

## **DC1 – GENERAL PLAN REQUIREMENTS FOR PUBLIC IMPROVEMENT PROJECTS**

**DC1-001** **GENERAL.** All plans and reports submitted shall be prepared by, or under the direction of and sealed by a professional engineer licensed in the state of Kansas and shall be reviewed by the city for compliance with the minimum design requirements as established in the Design Criteria Manual for Public Improvement Projects of the City of Gardner and with all other applicable city codes and standards.

Attention is directed to the design engineer that whenever extraordinary or unusual problems are encountered in conjunction with a proposed project, additional information, and analysis beyond the minimum requirements of these standards and criteria will be required.

The City of Gardner is not responsible for the accuracy and the adequacy of the design or dimensions, and elevations as depicted on the plans (which shall be confirmed and correlated at the site of the work). The City of Gardner, through the approval of the plans and/or report, assumes no responsibility for the completeness and/or accuracy of the public improvement plan or report.

**DC1-002** **REQUIRED NOTES.** The following general notes will be required as a minimum on all plan submittals for public improvement projects. These notes are not meant to be all-inclusive, and in certain situations the use of additional notes may be required by the City Engineer.

### Water Mains

1. Development plans are approved initially for one (1) year after which they automatically become void and must be updated and re-approved by the City Engineer before any construction will be permitted.
2. The City of Gardner plan review is only for general conformance with City of Gardner design criteria and the City code. The City is not responsible for the accuracy and adequacy of the design, or dimensions and elevations. The City of Gardner, through approval of this document, assumes no responsibility other than that stated above for the completeness and/or accuracy of this document.
3. The Contractor shall have one (1) signed copy of the plans (approved by the City of Gardner) with a State approval stamp on the title sheet and one (1) copy of the appropriate Technical Specifications and Design Criteria for Public Improvement Projects at the job site at all times.
4. Construction of the improvements shown or implied by this set of drawings shall not be initiated or any part thereof undertaken until the City Engineer is notified of such intent, and all required and properly executed bonds and contract agreements are received and approved by the City Engineer.
5. The City of Gardner Technical Specifications for Public Improvement Projects, latest edition, shall govern construction of this project.
6. All existing utilities indicated on the drawings are according to the best information

available to the engineer; however, all utilities actually existing may not be shown. Utilities damaged through the negligence of the Contractor to obtain the location of same shall be repaired or replaced by the Contractor at his expense.

7. Backfill within the right-of-way shall be compacted to ninety-five (95) percent of maximum density at optimum moisture. No fill shall be placed in future rights-of-way under a Land Disturbance permit unless approved by the City Engineer.
8. All trench excavation beneath existing and proposed streets shall be backfilled in accordance with Technical Specifications. Alternate backfill materials shall require the approval of the City Engineer.
9. Saturday work shall be as approved by the City Engineer. No work shall be permitted on Sunday or a Holiday.
10. Where available, all water required for the construction of this project shall be purchased from the Public Works Department through the use of a fire hydrant water meter. Meters can be obtained from the Public Works Department, Field Operations Division, for a nominal deposit, refundable upon return of the meter.
11. Relocation of any water line, sewer line or service line required for the construction of this project shall be the responsibility of the Contractor at his expense.
12. The proposed waterline improvements shown by this set of drawings have been designed to provide for the following fire flow requirements as determined by the City of Gardner Fire Chief: GPM. (Note to be placed on development drawings that contain areas zoned for higher densities than R-2).
13. Connections to existing water mains shall not be allowed for new water main extension projects until all testing and disinfection requirements have been met and the connection has been approved by the City Engineer.
14. All structural inspections shall be completed by a professional engineer registered in the State of Kansas.
15. The horizontal separation distance between water lines (service lines) and sanitary sewer lines (service lines), and waterlines (service lines) and sanitary sewer manholes shall be a minimum of 10 ft measured from edge to edge.
16. Waterlines (service lines) must always cross over the force mains (service mains) with a minimum vertical separation distance of 2 ft.

#### Sanitary Sewers

1. Development plans are approved initially for one (1) year, after which they automatically become void and must be updated and re-approved by the City Engineer before any construction will be permitted.
2. The City of Gardner plan review is only for general conformance with City of Gardner

Design Criteria and the City Code. City is not responsible for the accuracy and adequacy of the design, or dimensions and elevations. City of Gardner through approval of this document assumes no responsibility other than as stated above for the completeness and/or accuracy of this document.

3. Contractor shall have one (1) signed copy of the plans (approved by the city of Gardner) with a State approval stamp on the title sheet and one (1) copy of the appropriate Technical Specifications and Design Criteria for Public Improvement Projects at the job site at all times.
4. Construction of the improvements shown or implied by this set of drawings shall not be initiated or any part thereof undertaken until the City Engineer is notified of such intent and all required and properly executed bonds and contract agreements are received and approved by the City Engineer.
5. The City of Gardner Technical Specifications for Public Improvement Projects, latest edition, shall govern construction of this project.
6. All existing utilities indicated on the drawings are according to the best information available to the City Engineer; however, all utilities actually existing may not be shown. Utilities damaged through the negligence of the Contractor to obtain the location of same shall be repaired or replaced by the Contractor at his expense.
7. Backfill within the right-of-way shall be compacted to ninety-five (95) percent of maximum density at optimum moisture. No fill shall be placed in future rights-of-way under a Land Disturbance permit unless approved by the City Engineer.
8. All trench excavation beneath existing and proposed streets shall be backfilled in accordance with Technical Specification Section. Alternate backfill materials shall require the approval of the City Engineer.
9. All service lines shall be laid on a 1.00% minimum grade unless approved by the City Engineer.
10. Accurate elevations of either the first-floor surface or the basement floor surface shall be shown, and identified, for all existing and/or proposed structures for all building sites to be served by the proposed sewer system.
11. Where available, all water required for the construction of this project shall be purchased from the Public Works Department through the use of a fire hydrant water meter. Meters can be obtained from the Public Works Department, Field Operations Division for a nominal deposit, refundable upon the return of the meter.
12. Saturday work shall be as approved by the City Engineer. No work shall be permitted on Sunday or a Holiday.
13. Relocation of any water line, sewer line or service line required for the construction of this project shall be the responsibility of the Contractor and shall be at his expense.

14. The Contractor shall install and properly maintain a mechanical plug at all connection points with existing lines until such time that the proposed line is tested and approved.
15. To prevent damage to main sewer line, all blasting required for laterals stub lines shall be performed during blasting for the main line.
16. A pre-blast survey shall be approved by the Fire Marshall prior to the initiation of blasting operations.
17. All structural inspections shall be completed by a professional engineer registered in the State of Kansas.

#### Streets and Storm Drainage

1. Development plans and drainage reports are approved initially for one (1) year, after which they automatically become void and must be updated and re-approved by the City Engineer before any construction will be permitted.
2. The City of Gardner plan review is only for general conformance with Gardner design criteria and the City code. City is not responsible for the accuracy and adequacy of the design, or dimensions and elevations. City of Gardner, through approval of this document, assumes no responsibility other than as stated above for the completeness and/or accuracy of this document.
3. Contractor shall have one (1) signed copy of the plans (approved by the city of Gardner) and one (1) copy of the appropriate Technical Specifications and Design Criteria for Public Improvement Projects at the job site at all times.
4. Construction of the improvements shown or implied by this set of drawings shall not be initiated or any part thereof undertaken until the City Engineer is notified of such intent, and all required and properly-executed bonds and contract agreements are received and approved by the City Engineer.
5. The City of Gardner Technical Specifications for Public Improvement Projects, latest edition, shall govern construction of this project.
6. All existing utilities indicated on the drawings are according to the best information available to the City Engineer; however, all utilities actually existing may not be shown. Utilities damaged through the negligence of the Contractor to obtain the location of same shall be repaired or replaced by the Contractor at his expense.
7. Backfill within the right-of-way shall be compacted to ninety-five (95) percent of maximum density at optimum moisture. No fill shall be placed in future rights-of-way under a Land Disturbance permit unless approved by the City Engineer.
8. All trench excavation beneath existing and proposed streets shall be backfilled in accordance with the Technical Specifications. Alternate backfill materials shall require the approval of the City Engineer.

9. Sidewalk locations are shown for informational purposes. Sidewalk and ramp construction shall be required when noted on the plans and/or contained in the summary of quantities.
10. Soil sampling and compaction testing shall be performed by a qualified technician at locations determined by the City Engineer. All sampling and testing expenses shall be paid for by the Contractor.
11. Where available, all water required for the construction of this project shall be purchased from the Public Works Department through the use of a fire hydrant water meter. Meters can be obtained from the Public Works Department, Field Operations Division for a nominal deposit, refundable upon the return of the meter.
12. Saturday work shall be as approved by the City Engineer. No work shall be permitted on Sunday or a Holiday.
13. Relocation of any water line, sewer line or service line required for the construction of this project shall be the responsibility of the Contractor and shall be at his expense.
14. If precast concrete storm sewer structures are to be used on this project, the Contractor shall, subsequent to review by the Design Engineer, submit shop drawings to the City Engineer prior to fabrication of the structures. Failure to do so may be cause for rejection.
15. Monument boxes conforming to all applicable Standard Details shall be installed when the quarter section corners are located within the limits of the new street.
16. Where a new street is to connect to an existing street, all deteriorated or cracked asphalt within five (5) feet of the connection point shall be removed to a depth where sound material is found. If full depth pavement removal is required, the subgrade shall be recompact to ninety-five (95) percent of maximum density at optimum moisture.
17. All structural inspections shall be completed by a professional engineer registered in the State of Kansas.

#### Erosion and Sedimentation Control

1. All earth disturbance activities shall proceed in accordance with the following sequence. Each stage shall be completed and immediately stabilized before any subsequent stage is initiated. Clearing, grubbing, and topsoil stripping shall be limited only to those areas described in each stage. No fill shall be placed in future rights-of-way under a Land Disturbance permit unless approved by the City Engineer.
2. The Contractor or Owner shall obtain a Land Disturbance Permit from the City of Gardner. The permit holder must schedule an initial erosion and sediment control inspection prior to any earthmoving on the proposed site as per the approved plan. Scheduling of initial inspections must be made at least twenty four (24) hours in advance.
3. All excavation for utility line installation shall be limited to the amount that can be excavated, installed, backfilled, and stabilized within one working day. All excavated material shall be deposited on the upslope side of the trench. Sediment laden water that

accumulates in the trenches shall be pumped through a filtration device, or equivalent sediment removal facility, or over non-disturbed vegetated areas. Discharge points should be established to provide for maximum distance to active waterways.

4. Before implementing any revisions to the approved erosion and sediment control plan or revisions to other plans, which may affect the effectiveness of the approved Erosion and Sediment control plan, the Contractor must receive approval of the revisions from the City of Gardner.
5. All building materials and wastes must be removed from the site and recycled or disposed of in accordance with the Kansas Department of Health and Environment's regulations. No building materials or wastes or unused building materials shall be burned, buried, dumped, or discharged at the site.
6. Before disposing of soil or receiving borrow for the site, the Contractor must assure that each spoil or borrow area has an Erosion and Sediment Control Plan approved by the City of Gardner and which is being implemented and maintained according to City of Gardner regulations.
7. Any disturbed area on which activity has ceased must be stabilized immediately. During non-germinating periods, mulch must be applied at the recommended rates. Disturbed areas which are not at finished grade, and which will be re-disturbed before winter shall be stabilized in accordance with temporary seeding specifications. Disturbed areas that are either at finished grade or will not be redisturbed before winter must be stabilized with permanent seeding specifications.
8. Planting and seeding dates shall be in accordance with the City of Gardner Technical Specifications for Public Improvement Projects. Interim stabilization will be achieved by mulching.
9. Only limited disturbance will be permitted to construct sediment traps, diversion terraces, etc.
10. At the end of each working day, any sediment tracked or conveyed onto a public roadway will be removed and re-deposited onto the construction site. Removal can be completed through use of mechanical or hand tools, but must never be washed off the road using water.
11. Sediment removal from erosion and sediment controls and facilities shall be disposed of in landscaped areas outside of steep slopes, wetlands, floodplains, or drainage swales and immediately stabilized or placed in topsoil stockpiles.
12. Immediately upon discovering unforeseen circumstances posing the potential for accelerated erosion and/or sediment pollution, the Contractor shall implement appropriate best management practices to eliminate the potential for accelerated erosion and/or sediment pollution.
13. A copy of the approved erosion and sediment control plan and Stormwater Pollution Prevention Plan (SWPPP) must be available at the project site at all times.

14. All pumping of sediment laden water shall be through a sediment removal facility or over undisturbed vegetated areas.
15. Stabilization is defined as a minimum uniform 70% perennial vegetated cover or other permanent non-vegetated cover with a density sufficient to resist accelerated surface erosion and subsurface characteristics sufficient to resist sliding and other movements.
16. An erosion control blanket will be installed on all disturbed slopes steeper than 3:1 and all areas of concentrated flows.
17. Until the site is stabilized, all erosion and sediment control BMPs must be maintained properly. Maintenance must include inspections of all erosion and sediment control BMPs after each runoff event and on a weekly basis. All preventative and remedial maintenance work, including clean out, repair, replacement, regrading, reseeding, mulching, and renetting must be performed immediately. If erosion and sediment control BMPs fail to perform as expected, replacement BMPs, or modifications of those installed will be required.
18. Any sediment removed from BMPs during construction shall be returned to upland areas on site and incorporated into site grading.
19. Upon completion of all earth disturbance activities and permanent stabilization of all disturbed areas, the Owner and or Contractor shall contact the City for a final inspection.

#### Traffic and Signaling

1. Existing underground (U/G), overhead (OH) utilities and drainage structures have been plotted from available information and therefore, their locations must be considered approximate only. It is the responsibility of the Contractor to locate each utility prior to construction.
2. All construction methods and traffic signal equipment shall conform to the latest edition of the City of Gardner Standard Specifications for Public Improvement Projects.
3. Contractor shall stake the location of all traffic signal poles, conduit, controllers, service boxes and junction boxes to be installed. Stations and offsets provided are to the center of the traffic signal equipment. The City Engineer shall inspect the staking prior to any excavation and/or construction. Minor relocation of equipment to avoid conflicts may be allowed with the approval of the City Engineer.
4. All existing curb and gutter, sidewalk, pavement, drainage structures or ground damaged during the traffic signal construction shall be replaced by the Contractor at his expense.
5. Conduit entering service boxes, junction boxes and/or pole bases shall be continuous in the service boxes, junction boxes and/or pole base. .
6. Coordinate Signal Turn-On with the City of Public Works Department, Traffic Operations Division.

**DC1-003** **APPROVAL BLOCK.** A signature block shall be required on the cover sheet of all plans or reports submitted for review and approval. All plans require the signature of the City Engineer and the date of such signing for formal approval by the city.

The general form of the approval block shall be as follows:

APPROVED	
_____	_____
City Engineer	Date
APPROVED FOR ONE YEAR FROM THIS DATE	

**DC1-004** **PRIVATE IMPROVEMENTS.** Private improvements, if any, shown on public improvement plans, shall be clearly defined, and marked as such. These improvements will not be maintained by the City of Gardner and, as such, an appropriate note shall be included on the drawings. These improvements nonetheless shall be designed and constructed to city standards.