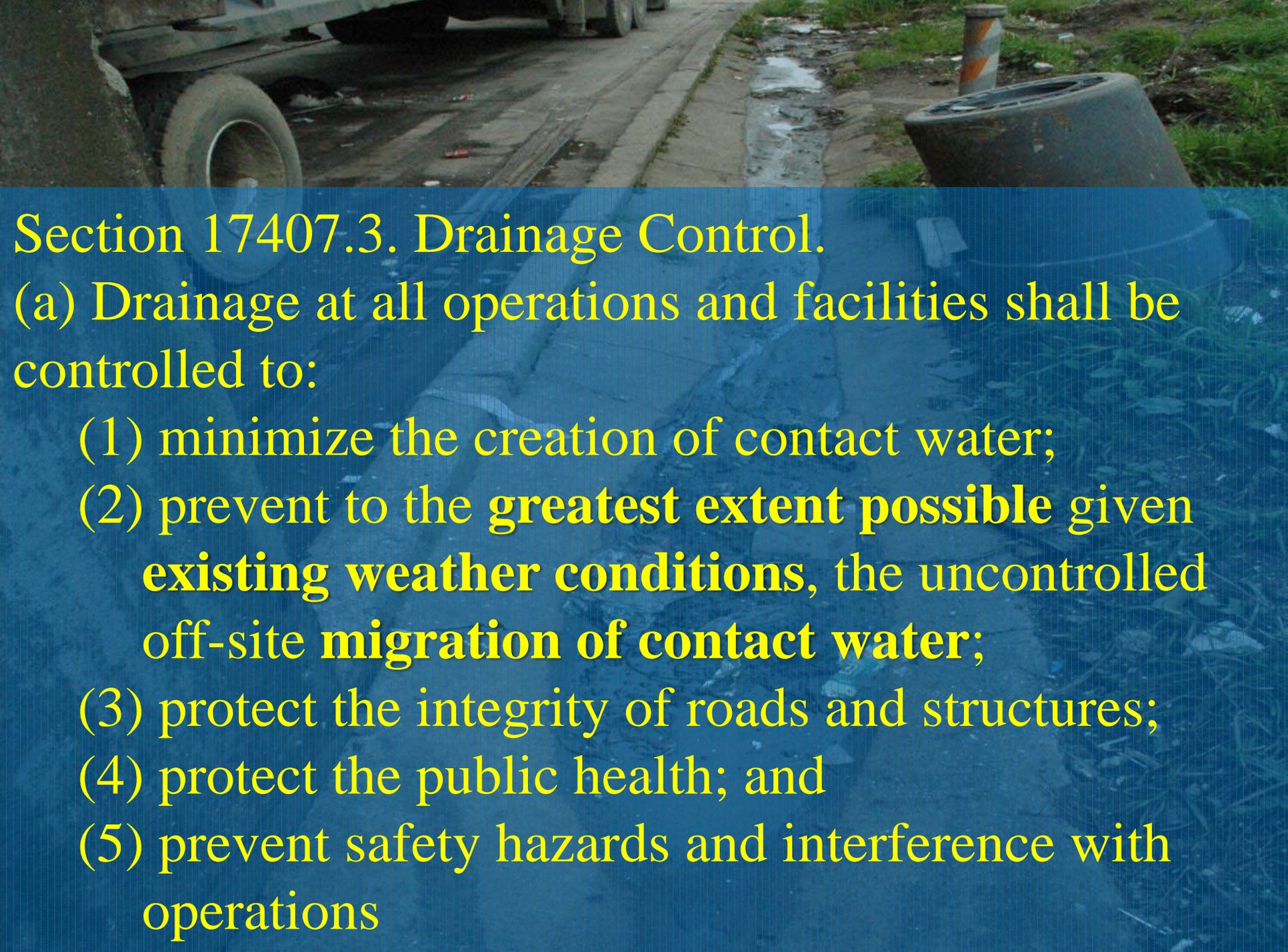
## 20680. CIWMB - Daily Cover

(a) Except as provided in (b), and (f) and Section 20690, the owners or operators of all municipal solid waste landfill units shall **cover disposed solid waste** with a **minimum of six inches of compacted** earthen material at the end of each operating day, or at more frequent intervals if necessary, to control vectors, fires, odors, blowing litter, and scavenging.



## Section 17867. General Operating Standards

(a) (2) All handling activities shall be conducted in a manner that **minimizes vectors**, odor impacts, litter, hazards, nuisances, and noise impacts; and minimizes human contact with, inhalation, ingestion, and transportation of dust, particulates, and pathogenic organisms.



## Section 17407.3. Drainage Control.

(a) Drainage at all operations and facilities shall be controlled to:

- (1) minimize the creation of contact water;
- (2) prevent to the **greatest extent possible** given **existing weather conditions**, the uncontrolled off-site **migration of contact water**;
- (3) protect the integrity of roads and structures;
- (4) protect the public health; and
- (5) prevent safety hazards and interference with operations