

City of Oshkosh Stormwater Management Westhaven Clubhouse Area Detention Basin



Neighborhood Meeting
June 1, 2011

James Rabe, P.E., CPESC
Civil Engineer II
Storm Water Utility



1

Overview

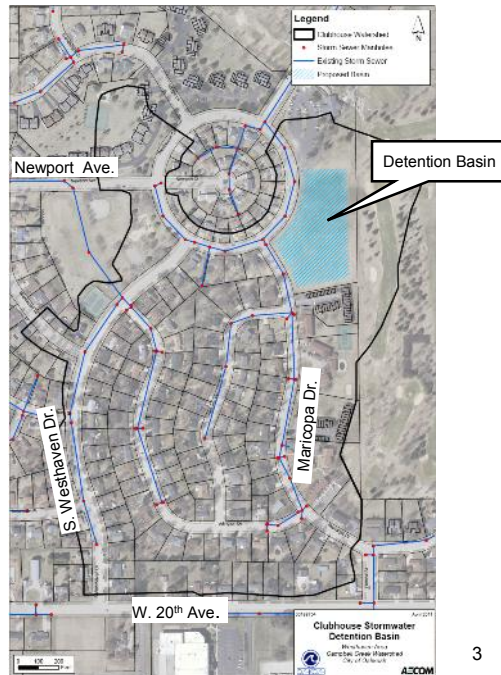
- Watershed Characteristics
- Purpose of the Project
- Detention Basin Design
- Discussion



2

Watershed Characteristics

Project Area
Watershed = 72 acres



3

Purpose of Project

- Eliminate Street Flooding for 10-year Rain Storm
 - 2.06" of rain in 2 hours.
- Reduce Street Flooding for Larger Storms
 - Look at performance during
 - 25-year rain (2.59" in 2 hours); and
 - 100-year rain (3.68" in 2 hours)
- Keep Flooding on Streets and Away from Homes for Larger Storms



4

Detention Basin Design

- Flood Control Benefits
 - Storm sewer improvements reduce flooding in watershed
 - Westhaven Circle
 - Westhaven Drive
 - Maricopa Drive
 - Newport Court
 - Stormwater stored and slowly released
 - Reduce flooding downstream



5

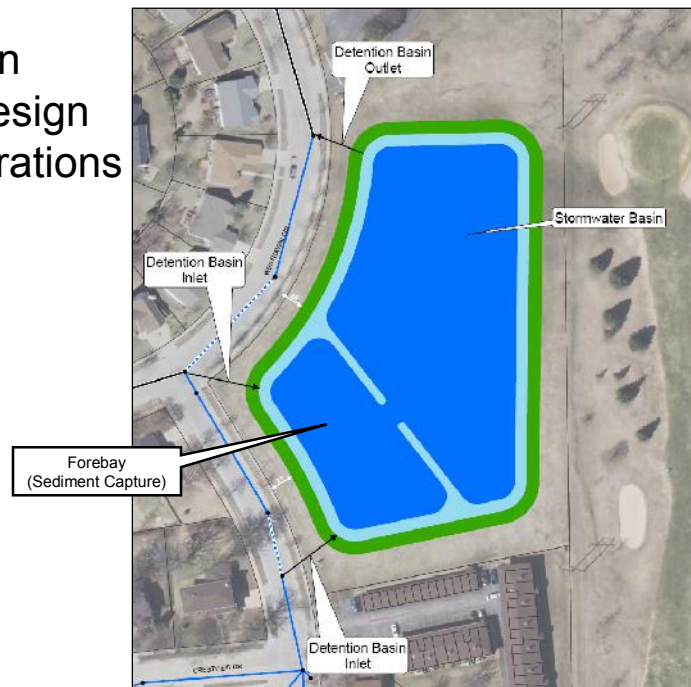
Detention Basin Design Considerations

- Add Inlet Capacity
 - Increase size of inlets
 - Add more inlets
 - Newport Court, Westhaven Circle, Westhaven Drive, & Maricopa Drive
- Detention Basin
 - Maximize stormwater storage (Approx 17 ac-ft)
 - Reduce stormwater pollution (trap sediment)



6

Detention Basin Design Considerations



7

Detention Basin Design Considerations

- Safety Considerations
 - Gradual side slopes above water
 - 14 foot wide safety shelf area (1 foot or less of water)
- Aesthetics
 - Prairie grasses/flowers on side slopes
 - Wetland plantings in shallow water areas
 - Trees & shrubs



8



Discussion