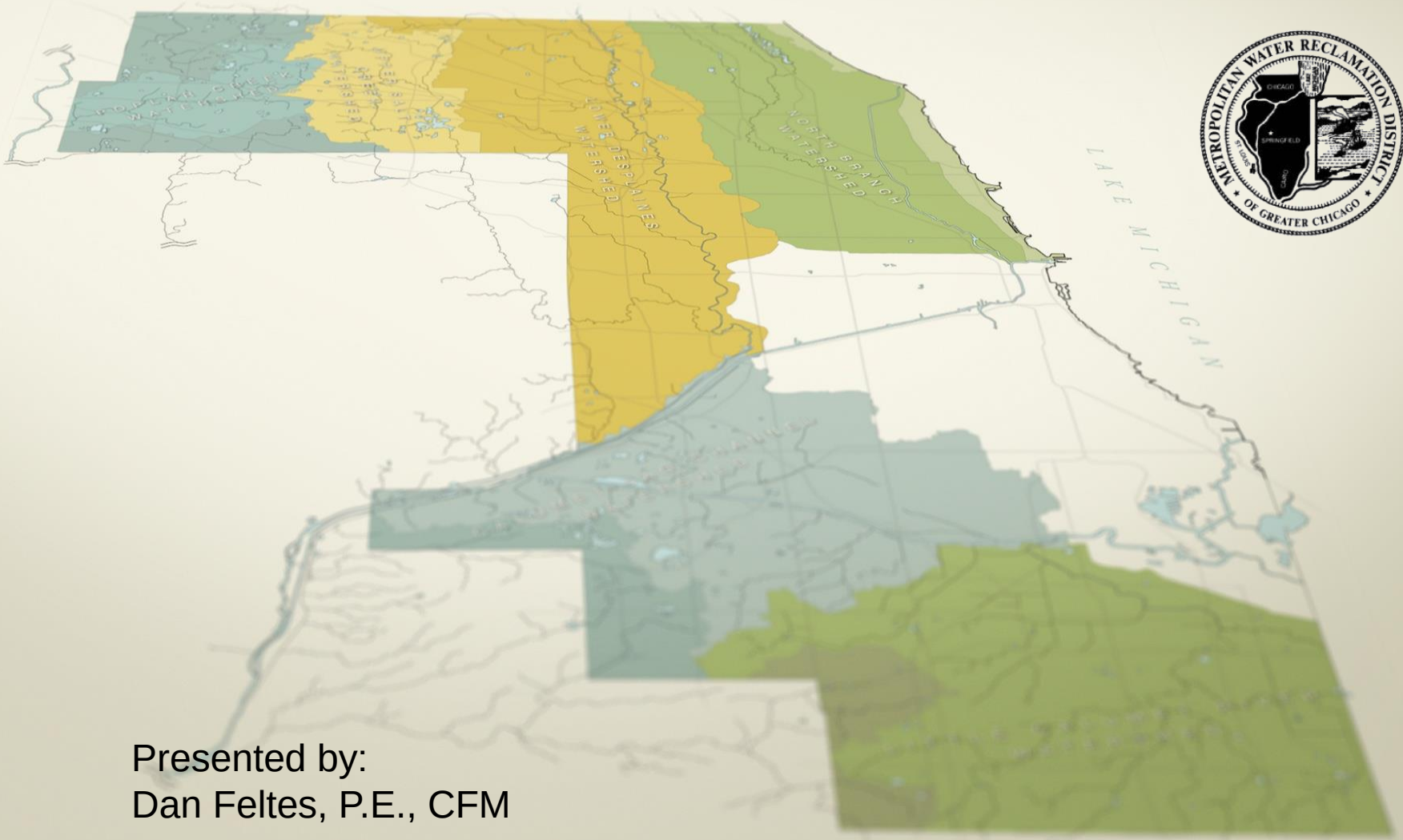
Watershed Management Ordinance (WMO)



Presented by:
Dan Feltes, P.E., CFM

WMO Objective

Establish uniform, minimum, and comprehensive countywide stormwater management regulations

Enabling Legislation

Watershed Management Ordinance

"Stormwater management in Cook County shall be under the general supervision of the Metropolitan Water Reclamation District of Greater Chicago."

"The District may prescribe by ordinance reasonable rules and regulations for floodplain and stormwater management . . . in Cook County."

Public Act 093-1049

Sewer Permit Ordinance

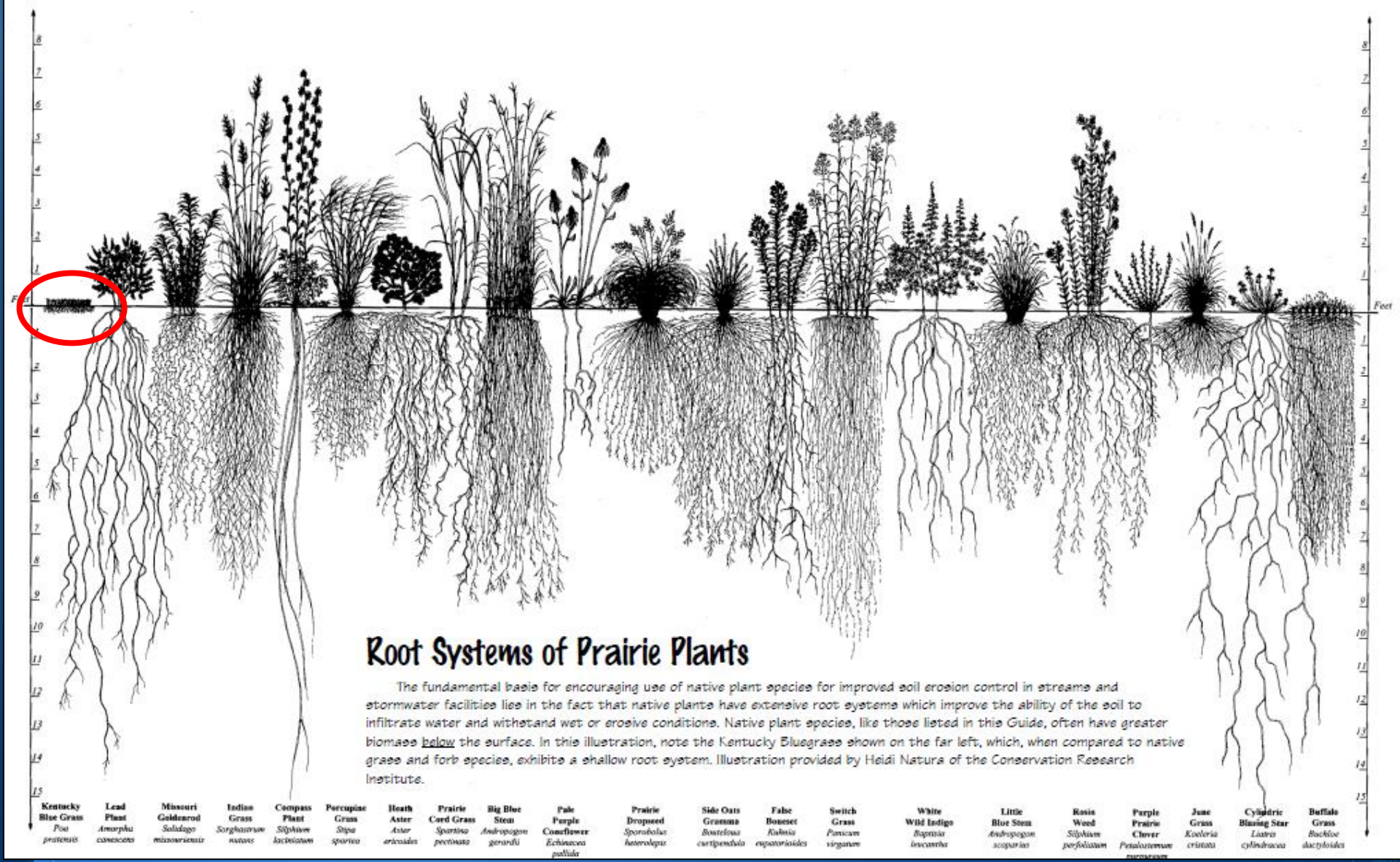
- Sanitary Sewers
- Stormwater Detention
  - TP-40 Rainfall Data
  - Modified Rational Method

Watershed Management Ordinance

- Sanitary Sewers
- Stormwater Detention
  - Bulletin-70 Rainfall Data
  - Flat Release Rate
  - Hydrograph Method
- Volume Control
- Erosion & Sediment
- Flood Protection Areas
  - Floodplain
  - Floodway
  - Isolated Wetlands
  - Riparian Areas

Green Infrastructure (GI) = Volume Control (VC)

(in Consent Decree) (in WMO)



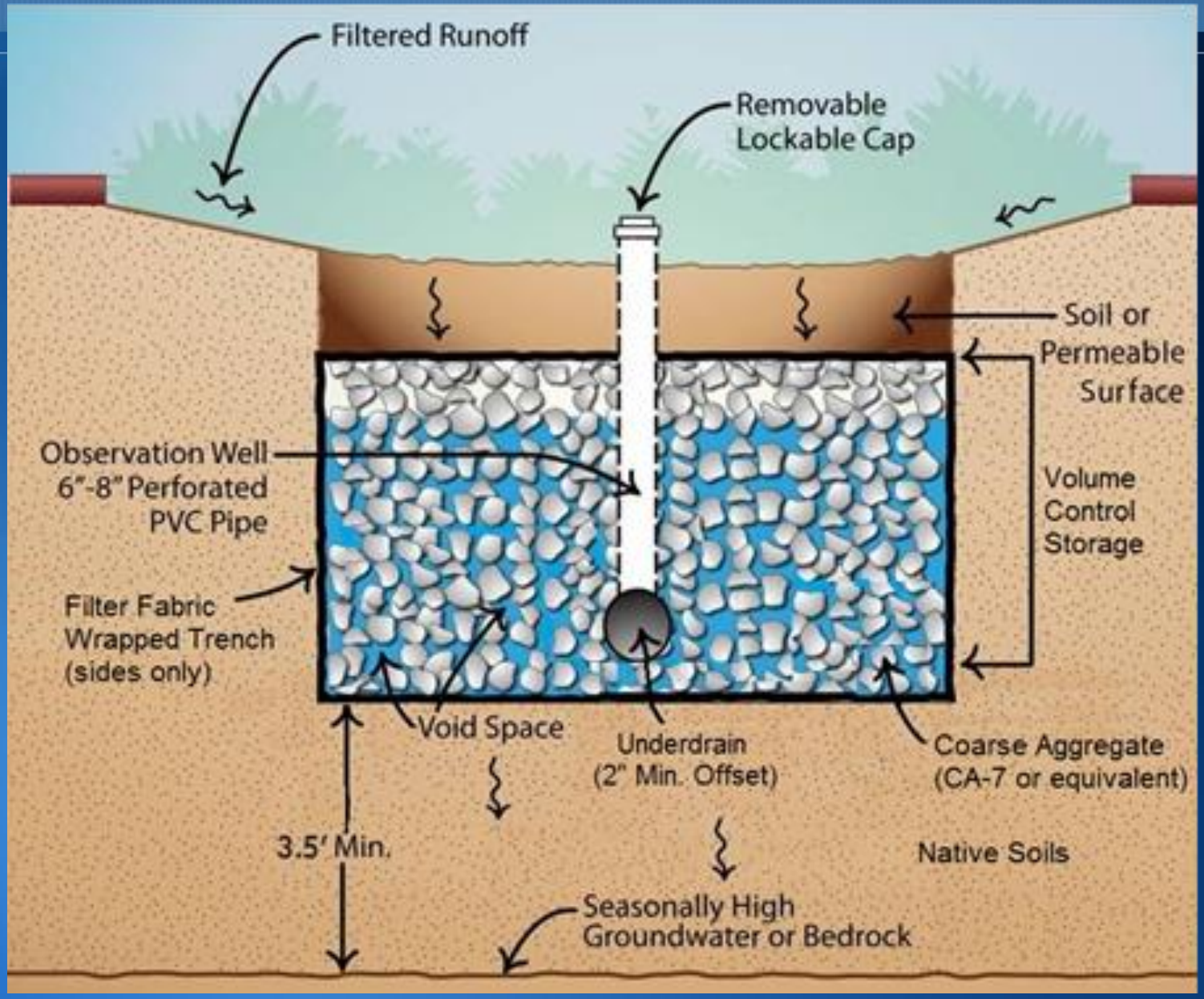
Root Systems:
Turf Grass to Native Plants

WMO Volume Control Summary

- One inch of volume over total new impervious area
- Can be provided in several ways:
  - Infiltration Trenches
  - Infiltration Basins
  - Porous Pavement (storage in the voids below the pavement)
  - Bio-Retention Systems
  - Dry Wells
  - Cisterns
  - Open Channel Practices Fitted With Check Dams
  - Storage Below the Outlet of a Site Detention Facility
- Credit toward required detention volume (CN reduction)

WMO Volume Control Summary

- When providing storage in void space of aggregate, stone must be angular cut and cleaned/washed free of fines. Different aggregate sizes are acceptable
- Underdrains are required, and must be offset at least 2” above bottom of volume control storage
- Bottom of storage must be above groundwater level
  - 2 feet in separate sewer areas
  - 3.5 ft in combined sewer areas
  - Highest seasonal groundwater level established through soil borings
- One monitoring well per 40,000 ft^2 of area



Cross Section - Typical Volume Control System

Flow-Through Practices

- Required for portion of volume control not being provided by volume control practices
- Common flow-through practices are:
  - Vegetated Filter Strips
  - Bio Swales
  - Constructed Wetlands
  - Catch Basin Inserts
  - Oil and Grit Separators
- No detention volume credit for flow-through practices

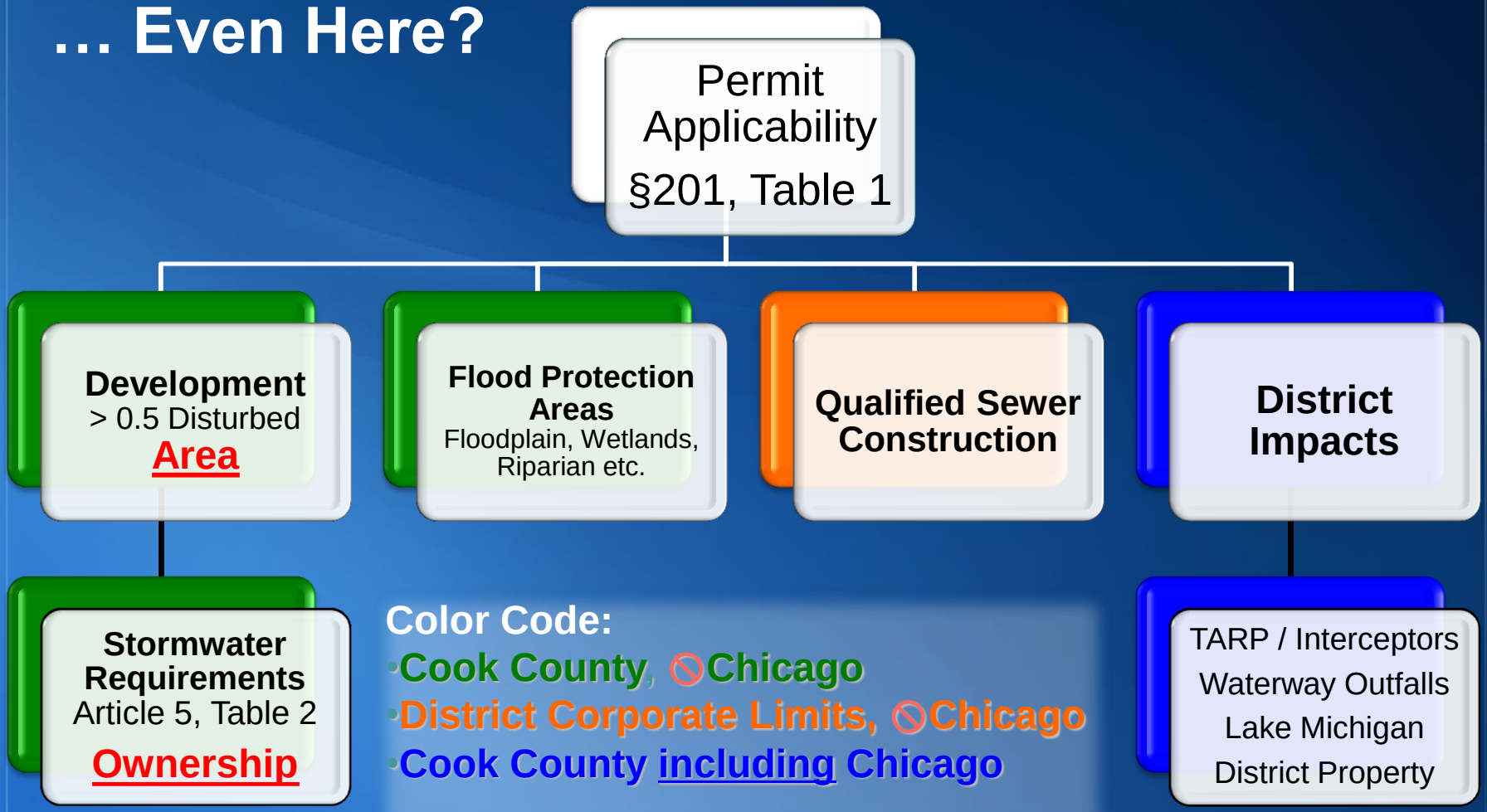
WMO Compliance Flexibility

- Full credit for volume control
- Trading
- Phased release rates
- Existing development plans list
- Legacy development / redevelopment allowance
- Authorized municipalities
- Multi-county municipalities
- Non-qualified development
- Marginal increase in required volume
- Streamlined, practical permit review

Technical Guidance Manual

Article 2	Applicability and General Provisions
Article 3	Watershed Management Permit Requirements and Submittals
Article 4	Requirements for Erosion and Sediment Control
Article 5	Requirements for Stormwater Management
Article 6	Requirements for Flood Protection Areas
Article 7	Requirements for Sewer Construction
Article 9	Maintenance
Article 10	Inspection
Article 14	Administration

Do I need a WMO Permit… … Even Here?



New WMO Permit Cover

WATERSHED MANAGEMENT PERMIT

DISTRICT Permit No. _____

METROPOLITAN WATER RECLAMATION DISTRICT OF GREATER CHICAGO
100 EAST ERIE, CHICAGO, ILLINOIS, 60611 http://www.mwrd.org

INSTRUCTIONS FOR COMPLETING PERMIT FORM: Submit ____ typed copies of permit application (eight pages) and any required WMO schedules listed below; do not leave any blank spaces; use "X" for checking applicable information. Also submit ____ copies of location map and plans. Submit two copies of specifications, if specifications are not part of the plan sheets. Address all correspondence to the Local Sewer Systems Section; for any inquiries or assistance, telephone (312) 751-3255.

NAME AND LOCATION:

Name of project (as shown on plans): _____

Location of Project (street address or with respect to two major streets):_____

_____

Municipality (Township, if unincorporated) _____

Section_____, Township_____ N, Range _____ E

☐ Project Information (Required in all cases)	WMO Schedule A[1]	(Page 4 of 8
☐ Sewer Summary (Required in all cases)	WMO Schedule B[1]	(Page 5 of 8)
☐ Sewer Connections (Required in all cases)	WMO Schedule C[1]	(Page 6 of 8)
☐ Detention & Stormwater Management Facilities (WMO)	WMO Schedule D[2]	(__ Pages)
☐ Detention & Stormwater Management Facilities (Legacy)	WMO Schedule D_{Legacy}[1]	(__ Pages)
☐ Lift Station and/or Force Main	WMO Schedule E[1]	(_ Pages)
☐ Characteristics of Waste Discharge	WMO Schedule F[1]	(2 Page)
☐ Treatment or Pretreatment Facilities	WMO Schedule G[1]	(2 pages)
☐ Hazard Areas (Floodplain / Floodway /Riparian Areas)	WMO Schedule H[2]	(_ Pages)
☐ Affidavit Relative to Compliance with Art._____	WMO Schedule J[1]	(1 Page)
☐ Affidavit of Disclosure of Property Interest	WMO Schedule K[1 2]	(2 Pages)
☐ Notice of Requirements for Storm Water Detention	WMO Schedule L[2]	(2 Pages)
☐ Current Survey of Property Interests	Exhibit A[1]	
☐ Outfall, Direct Connection, District Owned or Leased Property	WMO Schedule O[1]	(1 Pages)
☐ Erosion Control (Required in all cases)	WMO Schedule P[1 2]	(_ Pages)
☐ Recording and Maintenance	WMO Schedule R[2]	(_ Pages)
☐ Wetlands and Wetland Buffer Areas	WMO Schedule W[2]	(_ Pages)

[1] Submittal elements required to District for qualified sewer construction, outfalls, direct connections to District facilities and development impacting District Property.
[2] Submittal elements required to Authorized Municipality if development is within the corporate limits of an Authorized Municipality. Submit to District otherwise.
Note: Refer to Table 1 of § 201 of Article 2 of Watershed Management Ordinance for applicable Permitting Authority.

OTHER DOCUMENTS: Indicate title, number of pages and originator_____

_____

NOTE: ATTACH FEE PAYMENT VOUCHER AND PAYMENT IF APPLICABLE

MWRDGC USE ONLY

Application received: _____ WMO Permit issued: _____ WRP:_____

Issued by: ☐ MWRDGC ☐ Authorized Municipality

REV 12-13-13

Watershed Management Ordinance

The Watershed Management Ordinance (WMO) establishes uniform, minimum, countywide stormwater management regulations throughout Cook County. Components which are regulated under the WMO include drainage and detention, volume control, floodplain management, isolated wetland protection, riparian environment protection, and soil erosion and sediment control. The District's Board of Commissioners adopted the Watershed Management Ordinance (WMO) on October 3, 2013, which will become effective on May 1, 2014. The WMO is accessible through the link below.

Watershed Management Ordinance (As amended on April 17, 2014) (7.1MB)

WMO Amendment Doc. Comparison (5.9 MB)

The District is developing a Technical Guidance Manual (TGM), which will serve as a technical reference to the WMO. The draft TGM documents are accessible through the link below.

Draft Technical Guidance Manual (TGM)

The District will conduct training for stakeholders in early 2014 to ease the transition from the Sewer Permit Ordinance to the WMO.

Training Schedule

Permit Resources:

- WMO Permit Forms
- WMO Design Calculators
- WMO Model Templates

Basic Permit Applicability Chart (525 KB)

Other Resources:

- Watershed Management Ordinance: Short Summary
- Authorized Municipalities
- Multi-County Municipalities
- Existing Development Plans List
- Frequently Asked Questions (FAQs)
- Presentations
- WMO Advisory Committee Resource Page

If you have any questions about the WMO, contact Mr. John Murray at (312) 751-7918 or john.murray@mwrd.org.

wmo.mwrd.org

WMO Training Schedule

May

Date	Time	Location
Wednesday, May 21, 2014	12:00 p.m. – 4:00 p.m.	South Suburban Mayors and Managers Association 1906 W. 174th Street, East Hazel Crest, Illinois

June

Date	Time	Location
Tuesday, June 3, 2014	11:00 a.m. – 3:00 p.m.	Lincolnwood Village Hall 6900 N. Lincoln Avenue, Lincolnwood, Illinois
Thursday, June 5, 2014	12:00 p.m. – 4:00 p.m.	Northlake City Hall 55 E. North Avenue, Northlake, Illinois
Wednesday, June 11, 2014	12:00 p.m. – 4:00 p.m.	Palos Hills City Hall City Council Room 10335 South Roberts Road, Palos Hills, Illinois
Tuesday, June 17, 2014	12:00 p.m. – 4:00 p.m.	Prairie Center for the Arts 201 Schaumburg Court, Schaumburg, Illinois

Thank you
Questions

Dan Feltes, P.E., CFM

Daniel.Feltes@mwrd.org

Metropolitan Water Reclamation District of Greater Chicago

100 E. Erie Street

Chicago, Illinois