



Construction Plan and Submittal Review Checklist

Project: _____

The following checklist provides minimum criteria for compliance with the Parish standards, policies, and Subdivision Regulations. The design engineer may provide additional plan sheets in addition to this minimum criteria at his/her discretion. The design engineer shall fully comply with applicable Parish standards, policies, Subdivision Regulations and sound engineering practices, which may not be contained in this checklist. All applicable items must be addressed. Please indicate items completed by placing a checkmark in the following checklist blocks: or write "n/a" for not applicable. The design engineer shall sign and date the last page of the checklist and submit it along with one (1) set of half scale construction plans and complete stamped and signed drainage calculations for review.

I. CONSTRUCTION PLANS

A. TITLE SHEET & LOCATION/VICINITY MAP:

- Subdivision name and filing number
- Type of Subdivision (Residential, Commercial, Industrial, or Large Scale Development)
- Date of original Preliminary Plat Approval and all revisions
- Name of Engineer, signature, and seal
(NOTE: Engineer's Certification: I hereby certify that the design of the subdivision improvements, to the best of my knowledge, conforms to the current Parish Subdivision Regulations, current design standards of the Department of Public Works, and sound engineering practices.)
- Typical Section Sheet(s)
- Index to sheets:
 - Title Sheet & Location /Vicinity Map
 - Existing site condition map
 - Storm Drainage Layout
 - Sanitary Sewer Layout
 - Plan/profile sheets (to be indexed by street name)
 - Drainage Outfall Profiles / Sections (if applicable)
 - Sanitary Sewer Profiles (if applicable)
 - Traffic Control Plan
 - Site Grading/Detention Pond Plan
 - Sanitary Sewage Treatment Plant / Pump Station Site Plan (if applicable)
 - Special Details (if applicable, Bridges, spillways, boxes, concrete collars, etc.)
- Applicable Standards
(Each standard is to be listed by name and number)
- Notes on Title Sheet:
 - 1. All work shall conform to the Ascension Parish Subdivision Construction Specifications, latest edition
 - 2. Maintenance Bond required in accordance with provisions of Section 50.202 of the Ascension Parish Subdivision Regulations.
 - 3. The approval of these plans applies to the construction features only as required by the Ascension Parish Subdivision Regulations, established policies, and sound engineering practices.

- 4. All Sanitary Sewer lines, treatment plant or sewerage treatment facilities shall be approved by the Louisiana Department of Health and Hospitals.
- 5. No street in this Subdivision is to be open to traffic until the proper intersection control signs have been installed by the developer.
- 6. Post installation tests for sewer lines are to be performed in accordance with Sections 38.204 & 38.205 of the Ascension Parish Subdivision Regulations
- 7. A LPDES Permit will be required.
- 8. A US COE 404 Permit may be required for any activity in a designated wetland area.
- 9. A DOTD permit is required for activity within a state right-of-way or servitude.
- Bench Mark Data: Description, Elevation, and Source (Datum)
- List of variances/waivers and date of Planning Commission Approval

B. TYPICAL SECTION SHEET:

- Subdivision name and filing number
- Name of engineer, signature, and seal
- Right-of-Way Requirements(check all applicable boxes):
 - Alleys-Minimum 20 feet
 - Boulevards-Minimum 100 feet
 - Major Streets-Shall conform to widths required on the major street plan
 - Arterial/Commercial/Industrial Streets (Curb & Gutter)-Minimum 50 feet
 - Arterial/Commercial/Industrial Streets (Open Ditch)-Minimum 60 feet
 - Collector/Local Streets (Curb & Gutter)-Minimum 50 feet
 - Collector/Local Streets (Open Ditch)-Minimum 60 feet
 - Rural Roads (Open Ditch)-Minimum 80 feet
 - Townhouse Driveways-Minimum 30 feet (Private Servitude of Passage)
 - T-Turnaround-100 feet by 40 feet
 - Cul-de-sac (Turning Circle)-Minimum 68 feet outside radius (Curb and Gutter), 75 feet outside radius (open ditch)
 - Utility Space Allocation Plan. (Also show rear yard space allocation plan, if applicable)
 - Minimum cross slope = 0.025 Ft/Ft
 - Show lime cut below curbs and specify that lime determination is to be determined by the testing lab with a minimum of 8% and approved by the Engineering Reviewing Agency (ERA)
 - Provide details of transitions between different roadway surfaces or connections to existing streets
 - Typical cross section (show cross section for each type of street, i.e., boulevard section, curb & gutter standard, open ditch standard, etc.)
 - Collector, Local, or marginal access(check all applicable boxes):
 - a. Twenty (20) foot pavement, open ditch in 60 foot right-of-way, 3:1 fore slopes, and 4:1 back slopes.
 - b. Twenty-seven (27) foot back of curb to back of curb in a 50 foot right-of-way
 - c. Street paving sections(check applicable box)
 - 1. Three (3) inch asphaltic wearing surface on ten (10) inch soil cement base or better
 - 2. Six (6) inches of concrete
 - 3. Five (5) inches of concrete and one and one-half (1½) inches of asphaltic wearing surface.
 - 4. Alternate section approved by the ERA
 - Rural Road
 - a. Twenty-four (24) foot wide pavement in a 80 foot right-of-way.
 - b. Street section
 - 1. Two (2) inch asphaltic wearing surface on 8½ inch soil cement base or better., with 4:1 fore slope and back slope
 - Arterial or Commercial-Industrial Streets: _____
 - a. Twenty-seven (27) foot back of curb to back of curb in a 50 foot right-of-way, 8 inch Town of Sorrento - Construction Plan and Submittal Review

Checklist- rev Aug 2017.docxPage 3 of 8Town of Sorrento - Construction Plan and Submittal Review Checklist- rev Aug 2017.docx portland cement concrete pavement.

- b. Twenty-four (24) foot pavement, open ditch in 60 foot right-of-way, 3:1 fore slopes, and 3:1 back slopes, 8 inch portland cement concrete pavement (Variance/Waiver Required)
 - Boulevards – 25½ foot lane width back of curb to back of curb; minimum 30 foot neutral ground.
 - Townhouse Private Access Drives – Minimum twenty-two (22) foot wide with adequate drainage and turnaround space, six (6) inch soil cement or better, with 1½” asphaltic concrete wearing course.
 - T-Turnaround – Minimum pavement size is 80 feet by 20 feet. The type of construction is same as adjacent street.
 - Cul-de-sac (Turning Circle) – minimum inside turning radius of 35 feet
 - a. Curb and Gutter Streets – 68 foot right-of-way radius with 24 foot pavement width back of curb to back of curb.
 - b. Open Ditch Streets – 75 foot right-of-way radius with 20 foot pavement width.
 - Private streets – At the entrance to any subdivision development with private improvements, a sign shall be installed which states the limits of public improvements within the development.
- C. EXISTING SITE CONDITION MAP:
- Subdivision name and filing number
 - Name of engineer, signature, and seal
 - North arrow
 - Graphic scale
 - Legend
 - Contour lines, onsite and offsite
 - Identify adjacent properties
 - Show all existing culverts, ditches, structures, driveways, fences, gas pipelines, lakes/ponds, roads, historic features etc.. and label all items
- D. STORM DRAINAGE LAYOUT:
- Subdivision name and filing number
 - Name of engineer, signature, and seal
 - North arrow
 - Graphic Scale
 - Legend
 - Contours
 - Servitudes (width per Section 37.205)
 - Minimum 30-foot drainage servitude required through lake/pond to extend from each discharge point into lake/pond to the lake/pond outfall structure.
 - Rear swale ditches
 - Lot numbers
 - Drainage Areas (area, including offsite areas, and calculated flow should be given for each area). Sheet flow shall be accommodated on the site by use of swale ditches or pipe systems to intercept the sheet flow and direct it to the appropriate outfall. Provisions must be made to adequately take care of adjacent watershed areas for existing conditions flows.
 - Pipe sizes, lengths and type. For public servitudes and R/W's, minimum pipe size shall be 15”
 - Inlet designations
 - Adjacent lots, lot numbers, or tract names
 - Provide catch basins for low areas behind curb.
 - Where open ditches are used for drainage, size of all driveway culverts shall be shown. (Culverts are to be designed using Manning's roughness coefficient of 0.024)
 - Show cemeteries, existing structures, gas pipelines, lakes/ponds, historic trees, etc.

- Note required regarding private ownership and maintenance of lake/pond and shoreline and that Ascension Parish does not own or maintain lake/pond and shoreline. Also this note must be added to final plat.
- Rear yard drainage is required (1.5' maximum ditch depth with 5:1)
- For zero-lot line subdivisions, rear yard drainage systems may be required (can be private).
- Water surfaces at outfalls
- Inundation elevation (if available)
- Delineate FEMA 100-year flood zones and nearest base flood elevation
- Riprap at Outfalls
- 5' chain-link fence required along ditches with top bank width of 20' or greater (per Section 37.207)
- Show static, 10 year design water surface and peak 10 year elevation on all detention ponds

E. SANITARY SEWER LAYOUT:

- Subdivision name and filing number
- Name of engineer, signature, and seal
- North arrow
- Graphic Scale (1" = 100')
- Legend
- Contours
- Servitudes
- Lot numbers
- Pipe sizes and grades (min. 0.4% and max. 150 lots on an 8" line)
- Manhole designation, top elevation, and invert elevation for each manhole. Manholes with drops 2' or greater require special drop detail
- Wyes for each lot. Single wyes required on same side as main. Double wyes with cleanouts are allowed for street crossings. Sewer services are required to extend past utility servitude and terminus is to extend a minimum of 3 feet above finish grade.
- Manhole spacing (max. 400 feet, recommended 300± feet)
- Note: "Minimum depth of sewer services at the property line shall be 4 to 6 feet below the finish grade. Sewer services from the main sewer to the property shall have a minimum slope of 1% (2% where available depth permits). Sewer services are required to extend past utility servitudes and terminus is to extend a minimum of 3 feet above finish grade"
- Note: "Sanitary sewer mains shall be tested and accepted in accordance with Sections 38.204 and 38.205 of the subdivision regulations prior to acceptance for maintenance by the Parish"
- Plan showing location of sanitary sewer and service line in servitude or right-of-way. Show cleanouts with cast iron cover in concrete pad where required.
- Identify adjacent properties
- Location of pump station and force main (if applicable)
- Treatment plant is more than 100' from an existing residence
- Statement as to ownership and maintenance of treatment plant and collection system
- Show cemeteries, existing structures, gas pipelines, lakes/ponds, historic trees, etc.

F. PLAN – PROFILE SHEETS:

- Subdivision name, filing number, and street name on each sheet
- Name of engineer, signature, and seal
- North arrow
- Graphic Scale (1" = 20' plan, 1" = 2' profile)
- Identify type of street construction on each sheet (plan only)
- Inlet and manhole designations (on both plan and profile)
- Top and invert elevations of all inlets and manholes (on both plan and profile). Each structure should be labeled on one plan-profile sheet within the set of plans.

- Length, size, slope, and type of all sanitary sewer lines (on both plan and profile). Each pipe should be labeled on one plan-profile sheet within the set of plans.
- Length, size, slope, and type of all storm drain pipes (on both plan and profile) Each pipe should be labeled on one plan-profile sheet within the set of plans.
- Hydraulic grade line. Show the design water surface value at all Junction boxes and inlets. The hydraulic grade line shall not exceed 2" above the lowest gutter elevation of a curb & gutter street and the edge of pavement on a suburban standard street (open ditch), unless otherwise approved by the ERA.
- Street centerline elevation:
 - 1. The base grade of all streets shall be constructed to no lower than one (1) foot below the FEMA Base Flood Elevation.
- Proposed Street grades (0.4% minimum) (for curb and gutter and future curb and gutter streets; open ditch subdivisions can have a 0.0% street grade). Label PVI, PVC, PVT, curve length, and slope. Label on minimum 50' intervals. Check to be sure inlets are at low points.
- Street gutter grades are at or above 10 yr peak water surface of detention pond(s), unless otherwise approved by the ERA
- Existing ground in profile. Label on minimum 50' intervals.
- Radius at intersections:
 - Residential – 25' minimum
 - Commercial – 35' minimum
 - Industrial and major streets – 50' minimum
- Curve data where required
- Lot numbers
- Servitudes
- Building setbacks
- Driveways to treatment plant or pump station sites. (10' minimum width and 4" minimum thickness) 10' concrete or asphalt aprons required where drive abuts street. The remainder of drive may be aggregate.
- Sidewalks (4" thick x 4' wide) within a 5-foot sidewalk servitude. (if applicable)
- Handicap ramps – required for sidewalks at all intersections (if applicable)
- Check for conflicts between sewer and storm drain lines. Provide conflict boxes or ductile iron pipe where required.

G. DRAINAGE OUTFALL PROFILES/SECTIONS:

- Subdivision name and filing number
- Name of engineer, signature, and seal
- Profile:
 - 1. Natural ground
 - 2. Bottom of ditch
 - 3. Hydraulic grade line
 - 4. Corrugated metal pipe (20' minimum) at discharge channel
 - 5. Top of drainage pipes out-falling into lakes shall be 1' below the normal water surface
- Section:
 - 1. Bottom width
 - 2. Side slopes- 3:1 for earthen channels, 1½ : 1 for concrete lined channels.
 - 3. Design water depth
 - 4. Top of ground
 - 5. Top width
 - 6. Location within servitude or right-of-way
 - 7. Design flow
 - 8. Submit signed and sealed calculations for files
- Erosion Protection:
 - 1. Show type
 - 2. Show limits

- H. SANITARY SEWER PROFILES:
- Subdivision name and filing number
 - Name of engineer, signature, and seal
 - Natural ground
 - Size, length, type, and slope of all lines
 - Manhole designation, stationing, top elevation, and invert elevation
 - Drop inlets if required (avoid when possible).
- I. TRAFFIC & CONTROL PLAN
- Subdivision name and filing number
 - Name of engineer, signature, and seal
 - North arrow
 - Graphic Scale (1" = 100')
 - Legend
 - Identify adjacent properties
 - Lot numbers
 - Street signs
 1. North-South streets shall be called drives
 2. East-West streets shall be called avenues
 3. Boulevard streets shall be called boulevards
 - Traffic intersection control signs
 - Posted speed limit is no greater than 25 mph
 - At the entrance to any subdivision development with private improvements, a sign shall be placed stating the limits of public maintenance within the Development.
 - Striping plan required if more than three lanes proposed without a raised median.
- J. SITE GRADING/DETENTION POND PLAN:
- Subdivision name and filing number
 - Name of engineer, signature, and seal
 - North arrow
 - Legend
 - Contours (Existing and Proposed for entire project site)
 - Graphic Scale
 - Identify adjacent properties
 - Lot numbers
 - Show static, 10 year design water surface and peak 10 year elevation on all detention ponds
 - Lake outfall structure details (plan and cross section views). Primary and secondary (emergency) outfalls.
 - If at all feasible, the emergency spillway should be located in a different location than directly above the primary outfall pipe(s).
 - Note stating that finish floor elevations should be 1ft higher than the 100 FEMA flood elevation or the 100 yr peak water surface elevation of the detention pond(s), which ever is greater
- K. SANITARY SEWAGE TREATMENT PLANT/PUMP STATION SITE PLAN:
- Subdivision name and filing number
 - Name of engineer, signature, and seal
 - North arrow
 - Graphic Scale
 - Identify adjacent properties
 - Lot numbers
 - Treatment plant/pump station location (dimension from property lines)
 - Treatment plant/pump station top elevation (check 100-year B.F.E.)
 - Sewer influent lines
 - Sewer effluent lines to outfall
 - Fence
 - Driveway

L. BRIDGE PLANS AND DETAILS):

- Subdivision name and filing number
- Name of engineer, signature, and seal
- Cast-In-Place concrete deck with concrete piles and caps
- Precast concrete deck with concrete piles and caps
- Elevation of lowest bridge deck member must clear the 100 Year Flood Elevation or Inundation, whichever is greater.
- Provide boring logs
- Adequate bridge opening is required. Provide signed and sealed hydraulic calculations.
- Provide signed and sealed pile capacity and structural calculations.

COMMENTS:

Designed and Checked By: _____ Date: _____

Initial Review

By: _____ Date: _____

II. SUBMITTAL

- Checklist that is fully completed and signed and dated by the Engineer
- Bound drainage Calculations that include but not limited to:
 - Fill mitigation calculations
 - Tail-water calculations
 - Layout showing locations of cross sections used in drainage models
 - Existing condition, 10 year, and 100 year hydrographs
 - 10 year and 100 year detention pond routing calculations
 - Pre and post stream water surface profile analysis(provide layout that depicts the location of the stream cross sections where offsite water is conveyed through project site)
 - Pre and post watershed map
 - Internal pipe calculations
- Copy of latest approved preliminary plat
- All items from the planning commission meeting minutes, the ERA preliminary plat review letter, and requirements from the approved preliminary plat are addressed in the construction plan submittal.
- Copy of transmittal letter to State Department of Health & Hospitals during sewer plan submittal
- If proposed improvements are to be constructed in an existing utility, pipeline, etc. servitude or right-of-way, then documentation will be required.

Construction Plan Approval Process

1. The consulting engineer will submit:
 - 1 half scale set of plans and review fees to the Town of Sorrento
 - 1 half scale set of plans and all items from the construction plan submittal checklist

2. The ERA will review the construction plan submittal and then notify the consulting engineer of the review comments by copy of a letter that is sent to the Town of Sorrento via email.
3. Once the construction plans are approved, the ERA will contact the consulting engineer to request five (5) full scale and one (1) half-scale set of plans to be delivered to the ERA's office for stamping. Once these sets of plans are stamped, the ERA will notify the Town of Sorrento via email that the construction plans are approved. The ERA will then notify the consulting engineer that they can pick up their three (3) sets of stamped plans. The ERA will deliver the other two (2) full scale sets to the Town of Sorrento and the one (1) half-scale set will remain in the ERA's files.
4. After the construction plan approval letter is received, the consulting engineer will then notify the Town of Sorrento in writing prior to beginning construction as to the start date of the project, the name of the construction company, and the name of the testing lab that will monitor the work. A copy of this notice should be sent to the ERA. A pre-construction conference date will be established by the Town of Sorrento and the ERA and a construction permit will be issued at that conference. The consulting engineer will be responsible for notifying the testing lab and the contractor to make sure that they have a representative at the meeting. During the pre-construction conference the subdivision construction process and requirements will be discussed.
5. Construction begins