

#### **DEVELOPMENT SERVICES**

Date: Tuesday, August 31, 2021

To: SM ENGINEERING
919 W STEWART RD
COLUMBIA, MO 65203

**From:** Sue Pyles, P.E.

Senior Staff Engineer

**Application Number:** PL2021267

**Application Type:** Engineering Plan Review

Application Name: STREETS OF WEST PRYOR - PHASE II LOWENSTEIN ROAD IMPROVEMENTS

The Development Services Department received plans for this project on July 09, 2021. We have completed our review and offer the following comments listed below.

- See comments below to determine the required revisions and resubmit to the Development Services
   Department public portal located at <u>devservices.cityofls.net</u>. Digital documents shall follow the electronic plan submittal guides as stated below.
- Revised plans will be reviewed within five (5) business days of the date received.

## **Engineering Review - Corrections**

 Sheet C3.0: Please revise the line weight of Sanitary Line A on this sheet and throughout the plan set. Line A has been faded back

#### 2. Sheet C7.0:

- Please provide a close-up detail of the area around the 2 driveways. At this scale, it isn't clear where the curb and gutter will be, what the extent will be, etc. Sheet C9.0 provides a blowup of this area
- The Geogrid shown on the typical section isn't on the City's approved product list. Please revise or submit to the City Engineer to have the alternate material approved. Geogrid has been revised
  - Review the fiberoptic line note near Sta. 9+00 for spelling. Corrected

## 3. Sheet C9.0:

- As designed, mid-block ramp turning space exceeds allowable slope in both diagonal directions. Please revise. Slopes have been revised
  - The mid-block ramp requires detectable warnings. Please revise. Detectable warning added

# 4. Sheet C10.0:

• Please include the flowline of the stub being installed upstream of Structure E-1. Verify drop thru the inlet meets City requirements. Flowline added. Drop verified.

- Record drawings indicate different size existing pipes crossing the road at Structure S-1. Please verify and revise if needed. Note added for contractor to field verify size.
  - The waterline crossing at Sta. 0+91.35 does not appear to have adequate separation. Please revise. Notation regarding separation added to profile
  - Please relocate overlapping text in the Structure E-3 Profile view label for clarity. Done
  - RCB is specified between Structures E-1 & E-3. Please include details in the plan set for these RCBs. RCB's will be precast.
- 5. Sheet C12.0: Please include compacted fill note and hatching. Note and hatching has been added
- 6. Sheet C14.0:
  - The City requires a minimum 6" of aggregate below all pipes. Please revise the Storm Sewer Pipe Bedding Table accordingly. Detail has been revised
    - The Concrete Sidewalk CW2 standard detail isn't required since GEN-3A is in the plan set. Done

#### **Traffic Review - No Comments**

In order to calculate the Engineering Plan Review and Inspection Fee, a sealed Engineer's Opinion of Probable Construction Costs shall accompany your final submittal copies. The itemized estimate (material and installation) shall be sufficiently broken down and shall include the following items, as applicable.

- Public infrastructure, both onsite and offsite.
- Private street construction, including parking lots and driveways.
- Sidewalks located within the right-of-way.
- ADA accessible ramps.
- Sanitary sewer manholes and piping between manholes, including private mains.
- Connection of the building sanitary sewer stub to the public main.
- Waterlines larger than 2 inches in diameter, valves, hydrants, and backflow preventer with vault, if outside the building.
- Stormwater piping greater than 6 inches in diameter, structures, and detention / retention facilities public or private.
- Water quality features installed to meet the 40-hour extended duration detention requirements.
- Grading for detention / retention ponds.
- Grading to establish proper site drainage.
- Utility infrastructure adjustments to finished grade (i.e. manhole lids, water valves, etc.).
- Erosion and sediment control devices required for construction.
- Re-vegetation and other post-construction erosion and sediment control activities.

### **Electronic Plans for Resubmittal**

All Planning application and development engineering plan resubmittals shall include an electronic copy of the documents as well as the required number of paper copies.

Electronic copies shall be provided in the following formats

- Plats All plats shall be provided in multi-page Portable Document Format (PDF).
- Engineered Civil Plans All engineered civil plans shall be provided in mulit-page Portable Document Format (PDF).

<ul> <li>Studies – St</li> </ul>	Studies, such as stormwater and traffic, shall be provided in Port	able Document Format (PDF).
Please contact me i	e if you have any questions or comments.	

Sincerely,

Sue Pyles, P.E. Senior Staff Engineer (816) 969-1245 Sue.Pyles@cityofls.net

cc: Development Engineering Project File