

CITY OF BOZEMAN

GUIDELINES FOR UTILITY OCCUPANCY ON PUBLIC RIGHT-OF-WAY

Chapter 12.12 of the Bozeman Municipal Code gives the Director of Public Service the authority to regulate public rights-of-way. The following guidelines are to be used in regulating utility or utility-like facilities that are proposed to occupy public right-of-way under the jurisdiction of the City of Bozeman. This document can also be used by utility and non-utility companies as guidance when proposing to locate their facilities in public right-of-way. In case of conflict between these guidelines and state laws concerning utility occupancy of public right-of-way, state laws shall take precedence.

Definition of a Utility:

A utility is defined by State laws, Section 69-3-101 MCA, 69-13-101 MCA, and Sections 35-18-101 through 35-18-503 MCA. When there is a question whether a facility is a public utility, request a legal opinion from the City Attorney.

When Occupancy Permits Are Required:

- New installations of utilities
- Major modifications to existing facilities
- Any change in type, function, or physical location of a facility

When Occupancy Permits Are Not Required:

- Normal repair and maintenance operations on an existing facility
- Substituting wires, which does not increase capacity
- Installing additional capacity in existing conduit systems that does not change the nature or operational conditions or the original facility.
- Replacing a pole in the same location of a pole removed for maintenance purposes.
- For the installation, maintenance, or replacement of publicly-owned and maintained water, sanitary sewer, and storm sewer facilities.

Approval Process:

The applicant must submit the completed permit form and an adequately scaled and dimensioned plan view of the proposed occupancy to the City Engineer. The plan must show the following:

- the type of installation, i.e. 200 pair telephone,
- distances from centerline and distances to the right-of-way,
- distances from existing utilities or other facilities or features,
- nearest cross-streets to the proposed installation, and
- depth of cover for proposed buried utilities.

If the installation is not started within six months after the permit is issued, the applicant is required to submit another permit for approval. The Engineering Department should act on

the permit within 30 days of receiving it. If a permit is denied, based on sound engineering judgment, the applicant may re-submit the application after making any required corrections.

Installation of Aboveground Facilities Such as Cabinets, Poles, Closures, etc.:

A public utility can install an aboveground facility in public right-of-way, as long as the facility does not inconvenience, hinder or endanger the public in the use or maintenance of the roadway or bicycle and pedestrian facilities. All aboveground structures shall be located a minimum of 10 feet from any water, sewer, or storm drain lines.

Occupancy by a Non-Utility:

Cable television facilities, because they perform a public service, are allowed to occupy public right-of-way under an encroachment permit. When permitted, the cable company must meet all of the conditions required for a utility occupancy, including placement and traffic control.

Occupancy by other non-utility facilities may be allowed by encroachment permit only.

Overhead Installations - Longitudinal

Overhead facilities should be installed at the outer edge of the right-of-way, behind the City's standard sidewalk location, or a minimum of 2 feet behind the face of the curb. Poles should not be placed within the standard sidewalk location, which is one to six feet from the right-of-way line. Downguys must have a minimum vertical clearance of 7 feet above existing or future sidewalks.

Overhead Crossings

- Should have a minimum vertical clearance of 21 feet.
- Should be at right angles to the roadway.

Open Trench Roadway Crossings

Open cuts of arterial roadways should be avoided. If pushing or boring has been demonstrated to be impractical, the following are requirements when open cuts are permitted:

- A Street Cut Permit must be obtained.
- The open trench shall be filled, compacted, and open to traffic before the end of the work day unless otherwise approved by the City Engineer.
- If the street is paved, the asphalt shall be replaced as soon as possible. When weather conditions do not permit the use of hot mix, cold mix or Class M-3000 concrete shall be used and replaced with hot mix as soon as available, but no later than 30 days after the batch plant re-opens for the season. The depth of the asphalt patch shall match the existing pavement depth, but shall be not less than three (3) inches compacted depth.
- The permittee will be responsible for maintenance of the hot mix patch for one (1) year from the installation date. If the permittee does not perform the repair within 5 working days of written or verbal notification, the City may make the repair and charge the permittee.

- All work zones shall be signed in accordance with the Manual of Uniform Traffic Control Devices during utility installation, street patching, or patch replacement.

Non-shrink (flowable fill) Backfill

If required, the following are guidelines for the use of non-shrink backfill:

- Should be poured to the final surface grade.
- Allowed to set a minimum of three (3) hours curing time prior to allowing traffic.
- Four (4) inches removed prior to patching.
- Should be of a consistency to fill all voids without excess water.
- Requires no tamping or vibrating.
- Use the following non-shrink formula:

<u>Ingredients</u>	<u>Weight/C.Y.</u>
Cement - 0.45 sack	42 lbs.
Water - 39 gallons*	325 lbs.
Air (entrained) - 1.5%	
Course Aggregate (1" max.)	1700 lbs.
Sand (ASTM C-33)	<u>1845 lbs.</u>
	3912 lbs.

*Note: Start with 30 gallons of water or less and add more if necessary.

Bored, Pushed, or Trenchless Technology Crossings:

- All crossings should be a minimum of 42 inches below grade.
- Crossings should be at right angles to the roadway.
- If pavement upheaval or settling results from the crossing within two years of completion of the work, the pavement shall be repaired by the permittee within 5 days of notification. A Street Cut permit must be obtained prior to beginning repairs.
- Potholing of all crossings of water, sewer, or storm drain lines shall be done to ensure no damage is done to these lines during trenchless installations.

Longitudinal Installation of Underground Facilities

For new developments, installation of facilities in the right-of-way is discouraged. Utilities should be placed outside of the right-of-way in either front yard or rear yard easements.

Where no reasonable alternatives exist, facilities may be permitted in the right-of-way. The facilities should:

- Be placed in conduit.
- Be a minimum of 30 inches deep.
- Manholes and valve boxes should be located outside of the wheel path.
- Manholes should be placed where entrance to the manhole for maintenance will not obstruct traffic.
- Above-ground structures should be placed in the boulevard a minimum of two feet behind the face of the curb, but not within the City standard sidewalk alignment.
- Should have a minimum horizontal separation of ten feet from any sewer or water

mains.

Fiber Optic Cable

- Should be placed within six feet of the edge of the right-of-way, unless authorized by the City Engineer.
- Should be placed in conduit.
- Should be placed 42 inches deep.
- Must have a warning tape 18 inches above the cable.

Natural Gas, Electrical, and Communication Installations:

- Should be placed a minimum of 30 inches deep
- Should have warning tape 18 inches above the installation

Traffic Control and Safety

Part VI of the Manual of Uniform Traffic Control Devices contains the national standards for work zone traffic control. All work zones must be signed in accordance with these standards.

A traffic control plan must be approved by the City Engineering and/or Street Departments for all operations that result in the closure of one lane or more of traffic.

All materials and equipment must be kept out of vehicle lanes open to traffic. Material stored in the right-of-way must be clearly marked with lighted Type II barricades or other approved warning devices.

Open trenches must be either covered (plated) or otherwise adequately protected at the end of the work shift. Open trenches must be protected with a temporary fence or other acceptable barriers.

Equipment working on or near the roadway should have visible amber flashing lights.

Cleanup and Restoration

Cleanup of the installation shall be to an original-like or better condition.

Changes in the Roadway/Right-of-Way Use

If widening, reconstruction, or other improvements of the roadway (including but not limited to pedestrian facilities or public sewer, water, or storm drainage facilities) necessitate relocation of facilities with a utility occupancy permit, the utility shall be relocated at no expense to the City of Bozeman.