City of MEMPHIS ENGINEERING

# LAND DEVELOPMENT

# STANDARDS AND GUIDELINES

May 14, 2025

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# I. Introduction & General Background

The City of Memphis, Engineering Division (City Engineering) welcomes the opportunity to serve the citizens of our community and private developers. This document serves to communicate our process related to land development, and the role that City Engineering plays in that process.

The Land Development Office (LDO) is a department under City Engineering that specifically works with the Memphis and Shelby County Division of Planning & Development (DPD) to ensure that all developments adhere to City standards and meet the requirements set forth for public improvements.

Contact information for the LDO is as follows:

- Title: Land Development Office
- Address: 125 North Main Street, Suite 644 Memphis, TN 38103
- Phone: 901.636.6340
  - Calls can be directed to the following:
    - 901 Portal (Accela) and General Procedures
    - Plans Review/Plans Distribution/901 Portal Record Inquiry
    - Plans Permitting, Bonds, Fees, Inspections and Council Resolutions
    - Fiber Installation Permitting
    - City Smart Fiber Project Inquiry
    - ROW Drainage and Detention Inquiry

ROW Landscape Inquiry Disclaimer: This document is provided as a general guideline for the plans submittal process. Information contained herein is for the designer's aid. The intent of this document is to provide information and guidance only. The engineer is ultimately responsible for the accuracy and completeness of the design submittal. Each of the following provides exhaustive information pertaining to design requirements and can be found on the City engineering website at: Engineering | Memphis, TN

- City of Memphis Standard Construction Specifications
- City of Memphis Engineering Design and Policy Review Manual
- The Memphis and Shelby County Unified Development Code (UDC)
- City of Memphis/Shelby County Storm Water Management Manual (SWMM)

# II. Development Applications - FAQs

## A. When is it necessary to submit plans to Land Development?

Plans must be submitted to the Division of Engineering, Land Development Office for review of:

- Any work within or upon City of Memphis property or street Right-Of-Way (ROW), or within a City easement (drainage, sewer, fiber, etc.)
- Any work that directly affects traffic within the City's ROW
- Any work that may cause an increase of stormwater runoff to City stormwater facilities or downstream properties (refer to the SWMM).

Stormwater runoff from projects larger than one acre, within a drainage basin deemed a "Sensitive Drainage Basin" by the City, or in the Fletcher Creek Overlay District must be addressed with stormwater detention facilities, unless a request for a stormwater exemption has been filed and approved by City Engineering (SWMM Section 2.8.5.4). This issue is discussed in further detail in this document.

## B. What types of Projects go through Land Development?

Projects that must go through the Land Development Plans Review process should fall into one of the following categories:

- Memorandum of Conformance (MOC)
- Administrative Site Plan Review (ASPR)
- Right of Way (ROW) Permit
- Standard Improvement Contract (SIC)
- Plat Re-Recording
- Easement Plat
- Encroachment Agreement
- ROW Dedication
- Street & Alley Closure
- Underground Fiber/Cable Plans
- Monitoring Well
- Soil Sampling within ROW

## C. How do I apply for an application?

All applications must be uploaded through the Accela Citizen Portal (see Page 8).

## D. What are the types of Permits issued by Engineering?

A ROW Permit is filed for work within City ROW/easements, not exceeding construction costs of $25,000. For projects exceeding $25,000, a Standard Improvements Contract must be executed between the owner/developer and the City and approved by City Council.

Curb Cut Permit applications (for work involving only a new commercial drive connection and with no adjoining curb, gutter or sidewalks greater than 100ft) should be submitted directly to City of Memphis Traffic Engineering (901.636.6710).

Sidewalk Permits (for work involving only minor sidewalk, less than 100ft, repair/pour) must be applied for online through Accela.

Residential Driveway Permits can be obtained from the City of Memphis, Construction Inspections Office (901.636.2462).

## E. How do I get an MOC?

MOCs are issued by DPD upon submittal of the Final Plat (901.636.7152).

## F. How do I get an ASPR?

Plans for developments considered by the applicant as a "use by right" (i.e., already properly zoned, platted, etc.) should be submitted to the Memphis/Shelby County Office of Construction Code Enforcement (OCCE). OCCE will coordinate with LDO as needed to determine whether plans will be reviewed by City Engineering (901.636.7152).

## G. What fees are required for plan review?

The City has established a review process that ensures all applicants are treated equitably with the following fee structures:

- The base fee for Civil Engineering Plan Review is $525 for the first 3 reviews and $250 for each additional review. Final Plats submitted in conjunction with site plans are assessed at the same rate as a single review request.
- The review fee for Street and Alley Closure Plats, Easement Plats, Encroachment Plats, and Plat Re-records is $250.
- Right of Way fees for work within the public ROW are calculated by Land Development near completion of the plans review process.
- Curb Cut Permit fees are calculated by Traffic Engineering depending on the area per square foot of curb cut, sidewalk, and curb & gutter.
- Sidewalk Permit and Residential Driveway Permit fees are calculated by price per square foot by City Inspections.
- The review fees for Fiber Optic Permits are the following:
  - $750 for the base review fee
  - $1 per foot of installation for the inspection fee

- Traffic Control fees are calculated by Land Development per Ordinance 5766: Ordinance No. 5766 | Code of Ordinances | Memphis, TN | Municode Library
  - Sewer development fees are calculated per Ordinance:_____
  - Fiber installation fees are calculated per ordinance: _____

For more detailed information regarding fees for review, refer to City of Memphis Ordinances, available at: Code of Ordinances | Memphis, TN | Municode Library

## H. What will be required at the end of construction to close out the project and get bonds released?

Prior to release of Developer's bonds, the Developer will contact LDO to submit the following items:

- A request for final inspection from Construction Inspections
- PDFs of As-built plans in Accela to begin the as-built review process. Refer to As-Built Process: Communications / Procedures / Requirements under Appendix D for the complete review process.

The bond release process will begin when:

- Construction Inspections confirms the final inspection has 100% passed.
- LDO has completed the as-built review process and mylars with as-built revisions are returned to LDO.

Projects that were designated as Contracts will also be forwarded to the City Council with a recommendation of completion prior to bond release. Additional information regarding Record Drawings is provided in Section III.D.13.

# III. Submittal Requirements

## A. Items to be Submitted

The following items are required to be submitted for all LDO reviews:

- All plans submitted to Land Development **must be submitted** through the Accela Citizen Portal unless otherwise directed by City Engineering.
    - Accela Citizen Portal link: Accela | Citizen Portal
    - Instructions can be found in Appendix E
    - For Accela related support, please call 901.636.6962.
- Plans Review Fees (see Section II.G)

Mylar and paper copies of plans that are requested by LDO are required to be the following sheet sizes:

- Site Plans: 24” x 36” sheets with City Title Block (see Section III.D and Appendix A – Page 1)
- Final Plat/Plan: Plats to be recorded are to be submitted on 20” x 24” sheets.

## B. Contents for Plan Submissions

As applicable, submittals should include the sheets outlined in Table 1. Please refer to Section III, Table 2 for additional detail:

**Table 1 – Plans Required for Project Submittals**

| Sheets signed by City Engineer(s) (must be on City Title Block and include signature line) | Sheets not signed by City Engineer |
|---|---|
| 1. Site Plan or Site Plan and Final Plat<br>2. Grading & Drainage (including detention and off-street drainage)<br>3. Erosion Prevention & Sediment Control (EPSC) Plan<br>4. Post Construction Runoff Control Plan (PCRCP)<br>5. Sewer Plan – both public and private<br>6. Plan & Profile (individual sheets for Roadway, Sewer and Drainage) – required if any public improvements are affected unless it is a rural or industrial section of roadway.<br>7. Traffic Control for work zones<br>8. Signage & Striping (permanent)*<br>9. Signalization*<br>10. Details – City of Memphis Standards (see Section III.C.8) or custom details for public infrastructure. | 1. Title Sheet with Index (required for all projects)<br>2. Existing Conditions<br>3. General Notes sheet<br>4. Site Layout Plan<br>5. Details (not per City standard and for private infrastructure)<br>6. Demolition Plans<br>7. Landscaping Plans |

* Signed by the City Traffic Engineer.

All plan sets submitted under MOCs must include a Final Plat. Requirements for submittal of a plat to DPD for approval can be found in the Memphis and Shelby County UDC:

Shelby County | Unified Development Code

Table 2 provides a matrix to determine which sheets you are required to submit. All sheets must be 24” x 36”, signed and sealed by a TN Licensed Professional Engineer, and use the City of Memphis Title Block and signature lines for City Engineer(s) as applicable (Appendix A – Page 1). Watermarks or stamps for “PRELIMINARY” or “NOT FOR CONSTRUCTION” are acceptable during review.

## Table 2 – Plan Sheet Submittal Matrix (Page 1 of 2)

| Plan Sheet Name | Sheet required if one of the conditions in the 3 columns below are proposed for your project: | | |
|---|---|---|---|
| **a. Site Plan** | Required for all submittals | | |
| **b. Plan & Profile (P&P)** | If only sidewalk improvements, no P&P required | | |
| i. Roadway (P&P) (show both storm and sewer) | Min of 100' of contiguous curb & gutter and drive openings (new or replacement) | Lane widening, new median or median improvements | Milling/overlay |
| ii. Drainage (P&P) | Improvements within the public ROW<br>(drainage profiles may be placed on roadway P&P) | Private drainage<br>(P&P not required, but G&D Plan must be submitted). | |
| iii. Off-Street Drainage (P&P) | Improvements outside ROW that are in public drainage easements or are public infrastructure | | |
| iv. Sewer (P&P) | Improvements within the public ROW or public sewer easement<br>(sewer profiles may be placed on roadway P&P) | Private sewer<br>(P&P not required, but Sewer Plan must be submitted). | |
| v. Off-street Sewer (P&P) | Improvements outside ROW that are public or that affect public sewer easements or infrastructure | | |
| **c. Grading & Drainage (G&D) Plan**<br><br>**(Criteria for Stormwater Detention)** | Improvements include stormwater detention due to size of graded/disturbed area<br>Generally, detention is required for projects greater than or equal to 1 acre. Provide stormwater detention or request waiver for detention via letter as applicable per SWMM 2.8.5.4 | Project is in a Sensitive Drainage Basin (Table 3) OR in Fletcher Creek Overlay District<br>Provide stormwater detention or request waiver for detention via letter as applicable per SWMM 2.8.5.4 | If drainage connects to, or flows directly to public drainage system or ROW, or as required by LDO* |
| **d. Erosion Control Plan (ECP)** | Refer to Section III.C | | |

* For further guidance, refer to SWMM, UDC, and City Ordinances.

## Table 2 – Plan Sheet Submittal Matrix (Page 2 of 2)

| Plan Sheet Name | Sheet required if one of the conditions in the 3 columns below are proposed for your project: | | |
|---|---|---|---|
| **e. Post Construction Runoff Control Plan (PCRCP)** | Refer to Section III.C.2 | | |
| **f. Sewer Plan** | Improvements include new public sewer | Improvements tying to City sewer and result in an increase in water meter size | Improvements tying to existing private sewer that result in water meter size increase |
| **g. Traffic Control Plan (TCP)** | Improvements within or affecting traffic within the public ROW | | |
| **h. Signage & Striping** | As requested/required by City Traffic Engineer | | |
| **i. Signalization** | As requested/required by City Traffic Engineer | | |
| **j. City of Memphis Standard Details** | Project has public infrastructure requiring construction details.<br>For City of Memphis Standards, see Section III.D.8. All City standard details and/or public structure details are reviewed and signed/approved by the City. | Project has private infrastructure requiring construction details.<br>All private infrastructure details must be on a separate sheet and are NOT reviewed/signed by the City. | |

## Table 3 – Sensitive Drainage Basins

**The fourteen (14) Sensitive Drainage Basins are identified by City Engineering and listed below. Please contact 901.636.6939 to determine the Basin in which your project is located.**

- Arlington Bayou (2-KA)
- Black Bayou (5-C)
- Black Bayou (5-D)
- Cherry Bayou (6-A)
- Fletcher (12-A)
- Harrison (3-H)
- Lenox Bayou (2-L)
- Lick Creek (2-K)
- Overton Bayou (2-M)
- Ridgeway (9-C)
- Royster Bayou (2-I)
- Sophia (1-J)
- South Cypress Creek (11-I)
- Young (12-C)

**The drainage basins map can be found on the LDO website:**
**Land Development | Engineering | Memphis, TN**

# C. Erosion Prevention and Sediment Control Guidance

## 1. Erosion Control Plan Submittal Requirements:

- The City of Memphis/Shelby County Storm Water Management Manual states that an Erosion Control Plan (ECP) shall be submitted for approval. The plan must meet all the requirements of the State of Tennessee Construction General Permit (CGP) and be in conformance with the SWMM. Since a minimum limit of earth disturbance is not established as a submittal requirement, the LDO typically decides if an ECP submittal is necessary.

- All development plans submitted to LDO that propose earth disturbance of 1 acre or more will need to include an ECP.

- Commercial developments that have curb cuts, sidewalks or infrastructure proposed to connect to public drainage or sewer are frequently less than 1 acre. If these developments lie within a Sensitive Drainage Basin, stormwater detention review is required by LDO. The requirement for stormwater detention may be waived subsequent to request thereof in accordance with SWMM Section 2.8.5.4.

- Neither an ECP, nor a Post Construction Runoff Control Plan (PCRCP) are required if the project meets the following:
    1. less than 1 acre in area, and
    2. not in Fletcher Creek Overlay District, and
    3. not in a Sensitive Drainage Basin, or
    4. the requirement for detention is waived or excepted under condition a–e in Section 2.8.5.4 of the SWMM.

- If the project requires stormwater detention, both an ECP and PCRCP are required.

When an ECP is not required, a general note must be added to an appropriate sheet in the plan set or other documentation (e.g. G&D plan, site plan, detention waiver letter, etc.) as determined by LDO. The general note is to inform the contractor of their responsibility to implement Best Management Practices (BMPs) to prevent improper disposal/illegal discharges of construction debris into the City's MS4. Per City ordinance #4538 sec. 33- 207, it is illegal to discharge construction material, silt, sediment, gravel, etc. into the Municipal Separate Storm Sewer System (MS4).

## 2. Post Construction Erosion Control Plan submittal requirements:

A PCRCP is required for all new and significant redevelopments within the City limits except for:(1) residential projects without detention and (2) for

linear projects. If your project does not meet one of these exceptions, then a PCRCP is required even if there are no stormwater facilities on-site. In addition to requiring measures for protecting City streams and waterways, the PCRCP gives record of the development for the purpose of assessing fees. Although these fees are not assessed by City Engineering as part of the Development Fees, every property within the City limits is required to pay a stormwater fee for maintenance of the City's public storm drain system.

## 3. Erosion Control for Roadway Projects:

- If there will be 1 acre or more of earth disturbance from a roadway project, then a CGP is required and an ECP is also required. If Tennessee Department of Environment and Conservation (TDEC) does not require a project to have a CGP (projects with earth disturbance < 1acre), then TDEC does not require an ECP.

- All projects, including linear projects, require a CGP and an ECP should be phased as required by the latest CGP requirements.

- The City of Memphis Stormwater Program will not require review for roadway linear projects that collectively total less than 1 acre of earth disturbance but instead will have a general note that must be added to an appropriate sheet in the plan set or other documentation (e.g. G&D plan, site plan, fiber optic letter, etc.) as determined by LDO. The general note is to inform the contractor of their responsibility to implement Best Management Practices (BMPs) to prevent improper disposal/illegal discharges of construction debris into the City's MS4. Per City Ordinance No. 4538 | Code of Ordinances | Memphis, TN | Municode Library, it is illegal to discharge construction material, silt, sediment, gravel, etc. into the MS4.

## D. Guidelines and Checklists for Plans:

The LDO reviews hundreds of projects annually which are completed by consultants from all over the country. Therefore, it is essential to have conformity between various plan sets and compliance with City Standards and Policies. For further information, reference City of Memphis Design and Policy Review Manual. Plans review can be conducted more expeditiously if basic project information is presented in a clear, concise, and standard format.

- The designer must explicitly define existing and proposed property lines, Right-of-Ways, facilities, infrastructure, etc., within the project by using standard notes and easily distinguishable graphical representations of such.

- All sheets must be 24" x 36" with City of Memphis Title Block and signature lines for the City Engineer(s) as applicable (see Appendix A – Page 1)

- A legend depicting line types & symbology for each design discipline is necessary. For example, for Grading & Drainage plans, a legend shall be provided for existing topography, existing drainage pipes, existing drainage structures, proposed topography, proposed drainage pipes, proposed drainage structures, drainage sub-basin ridgelines, property lines, areas reserved for storm water detention, etc.

Table 2 in Section III.B can be a resource to determine which sheets are required for each development project. Basic information needed on each sheet within the plan set follows, including checklists for each:

### 1. Final Plat

A Final Plat is reviewed by LDO at the direction of DPD. Aside from all other DPD requirements, the Final Plat should include the following:

**a. City Benchmark Note (EXAMPLE)**

- CITY OF MEMPHIS BENCHMARK #642 – POPLAR AND MANASSAS: CITY MONUMENT IS LOCATED ON SE CORNER, ON THE BACK OF SIDEWALK, AT THE END OF RADIUS ON POPLAR. ELEV. 268.70

A file containing the current City benchmarks can be found online at: Land Development | Engineering (memphistn.gov)

**b. Note Concerning Work Within Right-of-Way.**

- PLEASE BE ADVISED THAT A BUILDING PERMIT ISSUED BY THE MEMPHIS/SHELBY COUNTY OFFICE OF CONSTRUCTION CODE ENFORCEMENT DOES NOT ALLOW FOR ALTERATIONS AND/OR IMPROVEMENTS TO ANY RIGHT-OF-WAY (ROW) MAINTAINED BY THE CITY OF MEMPHIS. ALTERATIONS AND/OR IMPROVEMENTS TO THE CITY OF MEMPHIS ROW INCLUDE BUT ARE NOT LIMITED TO WORK PERFORMED ON SIDEWALKS, CURB AND GUTTER, DRIVE APRONS AND UTILITY TIE-INS. ROW PERMITS MUST BE OBTAINED FROM THE MEMPHIS CITY ENGINEER'S OFFICE AT 901.636.6700.

**c. FEMA Note (EXAMPLE)**

- THE SUBJECT PROPERTY (IS/IS NOT) LOCATED IN A SPECIAL FLOOD HAZARD AREA ZONE "X" (AREAS DETERMINED TO BE OUTSIDE THE 0.2% ANNUAL CHANCE FLOODPLAIN) AS PER FLOOD LINES ESTABLISHED BY THE FEDERAL EMERGENCY MANAGEMENT AGENCY AS SHOWN ON FLOOD INSURANCE RATE MAP NUMBER 47157C____ F, DATED SEPTEMBER 26, 2007. THE NEAREST BFE IS___ LOCATED_____.

**d. Sanitary Sewer Notes 10 & 11**

- NO TREES, SHRUBS, PERMANENT STRUCTURES, OR OTHER UTILITIES (EXCEPT FOR CROSSINGS) WILL BE ALLOWED WITHIN SANITARY SEWER EASEMENT. NO OTHER UTILITIES OR SERVICES MAY OCCUPY SANITARY SEWER EASEMENTS IN PRIVATE DRIVES AND YARDS EXCEPT FOR CROSSINGS.

- THE CITY OF MEMPHIS SHALL HAVE INGRESS/EGRESS RIGHTS TO USE PRIVATE DRIVES AND YARDS FOR THE PURPOSE OF MAINTAINING ALL PUBLIC SEWER LINES AND SHALL BEAR NO RESPONSIBILITY FOR THE MAINTENANCE OF SAID PRIVATE DRIVES AND YARDS.

**e. Stormwater Detention Note**

This "Detention Note" is to be shown on Final Plat and Grading & Drainage Plan on any project requiring stormwater detention:

- THE AREAS DENOTED BY "RESERVED FOR STORM WATER DETENTION" SHALL NOT BE USED AS A BUILDING SITE OR FILLED WITHOUT FIRST OBTAINING WRITTEN PERMISSION FROM THE CITY ENGINEER. THE STORM WATER DETENTION SYSTEMS LOCATED IN THESE AREAS, EXCEPT FOR THOSE PARTS LOCATED IN A PUBLIC DRAINAGE EASEMENT, SHALL BE OWNED AND MAINTAINED BY THE PROPERTY OWNER AND/OR PROPERTY OWNERS' ASSOCIATION. SUCH MAINTENANCE SHALL BE PERFORMED SO AS TO ENSURE THAT THE SYSTEM OPERATES IN ACCORDANCE WITH THE APPROVED PLAN ON FILE IN THE CITY ENGINEER'S OFFICE. SUCH MAINTENANCE SHALL INCLUDE, BUT NOT BE LIMITED TO REMOVAL OF SEDIMENTATION, FALLEN OBJECTS, DEBRIS AND TRASH, MOWING, OUTLET CLEANING, AND REPAIR OF DRAINAGE STRUCTURES.

**f. Other DPD Requirements (Including Conditions of Approval)**

**g. Engineers Certificate on the Plat Signed at Each Submittal.**

ENGINEER'S CERTIFICATE:

IT IS HEREBY CERTIFIED THAT THIS PLAT IS TRUE AND CORRECT, IS IN CONFORMANCE WITH THE DESIGN REQUIREMENTS OF THE ZONING ORDINANCE, THE SUBDIVISION REGULATIONS AND THE SPECIFIC CONDITIONS IMPOSED ON THIS DEVELOPMENT AND TAKES INTO ACCOUNT ALL APPLICABLE FEDERAL, STATE AND LOCAL BUILDING LAWS AND REGULATION.

BY_____(SEAL) DATE_____

TENNESSEE CERTIFICATE NO._____

**h. All Dates (Seal and Title Block) Updated on Each Submittal.**

## 2. Site Plan

a. All submissions require a Site Plan (including those with a Final Plat) to be reviewed and signed by the City Engineer. The Site Plan shows basic information regarding the proposed development and the layout thereof. (Site Plan Checklist: Appendix B – Page 1)

## 3. Plan & Profile

a. This sheet will have the roadway plan and profile, typical section, notes, etc., associated with a typical roadway plan as used in standard engineering practice, as well as any and all public infrastructure (i.e., drainage and sewer, and any other utilities to be shown). Provide drainage tables for structures and pipes, shown in the plan view as well as City of Memphis General Notes. Sanitary Sewer information, if applicable, is required as well. (Street Plan and Profile Sheet Checklist: Appendix B – Page 2)

b. When public drainage and/or sewer lines are proposed in areas outside the limits of a street's right-of-way, an Off-Street Plan and Profile is required. (Off-Street Drainage Plan & Profile Checklist: Appendix B – Page 4)

c. (Off-Street Sanitary Sewer Checklist: Appendix B – Page 5)

d. When public sanitary sewer main trunks or laterals are proposed to be constructed or extended, a Sanitary Sewer Outfall or Extension Plan and Profile is required. (Outfall or Sewer Extension Plan & Profile Checklist: Appendix B – Page 8)

## 4. Grading & Drainage Plan

- The Grading and Drainage (G&D) Plan must show all existing and proposed stormwater pipes, structures, facilities (above ground and below), and pertinent topographical features. The designer's plan should completely analyze the impact of the proposed development on existing adjacent and/or downstream properties and public or private drainage infrastructure. The proper performance on the on-site stormwater runoff management facilities is critical for the protection of the new development and those existing, both nearby and downstream.
- The designer should utilize the City of Memphis/Shelby County Stormwater Management Manual (SWMM) for design guidance. The SWMM is available online at: Memphis/Shelby County Stormwater Management Manual
- The designer should either provide detention or submit a detention waiver request based upon SWMM 2.8.5.4

  (Grading & Drainage Plan Checklist: Appendix B – Page 10).

  (Grading & Drainage General Notes: Appendix C – Page 1) that must be shown, verbatim on every G&D sheet and any P&P sheets

The following items contain further information regarding review of drainage:

The minimum required detention data to be shown on the G&D sheet follows:

**a. Pre-Development Data:**

*Site Drainage Area (D.A.) = ____*

*C or CN = ____*

$T_c$ = _____

$Q_{25}$ *predevelopment (25-year Design Flow) = Allowable Discharge =* _____

**b. Post-Development Data (one listing each for Q to pond, and bypass as applicable):**

*D.A = _____*

*C or CN = ____*

$T_c$ = _____

$Q_{25}$ *post =* _____

**c. Detention Discharge:**

$Q_{25\ Routed}$ *(pond)* + $Q_{25}$ *(bypass, if applicable) =* _____ ≤ $Q_{25}$ *predevelopment*

*Table for pond performance showing Stage – Storage – Discharge*

The format above may be modified to fit specific development needs of applicability and is given as only a guide for minimum required project detention data. Appendix A – Page 4 provides a formatting example of a detention design.

Outlet Structure Details must be provided, including a trash rack detail for the outlet.

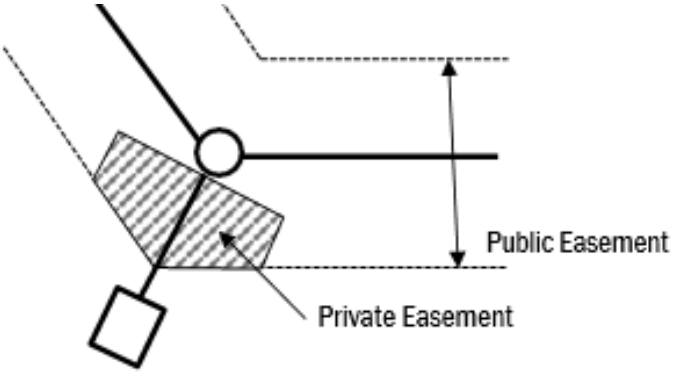
- Concerning underground detention, the SWMM discourages underground detention and placement of detention within parking areas. In practice, both are allowed, with the designer submitting plans depicting such in the plan review process. The underground detention must be accessible by a person for inspection/cleaning, so designer must provide adequate number and location of access points. Any area reserved for detention will be depicted on the plan and plat which will include the note, verbatim, in Section III.D.1.e. Since the area is reserved for detention, a parking lot may be most practical for placement of underground detention avoiding any landscape islands with trees. During review, LDO will review how the 100-year storm is handled.

- Drainage structure and pipe tables providing basic minimum data should be used for public drainage. (Drainpipe Data table: Appendix A – Page 2; Drain Structure Data table: Appendix A – Page 3)

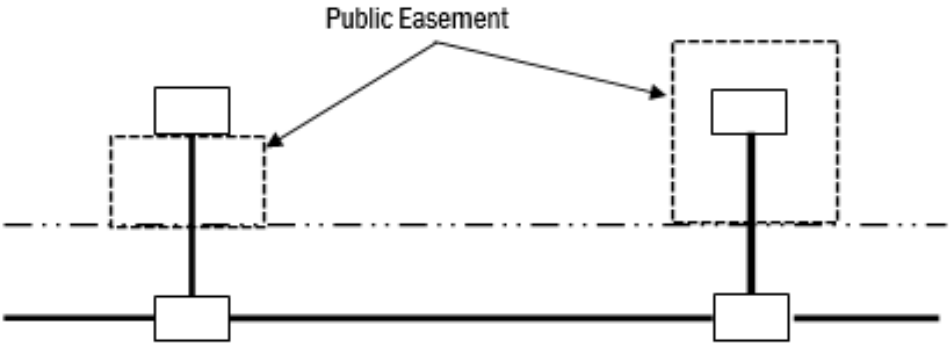
- For the purpose of assessing impact to the downstream system, the designer should include the structures and pipes 2 segments down from where the project's drainage system connects to the public system.

- Any new drainage pipe or structure must be wholly public or private. There are three options to achieve this.
    - Option 1: Provide a private easement (width based on the private pipe diameter & SWMM Chapter 2.6 (Easement)); the private easement would be superimposed over the public easement, beginning at the point where the private pipe enters the outside wall of the public structure, and end where the pipe exits the public easement. This easement would be recorded via the project's Final Plat or by separate Easement Plat, whichever is feasible. See Figure 1, Example 1.
    - Option 2: In rare situations, it may be feasible to provide a public drainage easement to include pipe and/or structure. This option is only with the approval of the City Engineer. See Figure 1, Example 2.
    - Option 3: Provide a structure placed immediately adjacent to the public ROW line (or public drainage easement line), and wholly inside or outside of the ROW (or easement). See Figure 1, Example 3.

**Example 1:**




**Example 2:**




**Example 3:**

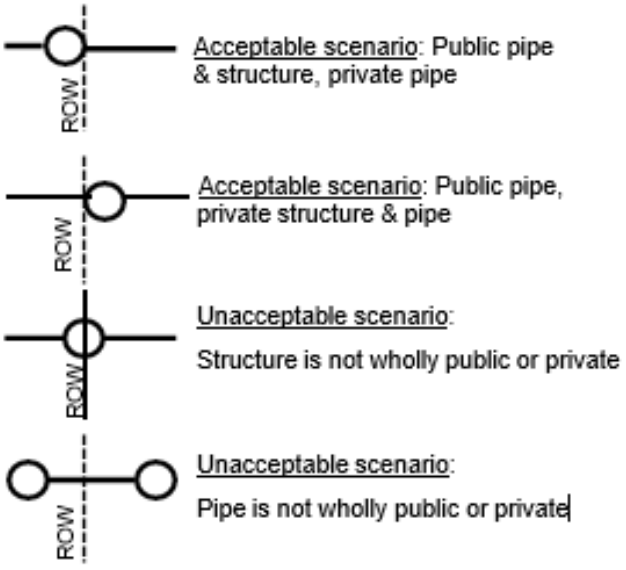


Figure 1: Pipe & Structure Placement Examples

## 5. Erosion Control Plan

ECPs are necessary to protect adjacent downstream properties, and the City's rivers and streams, from pollution and sediment transport during the construction phase of the project. The designer should utilize the more stringent standards of the SWMM and the most recent edition of the TDEC EPSC Handbook (available online at: TNEPSC | Handbook)

(Erosion Control Plan Checklist: Appendix B – Page 12)

## 6. Post Construction Runoff Control Plan

Similar to ECPs, PCRCPs are necessary to protect adjacent downstream properties, and the City's rivers and streams, from pollution and sediment transport throughout the life of the new development and to provide the property owner with specifics on maintenance of detention systems to ensure the design function throughout the life of the development. The designer should utilize the City of Memphis/Shelby County SWMM and the PCRCP Technical Standards Guidance Document for design guidance. The PCRCP Technical Standards Document is available online at:

PCRCP Technical Standards Document Chapter 7

(Post Construction Runoff Control Plan Checklist: Appendix B – Page 14)

## 7. Sewer Plan

Sewer Plans are required for both public and private sanitary sewer systems.

(Sanitary Sewer Plan Checklist: Appendix B – Page 15; Sewer Plan Notes: Appendix C – Page 2)

## 8. Public Infrastructure Details

City of Memphis Standards (see Section III.D.4) or details of public infrastructure, designed by the consultant, requiring structural review. Typical details can be found at: Civil Standards | Roadway & Stormwater Design | Engineering | Memphis, TN

## 9. Private Infrastructure Details

Include necessary details of private infrastructure.

## 10. Traffic Control

Temporary Work Zone Traffic Control is necessary for the safety of pedestrians, motorists, and construction workers. A Temporary Traffic Control Plan (TCP) is needed for all work that will be performed in the City ROW. This includes work performed in the actual roadway and the sidewalk. The Manual on Uniform Traffic Control Devices for Streets and Highways (MUTCD) should be referenced during design.

(Traffic Control Plan Checklist: Appendix B – Page 16; Traffic Control Plan Notes: Appendix C – Pages 3)

## 11. Signing & Striping and/or School Zone Flashing Plan

Roadway signage and striping plans are required with any modification to the existing roadway, with new roadway construction, and when existing traffic patterns are affected.

(Signing and Striping Plan Checklist: Appendix B – Page 17; School Zone Flashing Signal Plan Checklist: Appendix B - Page 18)

## 12. Traffic Signal Plan

Traffic Signal plans will be required for the installation of any new traffic signal or any modifications to existing traffic signals. Design consultants should coordinate any traffic signal design with the City of Memphis, Traffic Engineering Department.

(Traffic Signal Plan Checklist: Appendix B – Page 19)

## 13. Record Drawings (As-Builts)

Following construction, and prior to releasing the construction bond on a project falling under the ROW or SIC categories, the City requires as-built (record) drawings on all public and private infrastructures. Typically, the consultant or surveyor will obtain the particular project's original signed mylars from the City, and make appropriate revisions based on a post-construction survey.

All as-built public structures and connections at public structures and pipes (drainage & sewer) shall be surveyed. The infrastructure shall be shown with a cloud and notated in the Title revision block as "revised to reflect as-built info". Also, provide as-built elevations for the street improvements at 50-foot stations (median improvements, PGL changes, retaining walls in the right of way, curb and gutter construction, etc., where/if appropriate).

All stormwater detention facilities require as-built certification, as well. The elevations of both the as-built grading of the pond (including centerline of levee,

top of bank, toe of slope, internal swales and/or concrete flumes, etc.) and the outlet structure shall be certified. The as-built elevations of the pond grading shall be taken at 50-foot intervals along the perimeter of the pond. As-built elevations of underground detention facilities shall be taken at all access points (manholes, inlets, etc.) and at the outlet structure. The size and shape of detention outlets (orifice, weir, v-notch, etc.) shall also be verified with as-built measurements.

The as-built certification below is to be placed on each as-built drawing and sealed/signed and dated.

AS-BUILT CERTIFICATION:

I HEREBY CERTIFY THAT ALL AS-BUILT CONDITIONS, THE DISTANCES BETWEEN STRUCTURES AND THE AS-BUILT ELEVATIONS SHOWN HEREON (INDICATED WITH A CLOUD) WERE TAKEN ON THE GROUND ON _____, 20__ USING THE B.M. OR T.B.M. NOTED HEREON.

BY: _____ _____

SIGN PRINT

Please submit only bond copies of the original mylars for each discipline with the as-built revisions for initial review.

****Be aware that all as-builts will be reviewed on Accela. ****

LDO will review the as-builts, and if there are no comments, will notify that you can transfer the information to the mylar plans and submit them to us.

## 14. Easement Plats

- From time to time, it is necessary to record easements (or enter into agreements with the City requiring an easement) that are not shown upon or associated with a Final Plat. Examples of these could be Pedestrian Easements, Street and Alley Closures, Drainage or Sewer Easements, Easement Abandonments, Traffic Signal Easements, and "easement" plats for Encroachment Agreements. Reviews are completed on Accela. (Easement Plats Checklist: Appendix B – Page 20)
- Each easement, encroachment, or Street and Alley Closure (SAC) will be treated as a separate "case". LDO will need a "packet" submitted for each.
- There is a $250 review fee required. The plat is routed through an official review by LDO. If you submit more than one "packet", the $250 will cover all.
- The packet should include one 8.5" x 11" (letter) or 8.5" x 14" (legal) paper copy of the sealed/signed plat, along with 1 copy of the deed for the property and a separate page with only the contact information for the owner,

developer, and the engineer/surveyor. Mylar prints will be required for final submittal, but should not be sent until requested, which is typically after the initial review. Please make sure the bond copies are signed/sealed for review. Encroachments requiring an Encroachment Agreement will have to be coordinated with Real Estate Department.

- Traffic Signal Easements (easements for traffic signal locations) will require three separate documents. LDO will need a "packet" for each (one for the pedestrian easement, one for the traffic signal easement, and one for the ROW dedication).
- For Street and Alley Closures (SAC), if there are utilities or utility easements within the street or alley in question, then letters of release from City Engineering, MLGW, AT&T, and Comcast are necessary for Street and Alley Closures. This applies to Utility Easement Abandonments as well.
- For Roadway and/or Wayfinding Sign Encroachments (not standard business signs, etc.) in public right-of-way. Examples of plats and legal descriptions are available upon request.

Further guidance is below. These apply to Street and Alley Closures (SAC), easements and encroachments:

- Provide copies of the deed(s) for the property or properties along and adjacent to the easement (prints from the Register's site are fine)*
- A written description of the easement must be on the plat or on an 8.5" x 11" sheet (example written description below):

PROPERTY DESCRIPTION

BEING A DESCRIPTION OF _____ PROPERTY AS RECORDED IN BOOK ____, PAGE ___ AT THE SHELBY COUNTY REGISTER'S OFFICE, LOCATED IN MEMPHIS, SHELBY COUNTY, TENNESSEE AND BEING MORE PARTICULARLY DESCRIBED AS FOLLOWS: COMMENCING AT A FOUND IRON PIN _____ WITH THE CENTERLINE OF _____ ROAD (60 FOOT WIDE PUBLIC RIGHT-OF-WAY) SAID INTERSECTION POINT HAVING A TENNESSEE STATE PLANE COORDINATE OF NORTH 289962.7713 - EAST 791531.1671; THENCE S03°37'46"E ALONG THE CENTERLINE OF SAID OLD GETWELL ROAD A DISTANCE OF 110.36 FEET TO A POINT OF CURVATURE; THENCE CONTINUING ALONG THE CENTERLINE OF SAID OLD GETWELL ROAD ALONG A CURVE TO THE LEFT HAVING A RADIUS OF 573.95 FEET, AN ARC LENGTH OF 150.03 FEET (CHORD S11°07'53"E - 149.61 FEET) TO A POINT; THENCE LEAVING SAID CENTERLINE ON A BEARING OF N71°22'01"E A DISTANCE OF 30.00 FEET TO A FOUND IRON PIN AT THE SOUTHWEST CORNER OF THE CITY OF MEMPHIS PROPERTY AS DESCRIBED IN BOOK 5774, PAGE 280, SAID

POINT LIES ON THE EAST RIGHT-OF-WAY LINE OF SAID OLD GETWELL ROAD; THENCE S86°09'29”E ALONG THE SOUTH LINE OF THE SAID CITY OF MEMPHIS PROPERTY A DISTANCE OF 16.27 FEET TO A NON-TANGENT POINT ON AN ARC; THENCE ALONG A CURVE TO THE RIGHT, SAID CURVE BEING 15.00 FEET EAST OF PARALLEL TO THE EAST RIGHT-OF-WAY OF SAID OLD GETWELL ROAD AND HAVING A RADIUS OF 527.95 FEET, AN ARC LENGTH OF 111.44 FEET (CHORD N13°15'40”W - 111.24 FEET) TO A NON-TANGENT POINT. SAID POINT BEING THE POINT OF BEGINNING AND HAVING A TENNESSEE STATE PLANE COORDINATE OF NORTH 289822.5449 - EAST 791586.1834; THENCE N01°18'04”E A DISTANCE OF 41.00 FEET TO A POINT; THENCE S88°41'56”E A DISTANCE OF 22.50 FEET TO A POINT; THENCE S01°18'04”W A DISTANCE OF 41.00 FEET TO A POINT; THENCE N88°41'56”W A DISTANCE OF 22.50 FEET TO THE POINT OF BEGINNING AND CONTAINING 923 SQUARE FEET.

- For Encroachments, if applicable, provide graphics of the items of encroachment such as photos, architectural design or elevations
- For Street and Alley Closures, and/or Easement Abandonments, letters of release from City Engineering, MLGW, AT&T, and Comcast will need to be provided.
- Adjust line types for property lines and distinguish from the easement.
- Instruments listed in the title block should be graphically noted/represented.
- Text should be large enough to be easily read (0.12" height, if possible, 0.10” minimum)
- Provide an outline of existing buildings and drives, if available
- Black and white only (no colored lines)
- Examples for title block**, layout, etc. can be provided upon request by designer.
- The final submittal of the plat (subsequent to review) should be printed on mylar, 8.5” x 11” or 8.5” x 14”, with original seal/signature
- Seal should be original and standard size

* If the subject is an encroachment contained wholly within City ROW, the limits of the ROW must be noted. Include the deed of the adjacent property (if available) from the Register’s website.

** The title block must be near exactly like the example and the area of the encroachment/easement/ROW/abandonment should be noted.

Helpful information on SAC’s

- For SACs not associated with projects that include full CDs, and where the closure is a bit complex (e.g., involving installing new infrastructure such as sidewalk, and curb and gutter) a note should be added to the 8.5" x 11" SAC plat stating that "The City of Memphis Office of Construction Inspections must be contacted prior to construction for required permitting and inspection." Their contact information should be included. The satisfactory completion of the SAC conditions (post-construction) would be found in City Inspections' reports. Otherwise, if there are other conditions that must be met (outside of the inspector's purview) then LDO would be responsible for verification of proper closure according to approved conditions.
- For SACs associated with projects that include full CDs, no additional annotation is required assuming that the construction of infrastructure / appurtenances associated with the closure would be shown in the CDs and permitted under the Street Cut Permit or contract for the project. Also, no additional annotation is required for SACs deemed as "paper roads" where no paving or roadway surface treatment exists. The satisfactory completion of the SAC conditions would be determined by the LDO.

For additional information, please contact:

Land Development Office
125 North Main Street, Suite 644
Memphis, TN 38103
901.636.6340

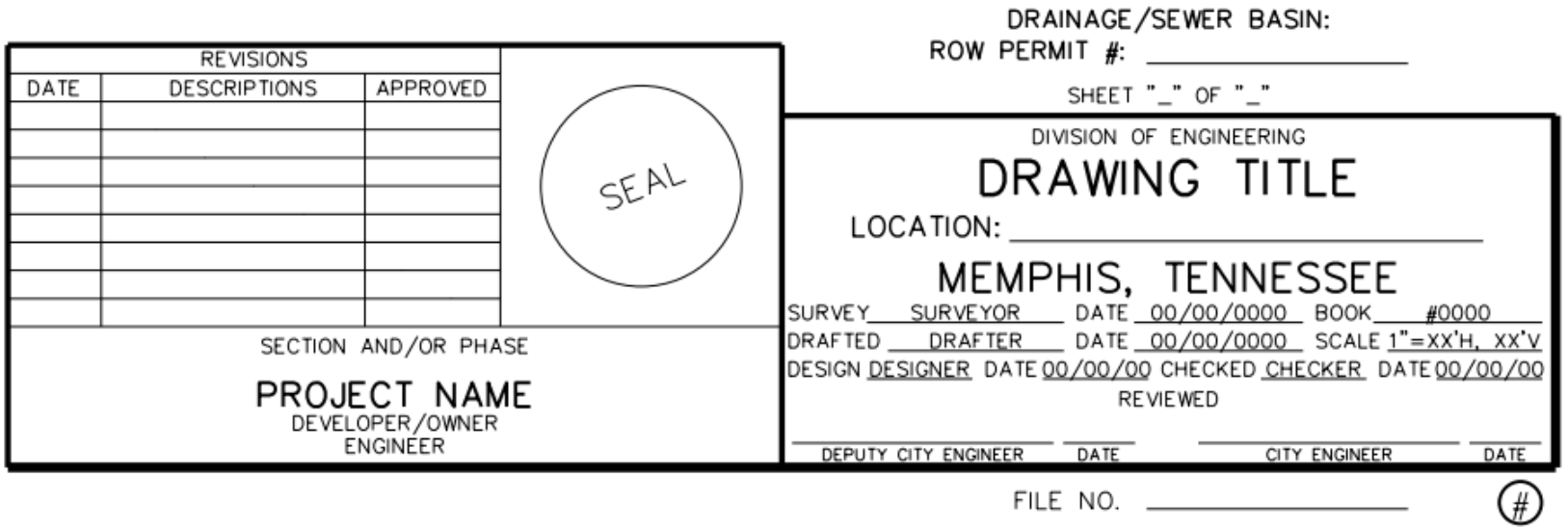
Calls can be directed to the following:

- 901 Portal (Accela) and General Procedures
- Plans Review/Plans Distribution/901 Portal Record Inquiry
- Plans Permitting, Bonds, Fees, Inspections and Council Resolutions
- Fiber Installation Permitting
- City Smart Fiber Project Inquiry
- ROW Drainage and Detention Inquiry
- ROW Landscape Inquiry

# APPENDIX A

TYPICAL STYLES/TABLES

# City of Memphis Title Block and Border Template




"DEPUTY CITY ENGINEER"
Could also be "CITY TRAFFIC ENGINEER" for a Traffic Control or Signs/Markings plan
Could be "CITY CIVIL DESIGN ENGINEER" capital improvement projects
Use "COUNTY ENGINEER" if a City/County Joint Title Block

# Drainpipe Data Table Template

| DRAINPIPE DATA | | | | | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| DESIGN INFORMATION | | | | | | | | | | | | | AS-BUILT | | | | |
| PIPE NO. | UPSTREAM STRUCTURE | INVERT | DOWNSTREAM STRUCTURE | INVERT | PIPE LENGTH (ft.) | PIPE DIA. (in.) | PIPE MATERIAL | SLOPE (%) | AREA (Ac.) | Qd (cfs) | Qc (cfs) | VELOCITY (fps) | UPSTREAM STRUCTURE | DOWNSTREAM STRUCTURE | PIPE LENGTH (ft.) | SLOPE (%) | Qc (cfs) |
| | | | | | | | | | | | | | | | | | |
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* P = PUBLIC PIPE

# Drain Structure Data Table Template

| DRAIN STRUCTURE DATA | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| DESIGN INFORMATION | | | | | | | | | | | | AS-BUILT | |
| STRUCTURE NUMBER | TYPE | CENTERLINE STATION | OFFSET | AREA (Ac.) | Qd (cfs) | ADD BYPASS | INLET Qd (cfs) | INLET Qc (cfs) | BYPASS (cfs) | THROAT ELEV. | RIM ELEV. | THROAT ELEV. | RIM ELEV. |
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* P = PUBLIC STRUCTURE

# Detention Pond Data Table Example

## DETENTION BASIN SUMMARY

**OUTLET STRUCTURE SUMMARY:**

| **POND A [NEW]** | | **POND B [EXISTING]** | |
|---|---|---|---|
| **TYPE:** ORIFICE | **TYPE:** OVERFLOW | **TYPE:** ORIFICE | **TYPE:** OVERFLOW |
| **SIZE:** 6" DIA. | **SIZE:** (4) 6" RISE x 36" | **SIZE:** 16" DIA. | **SIZE:** WEIR |
| **ELEVATION:** 273.00 | **ELEVATION:** 276.00 | **ELEVATION:** 265.12 | **ELEVATION:** 268.50 |

**POND A**

| STORM EVENT (YRS) | POST DEVELOPMENT | | | |
|---|---|---|---|---|
| | **TO POND A** | | **BYPASS TO B01** | |
| | AREA = 0.81 AC | | AREA = 1.32 AC | |
| | $C_{POND}$ = 0.66 | | $C_{BYPASS}$ = 0.38 | |
| | $T_{C\ POND}$ = 5 MIN | | $T_{C\ BYPASS}$ = 16 MIN | |
| | POND DISCHARGE | WSE | BYPASS DISCHARGE | TOTAL DISCHARGE TO POND B |
| | CFS | FT | CFS | CFS |
| 2 | 1.17 | 274.77 | 1.96 | 1.17 |
| 5 | 1.23 | 274.96 | 2.26 | 1.23 |
| 10 | 1.27 | 275.05 | 2.49 | 1.27 |
| 25 | 1.30 | 275.15 | 2.75 | 1.30 |
| 100 | 1.35 | 275.30 | 3.12 | 1.35 |

**POND B (EXISTING)**

| STORM EVENT (YRS) | POST DEVELOPMENT | | | |
|---|---|---|---|---|
| | DRAINAGE BASIN AREA | 3.01 | **TO POND B** | |
| | | | AREA = 2.94 AC | |
| | C = | 0.75 | $C_{POND}$ = 0.76 | |
| | $T_C$ = | 10 MIN | $T_{C\ POND}$ = 10 MIN | |
| | TOTAL ALLOWABLE DISCHARGE | | TOTAL DISCHARGE | WSE |
| | CFS | | CFS | FT |
| 2 | 8.41 | | 8.24 | 267.29 |
| 5 | 8.93 | | 8.79 | 267.50 |
| 10 | 9.36 | | 9.23 | 267.67 |
| 25 | 9.84 | | 9.71 | 267.87 |
| 100 | 10.56 | | 10.23 | 268.10 |

| STAGE (ELEV) | STORAGE (CF) | DISCHARGE (CFS) |
|---|---|---|
| 273 | 0 | 0 |
| 274 | 112 | 0.82 |
| 275 | 631 | 1.25 |
| 276 | 1,583 | 1.57 |
| 277 | 3,046 | 26.85 |
| 277.5 | 4,003 | 34.25 |

TOP OF POND BERM = 277.50

| STAGE (ELEV) | STORAGE (CF) | DISCHARGE (CFS) |
|---|---|---|
| 265.12 | 0 | 0 |
| 266 | 77 | 3.13 |
| 267 | 860 | 7.41 |
| 268 | 3,047 | 10.00 |
| 269 | 6,747 | 12.05 |

TOP OF POND BERM = 269.00

**COMBINED DISCHARGE (POND B PLUS B01)**

| STORM EVENT | PRE (CFS) | POST (CFS) |
|---|---|---|
| 2 | 10.89 | 10.20 |
| 5 | 11.80 | 11.05 |
| 10 | 12.53 | 11.72 |
| 25 | 13.35 | 12.46 |
| 100 | 14.56 | 13.35 |

## Stormwater Information Table Example

| ITEM | DESCRIPTION |
|---|---|
| INTENDED USE | *EXAMPLE:* RETAIL STORE, RESTAURANT, SINGLE FAMILY HOUSING, WAREHOUSE, ETC. |
| PARCEL ID | *EXAMPLE:* 017135 00005 |
| TOTAL SITE AREA (ACRES) | *EXAMPLE:* 3.5 ACRES |
| IMPERVIOUS AREA (SQ. FT.) | *EXAMPLE:* 35,189 SQ. FT. |
| EXPECTED HOT SPOTS | *EXAMPLE:* PARKING LOT, DUMPSTER, GREASE TRAP, ETC. |
| LARGE STRUCTURAL BMPs | *EXAMPLE:* DETENTION BASIN, RETENTION POND, UNDERGROUND DETENTION, ETC. (MAY NOT BE APPLICABLE AS THIS IS **NOT** REFERRING TO BASIC STRUCTURES/DRAINPIPES) |
| O&M REQUIREMENTS FOR STRUCTURAL BMPs | *EXAMPLE:* CLEAR OUTLET BLOCKAGES 1X/MONTH; CHECK & REPAIR STRUCTURAL INTEGRITY OF BANKS & OUTLET YEARLY (IF THERE IS NO LARGE STRUCTURAL BMP, THIS WILL NOT BE APPLICABLE) |
| NON-STRUCTURAL BMPS | *EXAMPLE:* EMPLOYEE TRAINING; LITTER PICK-UP WEEKLY; PARKING LOT SWEEPING 2X/YEAR; ETC. |
| ENTITY RESPONSIBLE FOR POST-CONSTRUCTION BMP MAINTENANCE | CONTACT NAME, STREET ADDRESS, E-MAIL AND/OR PHONE NUMBER |
| WATERSHED BASIN NAME | LOOSAHATCHIE RIVER, WOLF RIVER, NONCONNAH CREEK, OR MISSISSIPPI RIVER |
| CITY SUB-BASIN NAME | SUB-BASIN LIST CAN BE FOUND IN TABLE 3 ON PAGE 11 OF THE STANDARDS AND GUIDELINES |

# APPENDIX B

CHECKLISTS

Development:_____ Engineer:_____ Date: ___/___/___

# Site Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| STANDARD NOTES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | CoM Benchmark |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE |
| ☐ | ☐ | ☐ | Work within ROW note |
| ☐ | ☐ | ☐ | Sanitary Sewer Notes I & II |
| ☐ | ☐ | ☐ | CoM General Notes |
| ☐ | ☐ | ☐ | Stormwater Detention Note |

| FOR PROPOSED SCHOOLS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Circulation for AM Drop Off and PM Pick up |
| ☐ | ☐ | ☐ | Number of Expected Students |
| ☐ | ☐ | ☐ | Grades Served |
| ☐ | ☐ | ☐ | Number of Walkers Expected |
| ☐ | ☐ | ☐ | Signing Plan |
| ☐ | ☐ | ☐ | School Associated Traffic Control Changes |

| SITE PLAN - GENERAL CONTINUED | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Dimension to Property Line from the Edge of Curb Cut |
| ☐ | ☐ | ☐ | Dimension from the Edge of Curb Cut to the Edge of Utility pole, Fire Hydrant, Storm Sewer Drain inlet, etc. |
| ☐ | ☐ | ☐ | Dimension between any Two Curb Cuts |
| ☐ | ☐ | ☐ | Dimension to the End of Curb Radius from the Edge of Curb Cut |

**Traffic Impact Policy**

The Developer's Engineer shall submit a Trip Generation Report that documents the proposed land use, project, scope, criteria for determining Traffic Impact Study requirement and anticipated traffic demand associated with the proposed development. A detailed Traffic Impact Study will be required when the accepted Trip Generation Report indicates that the number of projected trips meets or exceeds the criteria listed in Section 210 - Traffic Impact Policy for Land Development of the City of Memphis Division of Engineering Design and Policy Review Manual.

| SITE PLAN - GENERAL CONTINUED | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Zoning and Land Use |
| ☐ | ☐ | ☐ | Building Footprints |
| ☐ | ☐ | ☐ | Property Lines, Interior Lot Lines and Setbacks |
| ☐ | ☐ | ☐ | Vicinity Map |
| ☐ | ☐ | ☐ | Area of Property |
| ☐ | ☐ | ☐ | Number of Units Proposed |
| ☐ | ☐ | ☐ | Graphic Scale |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Street Names with Centerline, Call and Bearings, and ROW width |
| ☐ | ☐ | ☐ | Adjoining Development Property Owner Names, Areas, and Lot Identifier (e.g. Plat Book and Page, Instrument #, Parcel ID) |
| ☐ | ☐ | ☐ | Dimension to Property Line from Side Street or Point of Commencement |
| ☐ | ☐ | ☐ | List of Approved Conditions |
| ☐ | ☐ | ☐ | Area Reserved for Stormwater Detention |
| ☐ | ☐ | ☐ | New Easements (All On 1 Lot) with Size, Ties, etc. |
| ☐ | ☐ | ☐ | Size and Location of All Existing Curb Cuts, Sidewalks, and Curb Ramps |
| ☐ | ☐ | ☐ | Provide ADA Compliant Cross Slopes for Pedestrian Path Across Curb Cuts |
| ☐ | ☐ | ☐ | Existing Curb Cuts to Remain |
| ☐ | ☐ | ☐ | Existing Curb Cuts to Be Replaced |
| ☐ | ☐ | ☐ | Proposed Curb Cuts, Sidewalks, and Gutter |
| ☐ | ☐ | ☐ | Curb Cut Detail (Throat Width, Width of Scoring Lines/Broom Finish, etc.) |
| ☐ | ☐ | ☐ | Above Ground Utilities and Storm Drainage Inlets |
| ☐ | ☐ | ☐ | Existing and Proposed Ingress-Egress Easements |
| ☐ | ☐ | ☐ | Existing and Proposed Pedestrian Easements |
| ☐ | ☐ | ☐ | Existing and Proposed Traffic Signal Easements |
| ☐ | ☐ | ☐ | Label Existing ROW and Dedication |
| ☐ | ☐ | ☐ | Existing and Proposed Street Improvements |
| ☐ | ☐ | ☐ | Existing and Proposed Sidewalks |
| ☐ | ☐ | ☐ | Existing and Proposed Curb and Gutter |
| ☐ | ☐ | ☐ | Existing and Proposed Medians and Median Openings |
| ☐ | ☐ | ☐ | Dimensioned Parking Layout and Number of Queueing Spaces |
| ☐ | ☐ | ☐ | Existing Underground Traffic Signal Conduits and Pullboxes |
| ☐ | ☐ | ☐ | Gate Setback from ROW and Required Turn-Around for Forward Exit |
| ☐ | ☐ | ☐ | Floodway and/or Floodplain zone lines per FEMA Map |
| ☐ | ☐ | ☐ | Clear Sight Area |
| ☐ | ☐ | ☐ | Property Line Calls and Bearings |

Development:_____ Engineer:_____ Date: ___/___/___

# Street Plan & Profile Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Sewer Basin Identification (above title block) |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| STANDARD NOTES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | CoM Benchmark |
| ☐ | ☐ | ☐ | CoM General Notes |

| TYPICAL SECTION | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Dimensions - ROW to ROW line |
| ☐ | ☐ | ☐ | Base Material & Thickness |
| ☐ | ☐ | ☐ | Sidewalk |
| ☐ | ☐ | ☐ | Curb & Gutter |
| ☐ | ☐ | ☐ | Proposed Grade Line |
| ☐ | ☐ | ☐ | Pavement X-Slopes |
| ☐ | ☐ | ☐ | Sidewalk & Grass X-Slopes |
| ☐ | ☐ | ☐ | Pedestrian Easement |

| PROFILE VIEW | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Grades ( Max 2% from E.R. to Intersecting Road EOP; End V.C. Behind E.R.) |
| ☐ | ☐ | ☐ | P.V.I. Station & Elevation |
| ☐ | ☐ | ☐ | P.V.C. & P.V.T. Station & Elevation |
| ☐ | ☐ | ☐ | Length of Vertical Curve |
| ☐ | ☐ | ☐ | K Values |
| ☐ | ☐ | ☐ | P.G.L. Elevation at 25' Stations |
| ☐ | ☐ | ☐ | 3 Point Profile |
| ☐ | ☐ | ☐ | Scale |

| PLAN VIEW | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Intersection Equation |
| ☐ | ☐ | ☐ | Intersection Angle |
| ☐ | ☐ | ☐ | Centerline Stationing |
| ☐ | ☐ | ☐ | Centerline Curve Data |
| ☐ | ☐ | ☐ | P.C. Station & P.T. Station |
| ☐ | ☐ | ☐ | Concrete Water Table |
| ☐ | ☐ | ☐ | Curb Radius |
| ☐ | ☐ | ☐ | E.R. Station & Elevation |
| ☐ | ☐ | ☐ | Slope & Direction Around E.R. |
| ☐ | ☐ | ☐ | T.C. Elevation & Station When Tying to Existing Curbs |
| ☐ | ☐ | ☐ | ROW Widths on All Streets |
| ☐ | ☐ | ☐ | Curb to Curb Widths on All Streets |
| ☐ | ☐ | ☐ | Handicap Ramps at All Intersections |
| ☐ | ☐ | ☐ | City Benchmark |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Scale |
| ☐ | ☐ | ☐ | Objects in 'Clear Zone' |
| ☐ | ☐ | ☐ | Pedestrian Easements |

| PIPE DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | List Pipe Material |
| ☐ | ☐ | ☐ | Pipe Sizes |
| ☐ | ☐ | ☐ | Pipe Length |
| ☐ | ☐ | ☐ | Slope |
| ☐ | ☐ | ☐ | Design Flow (Q-25 or Q-100) |
| ☐ | ☐ | ☐ | Pipe Capacity |
| ☐ | ☐ | ☐ | Gross Drainage Area Tributary to Pipe |
| ☐ | ☐ | ☐ | Full Pipe Velocity |
| ☐ | ☐ | ☐ | As-Built Columns (Left Blank) |
| ☐ | ☐ | ☐ | Flowline Elevations |
| ☐ | ☐ | ☐ | Radial Pipe Radius |
| ☐ | ☐ | ☐ | Public/Private Clearly Marked |

| STRUCTURE DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Type of Structure |
| ☐ | ☐ | ☐ | Drainage Area |
| ☐ | ☐ | ☐ | Sub-Basin Design Flow |
| ☐ | ☐ | ☐ | Intercepted Flow |
| ☐ | ☐ | ☐ | By-Pass Flow |
| ☐ | ☐ | ☐ | Flowline Elevations |
| ☐ | ☐ | ☐ | Structure Tope Elevations |
| ☐ | ☐ | ☐ | Inlet Throat Elevations |
| ☐ | ☐ | ☐ | Maintain 0.1 Foot Drop Across Structure |
| ☐ | ☐ | ☐ | As-Built Columns (Left Blank) |
| ☐ | ☐ | ☐ | Public/Private Clearly Marked |
| ☐ | ☐ | ☐ | Width of Spread - Upstream End (Upon Request) [See Street P&P] |
| ☐ | ☐ | ☐ | DMH Diameter |
| ☐ | ☐ | ☐ | Flowline of Throats, # of Openings, Etc. |
| ☐ | ☐ | ☐ | Structure Station and Offset |

Checklist continues on the following page →

Development:_____ Engineer:_____ Date: ___/___/___

| SANITARY SEWER | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Manhole Size (if not 4 ft.) |
| ☐ | ☐ | ☐ | SMH Station & Offset (Plan & Profile) |
| ☐ | ☐ | ☐ | SMH Flowlines with size and direction (Profile) |
| ☐ | ☐ | ☐ | Pipe Size (Plan & Profile) |
| ☐ | ☐ | ☐ | Pipe Length (Profile) |
| ☐ | ☐ | ☐ | Pipe Slope (Profile) |
| ☐ | ☐ | ☐ | Clearance with Drainage (1.5' outside pipe) |
| ☐ | ☐ | ☐ | Clearance with Water (10' separation) |
| ☐ | ☐ | ☐ | Minimum Cover |
| ☐ | ☐ | ☐ | Off-street Sewer Profiles: Stationed from Downstream |
| ☐ | ☐ | ☐ | Extend to Upstream Property or Phase line with manhole and stubout |
| ☐ | ☐ | ☐ | State Reference Number (e.g. 94-SSC-103) |
| ☐ | ☐ | ☐ | State Delegation Stamp ("Health Stamp") |
| ☐ | ☐ | ☐ | Ductile Iron as req'd (Profile) |
| ☐ | ☐ | ☐ | All Data on Sheet Matches Sewer Plan |
| ☐ | ☐ | ☐ | All Private Sewers Clearly Marked |
| ☐ | ☐ | ☐ | 5' Minimum From Face of Curb |

| OTHER DRAINAGE INFORMATION | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Water Table Design Flow |
| ☐ | ☐ | ☐ | DMH at End of Radial Pipes (Plan) |
| ☐ | ☐ | ☐ | Structure Station and Offset (Plan & Profile) |
| ☐ | ☐ | ☐ | DMH Flowlines with Size (Profile) |
| ☐ | ☐ | ☐ | Rip-Rap Grade |
| ☐ | ☐ | ☐ | Rip-Rap Dimensions and Thickness |
| ☐ | ☐ | ☐ | Headwall Exit Velocity |
| ☐ | ☐ | ☐ | Ditching at Headwall |

| MODIFICATIONS/IMPROVEMENTS TO EXISTING STREETS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Dimension Existing and Proposed; Match Existing Section; (Saw cut and Remove Existing Pavement and Base and Dimensions to be Removed and Added if Required (Section & Plan) |
| ☐ | ☐ | ☐ | Show and Label Existing E.O.P. (Section & Plan) |
| ☐ | ☐ | ☐ | Existing E.O.P., Centerline, and P.G.L. Elev. at 25' Stations (Profile) |
| ☐ | ☐ | ☐ | Maintain 1.5% ≤ (Cross Slope, Sc) ≤ 3.0% |

Development:_____ Engineer:_____ Date: ___/___/___

# Off-Street Drainage Plan & Profile Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Sewer Basin Identification (above title block) |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| STANDARD NOTES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | CoM Benchmark |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE |
| ☐ | ☐ | ☐ | CoM General Notes |

| PLAN VIEW | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Graphic & Detail Scales |
| ☐ | ☐ | ☐ | Interior Lot Lines |
| ☐ | ☐ | ☐ | Property Map and Parcel Number |
| ☐ | ☐ | ☐ | Minimum Lot Elevation |
| ☐ | ☐ | ☐ | Existing Contours (2' Maximum) On-Site and Off-Site as Needed to Determine Effects on Subject Property |
| ☐ | ☐ | ☐ | Proposed Contours (2' Maximum) |
| ☐ | ☐ | ☐ | Ridge Lines Delineating Basins |
| ☐ | ☐ | ☐ | Sub-Basin Drainage Areas |
| ☐ | ☐ | ☐ | Area of Off-Site Basins Draining to Development |
| ☐ | ☐ | ☐ | Adjoining Development Property Owner Names |
| ☐ | ☐ | ☐ | Adjacent Improvements |
| ☐ | ☐ | ☐ | Rip-Rap Grades |
| ☐ | ☐ | ☐ | Rip-Rap Dimensions and Thickness |

| DITCH DATA | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Typical Cross Section |
| ☐ | ☐ | ☐ | Location |
| ☐ | ☐ | ☐ | Slope |
| ☐ | ☐ | ☐ | Flow Depth |
| ☐ | ☐ | ☐ | Capacity |
| ☐ | ☐ | ☐ | Velocity |
| ☐ | ☐ | ☐ | Manning's "n" Value |

| PROFILE VIEW | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | DMH Stations (Plan & Profile) |
| ☐ | ☐ | ☐ | DMH Flowlines w/ Size & Direction (Profile) |
| ☐ | ☐ | ☐ | DMH Rim Elevation (Profile) |
| ☐ | ☐ | ☐ | Pipe Size (Plan & Profile) |
| ☐ | ☐ | ☐ | Pipe Length (Profile) |
| ☐ | ☐ | ☐ | Pipe Slope (Profile) |
| ☐ | ☐ | ☐ | Station Line from Existing Tie-In to Upstream |
| ☐ | ☐ | ☐ | All Data on Sheet Matches G&D Plan |
| ☐ | ☐ | ☐ | Special Pipe Notes Where Needed |
| ☐ | ☐ | ☐ | Details & Sections as Needed |

| PIPE DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | List Pipe Material |
| ☐ | ☐ | ☐ | Pipe Sizes |
| ☐ | ☐ | ☐ | Pipe Length |
| ☐ | ☐ | ☐ | Slope |
| ☐ | ☐ | ☐ | Design Flow (Q-25 or Q-100) |
| ☐ | ☐ | ☐ | Pipe Capacity |
| ☐ | ☐ | ☐ | Gross Drainage Area Tributary to Pipe |
| ☐ | ☐ | ☐ | Full Pipe Velocity |
| ☐ | ☐ | ☐ | As-Built Columns (Left Blank) |
| ☐ | ☐ | ☐ | Flowline Elevations |
| ☐ | ☐ | ☐ | Radial Pipe Radius |
| ☐ | ☐ | ☐ | Public/Private Clearly Marked |

| STRUCTURE DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Type of Structure |
| ☐ | ☐ | ☐ | Drainage Area |
| ☐ | ☐ | ☐ | Sub-Basin Design Flow |
| ☐ | ☐ | ☐ | Intercepted Flow |
| ☐ | ☐ | ☐ | By-Pass Flow |
| ☐ | ☐ | ☐ | Flowline Elevations |
| ☐ | ☐ | ☐ | Structure Tope Elevations |
| ☐ | ☐ | ☐ | Inlet Throat Elevations |
| ☐ | ☐ | ☐ | Maintain 0.1 Foot Drop Across Structure |
| ☐ | ☐ | ☐ | As-Built Columns (Left Blank) |
| ☐ | ☐ | ☐ | Public/Private Clearly Marked |
| ☐ | ☐ | ☐ | Width of Spread - Upstream End (Upon Request) [See Street P&P] |
| ☐ | ☐ | ☐ | DMH Diameter |
| ☐ | ☐ | ☐ | Flowline of Throats, # of Openings, Etc. |
| ☐ | ☐ | ☐ | Structure Station and Offset |

Development:_____ Engineer:_____ Date: ___/___/___

**Off-Street Sanitary Sewer Checklist**

Development:_____ Engineer:_____ Date: ___/___/___

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") (Legible when printed on 11x17) |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | State Reference Number (e.g. 94-SSC-103) |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Sewer Basin Identification (above title block) |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| STANDARD NOTES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | CoM Benchmark |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE |
| ☐ | ☐ | ☐ | CoM General Notes |

| GENERAL | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | BM or TBM Description & Elevation |
| ☐ | ☐ | ☐ | Vicinity Map on top right corner |
| ☐ | ☐ | ☐ | State Delegation Stamp ("Health Stamp") |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Property Lines & Interior Lot Lines |
| ☐ | ☐ | ☐ | Street Names |
| ☐ | ☐ | ☐ | Adjoining Development/Property Owner Names |
| ☐ | ☐ | ☐ | Permanent Easements Width (Usually 15' But Varies w/ Conditions) |
| ☐ | ☐ | ☐ | Temporary Construction Easements Width (Usually 20' But Varies w/ Conditions) |
| ☐ | ☐ | ☐ | Existing Sewer Data for Tie-In Points |
| ☐ | ☐ | ☐ | Private Sewers Clearly Marked |
| ☐ | ☐ | ☐ | Private Sewer Certificate |
| ☐ | ☐ | ☐ | Upstream Service Provided (Show Qc/Qd/A) |
| ☐ | ☐ | ☐ | Flow Direction Arrows |
| ☐ | ☐ | ☐ | Clearance CL Sewer to Face of Curb (5' MIN) |
| ☐ | ☐ | ☐ | Off-street Sewer Profile Reference |
| ☐ | ☐ | ☐ | Off-street Sewer Angles |
| ☐ | ☐ | ☐ | New Manhole Ties to Existing Manholes |
| ☐ | ☐ | ☐ | Typical Line Location 7' north or west of CL Street |
| ☐ | ☐ | ☐ | Utilities affecting installation (gas lines, etc.) |

| PLAN AND PROFILE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Manhole Size (if not 4 ft. Diameter Manhole) |
| ☐ | ☐ | ☐ | TN State plane Co-ord pts N & E for SMH |
| ☐ | ☐ | ☐ | SMH Station (Plan & Profile) |
| ☐ | ☐ | ☐ | SMH Flowlines with size and direction (Profile) |
| ☐ | ☐ | ☐ | SMH Rim Elevation (Profile) |
| ☐ | ☐ | ☐ | 0.1' Drop Across Manholes |
| | | | ***Manhole Rim Elevations*** |
| ☐ | ☐ | ☐ | 1.0' Above 100 Year Flood Elevation |
| ☐ | ☐ | ☐ | 1.5' Above Grade in Open Areas |
| ☐ | ☐ | ☐ | 0.5' Above Grade in Back Yards |
| ☐ | ☐ | ☐ | Sealed Lids & Vent Stacks Required if Rim Cannot Be Constructed 1.0' Above 100-yr Flood Elevation |
| ☐ | ☐ | ☐ | Spacing (pipes sized 8"-15" = 400', 18" 30" = 500") |
| ☐ | ☐ | ☐ | Pipe Size (Plan & Profile) |
| ☐ | ☐ | ☐ | Pipe Length (Profile) |
| ☐ | ☐ | ☐ | Pipe Slope (Profile) |
| ☐ | ☐ | ☐ | Station Line from Existing Tie-In to Upstream |
| ☐ | ☐ | ☐ | Drop Construction Required if Drop > 2.0' |
| ☐ | ☐ | ☐ | Ductile Iron As Required (Profile) Ref Sanitary Sewer Plan |
| ☐ | ☐ | ☐ | Drop Construction as Required (Profile) |
| ☐ | ☐ | ☐ | All Data on Sheet Matches Sewer Plan |
| ☐ | ☐ | ☐ | All Private Sewer Clearly Marked |
| ☐ | ☐ | ☐ | Ridgelines Not To Be Crossed |
| ☐ | ☐ | ☐ | Offset from Ditches and Streams |
| ☐ | ☐ | ☐ | Rip-Rap Protection for Ditch Crossings |
| ☐ | ☐ | ☐ | Standard Ingress/Egress Note |
| ☐ | ☐ | ☐ | Standard Sewer Construction Notes |
| ☐ | ☐ | ☐ | Erosion Control Details and Notes |
| ☐ | ☐ | ☐ | Special Pipe Notes Where Needed |
| ☐ | ☐ | ☐ | Qc/Qd/A Shown at All Downstream Tie-Ins |
| ☐ | ☐ | ☐ | Details & Sections As Needed |
| ☐ | ☐ | ☐ | Railroad Milepost Tie |
| ☐ | ☐ | ☐ | TVA or MLGW Tower Tie |
| ☐ | ☐ | ☐ | Easement Plat Number References |
| ☐ | ☐ | ☐ | Service Connection Stations with CO Top, FL out Elev & TN State co-ord pts for CO |

Development:_____ Engineer:_____ Date: ___/___/___

Development:_____ Engineer:_____ Date: ___/___/___

**Outfall or Sewer Extension Plan & Profile Checklist**

Development:_____ Engineer:_____ Date: ___/___/___

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| | | | |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") (Legible when printed on 11x17) |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Scale Usually 1"=50' |
| ☐ | ☐ | ☐ | State Reference Number (e.g. 94-SSC-103) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Sewer Basin Identification (above title block) |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| GENERAL | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | BM or TBM Description & Elevation |
| ☐ | ☐ | ☐ | Vicinity Map on top right corner |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE |
| ☐ | ☐ | ☐ | State Delegation Stamp ("Health Stamp") |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Property Lines & Interior Lot Lines |
| ☐ | ☐ | ☐ | Street Names |
| ☐ | ☐ | ☐ | Adjoining Development/Property Owner Names |
| ☐ | ☐ | ☐ | Permenant Easements (All on 1 lot) with size, ties, etc (15' wide) |
| ☐ | ☐ | ☐ | Temporary Construction Easement - 20' on both sides from Perm Easement |
| ☐ | ☐ | ☐ | Existing Sewer Data for Tie-In Points |
| ☐ | ☐ | ☐ | Private Sewers Clearly Marked |
| ☐ | ☐ | ☐ | Private Sewer Certificate |
| ☐ | ☐ | ☐ | Upstream Service Provided (Show Qc/Qd/A) |
| ☐ | ☐ | ☐ | Utilities Affecting Installation (Gas/Water Lines, etc.) Shown on Plan & Profile |
| ☐ | ☐ | ☐ | Clearance CL Sewer to Face of Curb (5' MIN) |
| ☐ | ☐ | ☐ | Off-street Sewer Angles |
| ☐ | ☐ | ☐ | Off-street Sewer Profile Reference |
| ☐ | ☐ | ☐ | New Manhole Ties to Existing Manholes |

| PLAN AND PROFILE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Manhole Size (if not 4 ft.) |
| ☐ | ☐ | ☐ | TN Plane Coordinate Pt. N & E for SMH |
| ☐ | ☐ | ☐ | SMH Station (Plan & Profile) |
| ☐ | ☐ | ☐ | SMH Flowlines with size and direction (Profile) |
| ☐ | ☐ | ☐ | SMH Rim Elevation (Profile) |
| ☐ | ☐ | ☐ | 0.1' Drop Across Manholes |
| | | | ***Manhole Rim Elevations*** |
| ☐ | ☐ | ☐ | 1.0' Above 100 Year Flood Elevation |
| ☐ | ☐ | ☐ | 1.5' Above Grade in Open Areas |
| ☐ | ☐ | ☐ | 0.5' Above Grade in Back Yards |
| ☐ | ☐ | ☐ | Sealed Lids & Vent Stacks Required if Rim Cannot Be Constructed 1.0' Above 100-yr Flood Elevation |
| ☐ | ☐ | ☐ | Manhole Spacing for pipes 15" or less = 400' & pipes 18" - 30" = 500' |
| ☐ | ☐ | ☐ | Pipe Size (Plan & Profile) |
| ☐ | ☐ | ☐ | Pipe Length (Profile) |
| ☐ | ☐ | ☐ | Pipe Slope (Profile) |
| ☐ | ☐ | ☐ | Station Line from Existing Tie-In to Upstream |
| ☐ | ☐ | ☐ | Drop Construction Required if Drop > 2.0' |
| ☐ | ☐ | ☐ | Ductile Iron As Required (Profile) |
| ☐ | ☐ | ☐ | Drop Construction as Required (Profile) |
| ☐ | ☐ | ☐ | All Data on Sheet Matches Sewer Plan |
| | | | |
| ☐ | ☐ | ☐ | All Private Sewer Clearly Marked |
| ☐ | ☐ | ☐ | Ridgelines Not To Be Crossed |
| ☐ | ☐ | ☐ | Offset from Ditches and Streams |
| ☐ | ☐ | ☐ | Rip-Rap Protection for Ditch Crossings |
| ☐ | ☐ | ☐ | Standard Ingress/Egress Note |
| ☐ | ☐ | ☐ | Standard Sewer Construction Notes |
| ☐ | ☐ | ☐ | Erosion Control Details and Notes |
| ☐ | ☐ | ☐ | Special Pipe Notes Where Needed |
| ☐ | ☐ | ☐ | Qc/Qd/A Shown at All Downstream Tie-Ins |
| ☐ | ☐ | ☐ | Details & Sections As Needed |
| ☐ | ☐ | ☐ | Railroad Milepost Tie |
| ☐ | ☐ | ☐ | TVA or MLGW Tower Tie |
| ☐ | ☐ | ☐ | Easement Plat Number References |
| ☐ | ☐ | ☐ | Service Connection Stations with CO Top, FL out Elev & TN State co-ord pts for CO |

Development:_____ Engineer:_____ Date: ___/___/___

# Grading & Drainage Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| PIPE DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | List Pipe Material |
| ☐ | ☐ | ☐ | Pipe Sizes |
| ☐ | ☐ | ☐ | Pipe Length |
| ☐ | ☐ | ☐ | Slope |
| ☐ | ☐ | ☐ | Design Flow (Q-25 or Q-100) |
| ☐ | ☐ | ☐ | Pipe Capacity |
| ☐ | ☐ | ☐ | Gross Drainage Area Tributary to Pipe |
| ☐ | ☐ | ☐ | Full Pipe Velocity |
| ☐ | ☐ | ☐ | As-Built Columns (Left Blank) |
| ☐ | ☐ | ☐ | Flowline Elevations |
| ☐ | ☐ | ☐ | Radial Pipe Radius |
| ☐ | ☐ | ☐ | Public/Private Clearly Marked |

| STRUCTURE DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Type of Structure |
| ☐ | ☐ | ☐ | Drainage Area |
| ☐ | ☐ | ☐ | Sub-Basin Design Flow |
| ☐ | ☐ | ☐ | Intercepted Flow |
| ☐ | ☐ | ☐ | By-Pass Flow |
| ☐ | ☐ | ☐ | Flowline Elevations |
| ☐ | ☐ | ☐ | Structure Top Elevations |
| ☐ | ☐ | ☐ | Inlet Throat Elevations |
| ☐ | ☐ | ☐ | Maintain 0.1 Foot Drop Across Structure |
| ☐ | ☐ | ☐ | As-Built Columns (Left Blank) |
| ☐ | ☐ | ☐ | Public/Private Clearly Marked |
| ☐ | ☐ | ☐ | Width of Spread - Upstream End (Upon Request) [See Street P&P] |
| ☐ | ☐ | ☐ | DMH Diameter |
| ☐ | ☐ | ☐ | Flowline of Throats, # of Openings, Etc. |

| GENERAL REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Graphic and Detail Scales |
| ☐ | ☐ | ☐ | Property Lines |
| ☐ | ☐ | ☐ | Interior Lot Lines |
| ☐ | ☐ | ☐ | Footprints of Existing and Proposed Buildings on Property |
| ☐ | ☐ | ☐ | Existing and Proposed Paving on Property |
| ☐ | ☐ | ☐ | Existing and Proposed Impervious Area on Property |
| ☐ | ☐ | ☐ | Minimum Lot Elevation |
| ☐ | ☐ | ☐ | Delineate Stream Buffers per SWMM Section 2.5.5 and UDC 6.4 |
| ☐ | ☐ | ☐ | Legend (Lines and Symbols) |
| ☐ | ☐ | ☐ | Limits of Area Reserved for Stormwater Detention |
| ☐ | ☐ | ☐ | Street Names and R.O.W. Width |
| ☐ | ☐ | ☐ | Existing Contours (No Greater than 2 Feet and Extending 100 Feet of Site) |
| ☐ | ☐ | ☐ | Proposed Contours (No Greater than 2 Feet) |
| ☐ | ☐ | ☐ | Ridge Lines Delineating Basins |
| ☐ | ☐ | ☐ | Sub-basin Drainage Areas |
| ☐ | ☐ | ☐ | Pipes and Structures Wholly Public or Private |
| ☐ | ☐ | ☐ | Easements |
| ☐ | ☐ | ☐ | Area of off-site Basins Draining to Development |
| ☐ | ☐ | ☐ | Adjoining Development Property Owner Names, Areas, and Lot Identifier (e.g. Plat Book and Page, Instrument #, Parcel ID) |
| ☐ | ☐ | ☐ | Adjacent Improvements and Topography as Needed to Determine Effects on Subject Property |
| ☐ | ☐ | ☐ | Rip-Rap Grade |
| ☐ | ☐ | ☐ | Rip-Rap Dimensions and Thickness |
| ☐ | ☐ | ☐ | Vicinity Map |
| ☐ | ☐ | ☐ | DMH at End of Radial Pipes |
| ☐ | ☐ | ☐ | Detention Note |
| ☐ | ☐ | ☐ | Existing and Proposed Storm Water Management Structures & Pipes. Must include the location, size, and capacity of the next two (2) public structures immediately downstream of the proposed public tie-in in every direction that will receive runoff. Must include size, type, slope, and invert elevation of the structures/pipes in tables. |

Checklist continues on the following page →

Development:_____ Engineer:_____ Date: ___/___/___

| STANDARD NOTES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | CoM Benchmark (All G&D Sheets) |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE (All G&D Sheets) |
| ☐ | ☐ | ☐ | Sanitary Sewer Notes (All G&D Sheets) |
| ☐ | ☐ | ☐ | CoM General Notes (All G&D Sheets) |
| ☐ | ☐ | ☐ | Stormwater Detention Note |

| DETENTION DATA TABLE | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | State Design Method Utilized (Rational or NRCS) |
| ☐ | ☐ | ☐ | Stage-Storage-Discharge Relationship |
| ☐ | ☐ | ☐ | Site Drainage Area in Acres |
| ☐ | ☐ | ☐ | Design Flow (Q-25) |
| ☐ | ☐ | ☐ | C, Runoff Coefficient or Pre and Post CN |
| ☐ | ☐ | ☐ | Ca, Frequency Coefficient (Appendix D Table D.2 of the SWMM) |
| ☐ | ☐ | ☐ | Tc, Time of Concentration of Pre and Post |
| ☐ | ☐ | ☐ | Allowable Discharge |
| ☐ | ☐ | ☐ | Controlling Downstream Structure |
| ☐ | ☐ | ☐ | Outlet Structure Details & Trash Rack |
| ☐ | ☐ | ☐ | Proposed Pond Grading |
| ☐ | ☐ | ☐ | Pond Freeboard |
| ☐ | ☐ | ☐ | Bypass Area and Flow |
| ☐ | ☐ | ☐ | Pond Area and Flow |
| ☐ | ☐ | ☐ | Total Post-Flow |
| ☐ | ☐ | ☐ | Emergency Spillway |
| ☐ | ☐ | ☐ | 1 Foot Freeboard Above WSE-100 |
| ☐ | ☐ | ☐ | Hydraulic and Hydrologic Calculations Using Approved Software per SWMM Section 8.5, Table 8.1 (Submitted as a Standalone Report, Sealed and Signed by a TN P.E.) |

| MAJOR DRAINAGEWAY DATA | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | HEC-2 Analysis/HEC-RAS |
| ☐ | ☐ | ☐ | Drainage Easements (see SWMM Section 7.12.1.2) |
| ☐ | ☐ | ☐ | Access to Drainageway |
| ☐ | ☐ | ☐ | "Trash and Deadwood" Note |
| ☐ | ☐ | ☐ | Improvement Cross-Section and Details |
| ☐ | ☐ | ☐ | Location and Geometry of Improvements |
| ☐ | ☐ | ☐ | Q-100 for Major Systems |

| DITCH DATA | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Typical Cross Section |
| ☐ | ☐ | ☐ | Location |
| ☐ | ☐ | ☐ | Slope |
| ☐ | ☐ | ☐ | Flow Depth |
| ☐ | ☐ | ☐ | Capacity |
| ☐ | ☐ | ☐ | Velocity |
| ☐ | ☐ | ☐ | Mannings "n" Value |

| MINIMUM FINISHED FLOOR ELEVATIONS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | In Low Areas |
| ☐ | ☐ | ☐ | Along Overflow Routes |
| ☐ | ☐ | ☐ | 1 Foot Above Grade per CoM General Note #10 |
| ☐ | ☐ | ☐ | Per Building Code 1808.7.3, 12 inches plus 2% above street gutter at point of discharge |
| ☐ | ☐ | ☐ | 18 inches-residential per UDC |
| ☐ | ☐ | ☐ | 24 inches Above BFE in FP District per UDC 8.8 |
| ☐ | ☐ | ☐ | 30 inches Above BFE in FC District per UDC 8.9 |
| ☐ | ☐ | ☐ | On Plat |
| ☐ | ☐ | ☐ | On Grading and Drainage |

| PERMIT DATA | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | TDEC CG Permit |
| ☐ | ☐ | ☐ | TDEC ARAP Permit |
| ☐ | ☐ | ☐ | USACE Permit |
| ☐ | ☐ | ☐ | Minimum Finished Floor Elevation |
| ☐ | ☐ | ☐ | Floodplain Alteration Permit |

| NOTE 1: SENSITIVE DRAINAGE BASINS | |
|---|---|
| Arlington Bayou (2-KA) | Black Bayou (5-C) |
| Black Bayou (5-D) | Cherry Bayou (6-A) |
| Fletcher (12-A)* | Harrison (3-H) |
| Lenox Bayou (2-L) | Lick Creek(2-K) |
| Overton Bayou (2-M) | Ridgeway (9-C) |
| Royster Bayou (2-I) | Sophia (1-J) |
| Young (12-C)* | South Cypress Creek (11-I) |
| White Station (7-B) | |

**** - Basins which make of the Fletcher Creek District (FCD)***

Development:_____ Engineer:_____ Date: ___/___/___

# Erosion Control Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Development Location (Reference to Nearest Street, Intersection...) |
| ☐ | ☐ | ☐ | Engineering Firm and Developer Information |
| ☐ | ☐ | ☐ | Drainage sub-basin, per City of Memphis drainage basin map (e.g. Days Creek), labeled above Title Block |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines |
| ☐ | ☐ | ☐ | EC group sheet numbering (e.g. 1 of 2) |
| ☐ | ☐ | ☐ | Sheet Scale |

| GENERAL REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard City of Memphis Plan Sheet Layout |
| ☐ | ☐ | ☐ | Individual Plan Sheet Numbers (e.g. C5.1) |
| ☐ | ☐ | ☐ | North Arrow & Graphic Scale (no Less Than 1" = 100') |
| ☐ | ☐ | ☐ | Streets Identified By Names |
| ☐ | ☐ | ☐ | Vicinity Map |
| ☐ | ☐ | ☐ | City of Memphis Benchmark |

| PCRCP PLAN DETERMINATION* | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Is this a linear project? (If yes, then a PCRC plan is not required.) |
| ☐ | ☐ | ☐ | Is this a residential project that will not have post-construction storm water detention? (If yes, then a PCRC plan is not required.) |
| ☐ | ☐ | ☐ | Is a PCRC plan required? If neither of the previous two exceptions are met, then a PCRC plan is required. |
| ☐ | ☐ | ☐ | Is a PCRC plan submitted with this plan set? |

* See Appendix 13 for PCRCP review checklist

| ECP SPECIFIC REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Indicate Amount of Disturbed Acreage |
| ☐ | ☐ | ☐ | Property Lines |
| ☐ | ☐ | ☐ | Indicate Limits of Disturbance |
| ☐ | ☐ | ☐ | Legend or individually labeled EPSC measures |
| ☐ | ☐ | ☐ | Existing & proposed site contours labeled at an interval no greater than two ft. |
| ☐ | ☐ | ☐ | Existing & proposed buildings & pavement/impervious area on property |
| ☐ | ☐ | ☐ | Existing & proposed stormwater structures on & in immediate vicinity of the property |
| ☐ | ☐ | ☐ | Ridge Lines delineating site's sub-basin drainage areas |
| ☐ | ☐ | ☐ | Indicate the acreage of each off-site contributing drainage area |
| ☐ | ☐ | ☐ | Label waters of the state, i.e wetlands, streams, wet weather conveyances |
| ☐ | ☐ | ☐ | Label top of bank, floodplain boundaries & floodplain elevations |
| ☐ | ☐ | ☐ | Stream & wet weather conveyance buffer zones |
| ☐ | ☐ | ☐ | Provide Construction Sequence for each ECP phase |
| ☐ | ☐ | ☐ | Indicate Final stabilization measures proposed for all disturbed areas on the property. Areas with slopes greater than 3:1 must be stabilized by methods approved by the city engineer. |
| ☐ | ☐ | ☐ | Detail drawings of all erosion control measures |
| ☐ | ☐ | ☐ | If between 3 - 4.9 drainage acres flow to a single outfall, a sediment trap must be utilized |
| ☐ | ☐ | ☐ | If 5 or more drainage acres flow to a single outfall, a sediment basin must be utilized (see details below) |
| ☐ | ☐ | ☐ | Include Standard Erosion Control Notes. |

Checklist continues on the following page →

Development:_____ Engineer:_____ Date: ___/___/___

| SEDIMENT BASIN DETAILS & DATA TABLE* | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Design storm of principal spillway (Minimum 5yr/24hr storm event, due to all of Memphis area streams = impaired) |
| ☐ | ☐ | ☐ | Design storm of emergency spillway (Min 25yr/24hr storm event) |
| ☐ | ☐ | ☐ | Surface area in acres |
| ☐ | ☐ | ☐ | Elevation of emergency spillway. (If ≥ to 20 ft., dam must comply with Safe Dams Act) |
| ☐ | ☐ | ☐ | Embankment should have 1ft. minimum freeboard above max design flood elevation |
| ☐ | ☐ | ☐ | Height and slope of embankment |
| ☐ | ☐ | ☐ | Stage and storage of forebay, if a forebay is included in basin design. (Should be 25% of dry storage volume and floor elevation should be ≥ to the permanent pool elevation.) |
| ☐ | ☐ | ☐ | Baffles in forebay to increase residence time (if done, not required) |
| ☐ | ☐ | ☐ | Forebay berm top and bottom elevation (top elevation should crest with the top of the dry storage and floor elevation should be > or = to the permanent pool elevation.) |
| ☐ | ☐ | ☐ | Outlet structure detail. (Should never have an open bottom outlet.) Detail of skimmer, if used. |
| ☐ | ☐ | ☐ | Resting pier, if skimmer is used. |
| ☐ | ☐ | ☐ | Anchoring detail for riser pipe, if used. |
| ☐ | ☐ | ☐ | Outlet protection (prefer a shut-off valve) |
| ☐ | ☐ | ☐ | Principal spillway with trash rack |
| ☐ | ☐ | ☐ | If at maximum water storage elevation, the capacity is 30 ac-ft (48,400 cy) or more, then dam must comply with Safe Dams Act. |
| ☐ | ☐ | ☐ | Equivalent controls approved by TDEC. Give description, if applicable. |

* A Sediment basin Data Table and Detail Drawing must be included with the Erosion Control Plan

| TN STATE PERMIT DATA (IF SITE IS 1 ACRE OR MORE) | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Tennessee General Storm Water Permit Certification Form Certifying that a Notice of Intent (NOI) has been submitted to Tenn Dept. of Environment & Conservation (TDEC) for a permit for construction site runoff. |
| ☐ | ☐ | ☐ | NPDES Permit |
| ☐ | ☐ | ☐ | ARAP Permit (if required) |
| ☐ | ☐ | ☐ | Copy of State Approved Permit |

Development:_____ Engineer:_____ Date: ___/___/___

# Post Construction Runoff Control Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| PCRCP SPECIFIC REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Property Lines |
| ☐ | ☐ | ☐ | Grading and Drainage Plan with arrows showing storm water flow direction across the site and BMP locations. |
| ☐ | ☐ | ☐ | Buildings and pavement on property |
| ☐ | ☐ | ☐ | Storm water management structures on and in the immediate vicinity of the property |
| ☐ | ☐ | ☐ | Existing and proposed site contours at an interval no greater than two (2) feet. |
| ☐ | ☐ | ☐ | Delineation of wetlands or other environmentally sensitive areas. |
| ☐ | ☐ | ☐ | Include a Storm Water Information Table (see Appendix 14 for formatting) |

| GENERAL REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard City of Memphis Plan Sheet Layout |
| ☐ | ☐ | ☐ | Individual Plan Sheet Numbers (e.g. C5.1) |
| ☐ | ☐ | ☐ | North Arrow and Graphic Scaling that Shows the Entire Site |
| ☐ | ☐ | ☐ | Streets Identified by Names |
| ☐ | ☐ | ☐ | Vicinity map based on USGS quad map with site location clearly shown and flow path to named water of the state. |
| ☐ | ☐ | ☐ | City of Memphis Benchmark |
| ☐ | ☐ | ☐ | Schematics of BMPs located on the site including outlet structure details indicating design storm events |
| ☐ | ☐ | ☐ | Floodplain and floodway boundaries, stream buffer zones, and the floodplain elevations (Stream buffers should begin from top of bank). |
| ☐ | ☐ | ☐ | Ridge lines delineating basin and sub-basin drainage areas. |
| ☐ | ☐ | ☐ | Certify compliance with all required state or federal storm water permits, if applicable. |
| ☐ | ☐ | ☐ | Total drainage area entering storm water detention (acres) [this number includes any off-site drainage area that is received]. |
| ☐ | ☐ | ☐ | Total onsite drainage area entering a water quality BMP |
| ☐ | ☐ | ☐ | State if the discharge from the site goes into another detention structure further downstream, if located within a larger development. |
| ☐ | ☐ | ☐ | Submit an Inspection and Maintenance Agreement if a structural BMP will be on-site (Available in the SWMM Section 3.9.1) |
| ☐ | ☐ | ☐ | Top of Bank Labeled |

Development:_____ Engineer:_____ Date: ___/___/___

# Sanitary Sewer Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size 24x36 (Legible when printed on 11x17)) |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Scale Usually 1"=50' |
| ☐ | ☐ | ☐ | State Reference Number (e.g. 94-SSC-103) |
| ☐ | ☐ | ☐ | Sewer Basin Identification |
| ☐ | ☐ | ☐ | State of TN Professional Engineering Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (City & Deputy City Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (i.e., Reference to Nearest Street, Intersection, etc.) |

| MANHOLES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Manhole Size (If Not 4' Diameter Manhole) |
| ☐ | ☐ | ☐ | Flowline Elevations w/ Pipe Size & Direction |
| ☐ | ☐ | ☐ | Manhole Top Elevation & TN Plane Coordinate Pt. N & E |
| ☐ | ☐ | ☐ | Drop Construction Required if Drop > 2.0' |
| ☐ | ☐ | ☐ | Maximum 3 House Connections Into Manhole |
| ☐ | ☐ | ☐ | 0.1' Drop Across Manhole |
| | | | ***Manhole Rim Elevations*** |
| ☐ | ☐ | ☐ | 1.0' Above 100 Year Flood Elevation |
| ☐ | ☐ | ☐ | 1.5' Above Grade in Open Areas |
| ☐ | ☐ | ☐ | 0.5' Above Grade in Back Yards |
| | | | |
| ☐ | ☐ | ☐ | Manhole Spacing for pipes 15" or less = 400' & pipes 18" - 30" = 500' |
| ☐ | ☐ | ☐ | Sealed Lids & Vent Stacks Required if Rim Cannot Be Constructed 1.0' Above 100-yr Flood Elevation |

| PIPE DATA | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Pipe Size |
| ☐ | ☐ | ☐ | Pipe Length |
| ☐ | ☐ | ☐ | Slope in Percent |
| | | | *Ductile Iron Requirements (Class 50 Minimum)* |
| ☐ | ☐ | ☐ | Less than 1.5' Clearance with Drainage |
| ☐ | ☐ | ☐ | Less Than 4.0' of Cover |
| ☐ | ☐ | ☐ | Fill Ground |
| ☐ | ☐ | ☐ | Drop Construction |
| ☐ | ☐ | ☐ | Ditch Crossings |
| ☐ | ☐ | ☐ | No House Connections in Lines over 10" |
| ☐ | ☐ | ☐ | Match Pipe Tops in Manholes EXCEPT 8" into 12" + |
| ☐ | ☐ | ☐ | Off-Street House Connections Dimensioned |
| ☐ | ☐ | ☐ | No 8" Pipe Flatter than 0.5% Slope |
| | | | *SST-16 Cleanout* |
| ☐ | ☐ | ☐ | Cleanout Location Per Standards |
| ☐ | ☐ | ☐ | TN plane Co-ord Pts N & E for Cleanout |
| ☐ | ☐ | ☐ | Tracer Wire along sewer pipe |
| ☐ | ☐ | ☐ | SST - 16 & 17 Detail Included |
| ☐ | ☐ | ☐ | Plan & Profile for all sewer lines 8" Diameter & larger Show pipe material & rating on plan |

| GENERAL | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | BM or TBM Description & Elevation |
| ☐ | ☐ | ☐ | Vicinity Map on top right corner |
| ☐ | ☐ | ☐ | FEMA 100-yr Flood Elevation |
| ☐ | ☐ | ☐ | State Delegation Stamp ("Health Stamp") |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Property Lines & Interior Lot Lines |
| ☐ | ☐ | ☐ | Street Names |
| ☐ | ☐ | ☐ | Adjoining Development/Property Owner Names |
| ☐ | ☐ | ☐ | Permanent Easements (All on 1 Lot) with Size, Ties, etc. (Usually 15' but Varies w/ Conditions) |
| ☐ | ☐ | ☐ | Temporary Construction Easements Width (Usually 20' But Varies w/ Conditions) |
| ☐ | ☐ | ☐ | Existing Sewer Data for Tie-In Points |
| ☐ | ☐ | ☐ | Private Sewers Clearly Marked |
| ☐ | ☐ | ☐ | Private Sewer Certificate |
| ☐ | ☐ | ☐ | Upstream Service Provided (Show Qc/Qd/A) |
| ☐ | ☐ | ☐ | Flow Direction Arrows |
| ☐ | ☐ | ☐ | Clearance CL Sewer to Face of Curb (5' MIN) |
| ☐ | ☐ | ☐ | Off-street Sewer Profile Reference |
| ☐ | ☐ | ☐ | Off-street Sewer Angles |
| ☐ | ☐ | ☐ | New Manhole Ties to Existing Manholes |
| ☐ | ☐ | ☐ | Typical Line Location 7' Noth or West of CL Street |
| ☐ | ☐ | ☐ | Utilities Affecting Installation (Gas/Water Lines, etc.) Shown on Plan & Profile |
| ☐ | ☐ | ☐ | Ridgelines Not To Be Crossed |
| ☐ | ☐ | ☐ | Offset from Ditches & Streams |
| ☐ | ☐ | ☐ | Rip-Rap Protection for Ditch Crossings |
| ☐ | ☐ | ☐ | Min. Floor Elevations for Lots in "Holes" |
| ☐ | ☐ | ☐ | Standard Ingress/Egress Note |
| ☐ | ☐ | ☐ | Sewer Standard Construction Notes |
| ☐ | ☐ | ☐ | Erosion Control Details & Notes |
| ☐ | ☐ | ☐ | Special Pipe Notes Where Needed |
| ☐ | ☐ | ☐ | Qc/Qd/A Shown at all Downstream Tie-Ins |
| ☐ | ☐ | ☐ | Sewer Extended Upstream with Manhole & Stub |
| ☐ | ☐ | ☐ | Calculations* sealed & signed by PE licensed in TN in a seperate 8.5x11 sheet |
| ☐ | ☐ | ☐ | Does Downstream system have capacity for proposed flow? |

* Calculations showing how flow rates were determined for normal & wet

| SIPHON DATA | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Typical Cross Section |
| | | | *Calculations Showing* |
| ☐ | ☐ | ☐ | Loading |
| ☐ | ☐ | ☐ | Barrel Sizes |
| ☐ | ☐ | ☐ | Capacity |
| ☐ | ☐ | ☐ | Velocity |

| STANDARD NOTES | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | CoM Benchmark (All SS Sheets) |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE (All SS Sheets) |
| ☐ | ☐ | ☐ | Sanitary Sewer Notes (All SS Sheets) |
| ☐ | ☐ | ☐ | CoM General Notes (All SS Sheets) |
| ☐ | ☐ | ☐ | Area Reserved for Stormwater Detention |
| ☐ | ☐ | ☐ | 10' Horizontal & 18" Vertical seperation between water & sewer lines |
| ☐ | ☐ | ☐ | Private ownership & maintenance note for Private sewer lines |

Development:_____ Engineer:_____ Date: ___/___/___

# Traffic Control Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | CoM Benchmark (All Sheets) |
| ☐ | ☐ | ☐ | FEMA Note with Nearest BFE (All G&D Sheets) |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| TRAFFIC CONTROL PLAN | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Graphic Scale |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Street Names of All Affected Roadways |
| ☐ | ☐ | ☐ | Duration of Traffic Control (Days, Weeks, Etc.) |
| ☐ | ☐ | ☐ | Vicinity Map |
| ☐ | ☐ | ☐ | Design Speed Limit |
| ☐ | ☐ | ☐ | Existing Striping and Lane Dimensions |
| ☐ | ☐ | ☐ | Existing Roadway Edge of Pavement |
| ☐ | ☐ | ☐ | Images Codes and Sizes of Traffic Control Signs |
| ☐ | ☐ | ☐ | Proposed Location of All Traffic Control Signs (Include All Affected Side Streets) |
| ☐ | ☐ | ☐ | Channelization Devices (Drums, Cones, Etc.) |
| ☐ | ☐ | ☐ | Other Traffic Control (Barricades, Arrow Boards, Temp. Striping, Etc.) |
| ☐ | ☐ | ☐ | Clearly Identified Work Area (Hatched) |
| ☐ | ☐ | ☐ | Non-TCP Linework Not Required on Plans (Contours, Underground Utilities, Owner Info, Etc.) |
| ☐ | ☐ | ☐ | Pedestrian Access & Signage Etc. - No Temp. Mid-Block Crosswalks |
| ☐ | ☐ | ☐ | Dates (Leave It Blank) |
| ☐ | ☐ | ☐ | Sidewalk Closure Design |
| ☐ | ☐ | ☐ | Bike Lane Closure Design |
| ☐ | ☐ | ☐ | Traffic Control Notes (See Attached) |

Development:_____ Engineer:_____ Date: ___/___/___

## Signing & Striping Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| SIGNING AND STRIPING PLAN | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Existing and Proposed Striping (Include Lane Widths and Line Types) |
| ☐ | ☐ | ☐ | Existing and Proposed Signs |
| ☐ | ☐ | ☐ | Parking Signs on Adjacent Sections of Street |
| ☐ | ☐ | ☐ | Size Legend (Include Sign Designations and Size of Signs) |
| ☐ | ☐ | ☐ | Regulatory Speed Limit |
| ☐ | ☐ | ☐ | City Traffic Engineer in Signature Block |
| ☐ | ☐ | ☐ | Include Note - "All Striping Shall be Thermoplastic. Follow City of Memphis Standard Pavement Marking." |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Graphic Scale |

Development:_____ Engineer:_____ Date: ___/___/___

# School Zone Flashing Signal Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| FLASHERS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Scale (1" = 40') |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Street Names |
| ☐ | ☐ | ☐ | Sign Legend |
| ☐ | ☐ | ☐ | Existing & Proposed Signs |
| ☐ | ☐ | ☐ | Solar Flasher Details |
| ☐ | ☐ | ☐ | Flasher Notes |

Development:_____ Engineer:_____ Date: ___/___/___

# Traffic Signal Plan Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Title Block |
| ☐ | ☐ | ☐ | Standard Sheet Size (24" x 36") |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Scale |
| ☐ | ☐ | ☐ | Drainage Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x) |
| ☐ | ☐ | ☐ | Development Location (e.g. Reference to Nearest Street, Intersection, Address) |

| SIGNAL LAYOUT | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Advance Detection Needed? |
| ☐ | ☐ | ☐ | Detection Zones Labeled from Inside to Outside (i.e., 2-1 for inside EB through lane; 2-3 for outside EB through lane) |
| ☐ | ☐ | ☐ | Striping Shown and Dimensioned |
| ☐ | ☐ | ☐ | Crosswalk Type (Traditional or High Vis.) and Width |
| ☐ | ☐ | ☐ | Signal Cabinet Location (ROW or Easement) |
| ☐ | ☐ | ☐ | Signal Cabinet Base Mounted |
| ☐ | ☐ | ☐ | Pole Locations (ROW or Easement) |
| ☐ | ☐ | ☐ | Signal Heads (No. of Heads, Locations & Dimensions) (2 min. for through movement) |
| ☐ | ☐ | ☐ | Pull Box Locations (1 per corner; req'd for mast arm) |
| ☐ | ☐ | ☐ | ADA Ramps and Accessibility throughout Intersection |
| ☐ | ☐ | ☐ | Push Button Locations (ADA Accessible) |
| ☐ | ☐ | ☐ | Signage (Lane Control; Street Name; Ped. Signs, Etc.) |

Will this signal need to be interconnected to the City of Memphis, Traffic Signal System? If so, all Traffic Signal interconnect details must be shown on the plan. A separate traffic signal interconnect plan may be required if this signal is to be connected to an existing signal that is not currently a part of the City of Memphis, Traffic Signal System.

| SIGNAL PLAN - GENERAL | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Scale |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | ROW and Property Lines |
| ☐ | ☐ | ☐ | Street Names |
| ☐ | ☐ | ☐ | Adjoining Development/Property Owner Names |
| ☐ | ☐ | ☐ | Dimension to Property Line from Side Street |
| ☐ | ☐ | ☐ | Standard Notes |
| ☐ | ☐ | ☐ | Above Ground Utilities & Storm Drainage Inlets |
| ☐ | ☐ | ☐ | Existing & Proposed Ingress-Egress Easements |
| ☐ | ☐ | ☐ | Existing & Proposed Pedestrian Easements |
| ☐ | ☐ | ☐ | Existing & Proposed Traffic Signal Easements |
| ☐ | ☐ | ☐ | Label Existing ROW and Dedication |
| ☐ | ☐ | ☐ | Existing & Proposed Street Improvements |
| ☐ | ☐ | ☐ | Existing & Proposed Sidewalks |
| ☐ | ☐ | ☐ | Existing & Proposed Curb and Gutter |
| ☐ | ☐ | ☐ | Existing & Proposed Medians and Median Openings |
| ☐ | ☐ | ☐ | Existing Underground Traffic Signal Conduits & Pull Boxes |
| ☐ | ☐ | ☐ | Type of Detection (Video Required for New Signals) |
| ☐ | ☐ | ☐ | Left Turn Operation (PT, PM, PTPM?) |
| ☐ | ☐ | ☐ | Ptortected Left Turn Phase Justified through Traffic Analysis? |
| ☐ | ☐ | ☐ | Phasing |
| ☐ | ☐ | ☐ | Signal Head and Detection ID Figure |
| ☐ | ☐ | ☐ | Signal Head Display Types |
| ☐ | ☐ | ☐ | Signal Head Display Type (12" Countdown) |
| ☐ | ☐ | ☐ | Phasing Diagram (Match Sequencing Chart?) |
| ☐ | ☐ | ☐ | Sequence Chart (Match Phasing Diagram?) |
| ☐ | ☐ | ☐ | Push Button Orientation (Match Phasing & Sequence?) |
| ☐ | ☐ | ☐ | Emergency Vehicle Preemption |
| ☐ | ☐ | ☐ | Transit Preemption |
| ☐ | ☐ | ☐ | Wiring Diagram |
| ☐ | ☐ | ☐ | Removal Diagram |
| ☐ | ☐ | ☐ | Plan Details |
| ☐ | ☐ | ☐ | Attachment Height (For Span Mount Signal) |
| ☐ | ☐ | ☐ | Conduit Runs to Cabinet (Size, No. of Pipes, Etc.) |
| ☐ | ☐ | ☐ | Pole Diameter & Height (City Standard) |
| ☐ | ☐ | ☐ | Conduit Stubs in Poles (2-3" PVC, Typical) |
| ☐ | ☐ | ☐ | Mast Arm Length |

Development:_____ Engineer:_____ Date: ___/___/___

# Easement Plat Checklist

| TITLE BLOCK REQUIREMENTS | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Standard Plat Title Block with City Project # |
| ☐ | ☐ | ☐ | Standard Plat Sheet in 8.5"X14". Must be legible when printed |
| ☐ | ☐ | ☐ | Project Name w/ Phase or Section Designator |
| ☐ | ☐ | ☐ | Sheet Number Corresponding to the Plan & Profile of the Proposed Development Plan |
| ☐ | ☐ | ☐ | Drainage Basin & Sewer Basin Identification (above title block) |
| ☐ | ☐ | ☐ | State of TN Professional Engineer Stamp and Signature |
| ☐ | ☐ | ☐ | Proper Signature Lines (No County Engineer) |
| ☐ | ☐ | ☐ | Plat Number (1 of x) |
| ☐ | ☐ | ☐ | Sheet Number (1 of x Unless Only 1) |
| ☐ | ☐ | ☐ | Owner's Name (Verified with County Assessor's website), Assessor Info., Most Current Deed, Instrument Number and Parcel ID. |

| GENERAL | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Graphic Scale |
| ☐ | ☐ | ☐ | North Arrow |
| ☐ | ☐ | ☐ | Key Map (Unless 1 or 2 Plats) |
| ☐ | ☐ | ☐ | Adjacent Plat Numbers |
| ☐ | ☐ | ☐ | CIP Number if City Participation |
| ☐ | ☐ | ☐ | Street Names |
| ☐ | ☐ | ☐ | Property Lines & Cross Street Ties |
| ☐ | ☐ | ☐ | Adjoining Development/Property Owner Names with Instrument Numbers (Supply Copies) |
| ☐ | ☐ | ☐ | Bearings/Angles & Distances on Easement Centerline/Perimeter (Be Consistent on all Plats if Possible) |
| ☐ | ☐ | ☐ | Widths of All Existing/Proposed/Temporary Easements & Rights of Way |
| ☐ | ☐ | ☐ | Street Center Line |
| ☐ | ☐ | ☐ | Bearing & Distance or Curve info for All Property Boundaries |
| ☐ | ☐ | ☐ | Existing and Proposed Right-of-Way widths for all streets shown on the plat |
| ☐ | ☐ | ☐ | Line and Curve Tables |
| ☐ | ☐ | ☐ | Detail Drawings as Needed |
| ☐ | ☐ | ☐ | Building Faces |
| ☐ | ☐ | ☐ | House Numbers |
| ☐ | ☐ | ☐ | Existing Features (Fences, Trees, etc.) esp. within ROW Acquisition and Easement Areas |
| ☐ | ☐ | ☐ | Instrument Number |

| GENERAL CONTINUED | | | |
|---|---|---|---|
| Complete | Incomplete | N/A | Description |
| ☐ | ☐ | ☐ | Ward, Block, and Parcel ID |
| ☐ | ☐ | ☐ | Plat Book and Page No. if Applicable |
| | | | *Designate the Following with Unique Hatch* |
| ☐ | ☐ | ☐ | Right-of-Way Acquisition |
| ☐ | ☐ | ☐ | Right-of-Way in Use |
| ☐ | ☐ | ☐ | Public or Private Drainage Easement |
| ☐ | ☐ | ☐ | Temporary Construction Easement |
| ☐ | ☐ | ☐ | Sewer Easement |
| ☐ | ☐ | ☐ | Any Other Type of Easement or Acquisition |
| ☐ | ☐ | ☐ | Point of Commencement (At Street Intersection or Permenant city monument) Shown & Labeled with TN state place co-ordinate points N & E |
| ☐ | ☐ | ☐ | Point of Beginning Shown & Labeled with Shown & Labeled with TN state place co-ordinate points N & E |
| ☐ | ☐ | ☐ | Legal Descriptions for all Areas (except Temporary Construction Easements) |
| ☐ | ☐ | ☐ | Closure Reports for all Areas, Including Temporary Construction Easements. Closure Report should match Legal Description and Begin at P.O.B. |
| ☐ | ☐ | ☐ | Area of Permanent & Temporary Showing Encumbered Area (If Any) to the Nearest Whole Foot |
| ☐ | ☐ | ☐ | Property Tied to Centerline of Street |
| ☐ | ☐ | ☐ | One Plat for Each Property; Each Plat may have Multiple Sheets (R.O.W., Drainage Esmt., Etc.) as required to provide clarity |
| ☐ | ☐ | ☐ | All of Parcel on One Sheet |
| ☐ | ☐ | ☐ | Text Legible; 0.12" Tet Height; Not Overlapping |
| ☐ | ☐ | ☐ | Drainage Easements Match the Grading & Drainage Plan |
| ☐ | ☐ | ☐ | Detention Area Denoted, with Detention Note |
| | | | *Easement Width* |
| ☐ | ☐ | ☐ | All lines 15" & smaller shall have 15' Esmt |
| ☐ | ☐ | ☐ | Lines greater than 15" regardless of depth shall have 30' Esmt |
| ☐ | ☐ | ☐ | Any line greater than 15' in depth to top of pipe shall have at least 30' Esmt, 50' preferable |

# APPENDIX C

GENERAL NOTES

# General Grading Notes

1. A MINIMUM OF 24-HOURS PRIOR TO BEGINNING CONSTRUCTION, THE CONTRACTOR SHALL NOTIFY THE CITY OF MEMPHIS CONSTRUCTION INSPECTION OFFICE AT 901-636-2462.
2. ALL NEWLY CUT OR FILLED AREAS, LACKING ADEQUATE VEGETATION, SHALL BE SEEDED, MULCHED, FERTILIZED AND/OR SODDED AS REQUIRED TO EFFECTIVELY CONTROL SOIL EROSION.
3. THE LOCATION OF EXISTING UNDERGROUND UTILITIES ARE APPROXIMATE AND NOT NECESSARILY ALL OF SAME. THE CONTRACTOR SHALL BE RESPONSIBLE FOR NOTIFYING THE UTILITY COMPANIES WHICH MAINTAIN A UTILITY LINE WITHIN THE BOUNDARIES OF THE PROJECT PRIOR TO THE INITIATION OF ANY CONSTRUCTION ON THE PROJECT OR IN THE STREETS BORDERING THE PROJECT. THE CONTRACTOR SHALL ALSO ASSUME FULL RESPONSIBILITY FOR DAMAGE TO ANY UTILITIES ENCOUNTERED WITHIN CONSTRUCTION PERIMETERS, WHETHER SHOWN ON THE CONSTRUCTION PLANS OR NOT, DURING THE WORK ON THE PROJECT. FOR SITE LOCATION OF EXISTING UTILITIES INVOLVING MLG&W, FIBER, AND/OR TEXAS GAS COMPANY, CALL 1-800-351-1111. FOR SEWER LOCATIONS CALL 901-529-8025.
4. CONTRACTOR SHALL MAINTAIN ACCESS TO ALL PROPERTIES.
5. ALL FILL SOILS SHALL BE COMPACTED TO A MINIMUM OF 95% OF STANDARD PROCTOR DENSITY (ASTM D-698) WITHIN 3% OF OPTIMUM MOISTURE CONTENT IN LIFTS NOT TO EXCEED SIX (6) INCHES OF COMPACTED THICKNESS.
6. ALL CONSTRUCTION MATERIALS AND PROCEDURES SHALL MEET OR EXCEED THE REQUIREMENTS OF THE CITY OF MEMPHIS STANDARD CONSTRUCTION SPECIFICATIONS.
7. PROPERTY LINES SHALL BE FIELD VERIFIED PRIOR TO CONSTRUCTION. GRADING, CLEARING AND THE ERECTION OR REMOVAL OF FENCES ALONG PROPERTY LINES SHALL BE FULLY COORDINATED WITH ADJACENT PROPERTY OWNERS.
8. VERIFY SITE CONDITIONS PRIOR TO CONSTRUCTION. NOTIFY THE CITY OF MEMPHIS CONSTRUCTION INSPECTION OFFICE ENGINEER OF ANY VARIATIONS PRIOR TO COMMENCEMENT OF WORK.
9. ALL GRADING WORK SHALL BE PERFORMED IN SUCH A MANNER THAT ADJACENT PROPERTIES ARE NOT DAMAGED OR ADVERSELY AFFECTED.
10. LOT DRAINAGE: FINISH GRADE SHALL BE SLOPED AWAY FROM THE FOUNDATION FOR DRAINAGE. FOR GROUND FLOOR RESIDENTIAL USES, THE GROUND FLOOR FINISHED ELEVATION SHALL BE A MINIMUM OF 18 INCHES ABOVE THE ADJACENT SIDEWALK. THERE IS NO MINIMUM FOR GROUND FLOOR NONRESIDENTIAL USES. THE MINIMUM GRADE AWAY FROM THE FOUNDATION SHALL MAINTAIN A POSITIVE SLOPE IN ALL DIRECTIONS.

# Sewer Plan Notes

The following two text blocks and typical construction notes must appear, exactly as written, on any sanitary sewer plans submitted to the city. Any additional notes added must be added after the typical construction notes. Typical construction notes No. 10 & 11 must also be shown on the plat for a project.

**APPROVED FOR CONSTRUCTION**

THE DOCUMENT BEARING THIS STAMP HAS BEEN RECEIVED AND REVIEWED BY THE CITY OF MEMPHIS DIVISION OF ENGINEERING UNDER AUTHORITY DELEGATED BY THE TENNESSEE DEPARTMENT OF ENVIRONMENT AND CONSERVATION DIVISION OF WATER RESOURCES. IT IS HEREBY APPROVED FOR CONSTRUCTION BY THE CITY ENGINEER AS EVIDENCED BY HIS SIGNATURE IN THE TITLE BLOCK BELOW.

APPROVAL EXPIRES 1 YEAR FROM APPROVAL DATE BELOW. THIS APPROVAL SHALL NOT BE CONSTRUED AS CREATING A PRESUMPTION OF CORRECT OPERATION OR AS WARRANTING BY THE CITY ENGINEER THAT THE APPROVED FACILITIES WILL REACH THE DESIRED GOALS.

**PRIVATE SEWER CERTIFICATE**

THE ENGINEER WHOSE SEAL AND SIGNATURE APPEAR BELOW HEREBY ACCEPTS THE RESPONSIBILITY FOR THE DESIGN OF THE PRIVATE SANITARY SEWER SYSTEM SHOWN HEREON. THE PRIVATE SANITARY SYSTEM DESIGN MUST BE SUBMITTED, APPROVED, INSPECTED, AND ACCEPTED BY THE PLUMBING INSPECTOR'S OFFICE AT THE MEMPHIS AND SHELBY COUNTY OFFICE OF CODE ENFORCEMENT. THE ENGINEER OF RECORD WILL PROVIDE THE MEMPHIS AND SHELBY COUNTY OFFICE OF CODE ENFORCEMENT A LETTER CERTIFYING THAT ALL PRIVATE SEWERS HAVE BEEN INSTALLED AND TESTED IN ACCORDANCE WITH APPLICABLE LOCAL STANDARDS, OR WHERE NO LOCAL STANDARDS EXIST, THE STANDARDS OF THE STATE OF TENNESSEE. NO PRIVATE SANITARY SEWER IS TO BE USED EXCEPT FOR TESTING UNTIL THIS SYSTEM HAS BEEN APPROVED AND/OR THIS CERTIFICATION HAS BEEN ACCEPTED BY CODE ENFORCEMENT.

**THESE NOTES ARE TO BE PLACED IN A PROMINENT LOCATION NEAR THE TITLEBLOCK OF THE SEWER PLAN.**

**TYPICAL CONSTRUCTION NOTES**

1. LOCATION OF EXISTING UNDERGROUND UTILITIES ARE APPROXIMATE AND ARE NOT NECESSARILY ALL THE SAME. THE CONTRACTOR SHALL BE RESPONSIBLE FOR CONTACTING THE APPROPRIATE UTILITY COMPANY TO DETERMINE THE EXACT LOCATION OF ALL UTILITIES AND/OR UNDERGROUND STRUCTURES PRIOR TO THE INITIATION OF ANY CONSTRUCTION. CONTRACTOR SHALL ALSO ASSUME FULL RESPONSIBILITY FOR DAMAGE TO ANY UTILITIES ENCOUNTERED WITHIN CONSTRUCTION PERIMETERS. FOR SITE LOCATIONS OF EXISTING UTILITIES INVOLVING M.L.G.&W., SOUTH CENTRAL BELL, AND/OR TEXAS GAS COMPANY, PLEASE CALL 1 800 351 1111. FOR SEWER SERVICE LOCATIONS, CALL 901-636-8025
2. CONTRACTOR SHALL ENSURE UNINTERRUPTED SEWER SERVICE ON EXISTING SEWER AND SERVICE CONNECTIONS BY PROVIDING AMPLE TEMPORARY WASTEWATER PUMPING AND/OR BYPASSING.
3. CONTRACTOR SHALL MAINTAIN ACCESS TO ALL PROPERTIES.
4. CONTRACTOR SHALL NOTIFY THE CITY OF MEMPHIS CONSTRUCTION INSPECTION OFFICE AT 901.636.2462 A MINIMUM OF 24 HOURS PRIOR TO BEGINNING ANY CONSTRUCTION.
5. ALL AREAS IN CUT OR FILL WHERE VEGETATION HAS BEEN REMOVED SHALL BE SEEDED, MULCHED, FERTILIZED, AND/OR SODDED AS REQUIRED TO PREVENT EROSION.
6. THE CONTRACTOR SHALL VERIFY EXISTING DATA AND REPORT ANY SIGNIFICANT DISCREPANCIES TO THE ENGINEER.
7. ALL SANITARY SEWER TO BE CONSTRUCTED AS PER CITY OF MEMPHIS STANDARD CONSTRUCTION SPECIFICATIONS. SANITARY SEWER SERVICE CONNECTIONS TO BE INSTALLED AS PER CITY OF MEMPHIS STANDARD SST 16.
8. ALL SEWER MANHOLE LIDS IN OPEN AREAS ARE TO BE CONSTRUCTED 1.5' ABOVE PROPOSED GRADE.
9. ALL SANITARY SEWER, INCLUDING SERVICE CONNECTIONS, WHICH HAS LESS THAN 1.5' CLEARANCE (OUTSIDE OF PIPES) WITH DRAINAGE OR IN FILLED AREAS SHALL BE CLASS 50 D.I.P. OR CONCRETE ENCASED, 10' MINIMUM BOTH SIDES OF CROSSING. ALL DUCTILE IRON PIPE (D.I.P.) SHALL BE POLYETHYLENE LINED OR SHALL BE TREATED WITH PROTECTO 401 OR APPROVED EQUIVALENT.
10. THE CITY OF MEMPHIS SHALL HAVE INGRESS/EGRESS RIGHTS TO USE PRIVATE DRIVES AND YARDS FOR THE PURPOSE OF MAINTAINING ALL PUBLIC SEWER LINES AND SHALL BEAR NO RESPONSIBILITY FOR THE MAINTENANCE OF SAID PRIVATE DRIVES AND YARDS.
11. NO TREES, SHRUBS, PERMANENT STRUCTURES, OR OTHER UTILITIES (EXCEPT FOR CROSSINGS) WILL BE ALLOWED WITHIN SANITARY SEWER EASEMENT. NO OTHER UTILITIES OR SERVICES MAY OCCUPY SANITARY SEWER EASEMENTS IN PRIVATE DRIVES AND YARDS EXCEPT FOR CROSSINGS.
12. ALL SANITARY SEWER MANHOLES IN REVERSE CROWN STREETS, ALLEYS, OR DRIVES (PUBLIC OR PRIVATE) SHALL BE PROVIDED WITH GASKETS AND PLUGS FOR PICK HOLES TO PREVENT DRAINAGE INFLOW INTO SEWER SYSTEM.
13. THE CONTRACTOR SHALL PROVIDE ADEQUATE AND EFFECTIVE EROSION CONTROL AS NECESSARY TO PREVENT ANY SILTATION INTO EXISTING DRAINAGE SYSTEM AND/OR ADJACENT PROPERTIES.

# Traffic Control Plan Notes Guidance

Notes regarding Traffic Control should be placed on each page of the Traffic Control Plans. The numbering for the notes to be shown on the plan should be in sequential order. For instance, if notes #31 through #33 are not needed on the TCP, the numbering of the remaining notes would continue to use #31.

Attached are the standard City of Memphis Traffic Control Plan Notes. Follow the following guidance on which notes should be used. A Temporary Traffic Control Plan (TCP) is needed for all work that will be performed in the City ROW. This includes work performed in the actual roadway and the sidewalk.

1. Typical notes that should be on TCPs are notes # 1 thru 9, 10 (with curb & gutter) OR 11 (without curb & gutter), 12, 21, 25 (with curb & gutter) OR 24 (without curb & gutter), 28, 29, 36, 37, and 44. Other notes may be required based on the scope of the project.

2. On note # 10, if the drums will stay on the street overnight, please change to Type "A" warning lights.

3. If NO lane/road closure or construction activities will occur at nighttime, please include note # 35. The developer/contractor cannot change to nighttime closures or activities without prior approval of a revised Traffic Control Plan by City Engineering.

4. Notes #32 thru 34 are for flagger design.

5. The minimum lane width allowed for temporary traffic control is 10'. The City may consider a lane width less than 10' if the existing lanes are less than 10'.

6. Any time work is going to be performed that would involve the closure of a sidewalk, a pedestrian traffic control plan is required. Provide the traffic control design for pedestrians on the same plan and include note #43. Note that the City does not allow temporary mid-block crosswalks.

7. If no sidewalk will be closed, please include note #42.

8. If any MATA route is within the traffic control area, please include note # 46.

9. The City does not allow half-road closures, i.e., the road is reduced to one-way traffic.

10. If there is any full road closure, please show the detour design and include note #26 and #27.

11. If there are any parking meters blocked within the traffic control area, please include note #39 and #40. If no parking meters will be blocked near work zone, please use note #41.

12. If any Explore Bike Share stations is within the City ROW and traffic control area, please include note #47.

13. All TCPs should be designed based on the existing regulatory posted speed limit. The design speed should be clearly identified on the TCP. Reductions in design speed have to be approved by the City Traffic Engineer.

14. All diamond shaped Traffic Control signs shall be 48" by 48".

15. Advance Warning signs should be placed on all side streets located in the "Advance Warning Area".

16. Traffic Control signs should be separated and spaced on the design speed:

    a. 35 MPH and less = 100' min
    b. 40 MPH = 350' min
    c. 45 MPH and over = 500' min
    d. Expressway/ Freeway = See MUTCD

# Signs & Markings Notes

(REV. 11-19-2024)

1. INSTALL SIGNS AND PAVEMENT MARKINGS AS SHOWN PER CURRENT CITY OF MEMPHIS STANDARD CONSTRUCTION SPECIFICATIONS.

2. ANY EXISTING STRIPING THAT CONFLICTS WITH PROPOSED STRIPING SHALL BE REMOVED.

3. ALL PAVEMENT MARKINGS SHALL BE HOT THERMOPLASTICS UNLESS OTHERWISE SPECIFIED.

4. ALL LONG LINE STRIPING SHALL BE 4” WIDE UNLESS NOTED OTHERWISE.

5. ALL DIMENSIONS ARE WITH RESPECT TO THE FACE OF CURB OR EDGE LINE.

6. ALL SIGNS TO BE PLACED ON EXISTING POLES UNLESS APPROVED BY TRAFFIC ENGINEERING.

7. THE CONTRACTOR SHALL CONTACT THE CITY OF MEMPHIS SIGNS AND MARKINGS DEPARTMENT AT (901) 528-2937 TO SCHEDULE A FIELD WALKTHROUGH BEFORE INSTALLING ANY SIGNS OR MARKINGS.

8. THE CONTRACTOR SHALL PROVIDE A MATERIAL SUBMITTAL PACKAGE FOR ALL PROPOSED SIGNAGE. THE SUBMITTAL PACKAGE SHOULD INCLUDE CUT SHEETS FOR ALL SIGNS THAT ARE PROPOSED FOR INSTALLATION, AS WELL AS PROPOSED INSTALLATION APPURTENANCES. THE SUBMITTAL PACKAGE SHALL BE APPROVED BY THE CITY OF MEMPHIS, TRAFFIC ENGINEERING DEPARTMENT PRIOR TO SIGNAGE BEING ORDERED OR INSTALLED.

FOR REPAVING PROJECTS ALSO:

1. ANY DETECTION LOOPS DAMAGED BY CONSTRUCTION ACTIVITIES SHALL BE REPLACED.

2. THE MILLED SURFACE SHALL BE REPAVED WITHIN 72 HOURS.

3. IF MILLED SURFACE BEGINS TO DETORIORATE, PAVING TO COVER UP DETORIORATING MILLED SURFACES SHOULD OCCUR AS DIRECTED BY THE ENGINEER DURING THE NEXT WORKING DAY. IF SEVERE DISTRESS OCCURS, IMMEDIATE RESPONSE WILL BE REQUIRED.

4. ANY EXISTING SIGNS THAT ARE MISSING, DAMAGED, OR FADED SHALL BE REPLACED.

5. THE CONTRACTOR SHALL CONTACT THE CITY OF MEMPHIS TRAFFIC SIGNAL MAINTENANCE SHOP AT (901) 528-2844 PRIOR TO INSTALLATION AND TURN ON OF VEHICLE DETECTION.

6. RAISED PAVEMENT MARKERS (RPMs) SHALL BE INSTALLED PER THE DETAIL(S) PROVIDED IN THE PLAN SET.

# Traffic Signal Notes

(REV. 09-30-2024)

1. THE CONTRACTOR SHALL CONTACT THE CITY OF MEMPHIS, TRAFFIC SIGNAL MAINTENANCE DEPARTMENT AT (901) 528-2844 TO SCHEDULE A FIELD WALKTHROUGH TO COORDINATE THE LAYOUT OF POLE FOUNDATIONS, ETC. PRIOR TO STARTING WORK AT THE INTERSECTION.

2. THE CONTRACTOR SHALL CONTACT THE CITY OF MEMPHIS, TRAFFIC SIGNAL MAINTENANCE DEPARTMENT AT LEAST 48 HOURS PRIOR TO POURING CONCRETE FOR POLE FOUNDATIONS.

3. THE CONTRACTOR/ENGINEER SHALLSCHEDULE A PRECONSTRUCTION MEETING WITH THE CITY OF MEMPHIS SIGNAL MAINTENANCE DEPARTMENT PRIOR TO STARTING CONSTRUCTION.

4. THE CONTRACTOR SHALL SUBMIT ALL EQUIPMENT SUBMITTAL INFORMATION TO THE CITY OF MEMPHIS, TRAFFIC SIGNAL MAINTENANCE DEPARTMENT FOR REVIEW AND APPROVAL PRIOR TO RELEASING EQUIPMENT ORDERS.

5. TOP OF ALL FOUNDATIONS SHALL BE FLUSH WITH ADJACENT SIDEWALK.

6. THE PROPOSED LOCATION OF THE SIGNAL SUPPORT POLES, AS SHOWN ON THESE PLANS, IS APPROXIMATE. FIELD ADJUSTMENT MAY BE REQUIRED IN ORDER TO AVOID CONFLICTS WITH EITHER UNDERGROUND OR OVERHEAD UTILITIES.

7. ANY SIGNAL HEADS VISIBLE TO DRIVERS BUT NOT OPERATIONAL SHALL BE COMPLETELY COVERED.

8. THE CONTRACTOR SHALL CONTACT THE CITY OF MEMPHIS, TRAFFI ENGINEERING DEPARTMENT A MINIMUM OF THIRTY (30) DAYS PRIOR TO ACTIVATION OF THE SIGNAL TO OBTAIN INITIAL SIGNAL TIMINGS.

# APPENDIX D

AS-BUILT PROCESS

City of MEMPHIS TENNESSEE

**CITY OF MEMPHIS**
LAND DEVELOPMENT OFFICE
125 NORTH MAIN • ROOM 644
MEMPHIS, TN • 38103 • 901-636-6700

Paul A. Young
Mayor
Division of Engineering

# I: As-Built Process: Communications / Procedures / Requirements

IMPORTANT: As-Builts Plans Will Be Accepted ONLY Through Project Engineer!

1. **As-Built Submission – The as-built process occurs after the project has been completed and should have clouded as-built revisions. The revision block above project title will have a triangle (△) with a revision number (Ex. △1, △2, etc.) inside of it and the description should be "Revised to Reflect As-Built Info".**

2. **As-built information is required for:**
   a. **Grading & Drainage plans**
   b. **Sanitary Sewer plans**
   c. **Roadway plans**

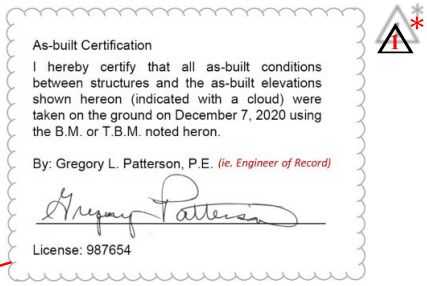
3. **As a general policy you'll need to send in only PDFs of your proposed as-built revisions for initial review. We will review those, and if there are no comments, we will notify that you can transfer the information to the mylars and then return those.** *(ie. Engineer of Record)*

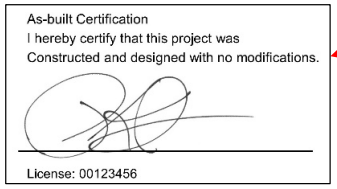
4. **Email a request to check out mylars from our office. We will notify you when ready for pickup.**

---

# II: As-Built Plan Setup: What is Required to be Included?

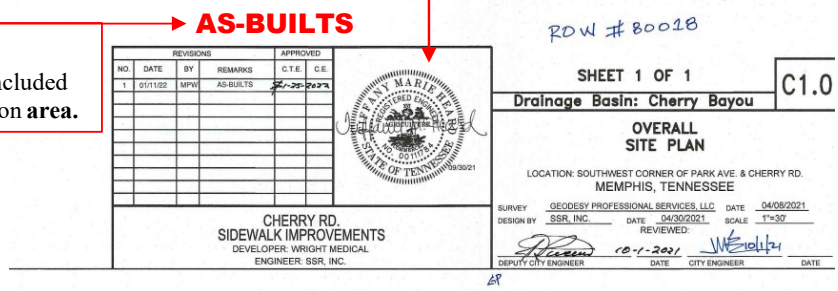
**As-Built Certification is Required**
Typically, it is added to the plans in a bubble form similar to this example. The majority of Engineers show it in **red** to stand out and be seen.
**Signature and License Number must be included.**




**Engineering Stamp MUST Be Included!**
As-built plans **will not be accepted** if Engineering seal and signature are missing from designated location.

**AS-BUILTS**
designation must be included above project information **area.**




*(Revised 06.04.24)*

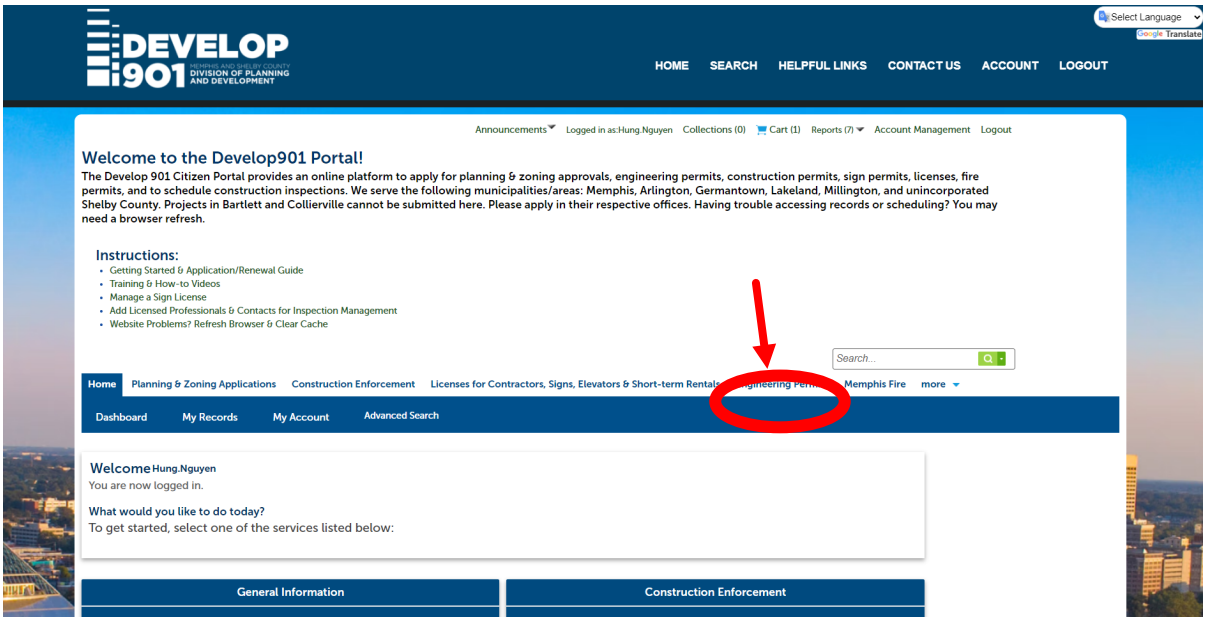
# APPENDIX E

ACCELA INSTRUCTIONS

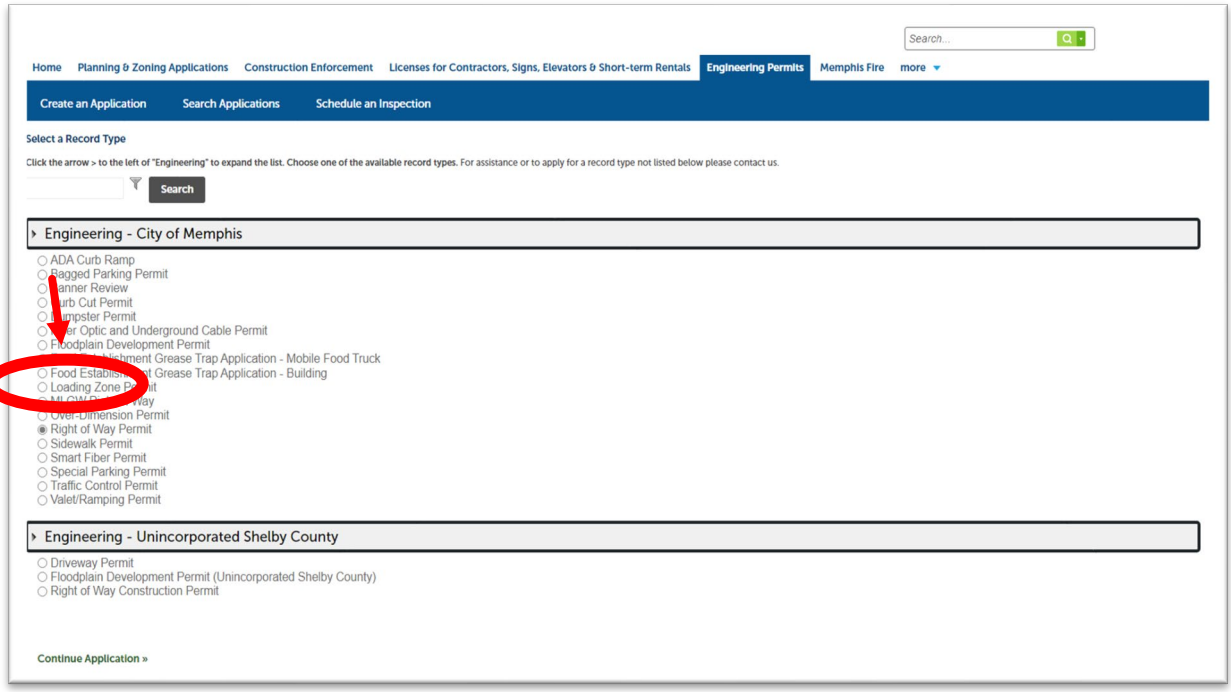
# How to Request a Permit Through Accela

Website: Accela Citizen Access

- Visit the above website address and create an account for Accela. Once you have created an account log in
- Select "Engineering Permits"




- Read the general disclaimer and accept the terms to move forward. After doing this, click "Continue application"
- Click the drop-down arrow next to "Engineering - City of Memphis" to see a list of different types of permits you can apply for.

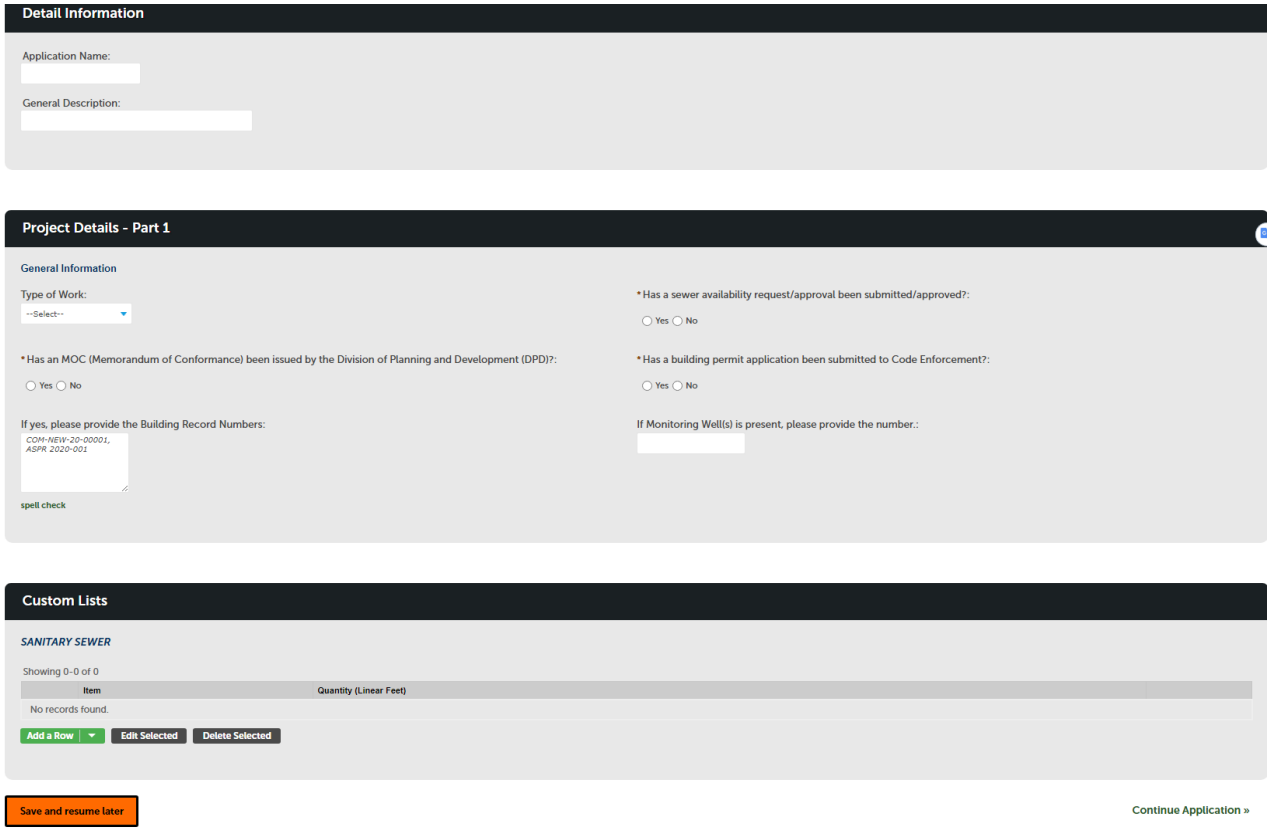



- Select "Right of Way Permit" and the "Continue Application"

## Step 1 – Instructions

- First, you will need to read the City of Memphis Procedures for Right of Way Permit document. Please make sure to read these through and to familiarize yourself with them if you are not already familiar with this document.
- After familiarizing yourself with the General Procedures, click "Continue Application"
- **Note- at any point you can save your progress, close out of it, and resume the application later.**

## Step 2 – Application Information

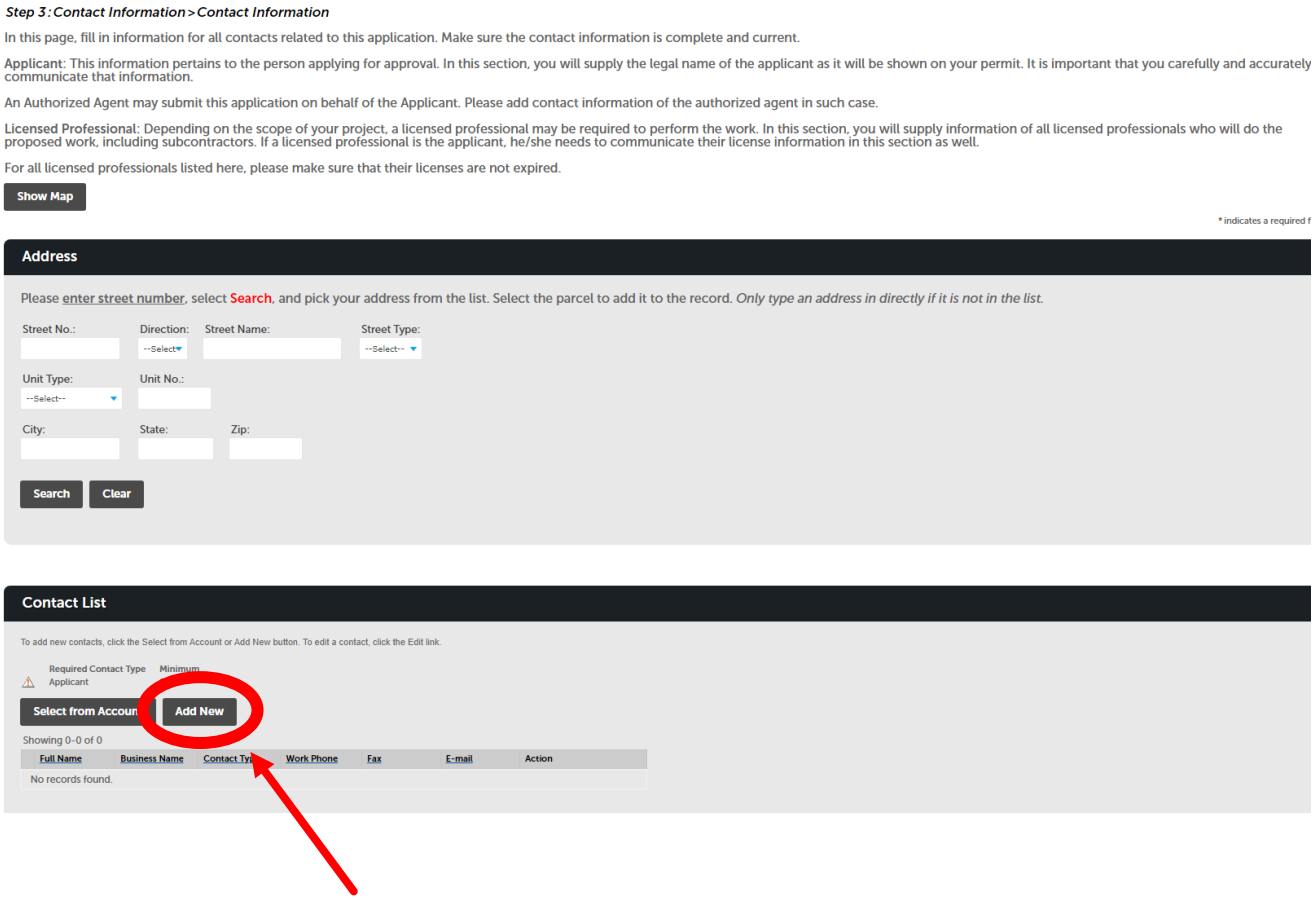



Fill these out to the best of your ability. If you have any questions with Sewer availability, MOC's, or Code Enforcement, here are some useful contacts below.

USEFUL CONTACTS

- Sewer availability
  - Contact Qaladize, Faraedoon Faraedoon.Qaladize@memphistn.gov
- Memorandum of Conformance (MOC)
  - Contact Norman Saliba Norman.Saliba@memphistn.gov
- Code Enforcement
  - Contact Bobby Decker Bobby.Decker@shelbycountytn.gov

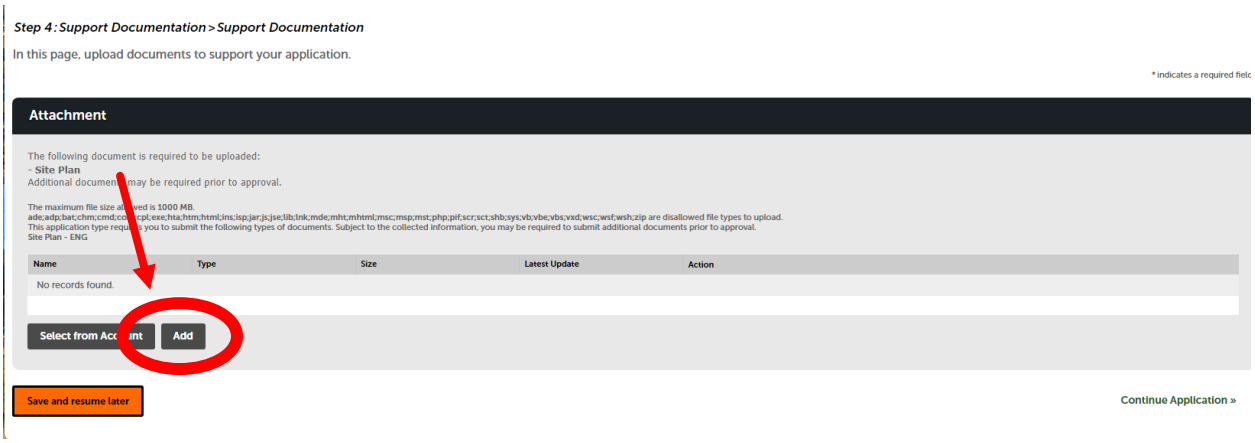
# Step 3- Contact list



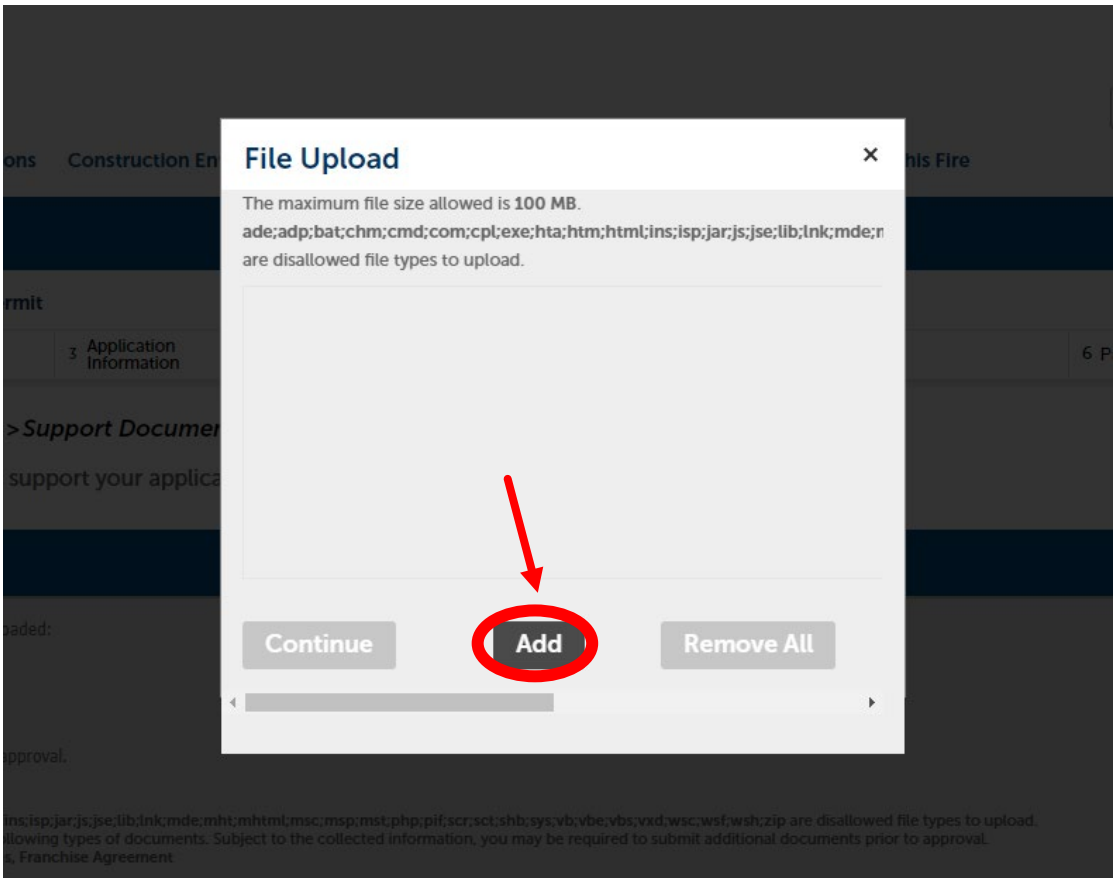

- Insert contact information. This will be the applicants that appear in the permit record. If there are more people you need on the emailing chains click ADD NEW.
- **BE ADVISED – They must have an Accela Account.**

# Step 4 – Support Documentation

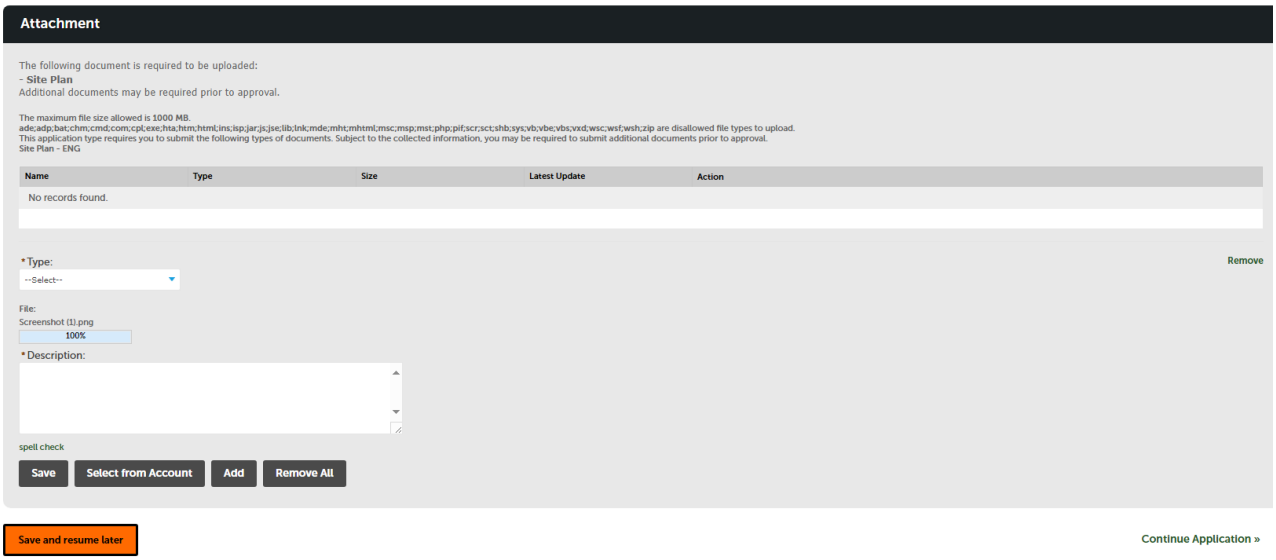
- Please attach your engineering drawings here:
- Click "Add"




- The following window will pop up. Click "Add" again and you will be taken to your files to select one.

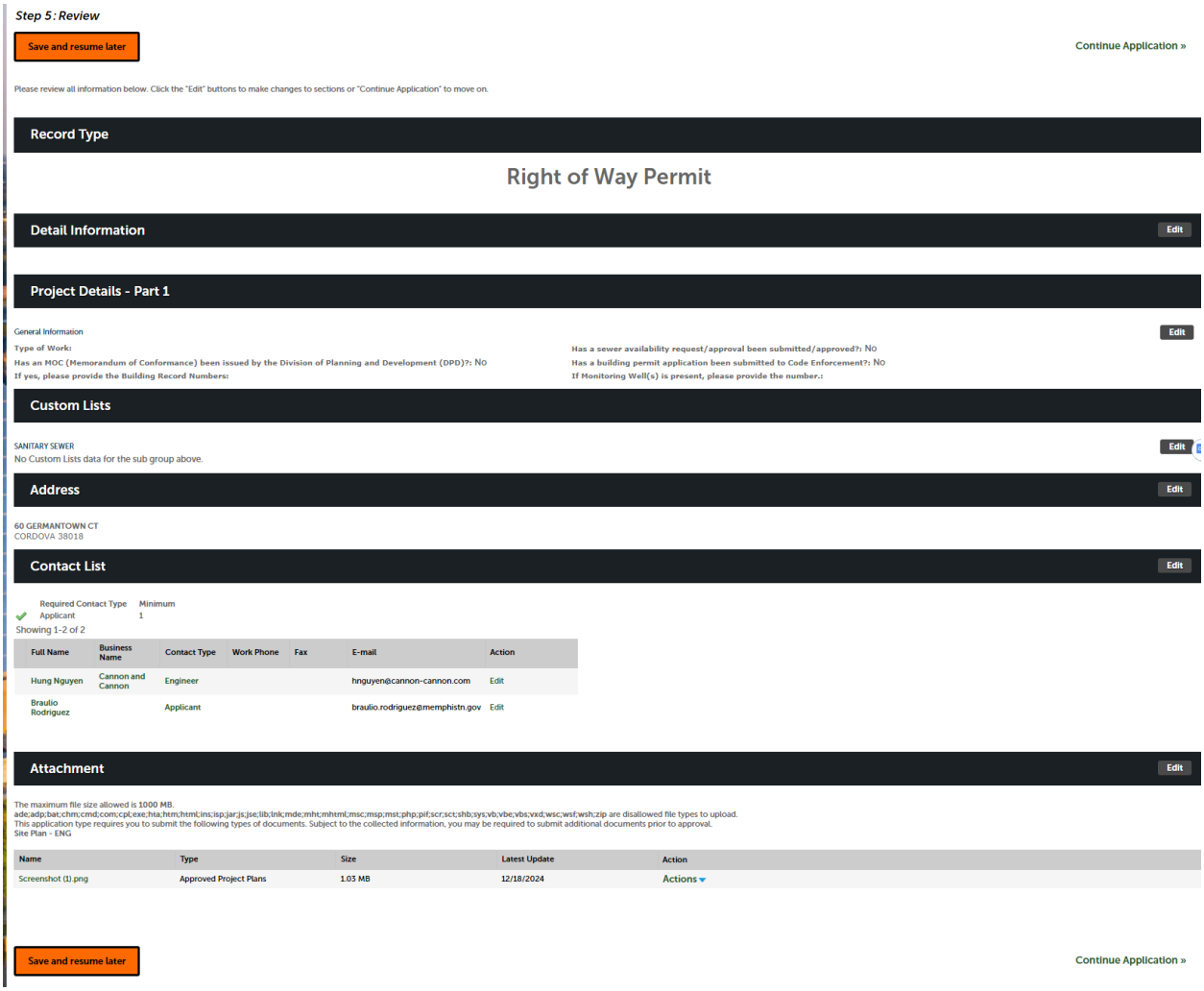



- You can select multiple documents at a time to upload. Then click "Continue"
- Now, you will need to go in and label what each of these documents are


Attachment
The following document is required to be uploaded:
- Site Plan
Additional documents may be required prior to approval.
The maximum file size allowed is 1000 MB.
ade;adp;bat;chm;cmd;com;cpl;exe;hta;htm;html;ins;isp;jar;js;jse;lib;lnk;mde;mht;mhtml;msc;msp;mst;php;pif;scr;sct;shb;sys;vb;vbe;vbs;vxd;wsc;wsf;wsh;zip are disallowed file types to upload.
This application type requires you to submit the following types of documents. Subject to the collected information, you may be required to submit additional documents prior to approval.
Site Plan - ENG
Name
Type
Size
Latest Update
Action
No records found.
*Type:
Remove
--Select--
File:
Screenshot (1).png
100%
*Description:
spell check
Save
Select from Account
Add
Remove All
Save and resume later
Continue Application »

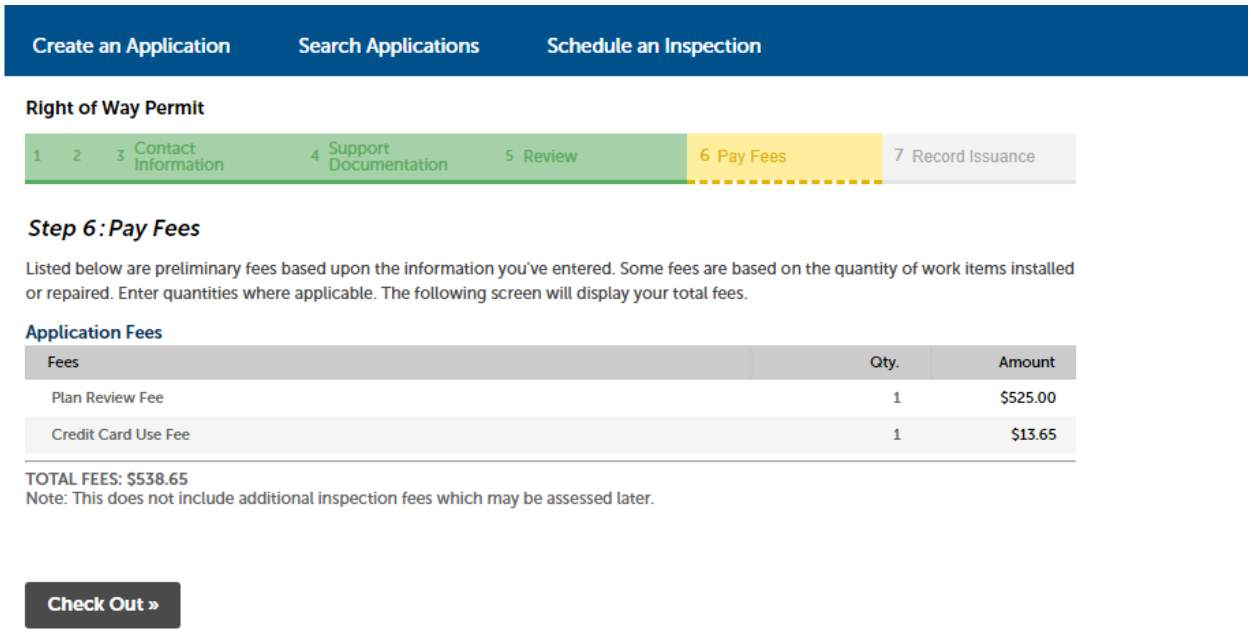
# Step 5 – Review

- Review all of the information to ensure that everything is correct. You have the opportunity at this time to go back and fix any mistakes.
- If everything looks good, click "Continue Application"




At this time, your application will be submitted to Accela/City of Memphis for review and the assessment of fees.

# Step 6- Pay Fees




**The fees in the system are for the initial review fee. **