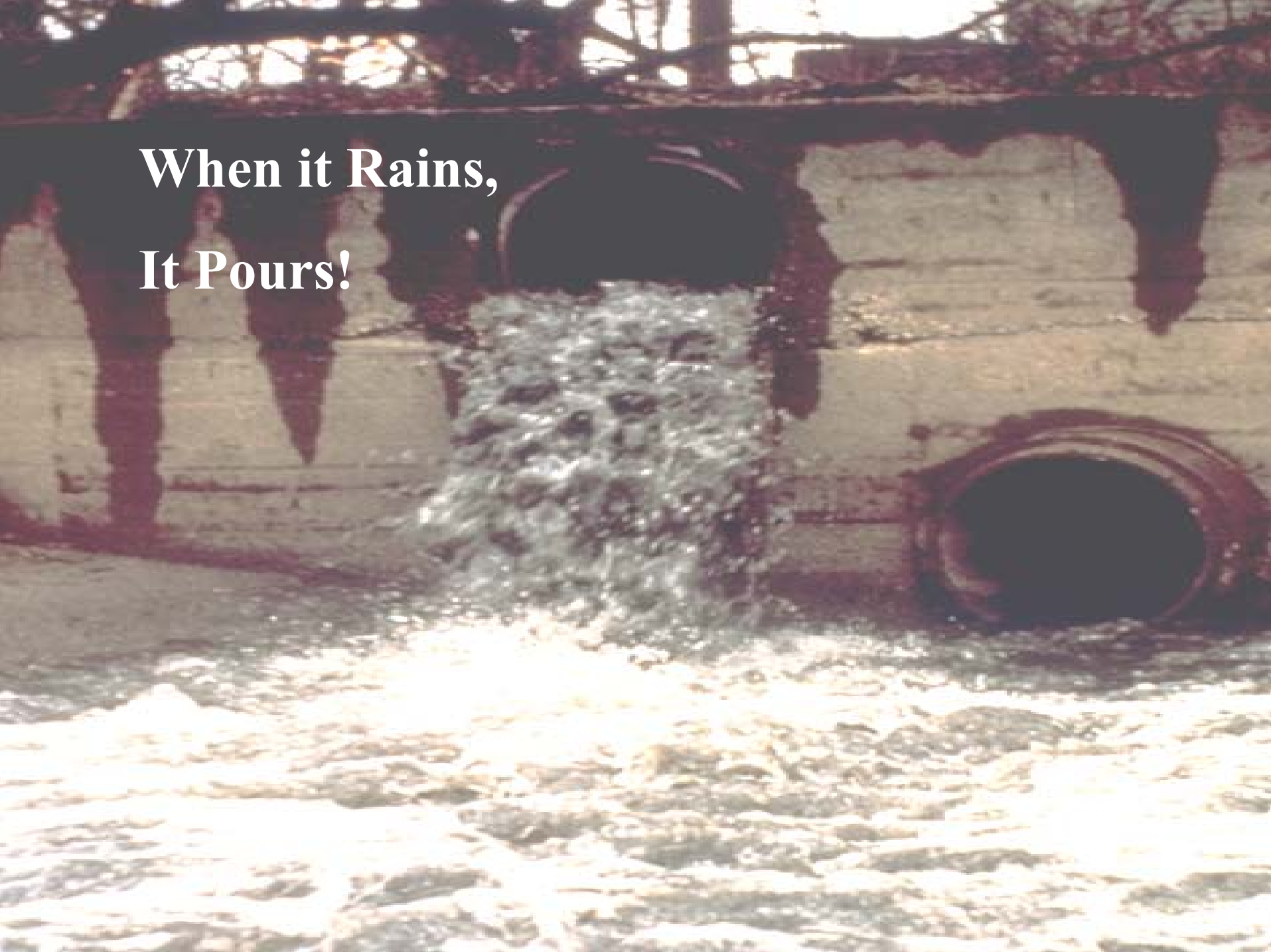
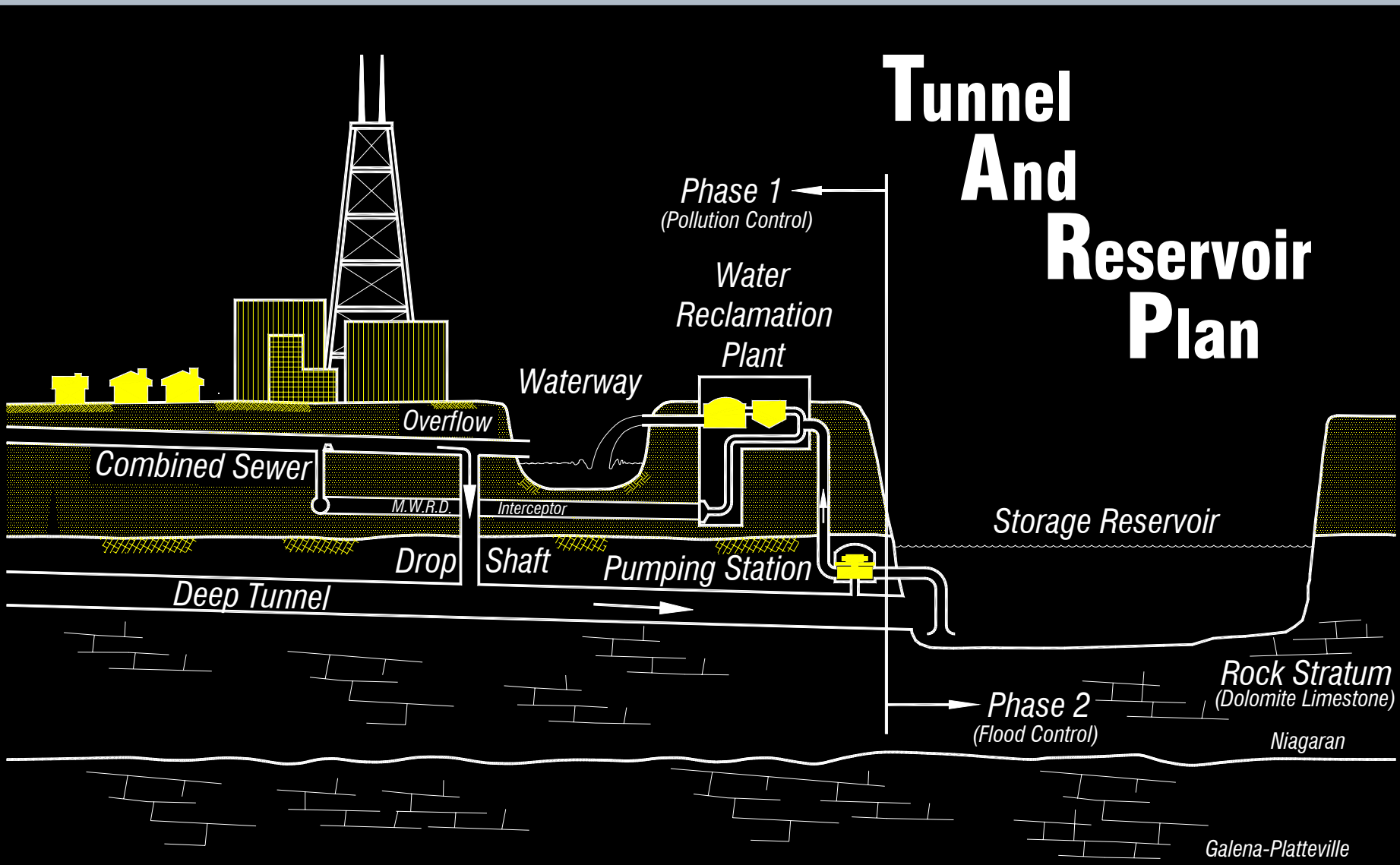
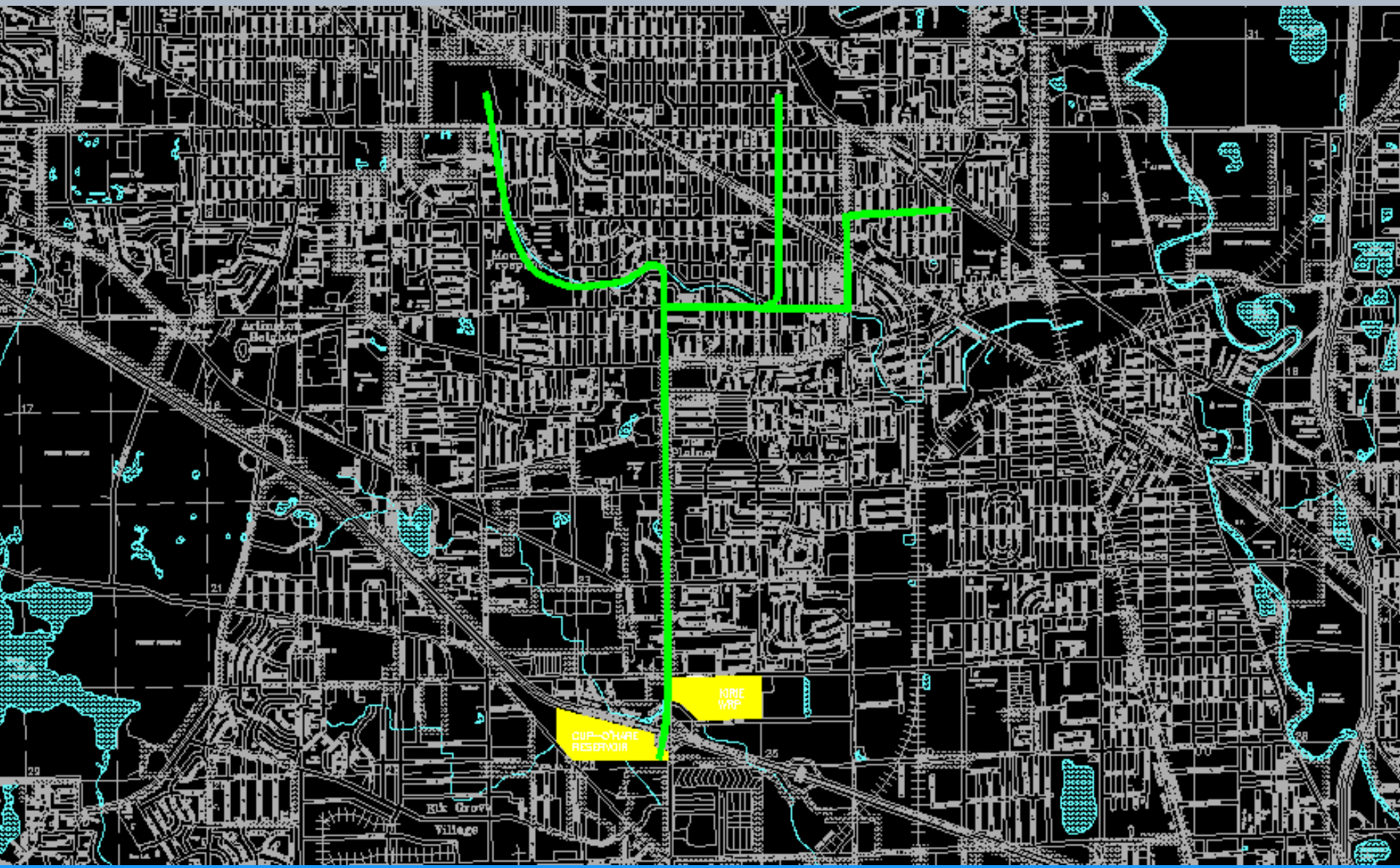

When it Rains,
It Pours!

Back-flow into Lake Michigan


All Beaches Closed!


Tunnel And Reservoir Plan
Phase 1
(Pollution Control)
Water Reclamation Plant
Waterway
Overflow
Combined Sewer
M.W.R.D.
Interceptor
Drop Shaft
Pumping Station
Storage Reservoir
Deep Tunnel
Rock Stratum
(Dolomite Limestone)
Phase 2
(Flood Control)
Niagaran
Galena-Platteville



O'Hare/Upper Des Plaines system

O’Hare CUP Reservoir

O'Hare CUP Reservoir Overview

- Capacity: 100-year storm (343 million gallons).
- Construction: The first project in Phase II (flood control) of the TARP began construction in 1990.
- Service Area: 21,000 homes and businesses in Arlington Heights, Mount Prospect, and Des Plaines.
- Savings: $2.3 million in average annual flood damage to population of 61,000.

Reservoir Features

Surface area	35 Acres
Invert El.	-7.2 CCD
Top of the pool	58 CCD
Top of the Reservoir	80.5 CCD
Inlet	Four 8’ x 10’ flap gates
Outlet	Six 30” diameter sluice gates staggered at various elevations.
	Two 16” diameter sluice gates
Under-drain	Two 12” diameter flap gates
	One 10” diameter flap gate

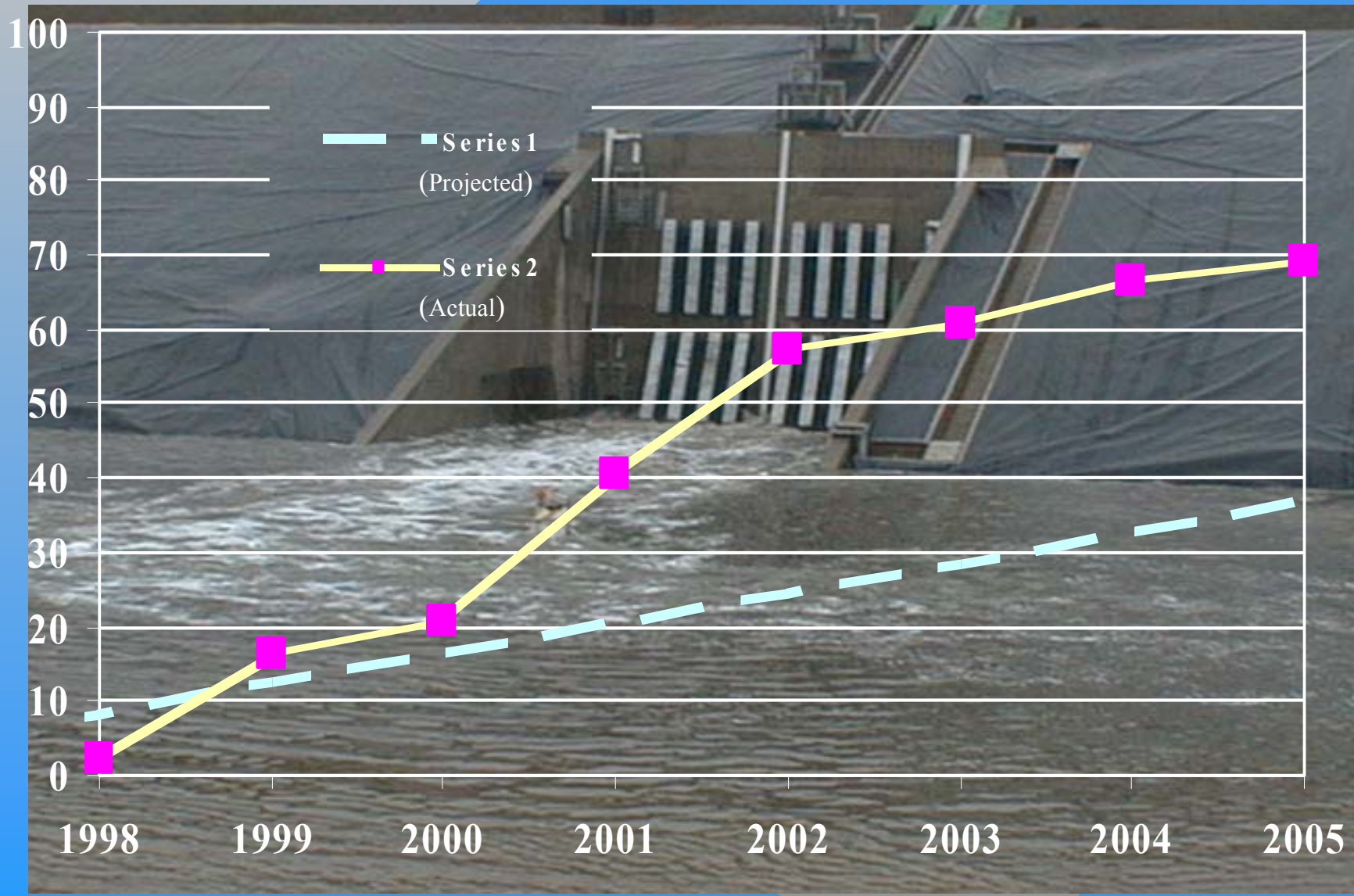
To save construction cost the reservoir side walls are composed of geomembrane liner over compacted clay.

October 13, 2001: 289 Mil. Gallons (84% full)

James C. Kirie Water Reclamation Plant

James C. Kirie Water Reclamation Plant

Capacity:	**72 MGD (Design Average)**	
	110 MGD (Design Maximum)	
Service Area:	**65.2 Sq. miles**	
Service population:	**Activated Sludge/Tertiary Filtration**	
NPDES Permit Limits*:	**CBOD**	**4 mg/l**
	Suspended Solids	**5 mg/l**
	NH3-N	**1.6 mg/l**
	Fecal Coliform	**< 200/100 ml**
	Dissolved Oxygen	**> 6 mg/l**

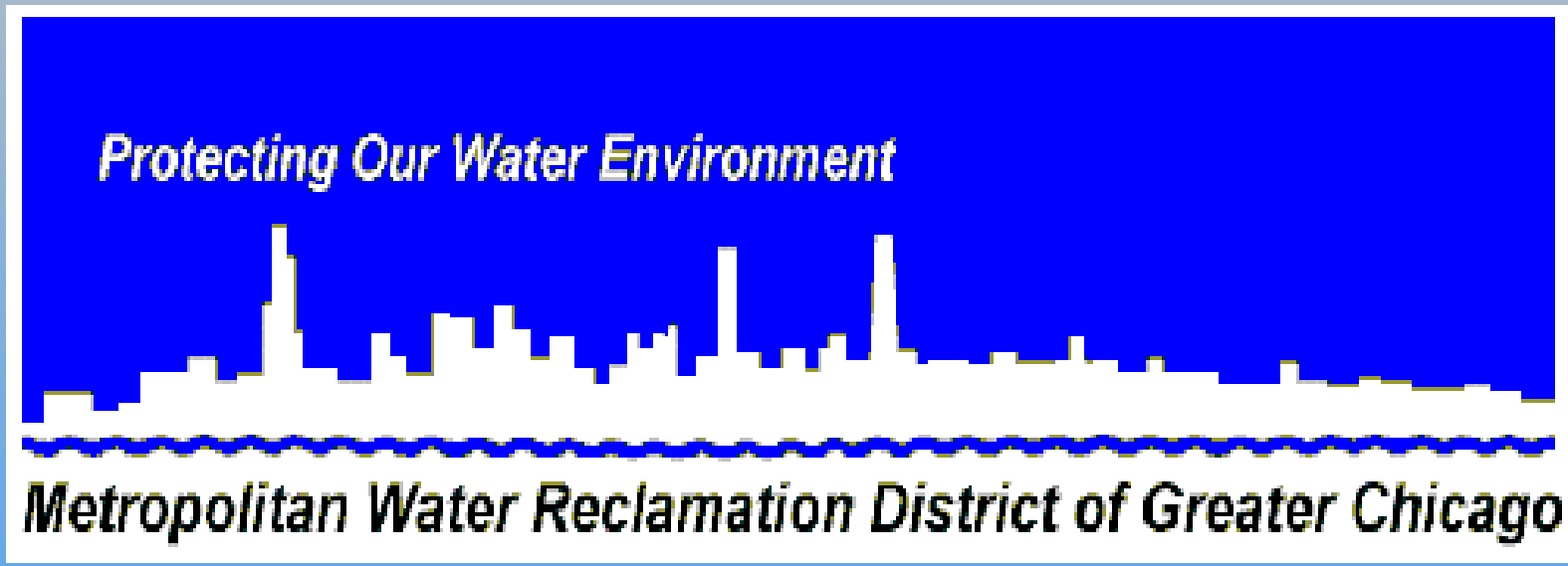


Projected VS. Actual Benefits

Conclusions

- James C. Kirie WRP has provided tertiary level treatment without use of tertiary facility.
- O'Hare CUP Reservoir has become reality and has served community well - providing flood control.
- Estimated pollution load captured by O'Hare CUP Reservoir to date:

1.931 Billion gallons of CSO
505,000 Pounds of BOD_5
866,000 Pounds of SS
54,000 Pounds of NH_3-N


Protecting Our Water Environment
Metropolitan Water Reclamation District of Greater Chicago

Thank you!