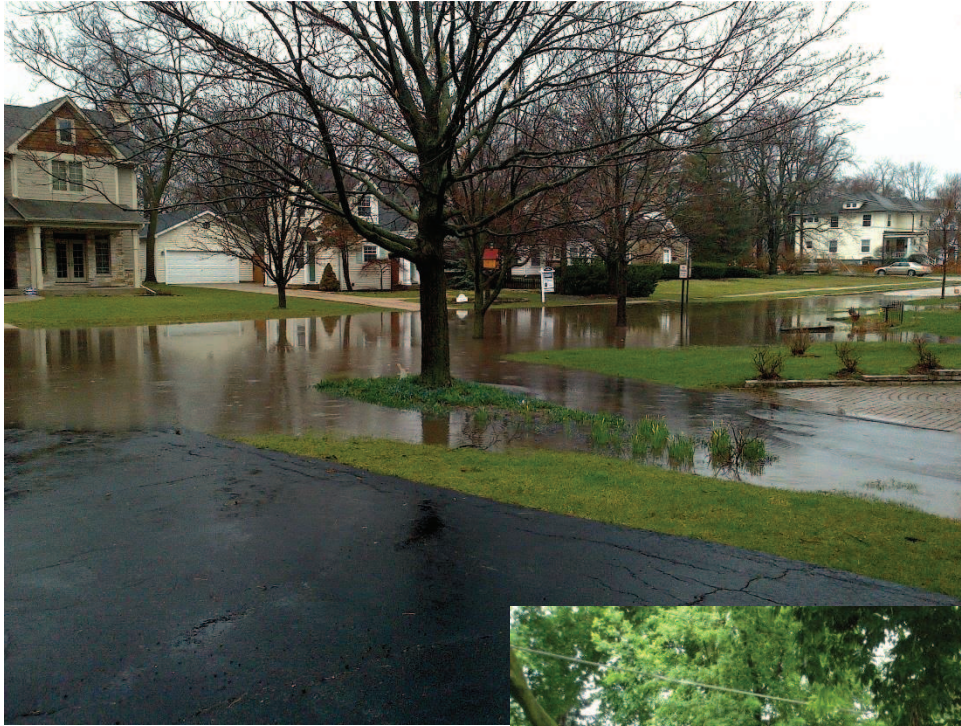


Project 29
FIRST STREET – CENTER AVENUE



2018 Center Avenue
looking Southwest



Backyard Flooding at
1340 First Street
looking Southwest



2018 Center Avenue
looking Southeast

PROJECT 29
FIRST STREET/CENTER AVENUE

Statement of Conditions:

The local drainage system is dependent upon small storm sewer conveyance and inlet collection system that is very old. The Walters Resub was platted in 1904. Stormwater runoff conditions have increased due to property redevelopment. The roadway drainage system cannot adequately convey runoff from storms of low rainfall intensities. Flood overflow route conditions result in rear yard flood condition. The cause of the flooding conditions were initially identified as undersized private rear yard drainage system, back-up from the mainline storm sewer system and the absence of a positive overland drainage route. One structure was reported to have had flood damage.

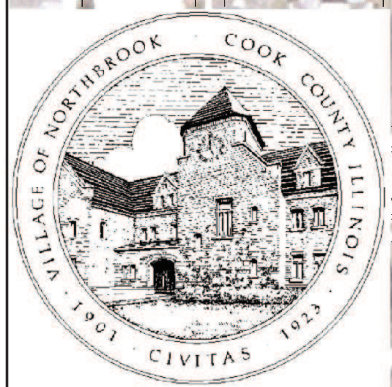
Problem Identification:

Street, front yard, backyard and structure flooding

Recommended Plan:

- Construct relief storm sewer from the First Street/Center Avenue northerly (425 feet) along First Street outletting to the Library Campus storm sewer/storage basin.
 - Disconnect Center Avenue storm sewer from First Street southerly outlet
 - Improve backyard drainage collection system by constructing a new low flow storm sewer that would connect to the First Street storm sewer within an acquired drainage easement (preferably within the area identified as easement required)
 - Mitigate potential downstream drainage impacts by oversizing the relief storm sewer for stormwater storage purposes
- Or,
- Construct stormwater detention facility on an acquired property lot located within the area subject to backyard and/or structure flooding (adjacent properties with back yard flooding conditions-four identified) (Not included in Cost Estimate or Benefit-Cost Ratio)

Estimated Total Cost	Construction Cost	Property Cost	Engineering Cost	B/C Ratio	Optimum Protection
\$ 374,000	\$ 312,000	\$15,000	\$ 47,000	2.41	10-yr



FIRST STREET AND CENTER AVENUE

PROJECT 29