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## **SECTION 1 – GENERAL ENGINEERING STANDARDS**

#### **AUTHORITY AND PURPOSE**

The purpose of the Engineering Design and Construction Standards Manual is to provide a consistent policy under which to implement certain physical aspects of public facility design. Most of the elements contained in this document are Engineering and/or Public Works oriented; the intention is that they apply to public improvements under City contract and public improvements under private contract. These Standards cannot provide for all situations. The intention behind the Design Standards is to assist, but not to substitute for, competent work by design professionals. Design Standards complement the City of Newport's standard construction specifications, based on the Oregon Standard Specifications for Construction as supplemented and/or modified by the City of Newport Special Provisions.

If a designer encounters a design feature for which a Design Standard does not exist, the responsible designer shall submit a "best professional judgment" design option for City Engineer's approval. The City Engineer retains the right to establish requirements for design of public works features for which a Design Standard does not exist, and the designer shall modify designs to reflect all requirements of the City Engineer. The City Engineer will assess any design exception to ensure the compensating or comparable result is adequate for public use. Interpretation and enforcement of these standards shall be under the authority of the City of Newport Engineering Department.

## **AUTHORITY OF CITY ENGINEER**

The City Manager has authorized the City Engineer to issue, modify and approve all updates to the *Engineering Design and Construction Standards Manual* whenever modifications and updates are needed. These modifications, changes, and adaptations take immediate effect and may be issued throughout the calendar year.

City Council formally accepted these standards through motion and approval June 17, 2024.

# **UPDATES TO DESIGN MANUAL**

If a discrepancy, error, or information is discovered missing, please notify the Engineering Department *in writing* using the REQUEST FOR CORRECTION / ADDITION TO ENGINEERING DESIGN AND CONSTRUCTION STANDARDS form at the end of this section. Corrections in typing or spelling errors may be sent by email. All requests will be maintained in a tracking log and addressed in the next update.

Once a year, City Council will be notified of any material changes amending the standards manual, within thirty (30) days of the close of the calendar year, and accept amendments to the standards though motion and approval. Changes made by the City Engineer throughout the course of the year remain in effect, unless Council does not accept those changes during their annual review.

## QUESTIONS PROPERTY OWNERS SHOULD DISCUSS WITH DESIGNERS

- 1. Have you checked that I can drive my car from the street to the garage over an American with Disabilities Act (ADA) conforming sidewalk?
- 2. Will you survey the right-of-way (ROW) around my property to know the existing elevations?
- 3. Are you going to call in locates and add all of the private and public utilities to my site plan?
- 4. Are you going to pothole existing pipes to make sure my sewer pipe can flow to the main and storm runoff can get to the street?

- 5. Do you know where my lot lines are and will you make sure to add them to my site plan?
- 6. Do you know, and have a copy of, the City of Newport design standards?
- 7. What do I do if there is not a main sewer, storm, or water line in front of my house?
- 8. What are all the ROW improvements I will need to install when I build my house?
- 9. How do I calculate the cost of building my house with the required public improvements?
- 10. Should we meet with the City's Engineering Department before the design is finished?

#### FRONTAGE IMPROVEMENTS

Frontage improvements are right-of-way (ROW) requirements adjacent to the front, or street facing, area of a property. Frontage improvements are intended to incorporate new private lot development with existing City infrastructure. Improvements are intended to help and maintain public safety, ensure smooth access on and off the lot, provide for future development/maintenance of neighborhoods, both commercial and residential, and manage storm water runoff.

## Community Development Department

Section 14.44.050 of the Newport Municipal Code (NMC) explains Transportation Standards. However, other sections of the municipal code also discuss improvements, so the Engineering Department recommends property developers familiarize themselves with the various design requirements discussed throughout.

## **Assessing Frontage Requirements**

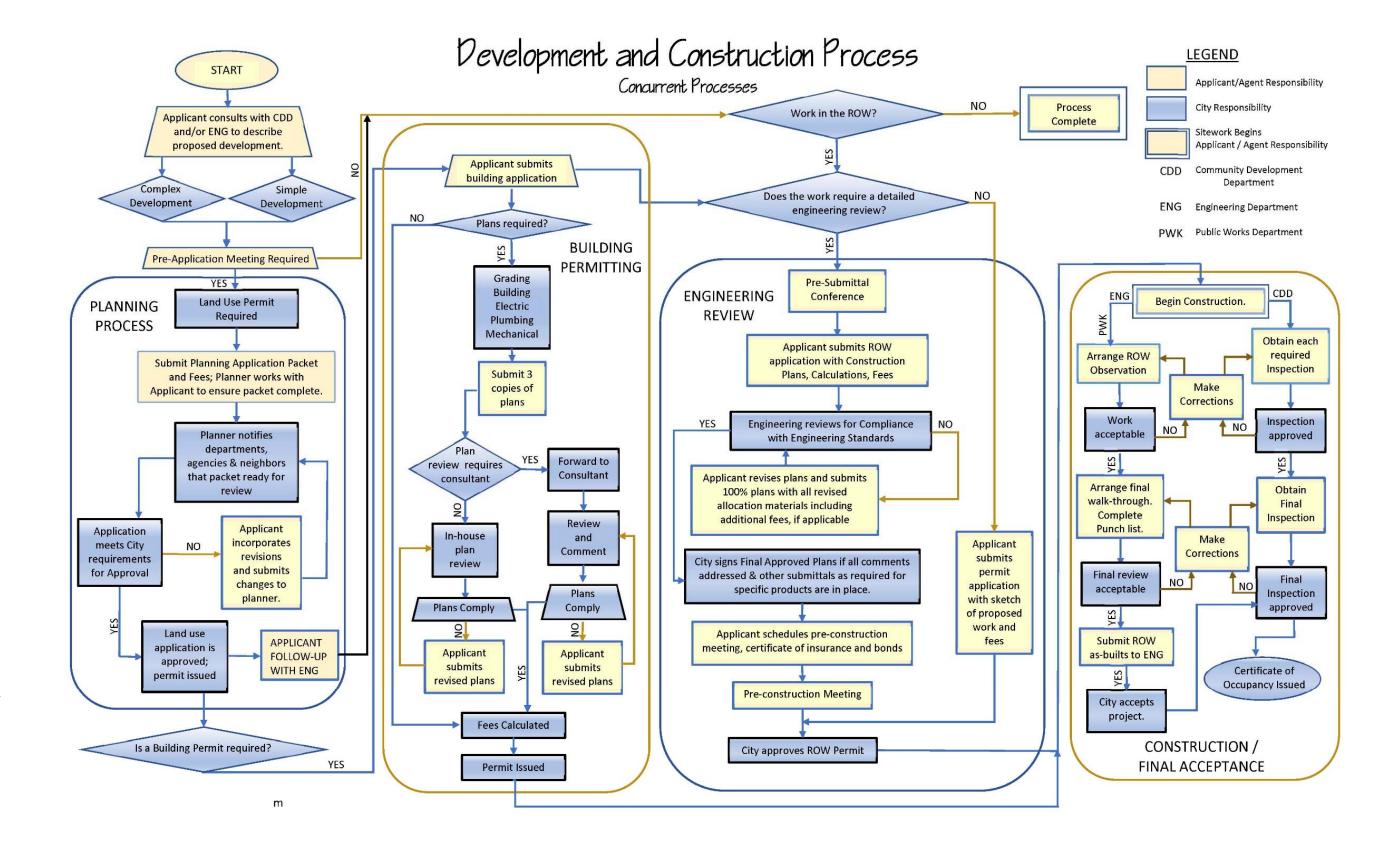
As a starting point, the following considerations are a good place to assess potential required frontage improvements for lot development:

- 1. Does the new development place demands on public or private transportation facilities and related utilities (NMC 14.44.020)? If yes, continue.
- 2. If the transportation facilities or utilities are private, has developer obtained approval to utilize the facilities/utilities from party that controls them?
- 3. Are public streets and utilities adjacent to, or within, a proposed development in conformance with standards outlined in NMC 14.44.060? If not, what is required to comply?
- 4. If improvements are needed, should they be built with this development?
- 5. Are traffic calming measures proposed per NMC 14.44.050©? Coordinate with Fire and Public Works Departments.
- 6. Are transit improvements proposed or needed per NMC 14.44.050(H)?
- 7. Do any of the triggers for a traffic impact analysis activate under NMC 14.45.010?
- 8. Are driveways and approaches in compliance with NMC 14.46.030?
- 9. Is the development subject to the pedestrian access requirements of NMC 14.47.030? (Applies to commercial, industrial, public/institutional, and multi-family projects.)
- 10. If a land division, are public improvements being provided per NMC 14.48.030 and 14.48.035?

# INSERT: Development and Construction Process

The Community Development Department and the Engineering Department work to support City goals in development and maintenance. The adjacent flow chart shows the complexity of planning codes, building codes, fire codes, municipal codes and engineering standards that must be reviewed to get a development, large or small, through from conception to completion.

At each stage in the development process, City staff is working to balance the needs of the Developer with the needs of the City. Whether building a single-family home or a sub-division, Staff strive to answer questions quickly and for the longterm good of the City and everyone who lives here.



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- 11. Are water mains, and existing service line(s) to property, if any, proximate to the development and of sufficient size to support connections?
- 12. Is there a pre-existing water service on the lot? If so, is the water infrastructure from the water meter to the main located within rights-of-way or public utility easements (NMC 5.10.040(A) and sized appropriately for the new intended use.
- 13. If a fire line is proposed, is it on a metered or non-metered line? If non-metered, has an agreement been developed per NMC 5.10.040(C)?
- 14. Will the water pressure at the meter be at least 20 psi per Oregon Health Authority rules? (Check water master plan. City has known issue on properties above Lighthouse Drive)
- 15. Is an adequately sized gravity sewer main adjacent to the property? If not, is a suitable gravity line within 250-feet of the property? (NMC 5.15.020 requires connection to city sewer if service is within 250-feet of the property.)



- 16. Is there an existing sewer lateral on the property? If so, is it in a useful condition or does it need to be replaced. (Camera line to determine condition. Engineering Dept will want to see video)
- 17. Does the wastewater system have adequate capacity to accept effluent from the proposed development? (Check the wastewater master plan for capacity constraints.)
- 18. Is there public storm drainage infrastructure in place to accept run-off from the development? (Check the wastewater master plan for capacity constraints. If there is a potential constraint, then downstream basin analysis can be required. City standard is a 25- year, 24-hour duration storm (ref: Comprehensive Plan Stormwater Goal #2, Policy #1)
- 19. Does the developer's plan rely upon use of other private property for access, storm run-off, utilities, etc,? if so, are easements in place to allow such use?
- 20. Are the proposed service laterals generally perpendicular to the mains to which they will be connecting?

- 21. Is proposed sidewalk, including driveway approaches, ADA compliant? (If sidewalk is not present, then driveway approaches must still have an ADA compliant cross slope).
- 22. Are existing sidewalks, curbs, and driveway approaches serving the property in serviceable condition? If not, then City can require that they be replaced, even if the development involves the in-kind replacement of an existing use (e.g. replacement of a single-family residence).

Although there may be many more considerations and impacts of NMC on development, the above questions provide a place to start when considering the potential frontage improvements required as part of a development plan.

Section 3.25.050.6 of the NMC discusses a letter from the City Public Works Department identifying city infrastructure impacts on a development in relation to multiple unity housing and property tax exemption. In this instance, the Public Works Department would work with the Engineering Department to determine needed frontage improvements.

## **Engineering Department**

When determining frontage improvements as part of a lot development, or a subdivision development, Engineering Staff use the following criteria to assess each lot on a case-by-case basis:

#### STREET IMPROVEMENTS

- Size of lot
- Remodel places new demands on the existing system
- New development places new demands on the existing system
- Location of Fire access
- Location of street/driveway access
- Size of street
- Classification of street
- Lot location
- Lot drainage needs
- Street drainage needs
- Transportation System Plan
- Newport Municipal Code
- ADA Guidelines
- Engineering Design Standards
- Main Line connection points
- Street Volume
- Residential or Commercial Lot
- Neighborhood Development
- Public need impacts
- Adjacent elevations
- Age and condition of private services

#### SIDEWALK IMPROVEMENTS

- Type of development
- Size of Development
- Location of lot
- Access points
- Distance to corners
- Pedestrian volumes
- Street surfacing
- NMC
- Engineering Design Standards
- Public Safety

## ADA DESIGN IN ROW

- New developments
- Utility pole removed and existing ramp is damaged-- Update ADA Ramps
- Street improvements continues into the crosswalk area—Update ADA Ramps
- Sidewalk improvements adjacent to noncompliant ramp—Update ADA Ramps

#### **CROSSWALK STRIPING**

- There are two sidewalk ramps
- Areas of heavy vehicle and pedestrian traffic
- Busy intersections
- Mid-block crossings

Many of right-of-way (ROW) development may be deferred to future development of a street, however, there are times, when, through usage, volume, or location, the City Engineer may require certain aspects of ROW development to happen as a lot is developed.

## **LOCATES**

There are several kinds of "locates" that come into play with construction. Each one has a specific way to handle the locate.

## **Boundary / Property Lines**

Property lines are best located by surveyors. The City does not know boundary line information. We have schematic lines in of Geographic Information System (GIS), but those cannot be used for legal boundary definitions. A potential source of information is the Lincoln County Assessor's Office. They have an online GIS system that also lists previous surveys for a property, if surveys have been done before. There may also be an above ground property pin that indicates property lines.

## **Service Lines**

Within the right-of-way (ROW), location of service laterals is done by City crews once they are notified a service request has been issued.

Sewer laterals may be located off of the main line connection. When the City videos a sewer main, the laterals are noted by direction and angle. If a section of sewer main has not been camera' d, City crews may be able to video the main line, depending on size, to look for a nearby lateral. To get this information, a property owner would call 811 and request a locate for their property. This may require the property owner mark the outline of the area in question in white paint within the ROW. The City does not locate service lines beyond the ROW line. Often a sewer cleanout will be on private property or at the edge of the ROW. The cleanout can be used to trace a lateral on private property.

Water lines are usually found by uncovering an existing water meter box that may have been abandoned. When that isn't possible, the City Water Crew will look through their records to see what information is available. These locates are also triggered by an 811 service call.

#### **Privately Owned Utilities**

Non-city owned utilities locates are also started through the 811 call center.

## **Private Property**

Finding utilities outside of right-of-way (ROW) and on private property may require a plumber.

#### INSTALLING PIPE IN LANDSLIDE PRONE AREAS

In areas of known sliding, pipe installation, whether sewer, storm, or water, may require special pipe and fittings adopted to work with native soils. In these situations, designers shall have their designs reviewed and approved by a licensed Geo-technical Engineer before submitting a design to the City for review. Further, construction specifications will outline any site specific requirements determined by the Geo-technical Engineer. These specifications shall be submitted with the plan set for City review.

## **EXISTING CONNECTIONS**

If a lot has been developed previously, there may be existing service laterals to the property. Before these connections can be reused for new development, sewer and storm lines will need to be camera' d

#### SECTION 1 - GENERAL SPECIFICATIONS

to verify condition of the lines. A video of that camera work needs to be submitted to the Engineering Department, prior to final design, for review and approval. If a lateral is in poor condition, the City may require it to be capped at the main and a new lateral installed.

Previous water services may still be active but not sized appropriately for the new development. In this case, a new line will be required.

Previous storm water runoff/drainage lines may not work with the new development if the design changes the way water drains off site. Should this occur, the City will require the abandoned lines to be capped or removed (as outlined in NMC).

#### **POTHOLING**

Potholing is the act of uncovering a pipe to verify its depth. For all new gravity service lines, it is important to know the depth of the main and the amount of cover required for a pipe. The City does not provide elevation information to property owners for developers. There are too many variables in measuring systems. Instead, the City requires developers to survey the construction area to get surface and locate elevations, and contractors to pothole pipe crossings and depths to ensure designed pipe(s) can connect as needed. See Standard Drawing G-160 for resurfacing requirements.

## PROPERTY CORNERS / SURVEY MARKERS

The City requires all property pins to be protected in place during construction. If any property pin or other survey markers are disturbed during construction it/they shall be replaced by a licensed land surveyor per Oregon Revised Statute (ORS) 209.155.

#### OWNER BUILDER

Some owners are interested in building their homes themselves without hiring a contractor. They may also wish to install their private infrastructure in the right-of-way (ROW). The City currently does not allow property owners to work in the ROW unless they are bonded and have a contractor's license. Since work in the ROW may impact other public infrastructure, licensed contractors are required to be bonded. That way if any damage to existing infrastructure occurs during installation of private or public improvements, the City has a process for repairing damage and holding the contractor responsible for his or her work.

#### **OWNER DEVELOPER**

Property owners that develop a section of property beyond a single-family dwelling, whether that be a duplex, triplex, apartments or a subdivision generally require licensed professionals to design both private and public improvements.

## **PROJECT ENGINEER**

The City of Newport requires Level 2 projects be designed by licensed professional engineers compliant with ORS 672.

A registered professional engineer, or a subordinate employee under the engineer's direction, shall prepare all engineering plans, reports, or documents. Submit such documents, signed and stamped with the engineer's seal to indicate the engineer's responsibility for submitted documents to the City for review. Project Engineer shall be responsible to review with the City any proposed public facility extension, modification, or other change prior to any proposed design work to determine any special

requirements or to determine whether the proposal is permissible. The City's approval of any project documentation does not relieve, in any way, the Project Engineer's responsibility to meet all requirements of the City or obligation to protect life, health, and property of the public. The proposed project shall be revised or supplemented at any time the City Engineer determines that the project does not meet the full requirements of the City.

#### CONTRACTOR

All contractors working in the right-of-way (ROW) and/or installing City infrastructure are required to be licensed with the Oregon Construction Contractors Board, bonded, and have an active City of Newport business license. Contractors shall provide a certificate of insurance, with the City of Newport named as an additional insured.

Contractors are not allowed to operate water valves or fire hydrants. If a water shut off is required contractors shall arrange for the City of Newport Water Crew to be on site to operate valves. The same is true for fire hydrants. If contractors need water on site, they are to apply for a water account and hydrant meter, which will be installed by the City of Newport Water Crew.

#### INTENT OF ENGINEERING DESIGN AND CONSTRUCTION STANDARDS

The City structured these standards for designing and constructing public facilities in the City of Newport to protect the public health, safety, and welfare through the following:

**NOTE:** The below engineering drawing standards, and various other standards referenced, describe how public facilities are to be designed and constructed through the use of the approved component materials, equipment, and methods set forth.

- Setting forth uniform material and workmanship standards
- Supplementing and completing the public health and safety requirements of the Newport Municipal Code.
- Streamlining the administration and construction of public facilities in the City, minimizing the need for repairs, and allowing for the long-term maintenance of the public facilities.

The City intends that these Design and Construction Standards provide some guidance for public improvements, but this document does not identify the permitting requirements. Consult the City of Newport Community Development Department and other agencies for required project permits. Prior to design, the designer should consider proximity to all private utilities and waterways that may exist within the project boundary and understand their permitting and approval requirements. Other Agency requirements are likely different from these design standards and could impact overall design and layout of public infrastructure.

Although this document may call out the design engineer, the City assumes the designer works for, and on behalf of, the developer who has oversight of the project outside City authority. Calling out the design engineer does not relieve the developer of responsibility for seeing project completed to these standards.

#### Interpretation

The City Engineer, where situations arise not clearly covered by these Standards, will review the issue on

a case-by-case basis to determine the design and/or construction methodology acceptable to the City.

#### Order of Precedence

The City expects developers to adhere to all federal, state, county, local laws and ordinances, including this manual. If there is any conflict between this manual and pertinent laws and ordinances, the laws and ordinances shall prevail, with the discrepancy brought to the City Engineer's attention in writing prior to beginning any work in conflict with these standards.

The City of Newport intends to align its public improvement design and construction practices with engineering industry standards. Where developers reference third party standards, the responsible designer shall obtain copies of these standards as required to understand and prepare designs in compliance with these standards using current editions of all policies. In no case shall the City of Newport be responsible for providing access to, or copies of, any referenced standard to a Consultant, Contractor, Developer, legal counsel or other party unless this standard is a unique standard published by the City of Newport.

If there is a conflict between approval documents, the document highest in precedence shall control. The order of precedence shall be:

- Permits from other agencies or jurisdictions, as may be required by law.
- City of Newport Municipal Code (NMC).
- Land use decision-making authority's Conditions of Approval.
- City of Newport master plans (latest editions): Transportation Systems Plan, Storm Water Master Plan, Wastewater Collection System Master Plan, Wastewater Treatment Plant Master Plan, Water System Master Plan.

**NOTE:** Permits, Land Use Conditions of Approval, and Master Plans are intended to provide the authority for what public facilities are to be constructed.

- City of Newport Engineering Design and Construction Standards.
- City of Newport Standard Drawings.
- Erosion Control Field Manual, Oregon Department of Transportation (ODOT).
- American Public Works Association (APWA)
- Any reference specifications and standard practices adopted by nationally recognized professional societies such as:
  - o American Society of Civil Engineers (ASCE),
  - o American Water Works Association (AWWA),
  - o American Concrete Institute (ACI),
  - American Society for Testing and Materials (ASTM),
  - American Association of State Highway and Transportation (AASHTO),
  - Manual on Uniform Traffic Control Devices (MUTCD).
- Oregon Standard Specifications for Construction (OSS), current edition.
- ODOT Pavement Design Guide.
- Uniform Fire Code.
- Uniform Building Code and City-issued building, mechanical, electrical, and plumbing permits.
- Americans with Disabilities Act latest approved standards or guidelines as referenced in the Standard Drawings of these standards.
- Plans and drawings prepared by the design engineer.

• Supplemental written agreements, franchise agreements, and approved revisions to plans and specifications by the appropriate jurisdictions and conforming to local, state, and federal law will take precedence over documents listed above.

Specific plans shall have precedence over general plans. In any event, the determination of the City Engineer shall be final.

#### REVISIONS TO ENGINEERING DESIGN AND CONSTRUCTION STANDARDS

The City may amend or update these standards periodically to protect the public health, safety and welfare. The City Engineer shall have the authority to modify the Standard Drawings as needed to maintain conformance with national and state design requirements, guidelines, and specifications and industry standards. The date appearing on the title page is the date of the latest revision. Users shall apply the latest edition to the work contemplated at the time of actual construction and design, and it shall be each user's responsibility to maintain his/her copy of these Engineering Design and Construction Standards with the latest changes.

## NON-ENFORCEMENT

Developer, Applicant, Design Engineer, or other entities involved in a project shall not consider that non-enforcement of any requirement in these Standards by the City as a waiver of that requirement, nor shall non-enforcement affect the enforceability of any requirement or of the remainder of the Engineering Design and Construction Standards.

## SPECIAL FACILITY DESIGNS

The City does not intend that these standards address the requirements for all possible public or private facilities. The design engineer shall design facilities not addressed in these standards as unique using site-specific criteria. For these types of facilities, the Design Engineer must request a pre-design meeting to review the appropriate design, operating and maintenance criteria that will apply to the specific project prior to submittal of any design reports or plans.

The following are examples of facilities that will require special review and approval:

- Sewer Force Mains
- Water Distribution Pump Stations
- Relining of Existing Sewers
- Internal Sealing of Existing Sewers
- Water Pressure Regulating Devices
- Wastewater Regulatory Devices
- Energy Dissipaters
- Wastewater Pump Stations

- Water Reservoirs
- Water Treatment Plants
- Wastewater Treatment Plants
- Water Flow Measurement/Monitoring/Telemetry Devices
- Wastewater Flow Measurement/Monitoring Devices

#### PROJECT ENGINEER'S RESPONSIBILITIES

Project and design engineers are responsible to know the standards contained in the *Engineering Design* and Construction Standards Manual for design of public and private right-of-way (ROW) improvements as well as be familiar with the processes required to design and construct within the City of Newport.

## Approval Of Alternate But Equal Materials, Methods, Or Design

The City will review any material or alternate method not explicitly described within these standards as

a substitute, providing the requested substitution meets the requirements set forth in this section. Persons seeking such approvals shall make application in writing. Approval of any major deviation from these Engineering Design and Construction Standards will be in written form.

Any alternate must meet or exceed the minimum requirements set in these Engineering Design and Construction Standards.

The written application for an alternate approval is to include, but is not limited to, the manufacturer's specifications and testing results, Engineering Design and Construction Standards, design drawings, calculations, and other pertinent information.

The Design Exception form is at the back of this section. Complete and submit this form when requesting an equal or better alternative.

## **Responsibility for Exceptions**

Project Engineer shall be responsible for requesting, in writing, any anticipated exceptions to the *Engineering Design and Construction Standards Manual* at the time of submittal of plans. City Engineer will consider only those exceptions approved during the plan review process, so noted and expressly approved, to be permitted changes. Said approved changes must be noted on the "red-line" or "asbuilt" drawings.

## **Modification Criteria**

City Engineer may make project-specific modifications and amendments to an existing standard or specification authorized through City Standardizing based on the following criteria:

- The standard is inapplicable to a particular situation.
- Topography, right-of-way (ROW), or other geographical conditions or impediments impose an
  undue economic hardship on the applicant, and an equivalent alternative that can accomplish
  the same design objective is available and does not compromise public safety, increase
  short/long term maintenance or cause future increased costs of accessibility.
- A change to a standard is required to address a specific design or construction problem, and if
  not modified, the standard will impose an undue hardship on the applicant with little or no
  material benefit to the public.

## "Field Fit" Designs

At times when the stamped, approved design cannot be installed in the field due to unknown existing conditions not taken into consideration during the design process, a "field fit" must be crafted. These should be done only with the City Engineer's approval and oversight by City Staff. Work changes must be approved before implementation.

## General

The City Engineer may approve a design exception request so long as it does not conflict with the City Development and/or Municipal Codes, the County or City Land Development Permit Decision, or any other relevant approvals, except as expressly provided herein. If the requested exception involves public safety, the City will rule in the direction of safety.

## Oregon Standards & Specification for Construction Conflict

The *Oregon Specifications and Standards for Construction* (OSS) has many Oregon Department of Transportation standard details that accompany the specifications book. When the OSS specifications

and/or ODOT standard drawing conflict, the developer or the developer agent, must submit a request for clarification. The City of Newport Standard Drawings often take precedent over the ODOT standard drawings within the City ROW, but the City of Newport uses the OSS for public improvement construction specifications, especially for private development within the ROW.

#### **Exception Requests**

All exception requests shall state: 1) the applicable standard, 2) the desired exception, 3) reason for request and 4) comparison between the applicable specification or standard and the exception as to function, performance and safety. If requesting an exception due to economic hardship, the request shall contain a statement on the impact to project cost with and without the exception. An Engineer shall prepare the request for exception then stamp and sign documentation. Separate, individually prepare, and submit multiple design exception requests to the City as independent requests.

Document any approved exception to these standards and reference nationally accepted guidelines, specifications, or standards. The approval of an exception shall not compromise public safety or the intent of these standards. The City will approve an exception only if the City Engineer finds that the alternative proposed by the Engineer meets the criteria addressed in this section and will provide equivalent or better function, performance, and safety.

The City Engineer shall approve or deny each exception on a case-by-case basis. The City considers all approved exception requests unique to each request and project; approved exceptions do not set a precedent, and are not uniformly applicable.

## Review Request for Deviation from Standard

The City Engineer will review the request for design exception with one of the following decisions within fourteen (14) days:

- Approve as requested;
- Approve with changes; or
- Deny with an explanation

City Engineer's decision will be based on:

- Newport Municipal Code
- Engineering Design and Construction Standards
- Public Health and Safety
- Best Management Practices
- Public Works Maintenance Policies

Approval of a request in one project shall not constitute a precedent for other projects.

# Appeal of Engineer's Decision

The Applicant may appeal the City Engineer's decision to deny an exception. The appeal shall be in writing, state the relevant facts, applicable provisions of these Engineering Design and Construction Standards, Public Health and Safety, Best Management Practices, and Public Works Maintenance Policies. In addition, the specific grounds for appeal, the relief sought, and information on which the applicant relies.

Complete and submit the Appeal Form at the end of this section within 14 days of the Engineer's

decision to the City Manager's Office. The applicant shall have the burden of proving that the requested exception meets the criteria and equals or exceeds the applicable standard as to function, performance, and safety.

The City Manager shall review all the information submitted with an appeal, may request additional information from the design engineer and/or the City Engineer, and may meet with concerned parties. The City Manager shall render a decision in writing within 14 day. The City Manager's decision shall be final.

#### CONTRACTOR'S SITE RESPONSIBILITIES

## **Qualified Personnel**

The City reserves the right to approve any Contractor or sub-Contractor performing work on City facilities. The Contractor must meet the city's insurance, bonding and business license requirements. Any Contractor and sub-Contractor shall employ responsible and qualified personnel to perform the work. If the City Engineer or designee deems any employee or contractor to be unqualified, the Owner, Developer or Project Engineer shall immediately replace the unqualified person.

# Work Hours, Trespass, Staging Areas, and Sanitation

Work hours are subject to the following limitations:

- Noise: All construction activities must comply with the noise restrictions of the Newport Municipal Code.
- Lane Restrictions: Unless approved by the City Engineer, arterial roads shall have no lane restrictions from 6:30 AM to 9:00 AM and from 3:30 PM to 6:30 PM. Collectors and Neighborhood Routes with an Average Daily Traffic of over 1000 trips shall have no lane restrictions from 7:00 am to 8:30 am and from 4:00 pm to 6:00 pm.
- Trespass: The Contractor shall limit work, including any physical disturbance, to the area defined
  within the boundaries of the easements and ROW shown on the approved plans for the project.
  The Contractor shall be solely responsible for any trespass upon adjacent property including all
  claims, fines, penalties and other remedies deemed applicable under Federal, State, County, and
  local laws, rules, ordinances, and regulations.
- Staging and Stockpiling Areas: The Contractor shall be required to obtain all necessary permissions, right-of-way (ROW) permits, easements, and any other permits associated with equipment and material staging areas. City does not allow stockpiling and staging of equipment and materials within the public ROW without prior approval of the City Engineer. These areas may be subject to local regulation and it is the sole responsibility of the Contractor to ensure that such regulations are satisfied. Materials shall be stored in a manner to ensure quality for use. Temporary fencing may be required for security and/or safety concerns.
- Sanitation: The Contractor shall be responsible for providing adequate sanitation facilities (e.g. Portable restrooms, etc.) at the job site for its employees and those of its subcontractors.
   Provide available access to these facilities to City representatives.
- Disposal of spoils: The Contractor shall obtain all necessary land use approvals and disposal or fill permits for the off-site disposal of spoils from the construction site.

## Materials

 All construction material and components used in the construction of public improvements shall be new manufacture, unless otherwise specified by the City. New manufacture materials do not include re-built, reconditioned, or refurbished materials. Install all new manufactured construction materials or components as designed by the manufacturer.

- Do not alter materials or components without consent of the City Engineer.
- Substitution of Products, "Approved Equal" Designation: Whenever a product, manufacturer's name or brand, or a specific item is designated, it shall be understood that the words "or approved equal" follow such designation. The City Engineer shall determine quality in reference to the project design requirement. A Contractor shall not use an alternative product without prior written approval of the City. Contractor shall process a request to designate an alternative product as an "approved equal" to the City Authorized Representative.
- The Project Engineer shall approve all project submittals provided to the City electronically prior
  to the Pre-construction meeting. Keep a hard copy of all approved submittals on site during
  construction at all times. The Project Engineer and the City need to approve substitution of
  approved equals prior to their use.

## **Protecting Existing Utilities**

Obtain maps and information regarding underground utilities from the utility owning and operating the utilities. Call 811 for utility location. The City does not guarantee locations of the utilities. In close working conditions to sensitive utilities, private or public, the contractor shall give forty-eight (48) hour notice to all utility operators potentially affected by construction activity. Contractor shall immediately notify the proper authority when interrupting a utility service due to the construction operation to restore utility service as quickly as possible.

The Contractor shall exercise due care in protecting property and shall restore any property disturbed by the construction to as near original condition as possible.

The Contractor shall notify, at least two business days in advance of work, by calling the Oregon Utility Notification Center at 1-800-332-2344 in accordance with State law.

The contractor must receive permission by the affected agency before exposing any utility. It shall be the Contractor's responsibility to locate and expose all of the existing underground utilities in advance of the trenching operation in accordance with State law (i.e. Potholing).

It shall be the Contractor's responsibility to protect all utilities and appurtenances above and below the ground from damage. The Contractor shall provide sufficient notice in advance of construction operations to permit the necessary arrangements with the affected utility company for protection or relocation of the interfering utility. The Contractor shall be solely and directly responsible to the Agency and operators of the utilities for any issues or claims arising out of the work done under the contract.

The Contractor shall promptly notify the apparent owner of the utility in the event of interruption to any utility service resulting from exposure, lack of proper support, or accidental breakage. Contractor shall cooperate with the authority in restoration of service as promptly as possible and shall bear all costs of repair.

The City is not responsible to the Contractor for damages resulting from inaccuracies in the location or existence of the underground utilities.

#### Field Relocation

Make minor relocations of the work only by direction or approval of the City Engineer or City Engineer's representative.

## Preservation, Restoration, and Cleanup

- The Owner, Developer, and Contractor must not disturb the following site features and amenities, unless expressly allowed by the permit or construction documents:
  - Existing drainage patterns and features;
  - Existing vegetation, shrubs, trees, and landscaping;
  - o Public property, improvements, operations, and services;
  - Private property and improvements;
  - o Access to public and private property and the enjoyment of same;
  - Private utility facilities and services;
  - o Street signing, mail boxes; and,
  - Other site features and amenities expressly indicated (preserve, protect, or maintain) in the construction documents.
- Do not leave disturbance of any existing drainage features or drainage features access unrestored for more than eight (8) hours unless the City grants an extension.
- No disruptions of public utility services shall last for more than four (4) hours. Restore private utility services at the utility providers own convenience. The Contractor shall provide temporary utility services during the period of disruption of utility services that is beyond four (4) hours, until fully restoring service, unless the utility provider grants an extension.
- Leave no disturbance of other amenities un-restored for more than twelve (12) hours unless requiring more immediate restoration by the City or the City grants an extension.
- Perform ongoing site maintenance and cleanup during construction. The Contractor shall keep
  the premises clean and orderly at all times during the work and leave the project free of rubbish
  or excess materials of any kind upon completion of the work. During construction, the
  Contractor shall stockpile excavated materials in such a way as to do the least damage to
  adjacent lawns, grassed areas, gardens, shrubbery, trees, or fences, regardless of the ownership
  of these areas.
- Protect existing trees designated for preservation by tree protection fencing. The City does not
  allow stockpiling of excavated material or the storage of construction material or equipment,
  within the drip line of existing trees to be preserved.
- Clean and flush all existing storm systems to restore original drainage capacity. Collect and
  dispose of sediment, rock, and other debris in a manner meeting DEQ standards. Do not flush
  debris down a storm or sanitary sewer for disposal. Repair and restore all damaged water pipes
  and appurtenances; sanitary sewer, and storm drainage facilities, irrigation and house drainage
  pipe, drain tiles, sewer lateral, and culverts to City standards.
- Restore all areas of existing public right-of-way (ROW) and easements disturbed by the
  Contractor's operations to their original condition or better as approved by the City Observer.
  Areas outside public ROW that are disturbed by the Contractor's operations shall be graded and
  restored to original condition. When not restoring property to its original condition the
  Contractor shall obtain a written release from property owners, for any claims of injury or
  property damage. The Contractor shall submit a copy of the written release to the City prior to
  final acceptance.
- Street Cleanup: The Contractor shall clean up all spilled dirt, mud, rock, gravel, and other foreign material deposited by the Contractor's construction operations from all streets and roads at the conclusion of each day's operation, or as directed by the City. Cleaning shall be by grader and/or front-end loader, supplemented by power brushing and hand labor, unless otherwise approved by the City. Remove and dispose of sawcut slurry from the street in an approved manner: the

- City does not permit washing of streets with a water truck or of flushing slurry down city conveyance pipes. The Contractor shall follow the City's erosion control procedures.
- Dust Prevention: During all phases of work, the Contractor shall take precautions to abate any
  dust nuisance by cleaning up, sweeping, sprinkling with water, or other means as necessary to
  accomplish results satisfactory to the City. Dust prevention measures shall be continuous until
  final acceptance by the City. Obtaining water from a hydrant will require a bulk water permit
  from the City Water Department.
- Streams and Sensitive Areas: The Contractor shall comply with all provisions of the permits required by the Oregon Department of Environmental Quality (DEQ), Oregon Division of State Lands (DSL) and/or the U.S. Army Corps of Engineers (USACE).

#### **Erosion and Sediment Control**

Install all erosion control before mobilization, grubbing and/or grading begins. Water trucks or other means of controlling dust must be present on site and/or have a tackifier applied to disturbed soils.

It is the policy of the City to require temporary and permanent erosion and sediment control measures for all construction projects to lessen the adverse effects of construction on the environment:

- City may require that a construction project scheduled such as to minimize erosion or other environmental harm.
- Contractor shall comply with all necessary City, DEQ, DSL, USACE, and any other applicable requirements and permits.
- Contractor shall properly install, operate, and maintain both temporary and permanent
  measures as provided in this section or in an approved plan, to protect the environment during
  the term of the project.
- Nothing in this section shall relieve any person from the obligation to comply with the regulations or permits of any federal, state, or other local authority.

## **Erosion Control Slope Mitigation**

Prior to a site's approval, all disturbed, steep slopes (exceeding 2 horizontal to 1 vertical - 2:1), must be treated for long-term erosion control. Disturbed ground of lesser slopes shall be treated for erosion control if erosion would transport sediments into either the right of way or a neighboring property. See disturbed ground, especially steep slopes. Seeding requirements are as follows:

- Apply seed in a hydroseeding application, containing tackifier and fertilizers.
  - Seed mix shall be free of noxious weed species, be native drought tolerant, and selfperpetuating. The following is seed mix, or approved equal, shall be used

Seed mix A

Lolium perenne ssp. Ryegrass

Multiflorium Italian (Annual)

Festuca rubra var. sealink Creeping Red Fescue

Sealink Slender

Festuca breviplia var. Spartan II II Hard Fescue

Spartan

Triflorium repens White Clover Puccinellia pumila var Fults Fults Dwarf Alkaligrass

Seed mix B

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Elymus trachycaulus Slender Wheatgrass
Lolium perenne Perennial Ryegrass
Dactylis glomerata Orchardgrass

Festuca rubra Creeping Red Fescue

Festuca rubra Sheep Fescue
Trifolium repens White Clover

- Place seed at a rate to provide eighty (80) to ninety (90) percent coverage over the disturbed surface.
- o For immediate germination, if ground is frozen do not apply hydroseed. Hydroseeding should not occur on snow unless approved by the City Engineer.
- Hydroseed shall be a Bonded Fiber Matrices (BFM) containing tackifier with seed and fertilizer. Install to manufacturer's specifications or to a minimum 2,000 pounds per acre on slopes flatter than two (2) horizontal to one (1) vertical (2:1), 3,000 pounds per acre on two (2) horizontal to one (1) vertical (2:1) slope or steeper, whichever is most stringent.
- Prior to hydroseed placement, the contractor must
  - o Track walk the full extent of the slope.
  - Install erosion control matting/blankets, fiber rolls/wattles, or other erosion control method
    per manufacturer's recommendations. The contractor and/or engineer shall determine the
    placement of these methods based on the size of the disturbed slope and identification of
    any point discharge (channelized flows) onto the slope.

#### **Erosion Control Maintenance**

Project Engineer shall monitor the erosion control maintained by the contractor. The minimum maintenance of the Best Management Practices (BMPs) are as follows:

- Inspect on a regular basis (at a minimum weekly; daily during/after a runoff producing storm event). Fix, replace, or add any erosion and sediment control BMPs immediately upon finding they are out of conformance or not functioning.
- Maintenance and repair:
  - Remove sediment from behind a Sediment Fence when it has reached a height of one-third
     (1/3) of the fence height and before fence removal.
  - Sediment must be removed from behind Bio Bags, Straw Wattles, and other barriers when it has reached a height of two (2) inches and also before BMP removal.
  - Sediment must be removed from a sediment basin or catch basin when it has filled fifty (50) percent of the facility storage capacity (sump area) and at the completion of the project.
- When no longer needed, remove temporary ESC BMPs within thirty (30) days.
- Permanently stabilize areas that are disturbed within ten (10) days of the project completion or when no longer conducting work.
- When soils are tracked onto pavements, said pavements shall be immediately swept and kept clean.
- City expects contractors to track weather conditions and forecasts and stabilize sites as needed to prevent erosion.

## **BEFORE COMMENCING WORK**

#### Agreements and Reviews

Before starting construction obtain final approval of the documents by City Engineer, or designee; obtain approval from all affected agencies; obtain amended Agreements with the City of Newport.

#### Permits and Fees

Prior to scheduling a pre-construction meeting, Contractor shall have all required permit plans approved, all required fees paid. In addition, present proof of all bonding required, proof of insurance, any relevant certifications and copies of signed contracts related to the project.

## **Pre-Construction Meeting**

The City will hold a pre-construction meeting prior to the issuance of a Notice to Proceed. See Appendix E, City Of Newport Pre-Construction Meeting Agenda For Private Development, for a preconstruction meeting template used on all private development projects.

During the pre-construction meeting, City will review observation requirements for the project listed in Section 2 of this document titled *Construction Observation* and Appendix A, *Construction Observation Tasks and Guidelines*. Consider these requirements from the beginning of design. Notes from the preconstruction meeting will include all in attendance, provide contact information including emergency contacts, and identify all key points to be discussed in the meeting. The responsible parties, the City, contractor, and owner, shall review and sign pre-construction notes.

The City will provide a copy of the Pre-Construction Meeting notes, with signatures, to the contractor, Project Engineer, and the project manager (if different from the Project Engineer); City will retain originals in their project files.

After applicant/owner/developer meets all pre-construction requirements, City will issue a Notice to Proceed.

#### **Business License**

All contractors performing work in the Public ROW and/or on City-owned infrastructure shall possess a current City Business License.

## Water Account

All contractors performing work in the Public right-of-way (ROW) and/or on City-owned infrastructure shall open a City of Newport Water Account if requesting access to water on the work site. After opening account through the Finance Department, someone from the Water Division will set a meter at the project work site for access to water during construction.

## SAFETY DURING CONSTRUCTION

#### Safety Requirements

- Contractor is responsible for the safety of the work and of all persons and property exposed to
  the work. Contractor shall conduct his work in such a manner as to comply with all the
  requirements prescribed by OSHA. Traffic control in work zones shall conform to the MUTCD
  and the ODOT supplements to the MUTCD. Submit a traffic control plan for approval by the City
  prior to construction.
- The City and its agents have no responsibility or liability relating to the safety of the work, or the enforcement of OSHA rules.
- City may stop work if Contractor does not address or correct a serious safety issue.

## Temporary Traffic Control

Temporary traffic control has two parts: 1) a traffic control plan (TCP) to move vehicles around

construction safely and 2) a temporary pedestrian access route plan (TPAR) to make sure people can move around the project. Both the TCP and the TPAR will require extra signage and may require sign relocation during constructions.

The best source for putting together a TCP is the *Oregon Temporary Traffic Control Handbook*, latest edition, prepared by the Oregon Department of Transportation (ODOT). This guide provides different layouts depending on the work being dome. Many of the examples in the handbook are for highways and will need to be adapted to our smaller neighborhood streets. ODOT also produces a TPAR guideline, which can be found on the Oregon.gov/ODOT/Engineering web page.

Both a TCP and a TPAR are required as part of the ROW application.

Traffic control is essential to construction safety and often overlooked. Temporary signage, flaggers, pedestrian channeling, all go to moving people and vehicles through improvements happening in the ROW in such a way that construction continues and no one gets hurt.

#### Blasting

When the Development project involves blasting, Contractor shall provide warning to all persons within the blast zone, together with the stationing of Contractor personnel at strategic locations to prevent persons and vehicles unaware of the danger from entering the blasting area.

Submit the following at the Pre-construction Conference prior to performing blasting work. Other agencies with jurisdiction may require additional approvals and submittals.

- Blasting Plan per Oregon Standard and Specifications for Construction (OSS), current edition, Part 00335.
- Evidence of insurance.
- Licenses of blasting personnel.

A permit from the Oregon Department of Fish and Wildlife (ODFW) is required for any use of explosives in the cause of removing any obstruction in any waters of this state, in constructing any foundations for dams, bridges or other structures, or in carrying on any trade or business. The OSS requires a minimum of three hundred (300) feet (dependent on the amount and type of explosive used) and a minimum of forty-eight (48) hours-notice prior to blasting. Use OSS Section 00335, in all cases unless otherwise approved by the City Engineer.

#### **Fire Safety During Construction**

- City must accept any installed approved Fire Department access roads, water supply, and fire
  hydrants prior to any combustible construction, unless otherwise approved in writing by the Fire
  Department.
- All construction activities shall maintain horizontal and vertical clearance from existing structures during construction to facilitate fire department access (i.e., work in ROW may provide a physical barrier or operational issue preventing fire department and emergency services appropriate access to properties.) Coordinate work sequencing to avoid such conflicts and to provide fire department and emergency services access through construction in the ROW.

#### **Protection of Fire Hydrants**

- Maintain a three (3) foot clear space around the perimeter of fire hydrants at all times.
- Fire hydrants shall comply with City standards.

## **ENFORCEMENT**

This Enforcement Section describes enforcement. Apply this Chapter in conjunction with the Newport Municipal Code (<a href="https://newportoregon.gov/dept/adm/documents/NewportMunicipalCode.pdf">https://newportoregon.gov/dept/adm/documents/NewportMunicipalCode.pdf</a>), and other portions of the Newport Standards and Specifications.

The City's intent is to outline a clear process that will lead to the voluntary compliance of the "responsible party" as defined in Newport Municipal Code 2.15.005.D.

Newport Municipal Code 14.55 Interpretation, 14.56 Severability, and 14.57 Fees

#### Violation

The City Observer will document each violation and forward documentation to City Engineer for review. The corrective action process may not always commence with the verbal warning or include every step listed below. The City Engineer, or their designated representative, may immediately issue a stop work order for any work done in violation of any applicable law, regulation, or these Standards and Specifications. The City Engineer will evaluate each situation given the nature and seriousness of the violation, the work history, and the onsite conditions. The City may take any or all of the following steps and may vary the order of the steps:

- Verbal warning (written follow up)
- Written Warning
- Stop work and suspension of construction privileges in the City of Newport
- Civil infraction and penalties under Newport Municipal Code Chapter 2.15.

A corrective action plan will be included in each of the first three steps to provide a path towards compliance with the Construction Inspection Requirements, approved contract plans and specifications, and all other applicable regulations.

## **ROAD CLOSURES**

The City rarely allows road closures. If a road closure is necessary to complete the work, a written request must be submitted to the City Engineer <a href="TWO WEEKS">TWO WEEKS</a> prior to commencing the road closure. The request must be accompanied by a compelling reason the work cannot be completed with the road at least partially open.

Road Closures require City Engineer and City Manager approval, public announcement, proper and complete detour signage, notification of emergency services, a detailed Traffic Control Plan, and the hours of closure.

#### PARTIAL ROAD CLOSURES

In most instances, a one-lane closure may be approved as long as a detailed Traffic Control Plan is submittal for approval with the lane-closure request.

# PRIVATE DEVELOPMENT REQUIREMENTS

## Airport Design

The City of Newport owns, operates, and maintains the Newport Municipal Airport. Airport design shall conform to the Federal Aviation Administration's (FAA) requirements. The City does not intend that any of these design standards supersede or replace the FAA requirements. Where the FAA is silent, or has no design requirements, use the City of Newport Design Standards.

Where a Developer wishes to build non-aviation facilities, use the City of Newport Design and Construction Standards to guide development standards.

## Survey Plat

When either a subdivision or partition plat is necessary to create a land division, submit a preliminary plat showing complete information to the City Community Development Director or designee for review and comments. The plat must be signed by all required parties and recorded with the Lincoln County Recorder prior to the City's final acceptance of any public facilities. After addressing review comments, and the County Surveyor has approved the plat, submit the plat to the City Engineer, or designee, for review/comments and/or signature. The required public facilities must be complete and accepted by the City and infrastructure as-built drawings submitted per Section 3 prior to receiving signatures from the Community Development Director or the City Engineer.

## **Pre-Design Conference**

The City of Newport will hold a pre-design conference with the applicant (owner/developer), before formal application for public improvement permits and review of site design and construction plans. The pre-design process allows the applicant and the City to discuss the proposed project and the standards and regulations that will apply while the project is still in a preliminary stage. Participants may discuss any specific development standards, regulations, or problem areas before the applicant makes a substantial investment in the project or proceeds with a formal application unaware of the issues.

#### Supporting Information

The engineer shall submit sufficient supporting information to justify the proposed design. Such information shall include, but not be limited to, the following:

- Design calculations.
  - Drywell capacity/testing volume in gallons per hour or gallons per 1/2 hour
  - o Storm runoff hydrograph and drainage system sizing
  - Calculations for both offsite drainage and existing site drainage
  - Pump station and wet-well sizing, including pump station operating parameters
- Storm drainage report with all hydrology and hydraulic calculations, storm water quantity and quality calculations, basin maps and downstream analysis as required in Section 6, Storm Drainage.
- Alternate materials specifications including manufacturer's design application recommendation.
- Intersection sight distance certification as outlined in SECTION 7 Streets.
- Grading plan support information to include as appropriate:
  - Soils engineering report
  - Hydrology report
  - o Engineering geology report
  - Arborist report

- Water model calculations and fire flow calculations for waterline system needs.
- Documentation of proper protection and/or replacement of record survey monuments. If contractor, in the course of construction of the proposed development, removes, disturbs, or destroys a record survey monument, the Engineer shall cause a registered professional land surveyor to reference and replace the monument within ninety (90) days in accordance with ORS 209.
- Cross-sections from roadways to garage area showing ADA required cross-slopes through driveway
- Temporary Traffic Control Plan
- Erosion and Sediment Control Plan

## **UTILITY EASEMENTS**

For public lines crossing private property the City requires an easement for maintenance of the line. The Pipe is to be centered in the easement. No building is allowed within seven (7) feet of an easement. See NMC for more information on easements. If the Design Engineer lays out a public line on private property, the City will request the easement as part of the project development. The easement shall be recorded prior to project close-out. A draft copy of the easement form is at the end of this section.

#### **ELECTRONIC DRAWING FORMAT FOR AS-BUILT SUBMITTALS**

Submitted electronic drawings shall be readable with the **Autodesk Standard Monochromatic pen table**. City requires all public infrastructure improvement projects submit .DWG files with red line notes at project closing.

## **Coordinate System**

The City uses the NAD83 HARN North Oregon coordinate system. The coordinate system needs to be tied into the CAD files.

#### **Plot Styles**

Use the **Autodesk Standard Monochromatic pen table** for plot styles. Do not use company specific pen tables with line types and weights not corresponding to the monochrome pen table.

## Model Space and Paper Space

All design work shall be in model space.

Title blocks, text, and dimensions shall remain in paper space with the use of a viewport for appropriate scaling of the drawing.

## Units

Set drawing to the		Display precision setting		Set drawing units	
following units		as follows		to the following	
Linear units	feet	Linear	2	Length Type	Decimal
Angular units	degrees	Elevation	2	Length Precision	0.00
Angle display style	bearings	Coordinate	2	Insertion Scale	Feet
		Angular	4	Angle Type	Deg/Min/Sec
				Angle Precision	0d00'00"

#### **Drawing Orientation**

North arrows are required on all drawings where applicable. Drawings should be oriented so that north

is the top or left on all sheets. In general, orient the drawing to allow project stationing to increase from left to right.

## External Reference (Xref)

Any external reference used to create a drawing shall be bound to the drawing and all objects transferred to the appropriate layers. **The City will not accept External References that need remapping upon receipt by City.** 

## **Sheet Layout**

Construction plans shall follow plan submittal checklist (*See Appendix C*). Prior to any construction work or plan approval, developer shall submit complete construction plans, specifications, and all other necessary documentation to City Engineer for review. City requires a professional engineer licensed in the State of Oregon to prepare all construction plans and specifications. Base construction plans on the current vertical datum for City of Newport, NAVD 88. City benchmark locations available from the Lincoln County Survey office.

Place plan views above profile views. Scale viewports to align stationing between plan and profile.

#### **Sheet Size**

Plot all construction plans clearly and legibly in ink on sheets measuring twenty-two inches by thirty-four inches (22 x 34). For half-size reductions scale drawings to eleven inches by seventeen inches (11 x 17). Sheets shall have an one-and-one-half (1½) inch clear margin on the left edge and an one-half (½) inch margin on all other edges.

## Scale of Plans

Produce plots for projects at a scale commonly used by the engineering profession (that is, 1''=10', 1''=20', 1''=30', 1''=40', 1''=50', 1''=100').

## Scale of Symbols

Scale symbols in ratio to drawing scale.

## **Leader Lines**

Use leader lines to identify specific objects or call attention to potentially overlooked features. All leader lines shall terminate with an arrowhead indicating the object of the reference.

Good drafting practice avoids leader lines that:

- Are horizontal or vertical;
- Match cross-hatching angles;
- Form very small angles to the terminating surface;
- Lay Parallel to extension or dimension lines;
- o Are Curved;
- Cross dimension lines, when necessary, break leader lines so that dimension and leader lines do not cross;
- o Are Too long.

#### Page Layout

Submit all drawings in full compliance with the AutoCAD® software (file extension = .DWG).

Draw plan views, horizontal scale profiles, and cross-sections in scale one-to-one (1:1) in model space. Selected vertical scales should minimize number of view breaks on sheet.

Certain details may be drawn "Not to Scale". Horizontal work must be proportional to itself and vertical work must be proportional to itself.

Draw vertical scale for cross-sections and profiles to a scale in the same ratio as final plotted product. For example, if the final plot is horizontal 1''=20', and the vertical 1''=20', then the vertical scale is ten (10) times that of the horizontal so it will be drawn ten (10) times larger than one-to-one (1:1).

#### **Construction Notes**

The City will provide a set of general construction notes. Additional design/engineering notes shall not conflict with City general construction notes unless approved by the City Engineer. See Appendix D for private development required construction notes.

## Standard Drawings

Standard drawings are accessible at the City's website in PDF format. Access the City of Newport website at <a href="www.newportoregon.gov">www.newportoregon.gov</a>. Drawings are included in this manual at the back of each applicable section.

Do not alter City standard drawings. If design engineer receives approval to modify a Standard Drawing to fit existing or unique conditions, show the modified drawing as a Special Detail on the plans with a unique assigned number. When using City Standard Drawing appurtenances or construction installations reference the specific Standard Drawing number on the relevant sheet. Insert all City of Newport standard drawings used on a detail sheet(s) in the plan set.

#### **Special Details**

Design engineer may create special details specifically for the project when standard details are not suitable. The City Engineer shall approve these special details prior to construction.

Call out special details numerically, with the detail number used only once, on the plan sheet with an embedded and pre-populated detail call-out block within the template drawing, where the top number is the detail number and the bottom number is the sheet location.

## **Terms and Abbreviations**

Use abbreviations only when enough room is not available to spell out the word. Include abbreviation in plan legend for clarification. Include a legend on the drawing sheets.

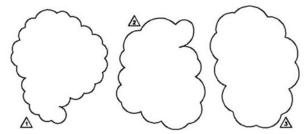
#### **Professional Stamps**

Use of professional stamps or seals shall follow the Oregon Revised Statutes (ORS) Chapter 672 regulations. Professional stamps shall be included on all final drawings and plan sets submitted for review for the discipline represented by the work. The placement of the stamp will be within the title block. Professional stamps may be either electronic or manually applied at the licensee's direction.

#### Revisions

List revisions in the title block of the drawing; show:

- Place a "cloud" box around revised areas.
- Label revised area with Revision Number.



REV	DATE	APPROVED BY	COMMENTS
1	4.17.07	CKH	NEW CB
2	6.2.07	MJR	ADDITION SIDEWALK
3	10.12.07	CAP	RELOCATED DRIVEWAY
4	12.31.07	MJR	ADDED 12" STORM LINE
5	1.08.08	CKH	ASJUSTED RETAINING WALL

- Add revision information to title block.
- Note reason for revision and approving authority in title block.
- Update revision block with each change to plan sheets.
- Show the consecutively numbered revision numbers (beginning with number one) in a triangle on each drawing.

Note: A particular set of revisions affecting several drawing sheets may not have the same revision number on each sheet, depending on the number of prior revisions made to each particular drawing sheet.

- The date the revision made on the drawing.
   Note: A particular set of revisions affecting several drawings shall be assigned the same date even though the actual work involved may take several days to complete.
- Note initials of person requesting revision.

## **GENERAL DESIGN CONSIDERATIONS**

## Standard Utility Locations

For new subdivision developments, the City has preferred way to align infrastructure in the streets. Existing infrastructure is laid out as closely as possible to this mapping, depending on the era of initial development. See Standard Drawing G-051 for construction details.

# Joint Trenching Crossing City Owned Infrastructure

The City prefers 12" of clearance for all pipes running parallel and perpendicular to City infrastructure. If utility conflicts do not allow for this clearance, contact the City Engineer for guidance. Perpendicular crossing may be narrowed to 6" if necessary. Get City Engineer approval before installing pipes with 6" clearance. See Standard Drawing G-052 for construction details.

# Joint Trenches Non-City Owned Utility

Private utility companies set their clearance requirements. This Standard Drawing is provided as reference only. The contractor and/or design engineer is responsible to know the current clearance depths required by the companies involved in the development. See Standard Drawing G-053.

## Typical Trench Detail for Paved Roads

The typical trench detail is included in the general section of the design manual due to universal application of trench work for all pipes, structures, road building, etc. See Standard Drawing G-100 for construction details.

## Typical Trench Detail for Gravel Roads

The typical trench detail is included in the general section of the design manual due to universal application of trench work for all pipes, structures, road building, etc. See Standard Drawing G-100 for

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construction details.

## Street Cut / T-Patch

Street cuts and asphalt patches for existing roads require consistent compaction and finishing. See Standard Drawing G-105 for City requirements on asphalt repairs.

# Pipe Anchor / Cut-off Wall Detail

When building on a slope greater than twenty (20) percent, pipe anchors are required for pipe stability. See Standard Drawing G-150 for design/construction requirements.

## Pothole Utility Location Backfill

The City does not provide pipe depths to designers or contractors. Potholing to locate underground utilities is the responsibility of all design engineers and contractors through the use of a ROW permit. When potholing occurs in pavement, the contractor digging the holes is required to repair the asphalt with non-shrink patching. See Standard Drawing G-160 for construction details.

**END OF SECTION** 

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# **DESIGN EXCEPTION FORM**

PROJECT DATA		FEE: \$250.00
Design Exceptions		
Design Speed Lane Width Shoulder Width/Shy Distance Sidewalk Alignment Sidewalk Installation Driveway Alignment Vertical Alignment Grade Horizontal Alignment	Pavement Cross Slope Superelevation Vertical Clearance Structural Capacity Clear Zone ADA Standards Spiral Length Superelevation Runoff Pavement Design Life	<ul> <li>Design Life and V/C Ratio</li> <li>Bike Lane/Multi-Use Path Width</li> <li>Sidewalk Width</li> <li>Parking Width</li> <li>Diagonal Parking</li> <li>Interchange Spacing</li> <li>(Other)</li> </ul>
Description of Exception:		
Description of Project:		
Location of Design Feature:		
Reasons For Not Attaining Standard	: (Such As Cost/ Benefit, Crash	History, Environmental, Etc.)
Effect on Other Standards:		
Compatibility with Adjacent Section	s:	

upporting Doculan Details):	umentation (Include the ap	ropriate Plan Section, Cro	oss Section, Alig	nments Sheets &
•				
<u>Signatures</u> repared By:			Date:	
	(Print Name)			
	Print Name:		Phone:	
	Company Name:		2 2	
	Company Address:			
	City:		ST:	Zip:
	Email Address:			
	PROJECT ENGINE PROFESSIONAL ENG STAMP			
pproved By:				
nnroved Rv.			Date:	

#### DRAFT PUBLIC UTILITY EASEMENT FORM

## After recording return to:

City of Newport 169 SW Coast Highway Newport, OR 97365

# CITY OF NEWPORT, OREGON PUBLIC UTILITY EASEMENT

GRANTOR NAME, hereinafter referred to as "GRANTOR", owner of the real property described below and does hereby give and grant unto the City of Newport, an Oregon Municipal Corporation located in Lincoln County, Oregon, hereinafter referred to as "GRANTEE", an exclusive, perpetual easement for public utilities, including the right to lay, construct, and maintain TYPE OF UTILITY HERE, and all related appurtenances, hereinafter referred to as "Public Utility", to be constructed and located on, across, under or over the surface of the following described real property:

## **LEGAL DESCRIPTION HERE OR IN ATTACHMENT**

This is intended to exclude all other below-surface installations, except as may be specifically-approved by the GRANTEE.

GRANTEE and its contractors, subcontractors, agents or employees shall have the right to enter and occupy the easement for the purpose of constructing the Public Utility, to permanently operate and maintain the Public Utility, to inspect, repair, replace, remove or renovate the Public Utility. In the event any damage is caused to GRANTOR's property by the GRANTEE or the GRANTEE's agents or independent contractors, GRANTEE shall promptly, at its expense, repair and restore the property to the condition existing prior to the damage.

GRANTOR shall be responsible for landscape and surface maintenance within the easement. In carrying out this responsibility, GRANTOR agrees not to plant any tree, shrub or plant within the Public Utility easement, nor build any structure or place any fence in the easement without first obtaining written permission from GRANTEE. It is understood that GRANTEE may remove any physical obstructions including buildings, fences, trees, or shrubbery, and abate any use of the easement if GRANTEE finds that the physical obstruction or use will interfere with the Public Utility or GRANTEE's easement rights granted above, without recompense to the GRANTOR.

GRANTOR and GRANTEE intend that this easement bind GRANTOR, his or her heirs, successors and assigns. This easement will not be considered abandoned until GRANTEE has declared the easement abandoned and no longer in use by GRANTEE, and releases this easement in a duly executed and recorded Release of Easement.

In addition to all other remedies allowed by law, GRANTOR and GRANTEE and their successors and assigns shall have the right to seek injunctive relief for the enforcement of the terms and conditions of this easement. If either party is required to bring suit or action to enforce the terms of this easement, the prevailing party shall be entitled to recover its reasonable attorney fees and costs in such action or suit, including upon appeal.

The true and actual consideration for this easement	is <mark>\$</mark>
DATED this, 20	24.
	GRANTOR
STATE OF OREGON ) ss	
County of Lincoln )	
Personally appeared before me this day of	, 2024 the above named
	Notary Public for Oregon
ACCEPTANCE	OF EASEMENT
The City of Newport, Oregon, does hereby a this, 2024.	ccept the above-described Public Utility Easement
	Spencer R. Nebel, City Manager
STATE OF OREGON ) ) ss:	
County of Lincoln )	
This instrument was acknowledged before n Spencer R. Nebel as City Manager of the City of New	ne on the day of, 2019 by port.
	Notary Public for Oregon



# APPEAL OF ENGINEERING DECISION

Name:			Date:
Address:			
Issue:			
Request:			
BASIS OF REQUEST:			
Newport Municipal Code			
Engineering Design Guide			
Public Health & Safety Refe	rence		
Best Management Practice			
Public Works Maintenance	Policies		
City Manager's Decision			
,			
		Date	
City Manager		Date:	
Attachment: City Engineers v	ritten decision		



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# REQUEST FOR CORRECTION / ADDITION TO ENGINEERING DESIGN AND CONSTRUCTION **STANDARDS**

Name:	Date:
Address:	
Issue:	
Request:	
BASIS OF REQUEST:	
Newport Municipal Code	
Engineering Design Guide	
Public Health & Safety Reference	
Tubile fleditif & Surety Reference	
Best Management Practice	
Dest management i action	
Public Works Maintenance Policies	
Public Works Maintenance Policies	
Date	
Signature	
*Attach copy of page in manual where correction / addition is needed.	

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# **GENERAL STANDARD DRAWINGS**