An Overview of the
Cook County Liquid Hazardous Waste Ordinance

Kevin Schnoes, Deputy Director, Cook County Department of Environmental Control

Gene Ryan, Chief of Planning, Cook County Department of Homeland Security and Emergency Management
Cook County

- Most populous of Illinois’ 102 counties
- Contains 134 municipalities, covering about 85 percent of the area of the county.
- 5.24 million people - approximately 40 percent of the state population
- Second largest county (by population) in U.S.
- Population is larger than that of 29 individual states
- Covers 946 square miles
Hazardous Materials – Why worry?

- Urban nature of Cook County results in public and residential areas in close proximity to chemical use and storage
- Potential for chemical releases and impacts due to natural and man-made circumstances
Hurricane Harvey

- Aug. 23 - 26 – 46 facilities in 13 counties reported 4.6 M (est.) pounds of airborne emissions that exceeded state limits.
- ~100 spills of hazardous substances reported
- Aug. 24 - Sept. 3 – National Response Center received 96 reports of oil, chemical, or sewage spills

NY Times – Sept. 8
Hurricane Harvey

- More than 22,000 barrels of oil, refined fuels, and chemicals spilled
- ~365 tons of chemicals – sulfur dioxide, ammonia, toluene, benzene, etc. released
Hurricane Katrina

- More than 190,000 barrels of oil, refined fuels, and chemicals spilled
Chemical Use and Storage in Cook County

- Large volume materials
Chemical Use and Storage

- High toxicity materials
Chemical Use and Reporting

• Emergency Planning and Community Right-To-Know Act (EPCRA) – passed in 1986 to help communities deal safely and effectively with hazardous substances used in their area
  ➢ Encourage and support emergency planning for responding to chemical accidents
  ➢ Provide local governments and the public with information about possible chemical hazards in their communities.
Chemical Use and Reporting

- Tier II – annual filing for chemicals designated as “extremely hazardous substances (EHS)” that are above their Threshold Planning Quantity (TPQ) and chemicals requiring an SDS and above 10,000 lbs.

- Information submitted electronically to Illinois Emergency Management Agency (IEMA)
Chemical Use and Reporting

- 2016 Tier II reporting
  - 1,846 facilities submitted in Cook County
    - 1,181 – Suburban Cook
    - 665 – City of Chicago
  - >500,000,000 lbs of 145 different EHS chemicals
  - Types of materials
    - Ethanol
    - Jet fuel
    - Gasoline
    - Acids
Opportunity for under-reporting

- 2016 – 1,846 facilities submitted Tier II information for Cook County (1,181 suburban Cook County)
- ~11,000 commercial/industrial facilities permitted by CCDEC
- ~8,600 listings for RCRA-related facilities in Cook County
- ~380 Large quantity generators
- ~2,700 Small quantity generators
Liquid Hazardous Waste / Tier II Ordinance

• Passed by the Cook County Board in June 2016.
  ➢ Sec. 30-901 – 30-903 (Liquid Waste)
  ➢ Sec. 30-941 – 30-946 (Tier II)
  ➢ Focus on safe management of hazardous waste, increasing the number of facilities filing Tier II, and improving the accuracy of the data reported to IEMA
  ➢ Does not replace or change Tier II reporting
  ➢ Information is intended for planning and response.
• 2016 liquid hazardous waste reporting
  ➢ January – June 2016
    - 3,697 facilities
    - 3,510,077 gals
  ➢ July – December 2016
    - 1,424 facilities
    - 2,762,797 gals
Liquid Hazardous Waste / Tier II Ordinance

• Inspections
  ➢ Storage of chemicals
  ➢ Proper use of basic controls
Liquid Hazardous Waste / Tier II Ordinance

- Inspections
  - Timely repair of leaks, malfunctions, etc.
  - Disposal of waste
• Education on filing requirements
  ➢ When to file
  ➢ What to file
Cook County Planning, Preparedness, and Response

- Cook County Department of Homeland Security and Emergency Management (DHSEM)
  - Integrates first responders, their departments and resources from 134 Cook County municipalities, and serves as the central agency in Cook County for coordinating efforts to prevent, protect against, mitigate the effects of, respond to, and recover from all incidents, whether man-made or natural.
Cook County Multi-Jurisdictional Hazard Mitigation Plan

• Cook County and a coalition of 114 planning partners
• Identify the risks posed by hazards and find ways to reduce their impacts and risk for those who live in, work in, and visit the County
• Considered natural hazards that could impact the planning area
• Identified the following hazards as presenting the greatest concern:
  ➢ Flood
  ➢ Tornado
  ➢ Severe weather
  ➢ Severe winter weather
  ➢ Dam or levee failure
  ➢ Earthquake
  ➢ Drought
• Since 1967, 19 hazard events for which federal disaster declarations were issued
Since 1972, 13 presidential-declared flood events in the County have caused in excess of $628.5 million in property damage.

FEMA has mapped over 78 square miles of 100-year floodplain and 99 square miles of 500-year floodplain along 172 water courses in the Cook County planning area.

Approximately 8 percent of the County is located within mapped 100-year floodplains.
• Between 1955 and 2008, there were 92 significant tornadoes (tornadoes rated F2 or greater on a scale of F1 to F5, or that caused fatalities or injured at least 10 people).
Hazard Mitigation Plan – Severe Weather

- 169 severe weather events for the planning area from 1993 to 2013 represent an average of 8 events per year.
Hazard Mitigation Plan – Dams & Levees

- 23 state-regulated dams
- 3 levee systems
- Mapped inundation areas (dams)
  - Population – 30,135
  - Structures – 12,762
  - Value (structures and contents) - $10.7B
- Levee failure
  - $43.7M (structures)
Accidental Releases
Summary

• Focus of ordinance
  ➢ Proper management of hazardous materials
  ➢ Filing of annual Tier II information
  ➢ Use data for Planning, Preparedness, and Response