



# LEE'S SUMMIT MISSOURI

## DESIGN AND CONSTRUCTION MANUAL DESIGN MODIFICATION REQUEST

PROJECT NAME: Lee's Summit Joint Operations Facility

PREMISE ADDRESS: 2 NE Tudor Road

PERMIT NUMBER: \_\_\_\_\_

OWNER'S NAME: City of Lee's Summit

TO: The City Engineer

In accordance with the Lee's Summit Design and Construction Manual (DCM) Section 1002.A, I wish to apply for a modification to one or more specification (s). The following articulates my request for your review and action. (NOTE: Cite specific code sections and engineering justification and drawings.)

The request is for a modification to the freeboard requirement from the top of flow for an emergency spillway to the top of berm per APWA 5608.4 Stormwater Detention and Retention Performance Criteria. This request is to modify the required depth from 1-ft to 0.70-ft. See attached summary of design information.

### SUBMITTED BY:

NAME: Michael Makris, P.E. ( ) OWNER (X) OWNER'S AGENT

ADDRESS: 7101 College Blvd, Suite 400 Tel.# 913-905-1581

CITY, STATE, ZIP Overland Park, KS, 66210

Email: Mike.Makris@ibhc.com SIGNATURE: Mike T. Makris

FORWARDING MANAGER: \_\_\_\_\_ RECOMMENDATION ( ) APPROVAL ( ) DENIAL

SIGNATURE: \_\_\_\_\_ DATE: \_\_\_\_\_

GEORGE BINGER III, P.E. – CITY ENGINEER: ( ) APPROVED ( ) DENIED

SIGNATURE: \_\_\_\_\_ DATE: \_\_\_\_\_

COMMENTS \_\_\_\_\_

**A COPY MUST BE ATTACHED TO THE APPROVED PLANS**

### Development Services

220 SE Green Street | Lee's Summit, MO 64063 | P: 816.969.1200 | F: 816.969.1221 | cityofLS.net

## Design and Construction Manual – Modification Request – Spillway Depth

### Summary of Request:

The request is to allow the development of the Lee's Summit Police Joint Operations Facility and Detention Modifications.

The proposed detention will be provided by modification of the existing dry detention pond. Presently, the outlet of the pond includes two 30" CMP outlet pipes, the proposed solutions considers replacing the existing CMP structures an outlet control structure with a weir wall.

The current emergency overflow spillway discharges onto property proposed for multifamily construction. This creates potential for downstream flooding during an event that activates the emergency spillway. To prevent this the proposed design raises the top of berm height to 1005.50 and relocates the spillway to the discharge on Commerce Drive. To provide the flow required for the 100-year event the spillway will need to be constructed of concrete and include a retaining wall to stabilize the berm along the northside of the site.

Proposed Detention Pond		
Storm Event	Peak Release (cfs)	Stage Storage Elevation
Water Quality	0.37	997.5
*2-year	23.73	999.49
10-year	34.50	1000.85
100-year	55.61	1002.75
Bottom of Spillway	--	1003.75
Top of Spillway	--	1004.70
Top of Berm	--	1005.50

Full documentation of this design is provided in the Final Stormwater Management Report for the Lee's Summit Joint Operations Campus.

