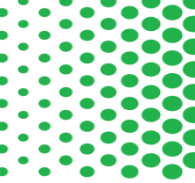




# Contamination

The environmental review, consultation, and other actions required by applicable federal environmental laws described in this training are carried out by FDOT pursuant to 23 U.S.C. § 327 and a Memorandum of Understanding dated December 14, 2016 executed by FHWA and FDOT.

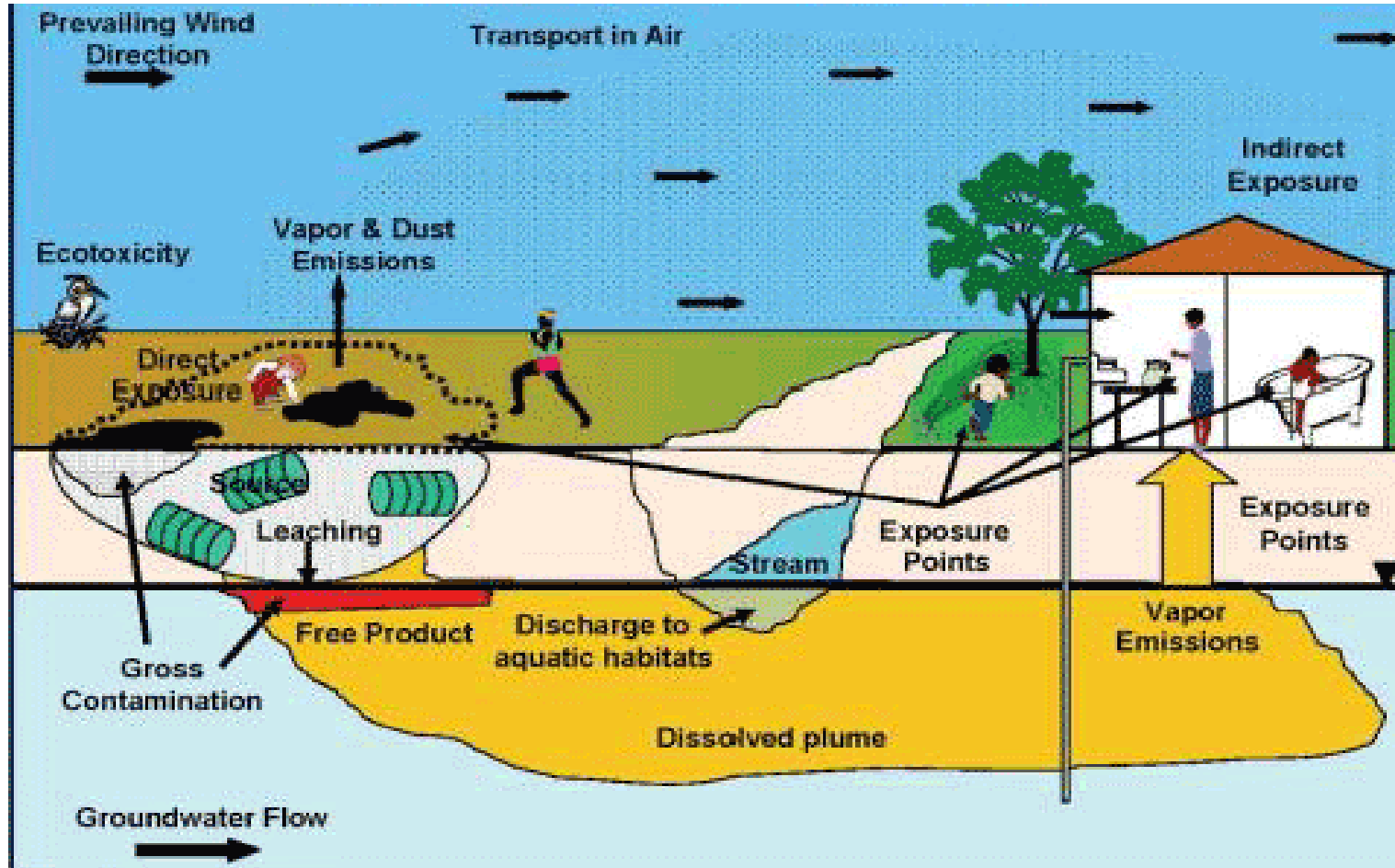




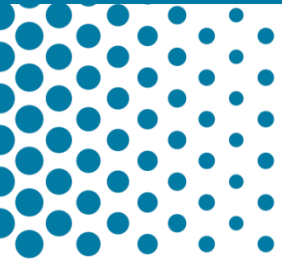
## Chapter 337.27 Florida Statutes (F.S.)

- (4) *When the department acquires property for a transportation facility or in a transportation corridor through the exercise of eminent domain authority, or by purchase or donation, **it is not subject to any liability imposed by chapter 376 or chapter 403 for preexisting soil or groundwater contamination due solely to its ownership.** This section does not affect the rights or liabilities of any past or future owners of the acquired property nor does it affect the liability of any governmental entity **for the results of its actions which create or exacerbate a pollution source.***

# Exposure Pathways



## II. Level I Assessment



## II. Level I Assessment

### Basic Components of a Level I Assessment:

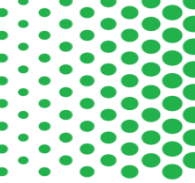
II-A Records review/ Desktop Review

II-B Field Review / Site reconnaissance

II-C Photographic documentation of findings

II-D Rate potential contamination risk for each site

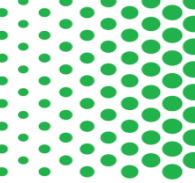
- Impacts are per site and per alignment
- Rating is in terms of “No”, “Low”, “Medium” or “High”
- Scoping for projects.



## II-A. Records Review/ Desktop Review

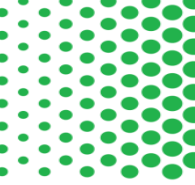
- Review of available regulatory records
  - Includes online and in-person file reviews
- Documentation of current & historic uses
  - Electronic environmental data reports
  - Permit information
  - Regulatory database files
  - Historical address information
  - Historical aerial photos
  - Sanborn Maps

## II-B. Field Review/ Site Reconnaissance



- Look at FDEP and EPA comments
- Changes in topography such as depressions or mounds indicative of subsurface concerns
- Visual indications of surface spills, surface staining, areas of suspect liquids
- Tanks
- Suspicious odors
- Apparent sink holes
- Distressed vegetation
- Ventilation pipes
- Drums, or chemical storage containers

## II-C. Photographic Documentation



Review of historic photos:

- Aerial (Evidence of landfilling, etc.)
- Ground-level photos
- Recent photos



## II-D. Risk Ratings

- Should be established for each suspected site within or adjacent to all proposed ROW limits
- Should be completed for each design alternative.
- Reflect the relative degree of concern that contamination may have on the project's design, construction, or schedule
- Results of the Level I should be included in the Environmental Documents for the project, including a summary of the CSER

## II-D. Risk Ratings

“No” Rating:

- No potential for contamination to impact the project
- No regulatory agency records of violations, spills or releases
- No interview comments indicate concern
- No historical information about past uses indicating contamination (Sanborn maps, historical photos, other records)

## II-D. Risk Ratings

“Low” Rating:

- Former or current activities on the property have an ongoing contamination concern
  - Hazardous waste generator identification (ID) number
  - Handles hazardous materials in some capacity
- Based on all available information and current design, contamination is not likely to impact the project.
- Rating should be based on the current design or the alternative design being studied
  - Sites may be ranked low based on scope of work in the construction area

## II-D. Risk Ratings

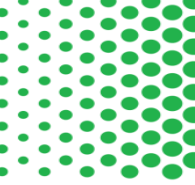


Photo Credit: CB&I

## II-D. Risk Ratings

“Medium” Rating:

- Site has known or suspected soil or groundwater contamination, is currently being remediated or is currently in monitoring only phase.
- Always designated for:
  - Current petroleum operating facilities
  - Non-evaluated former petroleum operating facilities
  - Abandoned UST sites
- Medium sites should be recommended for further assessment in the Level II

## II-D. Risk Ratings



Photo Credit: CB&I

## II-D. Risk Ratings

“High” Rating:

- There is a reasonable potential for contamination impacts during construction, based on all available information and current design plans
- Site should be recommended for further assessment in the Level II

## II-D. Risk Ratings

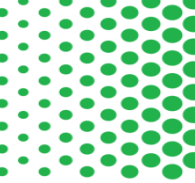


Photo Credit: CB&I



## II-D. Risk Ratings

### Information Sources for Desk Top Review:

Main FDEP website – [www.dep.state.fl.us](http://www.dep.state.fl.us)

FDEP Institutional Controls Registry -  
<http://www.dep.state.fl.us/waste/categories/brownfields/pages/ICR.htm>

FDEP Contamination Locator Map - <https://ca.dep.state.fl.us/mapdirect/?focus=contamlocator>

FDEP Map Direct – <https://ca.dep.state.fl.us/mapdirect/>

FDEP OCULUS Database - <http://depedms.dep.state.fl.us/Oculus/servlet/login>

#### Database companies

ERS - <http://www.reccheck.com/>

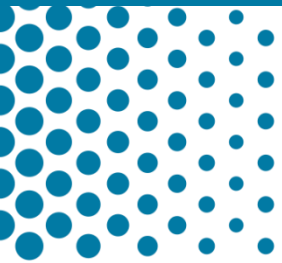
EDR - <http://edrnet.com/>

## II-D. Risk Ratings

### Historical aerial photos:

- Historical Aerials - <http://edrnet.com/prods/historical-aerial-photos/>
  - USGS - <https://www2.usgs.gov/pubprod/aerial.html>
  - FDOT- <http://www.fdot.gov/geospatial/aerialmain.shtm>
- 
- County Specific Property Appraiser Website
- 
- Sanborn maps - <http://edrnet.com/prods/sanborn-maps/>

## IV. CSER/Level I Report

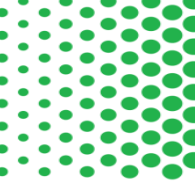


## IV. CSER/Level I Report

*Purpose of the report, Purpose & Need Statement from ETDM Screening Summary report*

- Project Description
  - Proposed improvements
  - Project termini
- Land Uses
- Hydrologic Features
- Methods used to perform Level I Assessment
- Brief description of each alternative
- Identification of contaminated sites on a figure or table
- Ensure contaminated site information is presented in the appropriate NEPA documents

## IV. CSER/Level I Report



*Describe the potential contamination issues*

- Include table that summarizes findings:
  - Contamination concerns
  - Contamination rating
  - Distance from right-of-Way
  - Other contamination-related information on each property in or adjacent to the project area

## IV. CSER/Level I Report

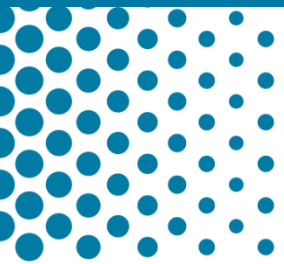
- Discussion of potential contamination impacts on the project
- Provide recommendation as to which alternative would have the least potential for contamination impacts

## IV. CSER/Level I Report

- Figures in the Level I include:
  - Project Location map
  - Land Use map
  - Detailed map showing all potential contamination sites with Low, Medium or High ratings

A revised CSER may need to be done if enough time has elapsed or there has been plan changes.

# V. Field Review





## V. Field Review

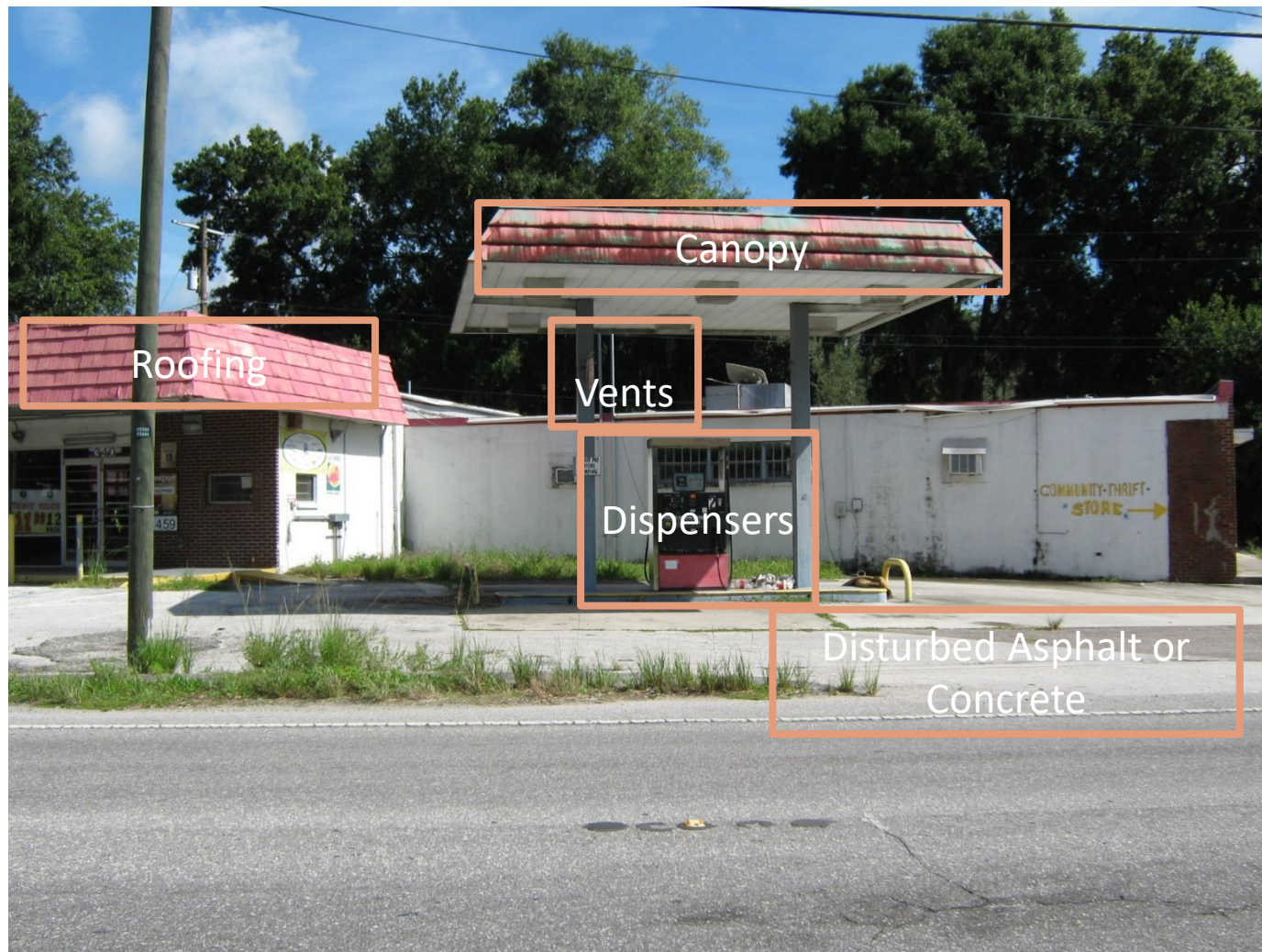
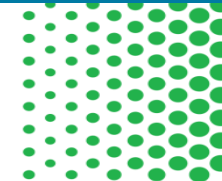


Photo Credit: CB&I

## V. Field Review

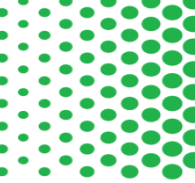


Photo Credit: CB&I

## V. Field Review

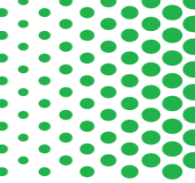


Photo Credit: CB&I

## V. Field Review

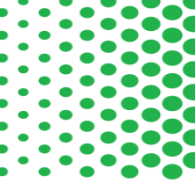


Photo Credit: CB&I

## V. Field Review

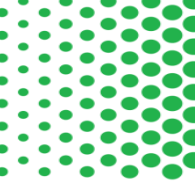
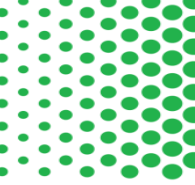


Photo Credit: CB&I



# State Environmental Impact Reports

- SEIRs should summarize the results of the contamination screening evaluation
- the summary should answer the following questions:
  - 1. Are there known or potentially contaminated sites within or near the project area.
  - 2. How did the project avoid or minimize impact to any known or potentially contaminated sites?
  - 3. Are there sites that require additional investigation (i.e. Level II assessment)?
- Upload the *CSE*R or Technical Memorandum, as appropriate, in SWEPT.