CITY OF HOMER BOMER, ALASKA

ORDINANCE 87-6(s)

A ORDINANCE OF THE COMMON COUNCIL OF THE CITY OF HOMER AMENDING TITLE 11, STREETS, SIDEWALKS, DRIVEWAY CONSTRUCTION, REPEALING AND REENACTING CHAPTER 11.04 STREET DESIGN AND CONSTRUCTION STANDARDS AND REPEALING AND REENACTING CHAPTER 11.20 CONSTRUCTION PROCEDURES WITHIN CITY RIGHTS-OF-WAY AND SUBDIVISIONS (STREETS AND UTILITY MAINS), OF THE HOMER MUNICIPAL CODE.

WHEREAS, the Homer City Council reestablished a Road Standards Steering Committee during its September 22, 1986 regular meeting, and

WHEREAS, the responsibility of the Committee was to review and recommend revisions to the existing road standards ordinances, specifically road construction standards relative to installing construction standards that would reduce road construction costs yet result in structurally sound roads developed by sound engineering practices;

NOW, THEREFORE, THE CITY OF HOMER ORDAINS:

Section 1. Section 11.04, STREET DESIGN DESIGN AND CONSTRUCTION STANDARDS and Section 11.20 CONSTRUCTION PROCEDURES WITHIN CITY RIGHTS-OF-WAY AND SUBVIDISIONS (STREETS AND UTILITY MAINS) are hereby repealed in their entirety and reenacted to read as follows:

Title 11

STREETS, SIDEWALKS, DRIVEWAY CONSTRUCTION

Chapters:

- 11.04 Street Design and Construction Standards
- 11.08 Driveway Construction Permits
- 11.12 Street and House Numbering
- 11.16 Construction In Right-Of-Way Permit and Load Restrictions
- 11.20 Construction Procedures Within City Rights-of-Way and Subdivisions (Streets and Utility Mains)

Chapter 11.04

STREET DESIGN AND CONSTRUCTION STANDARDS*

Sections:

- 11.04.010 Intent.
- 11.04.020 Applicability.
- 11.04.030 Definitions.
- 11.04.040 Street construction, design and dedication requirements - General.
- 11.04.050 Master Roads and streets Plan Adopted.
- 11.04.055 Official Maintenance Map Adopted.
- 11.04.058 Design Criteria Manual Adopted.
- 11.04.060 Geometric design requirements.
- 11.04.070 Required cross-section.
- 11.04.080 Drainage and erosion control.
 11.04.090 Intersections (street and driveway).
 11.04.100 Utilities in right-of-way.
 11.04.110 Street lighting.

- 11.04.120 Sidewalks.
- 11.04.130 Traffic-control devices and street signs.
- 11.04.140 Construction requirements.
- 11.04.150 Violation Penalty.
- 11.04.010 Intent. The intent of this chapter is to: a. Promote the safety, convenience, comfort, and common welfare of the public by providing for minimum standards to regulate design and construction of public streets, roads, and highways within the City.

For statutory provisions authorizing municipalities to provide for streets, see A.S. 25.48.000 (1). Prior ordinance history: Ordinance 85-14. 29.35.010 (9)

- b. Minimize public liability for publicly and privately developed improvements by ensuring that roads and streets will be built to City standards. (Ord. 85-14 (part), 1985).
- 11.04.020 Applicability. The requirements of this chapter shall govern the construction or reconstruction of roads and streets within the City of Homer. (Ord. 87-6(s) (part), 1987).
- 11.04.030 Definitions. In this chapter, unless otherwise provided, or the context otherwise requires, the following words and phrases shall have the meanings set forth below:
- a. "Arterial" means a street or highway which provides as a major function the transmission of vehicular through traffic along its prolongation or length (in preference to traffic entering the street or highway from an abutting lot or intersecting road), and which performs a major role in serving the transportation needs of the community (by serving relatively longer trip lengths with minimal interference and higher speeds), and which is identified as an arterial on the Homer Master Roads and Streets Plan.
- b. "As-built drawings" means the plan and profile drawings of the improvements as constructed, drawn to the same level of detail as the original design drawings.
- c. "Base Course" means a layer of crushed aggregate placed atop the subbase, according to a specified gradation.
- d. "City" means the City of Homer, a municipal corporation, acting through the City Manager and/or his designees.
- e. "Collector" means a street which collects traffic from local streets and/or relatively large traffic generators, and channels it into the arterial system, and is identified as a "commercial/industrial collector" or as a "residential collector" in the Homer Master Plan for Roads and Streets. (A "commercial/industrial collector" is a collector located in a commercial or industrial zoning district, while a "residential collector" is a collector located in a residential district.)
- f. "Cross culvert" means a culvert which crosses beneath the traveled way of a street, such that its ends are exposed on the embankment of each side of the street.
- g. "Cul-de-sac" means a street that is closed at one end and which is therefore required to provide a circular turnaround.
 h. "Design Criteria Manual" means a publication issued by
- h. "Design Criteria Manual" means a publication issued by the City of Homer entitled "Design Criteria Manual for Streets and Storm Drainage," dated April, 1985.
- i. "Design engineer" is a professional civil engineer, registered in the State of Alaska, who shall perform the project design for the developer.
- j. "Developer" means a person, firm, association, partnership, corporation, governmental unit, or combination of

any of these which proposes to install street improvements, either as part of a subdivision development or as a development project on an existing right-of-way.

- "Drainage Management Plan" refers to the City of Homer's documents entitled "Drainage Management Plan - Homer, Alaska" (dated August, 1979) and "Revised Drainage Management
- Plan Homer, Alaska" (dated February, 1982).
 1. "Driveway" means an entrance/exit roadway which provides lateral access to a private property from a public right-of-way, and which is located on private property except for its junction with the public road within such right-of-way.
- "Driveway intersection" means the junction of a
- driveway with a street or other public road.

 n. "Local street" is a street which services primarily relatively short trip lengths and low traffic, allowing transmission of traffic from abutting lots to the collector or arterial system, and which does not qualify for designation as a collector or arterial. For the purposes of this ordinance, local streets are segregated into two subclasses: "local residential" streets are those local streets situated in residential zoning districts and "local commercial/industrial" streets are those local streets located in commercial or industrial zoning districts.
- "Master Roads and Streets Plan" refers to the document labelled such, adopted by the City of Homer.
- "Non-frost susceptible material" means non-organic soil containing less than 3% by weight of grains smaller than .02 mm obtained from minus 3" material.
- "Permanent maintenance" means grading, pavement patching, ditching, culvert thawing, snowplowing, sanding and other work, performed on an all-seasons basis for maintenance of city streets.
- "Right-of-way" means land, property, or interest r. therein, usually in a strip, acquired for or dedicated to the public for transportation purposes.
- "Road" is a general term denoting a public way or track, or any length thereof, generally in rural areas, used for purposes of vehicular travel.
- "Roadway" means the portion of a street, road, or t. highway, including shoulders, for vehicular use.
- "Shoulder" means the portion of the roadway contiguous with the traveled way for accommodation of stopped vehicles for emergency use, and/or for lateral support of base and surface courses.
- "Street" is a general term denoting a public way or track, or any length thereof, in urban settings, used for purposes of vehicular travel.
- "Street intersection" means the junction of two or more public roads, i.e., roads located within public rights-of-way.

- x. "Subbase" means the specified or selected material of planned thickness placed atop the subgrade and below the base course.
- y. "Subdivider" means a person, firm, association, partnership, corporation, governmental unit, or combination of any of these which may hold any recorded or equitable ownership interest in land being subdivided. The term shall also include all heirs, assigns or successors in interest, or representatives of the subdivider, owner, proprietor or developer.
- z. "Subdivision" means the division of a tract or parcel of land into two or more lots, sites, or other divisions for the purpose, whether immediate or future, of sale, lease, or building development, including any subdivision, and when appropriate to the context, the process of subdividing or the land subdivided. A "new subdivision" is a subdivision in which a plat has received preliminary approval prior to the effective date of this chapter. There will be no time extension allowed for said preliminary plat to be considered at a later date.
- aa. "Subgrade" means the basement soil material in excavation (cuts), embankment (fills), and embankment foundations immediately below the first layer of subbase and to such depth as may affect the structural design of the roadway.
- bb. "Traveled way" means that portion of the roadway reserved for the movement of vehicles, exclusive of shoulders.
- cc. "Winter maintenance" means snowplowing and sanding of roads during winter months; this definition specifically excludes culvert maintenance and prevention or alleviation of glaciation (aufeis) effects. (Ord. 85-14 (part), 1985).
- 11.04.040 Street construction, design and dedication requirements General. a. All streets or roads constructed or reconstructed within the City of Homer after the effective date of the ordinance codified in this chapter shall adhere to the dedication, design and construction standards set forth in this chapter and shall also be designed and constructed according to the procedures and standards set forth in Chapter 11.20, unless waived as provided in Chapter 11.20.
- b. The City shall require new subdivisions to dedicate the rights-of-way according to the widths specified in Section 11.04.060(f) below, according to the appropriate functional classification. Arterials and collectors are as designated in the Master Roads and Streets Plan. This provision may be waived on a case-by-case basis by the Director of Public Works by requiring a minimum dedicated right-of-way of 60 feet along with an expanded building setback of sufficient width to equal the rights-of-way widths specified in Section 11.04.060(f).
- c. The Planning Commission shall require the dedication of a half street if the other half of the street has been dedicated or can reasonably be expected to be dedicated, unless it

determines the street would be unnecessary or undesirable. It shall further require half-street dedications if the street is on the Master Plan for Roads and Streets Map as a planned improvement or is the logical extension of an existing street.

d. When a subdivision borders or contains a street designated an arterial on the Master Plan map, the Homer Advisory Planning Commission may require shared access or the dedication of a frontage street. Alternatively, an interior road may be required (along the rear lot lines of the lots abutting the arterial) which will serve the access requirements of all the lots fronting the arterial. (Ord. 85-14 (part), 1985).

11.04.050 Master Roads and Streets Plan - Adopted.

- a. The City hereby adopts the functional classification system, Master Plan map, and preliminary plans and profiles of future streets contained in the Master Roads and Streets Plan.
- b. In all new subdivisions, excepting those specifically exempted in Chapter 11.10, the subdivider shall be required to dedicate street rights-of-way designated as arterials or collectors on the Master Plan for Roads and Streets map, in general agreement with the location and geometrics outlined on the map and, if preliminary engineering plans have been prepared, in general accordance with the route layout specified therein. The Planning Commission may require adjustments to the proposed plat at the preliminary platting stage if it finds that such geometrics and alignments are not adhered to.
- c. If a development includes a segment of an arterial or collector street as shown on the Master Plan, the developer shall construct the streets on the alignment adopted in the Master Roads and Streets Plan, and according to the geometric requirements (maximum grade, curvature, and intersection grade, and minimum intersection curb return radius) conforming to the respective classification. The developer, in such case, shall be required to construct the street to a twenty-eight-foot width in accordance with the minimum requirements of a local residential street; provided, however, that the City may, upon direction of the City Council, elect to require construction to the full standards and pay to the developer the cost difference between the required street and the proposed street.
- d. The City Council shall be empowered to designate additional routes as arterials and collectors beyond those adopted on the Master Plan map. (Ord. 85-14 (part), 1985).
- 11.04.055 Official Maintenance Map Adopted. a. The "Official Maintenance Map of the City of Homer" is enacted by reference and declared to be part of this chapter in its exact form as it exists on the date that the ordinance codified in this chapter is adopted by the City Council. This map shall be kept

in the City offices for public inspection.

- b. After the effective date of the ordinance codified in this chapter, the City shall not accept maintenance responsibility for any roads, existing or future, which are not constructed or reconstructed to the standards of this chapter, unless such road is shown on the "Official Maintenance Map of the City of Homer."
- c. City maintenance service, as specified on the official map, shall be provided on a permanent (year-around) basis and on a winter-maintenance-only basis (snowplowing and sanding only). In no case shall a winter-maintained road be upgraded to permanent maintenance unless it is reconstructed to the standards of this chapter.
- d. If the map becomes lost or damaged, the map or significant parts thereof remaining after partial destruction shall be preserved. The City Council may by ordinance enact a new map which shall be consistent with and supersede the old map.
- e. The map shall be signed by the City Clerk with a note of the date of enactment by the City Council. Amendments by ordinance shall be immediately added to the "Official Maintenance Map of the City of Homer" with a notation of the date of enactment of said ordinance by the City Council. (Ord.85-14 (part), 1985).
- 11.04.058 Design Criteria Manual Adopted. The City of Homer adopts by reference the "Design Criteria Manual for Streets and Storm Drainage," dated April, 1985 and revised February 1987. The "Design Criteria Manual" shall augment the standards of this chapter and shall govern site reconnaissance, survey and soils and design for streets and storm drains. (Ord. 87-6(s) April 14, 1987).
- 11.04.060 Geometric design requirements. The following design criteria shall be adhered to on all street construction within the City.
- a. Street Alignment. The street construction shall coincide with the right-of-way centerline unless otherwise approved by the City.
- b. Street Design. Streets shall be designed to meet the following objectives:
 - To drain adjacent property where possible;
- To match existing driveways where possible, and in all cases to match existing cross-street grades;
 - 3. To minimize cross-street or driveway grades;
 - To provide drainage of roadways;
- 5. To facilitate continuity of natural drainage patterns if storm drains are not incorporated in accordance with the Drainage Management Plan.
- c. Grade and Curvature Maxima. The following design limitations shall apply to grades and curvature according to the

Classification	Maximum Grade (%)	Short Distance (Less Than 500') Maximum Grade (%)	Maximum Grade On <u>Curve</u> (%)	Minimum Curve Radius (feet)*
Major arterial	6	8	* *	•
Minor arterial	8	•	6	700
Collector,	J	10	6	600
comm./indus. Local, comm./	8	12	6	500
indus.	8	12	6	500
Collector, res.	10	12	-	500
Local, res.		— 	. 8	500**
bocar, res.	10	12	8	150**

Radius shall be measured to right-of-way centerline. In hilly terrain (as defined by the Design Criteria Manual), the minimum curve radius for residential collector streets

may be reduced to two hundred seventy-five feet, and the minimum curve for local residential streets may be reduced to one-hundred-twenty feet, upon approval of the City

Public Works Engineer.

Traffic Forecast. Street design criteria (e.g., pavement thickness, roadway widths, etc.) shall be based on twenty-year traffic forecasts as approved by the City. Forecasts for local streets shall be based on estimated trip generation, such estimates to be obtained on per-unit basis from the Design Criteria Manual and standard texts and calculated by the design engineer for the given land-use intensity and type.

Cul-de-sacs. Cul-de-sacs must not be longer than six hundred feet and must have turnaround, with a minimum radius to

outer edge of pavement or shoulder of thirty-eight feet.

Width. Right-of-way, traveled way, and shoulder width standards for city streets shall, at minimum, be as follows:

Functional Class or Type	Right-of-wayWidth	Traveled Way Width	Shoulder Width, Each Side
Total and the second se	(feet)	(feet)	(feet)*
Arterial, major	100	36	8
Arterial, minor	100	26	-
Collector, comm./indus	. 80		6
Collector, res.	- - -	26	4
	80	26	4
Local, comm./indus.	60	22	3
Local, res., gravel			•
road/street	60	26	_
Local, res., paved	• •	20	0
road/street	60		
Cul-de-sac turn-	60	26	4
around radius	50	38	2
	(radius)	(radius)	4

Shoulder width reductions may be allowed on roads with curb and gutter.

- g. The right-of-way width standards of Section 11.04.060(f) above shall constitute minimum dedication requirements for subdivisions for respective street classification. Subdividers and developers shall be required to construct roadways to the width specified for local residential streets, regardless of the street classification.
- h. Construction or reconstruction of existing streets in pre-existing platted rights-of-way narrower than those defined in Section 11.04.060(f) shall require dedication of a sufficient construction and maintenance easement on each side of the road to allow the roadway to be constructed in accordance with Chapter 11.20 and the City of Homer Design Criteria Manual.
- i. Other design criteria shall be as specified in the City of Homer "Design Criteria Manual for Streets and Storm Drainage." Further explanation and elaboration of the requirements in (c) through (f) of this section is also set forth in the Design Criteria Manual. (Ord.87-6(s) (part), 1987).
- 11.04.070 Required cross-section. a. All cross-section designs shall be performed in conformance with the City of Homer Street Design Manual. Thickness shall be based on analysis of native soil and groundwater conditions, as detailed in the Street Design Manual using limited subgrade frost penetration, reduced subgrade strength, California Bearing Ratio, or other methods as appropriate for the functional classification of each roadway, provided that in no case shall the combined thickness of subbase and base course be less than twenty-four inches. Base course thickness shall be four inches on paved roads and six inches on unpaved roads.
- b. Prior to the placement of roadway structural fill material, native material shall be excavated to subgrade, and geotextile fabric, of a type approved by the City, shall be placed atop subgrade prior to placement of structural fill.
- c. Base course and subbase gradation shall be as specified in the City of Homer's Design Criteria Manual, except as otherwise approved or specified by the City Public Works Engineer. (Ord. 87-6(s) (part), 1987).
- 11.04.080 Drainage and erosion control. a. An adequate drainage system, which may include necessary storm drainage facilities, drain inlets, manholes, culverts, bridges, and other appurtenances, shall be provided to conduct stormwater efficiently and to protect the roadway's integrity. The flow requirements for each particular drainageway shall be established by the City, using the City Drainage Management Plan as a data base.
- b. Hydraulic structures shall be designed in accordance with the Design Criteria Manual.

- c. Underground storm drain systems will be required after preparation and official adoption of an official storm drain network plan, if the development occurs on the route of a storm drain, as provided on such official plan. Storm drains shall be designed in accordance with the Design Criteria Manual.
- d. Cross culverts shall have a minimum inside diameter of twenty-four inches, and shall be larger if the flow through the culvert will require larger diameter pipe, as determined by the City Public Works Engineer.
- e. Driveway culverts will be a minimum of 18" in diameter, and shall be larger if the flow through said culvert will require larger diameter pipe, as determined by the City Public Works Engineer.
- f. Plunge basins or other methods, as approved by the City, shall be employed to dissipate energy at culvert outfalls where the City or design engineer determines such methods are necessary, in accordance with the Design Criteria Manual.
- g. Ditch lining or other methods shall be required if necessary to prevent ditch erosion. (Ord. 87-6(s) (part), 1987).
- 11.04.090 Intersections (street and driveway). a. Right-of-way Requirements. Rights-of-way shall intersect at an angle as close to ninety degrees as feasible, and in no event at an angle less than sixty degrees.
- b. Right-of-way Radius Returns. At all intersections, right-of-way radius returns shall be a minimum of twenty feet. Additional radius shall be required in cases where the intersection angle is less than ninety degrees; the rounding shall permit construction of curb returns or turning radii as required in subsection c of this section, and radius returns in such cases shall not be less than forty feet.
- c. Curb Returns and Turning Radii. Turning radii at intersections shall be designed and constructed to accommodate the turning path of design turning vehicles with minimal encroachment on shoulders and opposing lanes; the design turning vehicles are as specified in the Design Criteria Manual, according to the street's functional classification.
- d. Centerline Separation. The distance between street intersection centerlines shall be not less than two hundred feet, measured along the centerline of the intersected street. Street intersections created by new subdivisions shall be spaced at intervals of not less than six hundred feet on major arterials, three hundred feet on minor arterials, and two hundred feet on collectors.
- e. Grades. Intersection grades shall not exceed three percent within sixty feet nor four percent within one hundred feet, of the intersection with the through-road centerline. The through-road grade shall not exceed seven percent approaching the

intersection if possible.

- f. Sight Distances. Intersections shall be planned and designed to provide sight distances in accordance with the Design Criteria Manual.
- g. New Subdivisions. For new subdivisions, the Homer Advisory Planning Commission may specify separation intervals between driveway and/or street intersections on arterial and collector streets, not to exceed the street intersection interval specified in this section. (Ord. 87-6(s) (part), 1987).
- 11.04.100 Utilities in Right-of-way. New streets to be constructed for acceptance by the City or existing substandard streets to be reconstructed for acceptance by the City shall also include the construction of applicable utilities in accordance with the Development Agreement. Placement of utilities in right-of-way shall be governed by the standards of the City of Homer "Design Criteria Manual."
- 11.04.110 Street lighting. Street lighting shall be installed in all streets in conformance with the requirements of the City of Homer Design Criteria Manual and the standards of the electric utility. (Ord. 87-6(s) (part), 1987).
- 11.04.120 Sidewalks. a. New streets to be accepted by the City may, at the developer's option, have sidewalks and/or bicycle paths.
- b. Sidewalks and/or bicycle paths shall be designed in accordance with the design criteria of the City of Homer Design Criteria Manual. (Ord. 87-6(s) (part), 1987).
- 11.04.130 Traffic-control devices and street signs. a. Street signs and other traffic control devices, including striping where applicable, shall be provided in accordance with the Alaska Traffic Manual.
- b. Street name signs shall be provided at all intersections, on fixtures and according to type specified in the Alaska Traffic Manual. (Ord. 87-6(s) (part), 1987).
- 11.04.140 Construction requirements. Street construction within rights-of-way dedicated or to be dedicated to the public within the City shall be subject to the following:
- a. Construction methods, materials, and practices for all work related to streets within the City shall conform to the Design Criteria Manual of the City of Homer; amendments to these specifications shall be subject to approval or shall be specified by the City of Homer.
- b. Construction procedures and responsibilities shall be as specified in Chapter 11.20 and Chapter 13.08 of the Homer Municipal Code.

- c. Copies of applicable permits must be on the construction site. If not, the City reserves the right to close the work down until such time the permits are present.
- d. If the project creates a condition that the City deems hazardous or detrimental to the public or public R.O.W., the City reserves the right to close the work down until such time that the problem is corrected.
- e. Restoration of existing streets and rights-of-way) Contractors will be required to restore the streets and public rights-of-way to the grade and condition originally found, to replace gravel, paving or sealcoating, ditches, culverts, fences, signs, or other improvements, unless specific authorization to the contrary is authorized in writing by the City. Failure to do so will be cause for the City to accomplish the required work, and to collect damages from the contractor or his surety. All work shall comply with the standards set forth by the State of Alaska, Homer Municipal Code, Homer Standard Construction Practices and Standard Specifications.
- Clean up) As the work progresses, all streets shall be thoroughly cleaned of all rubbish, excess earth, rock, and other debris resulting from such work. All cleanup operations at the location of such work shall be accomplished at the expense of the contractor and shall be completed to the satisfaction of the Public Works Inspector. Immediately after completion of said work, the contractor shall, at his own expense, clean up and remove all refuse and unused materials of any kind resulting from said work, and upon failure to do so within one working after having been notified to do so by the Public Works Inspector, said work may be done by the Department of Public Works; the cost thereof charged to the contractor and the contractor shall also be liable for the cost thereof under the security bond provided hereunder. The contractor shall maintain all gutters free and unobstructed for the full depth of the adjacent curb and for at least one (1) foot in width from the face of such curb at the gutter line. Where gutters do not exist, drainage ditches shall be kept free of obstructions and restored to their original condition. Whenever a gutter or culvert crosses an intersecting street, an adequate waterway shall be provided and at all times maintained. The contractor shall make provisions to take care of all surplus water, muck, silt, slickings, or other runoff pumped from excavations or resulting from sluicing or other operations and shall be responsible for any damage resulting from its failure to so provide.
- 11.04.150 Violation penalty. The violation of any provision contained in this chapter shall be punished under Section 1.16.010. (Ord. 87-6(s) (part), 1987).

Chapter 11.08

DRIVEWAY CONSTRUCTION PERMITS*

Sections:

11.08.010	Purpose
11.08.020	Applicability.
11.08.030	Definitions.
11.08.040	Permit - Required.
11.08.050	Permit - Application.
11.08.060	Applicant's responsibility - Generally.
11.08.070	Applicant's responsibility - For construction.

^{*} For statutory provisions authorizing cities to regulate public rights-of-way, see A.S. 29.48.025(1). Prior ordinance history: Ordinances 74-5 and 74-11. 29.35.0/0 (10)

Chapter 11.20

CONSTRUCTION PROCEDURES WITHIN CITY RIGHTS-OF-WAY AND SUBDIVISIONS (STREETS AND UTILITY MAINS)*

Sections:

- 11.20.010 Intent.
- 11.20.020 Scope and applicability. 11.20.030 Definitions.
- 11.20.040 Development permit process.
- 11.20.050 Permit application.
- 11.20.060 Design phase procedures.
- 11.20.070 Preconstruction requirements.
- 11.20.075 Public liability insurance.
- 11.20.080 Construction inspection and quality control requirements.
- 11.20.090 Project completion procedure.
- 11.20.100 Project acceptance procedure.
- 11.20.110 Violation Penalty.
- 11.20.010 Intent. The intent of this chapter is to establish procedures for constructing streets and utility mains in existing rights-of-way or public rights-of-way or easements to be dedicated by plat. (Ord. 87-6(s) 1 (part), 1987).
- 11.20.020 Scope and applicability. This chapter governs all street and utility main construction in public rights-of-way which are greater than twenty feet in width, excepting those rights-of-way which are specifically claimed for ownership and maintenance by the State of Alaska. It shall further govern such construction of streets and utility mains in rights-of-way or easements proposed to be dedicated as part of pending subdivision plats, as required in Chapter 22.10 of the Homer Municipal Code. (Ord. 87-6(s) 1 (part), 1987).
- 11.20.030 Definitions. In this chapter, unless otherwise provided or the context otherwise requires, the following definitions shall have the meanings set forth below:
- "As-built drawings" means plan and profile drawings of the improvements as constructed, drawn to the same level of detail as the design drawings.
- "City" means the City of Homer, a municipal corporation acting through the City Manager and/or his designees.
- "City Inspector" is an individual employed by the City of Homer, who shall monitor construction progress and quality to the satisfaction of the City of Homer, who shall record whether the project is proceeding according to the plans and specifications and who shall receive change requests and documentation related to the project, including "as-built" drawings, inspection field books and copies of the surveyor's

Prior ordinance history: Ordinance 85-13

field notes.

- d. "City Public Works Engineer" means the individual carrying such title, who is employed by the City of Homer Department of Public Works.
- e. "Contractor" means the person or company providing labor, materials and other services necessary to construct and install street and utility improvements for the developer, according to the plans and specifications.
- f. "Design Criteria Manual" means a publication issued by the City of Homer entitled "Design Criteria Manual for Streets and Storm Drainage," dated April, 1985 readopted April, 1987.
- g. "Design Engineer" means a professional civil engineer, registered in the State of Alaska, who shall perform the project design for the developer or City of Homer.
- h. "Developer" means the party proposing to install an improvement or improvements in existing public rights-of-way or subdivision developments, and assuming accountability for compliance with all City regulations pertaining to construction of such improvements; said party shall appoint or designate an individual, known as the project manager, to conduct its interactions with the City and to be responsible for developer's adherence to all pertinent City regulations.
- i. "Erosion control plan" means a plan, submitted to the City for preventing erosion on site and/or sedimentation off site during construction.
- j. "Field change" means a change in the design of a project, made in the field by the contractor under the approval of the project engineer, which is inconsequential in nature and which does not impact the integrity of the design or the intent of the project and does not cause violation of City ordinances or design standards.
- k. "Inspector" is an individual employed by the developer who shall monitor construction progress and quality on a daily basis, and who shall prepare daily inspection reports for submittal to the City.
- 1. "Major change" means a change in the design which, if executed, would lead to a consequential deviation in its intent or integrity or to a violation of city standards or ordinances, in the opinion of the City Public Works Engineer.
- m. "Project engineer" is a professional civil engineer, registered in the State of Alaska, who shall be employed by the developer and whose responsibilities shall include, but not be limited to, the following:
- Verify that all work is accomplished in accordance with the plans and specifications;
- 2. Supervise the Inspector, Surveyor, and Testing Firm;
 - 3. Authorize and document minor deviations in the

design, known as "field changes";

4. Submit proposals for major design deviations, known as "major changes," to the City;

5. Verify field notes and inspection reports as detailed in Section 11.20.080:

6. Sign and stamp "as-built" drawings.

- n. "Project manager" is the person charged with representing the developer with regard to project work, to the City on the project.
- o. "Right-of-way" means land, property, or interest therein, usually in a strip, acquired for or dedicated to the public for transportation purposes.
- p. "Road" is a general term denoting a public way or track, or any segment thereof, used for purposes of vehicular travel.
- q. "Site" means the area of construction, as defined on the project plans.
- r. "Street" is a general term denoting a public way or track, or any segment thereof, and of any length and location within the City, used for purposes of vehicular travel. For the purposes of this ordinance, it is synonymous with the term "road."
- s. "Street construction" includes all clearing, grubbing, compaction, grading and drainage improvement work involved in building a new street.
- t. "Subdivision" means the division of a tract or parcel of land into two or more lots, sites, or other divisions for the purpose, whether immediate or future, of sale, lease, or building development, including any subdivision, and when appropriate to the context, the process of subdividing or the land subdivided. A "new subdivision" is a subdivision in which a plat is recorded after the effective date of this chapter.
- u. "Surveyor" is a professional land surveyor, registered in the State of Alaska.
- v. "Traffic control plan" is the plan showing signage and traffic management on-site or entering/exiting the site during construction.
- w. "Pre-existing conditions" are the streets identified on the Official Maintenance Map, as platted or existing on the date of adoption of the ordinance codified in this chapter.
- x. "Permit" is required from anyone working within the public right-of-way. such permit shall be obtained from the Director of Public Works or his designee.

Other key terms are as defined in the text of the following regulations or, where no such definitions are found, as defined in Chapter 11.04 of this Code. (Ord. 87-6(s) 1 (part), 1987).

11.20.040 Development permit process. No street or utility

main construction shall be permitted within public rights-of-way prior to the developer's receipt of a development permit, notice of design approval, and notice to proceed with construction. (Ord. 87-6(s) 1 (part), 1987).

- 11.20.050 Permit application. Prior to issuance of the development permits, the developer must submit an application for development permit to the City. This application shall contain the following details at minimum:
- a. Design concept and preliminary layout showing location and extent of proposed improvements;
- b. Written scope of work, to consist of the type of improvements to be installed and approximate quantities;
- c. Identification of the design engineer, who shall be a professional civil engineer registered in the State of Alaska and who shall perform the project design for the developer;
- d. Identification of the project manager, who shall be the developer's representative authorized to contact and negotiate with the city;
 - e. Estimated project completion date or duration;
- f. A waiver of the development permit may be granted by the Public Works Engineer on a case-by-case basis for extension or upgrading of pre-existing platted rights-of-way; however, such temporary waiver on extension or repair shall not qualify the road for City maintenance unless the pre-existing platted rights-of-way or roadway are designed and reconstructed to City standards in accordance with the "Design Criteria Manual." All requests for waiver shall be made in writing and shall indicate the scope of work and the estimated date of completion.

Upon acceptance of the application, a development permit shall be issued by the City Public Works Engineer. This permit shall be a notice to proceed with design, based on approval of design concept and the preliminary layout, as required in subsection a. of this section. (Ord. 87-6(s) 1 (part), 1987).

- 11.20.060 Design phase procedures. After receipt of the development permit, the developer shall prepare and submit to the City a design of the proposed utility or street extensions. This design (consisting of plans, specifications, and supporting material including, but not limited to, soil test data, survey notes and design criteria reports) shall adhere to the following requirements:
- a. Design must conform to all pertinent City of Homer standards for street and utility construction, and shall be stamped and signed by the design engineer;
- b. Survey and soils data shall be obtained, and plans and specifications shall be prepared, in conformance with the standards of the Design Criteria Manual.

- c. Design must be accompanied by a statement from the design engineer that he has personally inspected the site, and must be accompanied by the design report. Design report requirements are as specified in the Design Criteria Manual.
- d. Design must also be accompanied by a signed and notarized statement from the developer that the developer has reviewed the design, and shall enforce adherence to the design during construction, excepting changes made in conformance with Section 11.20.080.
- e. If the developer's proposed improvements include a water and/or sewer line extension, the design shall in all cases be accompanied by a design for reconstruction of the existing roadway to City standards, in accordance with this chapter; said reconstruction shall be required as part of the project work. This section may be waived by the Public Works Engineer on a case by case basis if the right-of-way is restored to original condition or better as determined by the Public Works Engineer. All requests for waiver shall be made in writing and shall indicate the scope of work and estimated date of completion.
 - f. The developer shall provide copies of the following:
- 1. Approval or compliance certification letter for water and sewer facilities from the State of Alaska Department of Environmental Conservation;
- Corps of Engineers permit for construction in wetlands as necessary;
- 3. Permits, where applicable, from the State Department of Transportation and Public Facilities;
- 4. Telephone and power installation or relocation agreements.

Upon satisfactory completion of these requirements, and approval by the City of the plans and specifications, the City shall issue a notice of design approval to the developer. (Ord. 85-13 1 (part), 1985).

- 11.20.070 Preconstruction requirements. Following receipt of the Notice of Design Approval, the Developer shall submit the following to the City:
 - A construction schedule;
- b. Erosion control plan and traffic control plan for the area of the development project, if determined necessary by the Public Works Engineer.
- c. Identification of the following personnel, who shall be required to perform their respective duties during the construction of the project:
 - 1. Contractor,

- 2. Project engineer,
- Inspector,
- 4. Surveyor,
- 5. Testing firm (a firm employed by the developer to perform soils, compaction, and other tests deemed necessary by the project engineer to ensure conformance of work to plans and specifications);
- d. A development fee is required for private projects to cover costs of inspection and administration of the project. The fee shall be generally in relation to the design engineer's construction cost estimate, according to the following schedule below:

Cost Estimate

Development Fee

Less than \$100,000 1.0% of cost estimate, but not less than \$250 \$100,000 to \$500,000 0.75% of cost estimate, but not less than \$1,000 Above \$500,000 0.50% of cost estimate, but not less than \$3,750

Municipal projects shall include an appropriate project overhead for project administration and inspection.

- e. Design engineer's construction cost estimate. This cost estimate shall be accompanied by the calculations upon which the cost estimate is based. The estimate and calculations are subject to verification and concurrence by the City Public Works Engineer;
- f. A performance bond or other acceptable guarantee in the amount of 100% of the project cost, which bond shall be waived in the case of new subdivisions, in which right-of-way dedication, via plat filing or recordation, cannot occur until improvements are installed and accepted;
- g. Proof of liability insurance listing the City, as additional insured in accordance with the requirements of Section 11.20.075. The insurance may be purchased and maintained either by the developer or the contractor;
- h. A notarized statement that the developer shall hold the City harmless from any claims arising from construction including, but not necessarily limited to, liability or non-payment of subcontractors or suppliers;
- i. The developer shall submit to the City, in accordance with the form specified by the City, a quality control program for the construction of the improvements. The quality control program shall provide sufficient inspection and test procedures to determine compliance with all applicable plans,

specifications, and safety requirements. The program shall include at least the following:

- 1. The frequency and type of all tests to be performed,
- $\,$ 2. A list of all firms or persons who will perform tests and inspections,
- 3. Procedures for coordinating testing and inspections with the City, and for providing advance notice to the City of all inspections and tests which the City may opt to witness,
- 4. Procedures for reporting quality control activities, including discoveries of deficiencies in the work.

In addition, the developer must sign a performance agreement with the City that work shall be completed according to the plans and specifications, and allowing the City the right to enter upon and inspect the project, and to order work stoppage, tests, and field changes in accordance with Section 11.20.080.

Upon completion of the requirements set out in this section to the satisfaction of the City, the City shall issue a notice to proceed with construction. (Ord. 87-6(s) 1 (part), 1987).

- 11.20.075 Public liability insurance. The developer or contractor is required to purchase, and maintain throughout the life of the project, such public liability insurance as shall protect the City and the developer and/or contractor against losses which may result from claims for damages for bodily injury, including accidental death, as well as from claims for bodily damages which may arise from any operations related to the development project, whether such operations be those of the developer, contractor, or subcontractor or anyone directly or indirectly employed by any of these parties. Such public liability insurance shall include coverage for the following:
- a. Comprehensive general liability, bodily injury and property damage liability, premises operations including underground, products and complete operations, broad form property damage, blanket contractual, personal injury: five hundred thousand dollars combined limit, each occurrence and aggregate;
- b. Comprehensive automobile liability, bodily injury and property damage, including all owned, hired and nonowned automobiles: five hundred thousand dollars combined limit per accident. (Ord. 85-13 1 (part), 1985).
- 11.20.080 Construction inspection and quality control requirements. Following receipt of the notice to proceed, the contractor shall complete the improvements under the inspection of the project engineer, the inspector and the City, according to the plans and specifications and the procedural requirements of

this chapter. The inspection and quality control requirements shall be as follow:

- a. The developer shall submit to the City, on the Monday of each week during construction, copies of all inspection reports, surveyor's field notes, and materials test reports of the prior week. The reports shall contain a specific listing of any changes, either field changes or major changes, made to the design in that week.
- The City may perform, in a timely manner, any and all b. inspections it deems appropriate for the project; it shall, moreover, reserve the right to enter the project site at any time for purposes of inspection and to require additional tests if in the City's opinion, testing by the developer's testing firm has previously been inadequate. The developer shall pay for such tests if the tests reveal non-compliance with construction or material requirements; any test which confirms compliance shall be paid for by the City. The City may also issue a notice of rejection of materials or methods to the developer, which may state that the City will not release the performance bond or other accepted guarantee, or approve the project until the conditions cited in such notice are remedied. Furthermore, the City may issue an order to the developer to stop work within twenty-four hours, under conditions including, but not necessarily limited to, the following:
- 1. If inspection reports, field notes, and test reports are not submitted to the City when required;
- 2. If the project creates a condition that the City deems hazardous or detrimental to the public or public R.O.W., the City reserves the right to close the work down until such time that the problem is corrected."
- 3. If unauthorized deviations from the design occur which are, in the City's opinion, substantial and which the developer refuses to remedy in a timely manner after developer's receipt of notices from the City regarding these defects.
- 4. Construction procedures and responsibilities shall be as specified here and in Chapters 11.04 and 13.08 of the Homer Municipal Code.
- 5. Copies of applicable permits must be on the construction site. If not, the City reserves the right to close the work down until such time the permits are present.
- c. Surveyor's notes must include horizontal and vertical data for all improvements as installed, and shall include the date of installation.
- d. The developer must submit to the City Public Works Engineer, and the City Public Works Engineer must approve in writing, any proposal for "major changes" in the design prior to authorizing such change and prior to such change being executed in construction.

e. The Project Engineer shall authorize any "field changes" in the design prior to such change being executed in construction; if requested by the City, the Project Engineer shall be required to give written justification of any such "field change." (Ord. 87-6(s) 1 (part), 1987).

11.20.090 Project completion procedure. Prior to issuance of notice of project acceptance, the following are required:

- a. The developer's project manager, project engineer, and the City Public Works Engineer must conduct an inspection to determine if the project is complete and if the project has been completed in accordance with the contract documents and if the contractor has fulfilled all of his obligations. A written "punch list" shall be prepared identifying all observed defects, if any. The defects shall be remedied, to the satisfaction of the City Public Works Engineer, and a final inspection conducted to verify that these have been remedied, prior to acceptance of the improvements by the City.
- b. The developer must provide the City with a final submittal on the approvements that includes triplicate copies of project as-builts drawings. The as-built drawings shall contain a record of all improvements as installed and shall show all field changes and major changes. The final as-built drawings will be on three-mil mylar, twenty-four-inch by thirty-six-inch sheets, and marked 'AS-BUILT" in bold letters on all sheets of the plans. the as-built drawings shall use the design plan and profile drawings as a base, unless otherwise approved or specified by the City Public Works Engineer.

Included on the first sheet of the as-built drawings will be the following statement, stamped, signed and dated by the Project Engineer:

The following sheets are record drawings prepared by the Project Engineer, (insert name), based in part on information provided to us by others. We have carefully checked this information and believe it to be a reasonable and accurate representation of the work as constructed.

- c. The developer shall, following completion of all public improvements, restore all disturbed or destroyed monuments or lot corners by or under the direction of a registered land surveyor. (Ord. 87-6(s) 1 (part), 1987).
- d. The developer or contractor shall, following completion of all public improvements, install a permanent metal marker having magnetic properties at all intersections, center of cul-de-sacs and PI's where intervisible. If the PI's are not intervisible PC's and PT's shall be monumented. In paved roads, the monuments shall be a minimum of 1/2" x 6" set flush to the paving. In gravel roads, the monuments shall be a minimum of

1/2" x 30" with a 2-1/2 minimum diameter metal cap showing the year set, registration number of the surveyor and the monument identification. In accordance with AS 34.65.03, a Record of Survey shall be filed for all monuments established and shall show the Homer Grid Coordinates for at least two (2) monuments on the survey.

- 11.20.100 Project acceptance procedure. a. After the City Public Works Engineer is satisfied that the improvements are one hundred percent complete and acceptable, he shall forward to the Homer City Council a recommendation for project approval and acceptance for maintenance.
- b. The Homer City Council shall consider, and take action upon, the recommendation of project approval and maintenance prior to any formal acceptance and approval by the City administration. Acceptance for maintenance shall be as prescribed in Section 11.04.055 of the Homer Municipal Code.
- c. Within fifteen days of formal project approval and acceptance for maintenance by the Homer City Council, the City Public Works Engineer shall write a letter to the Kenai Peninsula Borough stating that the improvements are complete and accepted by the City.
- 1. In the case of new subdivisions, in which plat recording or filing is contingent upon improvement completion, this letter shall constitute notice of compliance with installation improvement regulations pursuant to Section 20.16.060 of the Kenai Peninsula Borough Code of Ordinances, and shall further authorize the Kenai Peninsula Borough to approve the final plat and forward the plat for filing and recording.
- 2. This letter shall further constitute final authorization for the City to allow operation and maintenance of water, sewer, and street improvements.
- d. A one-year construction warranty on the work shall be established starting from the date the City takes over maintenance and operations of the improvements; the developer shall correct any observed defects stemming from the design or construction methods within the one-year period, as directed by the City. To secure the developer's performance of the warranty, the Developer shall provide a warranty guaranty via warranty bond, deposit in escrow, letter of credit, or deed of trust, or other security the City may deem appropriate. The minimum amount of the warranty guaranty shall be the percentage of the estimated cost of all improvements determined by the following table:

Estimated Cost of All	Percent to Secure
Improvements	Warranty
0\$500,000.00	10
\$500,000.01\$1,000,000.00	7.5
\$1.000.000.01 and over	5

If the developer has provided a performance guaranty in accordance with Section 11.20.070(f), the developer may elect to allow the City to retain the performance guaranty until the end of the warranty period, in lieu of a separate warranty bond. (Ord. 85-13 1 (part), 1985).

11.20.110 Violation - Penalty. The violation of any provision contained in this chapter shall be punished under Section 1.16.010 (Ord. 85-13 1 (part), 1985).

ORDINANCE 87-6(s)

DATED at Homer, Alaska this 13 day of April , 1987.

CITY OF HOMER

John P. Calhoun, Mayor

ATTEST:

Patti J. Whalin, City Clerk

Reviewed and Approved as to form and content:

Phil C. Shealy, City Manager

Date: 4/24/87

A. Robert Hahn, City Attorney

Date: 4-24-87

First Reading: 3/9/87

Public Hearing: 03/23/87

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