



CITY OF FARMINGTON  
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Farmington, Missouri 63640  
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## SPECIFICATIONS FOR 2021 ASPHALT STREET IMPROVEMENTS

1. Scope. These specifications require the furnishing of supplies, machinery, equipment, tools, superintendence, labor, insurance, and other accessories and services necessary to provide asphalt placing and compacting work as directed by representatives of the City of Farmington.
2. Bidder's Qualifications. Bids will be accepted only from well established and qualified contractors; trained and experienced in providing concrete placing and finishing services. No bid will be considered from any Contractor unless they are known to be skilled and were previously engaged in work of a character and scope consistent with these bid specifications.

Bidders must show that their equipment and facilities are sufficient and their workload so arranged as to meet the schedules called for by the Contract without the use of subcontractors. In order to aid the City of Farmington in determining the responsibility of any Bidder, the Bidder shall furnish evidence, satisfactory to the City of Farmington, of the Bidder's qualifications, experience and familiarity with work of the character specified and his or her financial ability to properly prosecute the proposed work to completion.

### 3. Principles and Definitions

- A. The word "City" shall refer to the City of Farmington.
- B. "Contractor" shall mean the successful Bidder to whom a Contract is awarded.
- C. "Work" shall refer to everything agreed to be done and furnished by the Contractor including all supervision, supplies, labor, transportation and equipment together with all responsibilities and obligations imposed by the Contract Documents.
- D. "Equipment" shall mean the trucks, pavers, rollers, and other apparatus which are owned and operated by the Contractor and which are required to be maintained by the Contractor for the performance of the Contract in accordance with the Specifications.
- E. "Specifications" shall mean all specifications pertaining to the Work to be performed.

- F. "Contract" shall mean the fully executed document which binds the interested parties in an agreement to fulfill all terms, conditions, and specifications pertaining thereto.
- G. "Invitation for Bids" shall be the means by which the City of Farmington solicits bids from Qualified Contractors for Work which the City of Farmington may from time to time deem necessary to have performed.
- H. "Install", "Furnish", "Provide", or words of like import shall mean the Contractor shall install, furnish, or provide, and similarly the words "Approved", "Authorized", "Required", "Satisfactory", "Acceptable", or words of like import shall mean, as applicable, approved by, authorized by, required by, satisfactory to, or acceptable to the City of Farmington, unless otherwise expressly stated.

#### 4. General Requirements.

A contractor crew shall consist of all necessary personnel and all necessary tools and equipment to safely and efficiently complete the work. The City of Farmington reserves the right to do any Work covered within this Contract by its own forces, to cause such Work to be completed by other means, or to defer any Work to a future date.

Since Contractor(s) employees come in contact with the City of Farmington customers, they shall be completely dressed in suitable clothing which shall be clean at the beginning of each day. Identification badges or other forms of identification which displays the Company's name, person's picture, position, etc. is recommended but not mandatory and must be shown to the customer upon request.

All motor trucks and other vehicles provided by the Contractor to perform the Work shall bear the Contractor's number and shall be well marked and identified with company insignia or name designating the vehicles as property of the Contractor. All equipment must be maintained in such a manner as to minimize downtime. The City of Farmington shall not render payment for any charges in connection with lost productivity due to equipment failure or dysfunction.

When convenient for the City of Farmington, the Contractor may be given permission to park vehicles and equipment on the City of Farmington property. Otherwise, Contractor shall be responsible for parking vehicles and/or storing equipment at locations other than the City of Farmington owned facilities and paying all associated costs. The City of Farmington shall not be responsible for any damage or loss of Contractor's equipment.

Contractor shall observe all generally recognized safety rules, regulations, and methods to prevent injury to all employees and other persons or damage to property of the City of Farmington or the public arising from its operations. The Contractor shall observe all laws and regulations applicable to its operations including without limitation OSHA requirements, Missouri Department of Transportation requirements, Workmen's Compensation, Social Security payments, tax withholding payments, Contractor's License, etc.

Contractor crew foreman shall have a cell phone for the City of Farmington to contact them as needed.

Contractor shall promote a drug and alcohol free working environment.

#### 5. Work.

Contractor shall perform all Work to the complete satisfaction of the City of Farmington and in accordance with all municipal, county, state and other local laws, ordinances, and regulations applicable to Work of this character and nature. All Work performed by the Contractor is subject to inspection and approval by the City of Farmington. Any Work not meeting the minimums as set forth in these Specifications, or generally accepted standards, or Work which has been falsely represented in any fashion by Contractor shall be redone by the Contractor at no (zero) cost to the City of Farmington. Failure by the City of Farmington to inspect Contractor's Work shall in no way operate to relieve Contractor from any obligations, liabilities, or responsibilities in connection with this Contract.

Contractor shall certify that complaints of any nature received from property owners or public authorities resulting from this Work will receive immediate attention and that all efforts will be made to effect a prompt adjustment. If any damage is done to the property of others by Contractor's workforce, Contractor shall repair and restore at its sole expense any such property and correct any damage inflicted thereto, all to the complete satisfaction of the owner(s) of the injured property. All complaints, and any action taken by Contractor in connection with such complaints, shall be reported to the City of Farmington.

Contractor shall secure all permits and licenses necessary for the prosecution of the Work to be performed and pay all charges and fees required for such permits and licenses.

#### 6. Billing Restrictions.

The City of Farmington shall not be charged for time spent on maintenance of equipment, including without limitation fueling of vehicles, oil or antifreeze changes,

changing and/or sharpening of chipper blades, and other similar maintenance and repair work. The City of Farmington will not render payment for equipment that is incapable of fully performing its intended function.

The City of Farmington will not pay for meals and other incidental items for Contractor's employees.

#### 7. Supervision of Work and Workmanship.

Contractor shall supervise and direct the Work, using the Contractor's best skill and attention. The Contractor shall be solely responsible for and have control over construction means, methods, techniques, and procedures.

**Contractor is an independent contractor and neither Contractor nor any of its employees shall be deemed to be agents or employees of the City of Farmington.**

Contractor shall employ only workers who are competent to perform the Work assigned to them and who are adequately trained and experienced in performing first-class Work of the character and magnitude required by this Contract and expected of reputable Contractor's performing work similar to the Work necessary under this Contract.

The City of Farmington will periodically review and evaluate crew performance based upon factors such as, but not limited to, quality of work, quantity of work, clearances obtained, safety awareness and public relations efforts.

#### 8. PREPARATION OF BASE

The rock base will be prepared by the City ready for paving. On streets where the existing asphalt will be overlaid, the Contractor shall apply a complete coverage tack coat to the existing surface. The tack coat shall be uniformly applied at a rate of 0.05 to 0.15 gallons per square yard using diluted asphalt emulsion type SS-1 or SS-1h. Prior to placing any tack coat or surface course, the base shall be cleaned of all debris, dirt, grass or other foreign matter.

#### 9. THICKNESS OF SURFACE COURSE

For prepared rock base, the surface shall be placed in two (2) courses to the compacted thickness as directed by the City.

#### 10. SAMPLE AND TESTING

If requested by the City, the Contractor shall furnish for test and analysis, representative samples of the materials to be used in the work. Sampling and

testing shall be in accordance with the latest revisions of the American Association of State Highway Officials (AASHO) and Materials (ASTM) Standard procedures for sampling and testing the materials being used in the project.

#### 11. SMOOTHNESS

The surface of the completed work, when tested with a (10) foot straightedge, shall not contain irregularities in excess of ¼ inch.

#### 12. COLD MILLING

Butt Joint approximately 1 inch in depth, tapered 30 inches to 40 inches back to a 0-inch depth to make a smooth transition.

#### 13. MINERAL AGGREGATE

The mineral aggregate for asphalt plant mix shall consist of course aggregate, fine aggregate and if needed, mineral filler. The course aggregate shall be sound, angular crushed stone or crushed gravel. The fine aggregate shall be well graded sand. Mineral filler shall consist of limestone dust, Portland cement or other suitable mineral matter. The mineral aggregate and asphalt shall be combined to meet the following gradation for asphalt plant mix surface.

<u>Surface Mixture</u> <u>Sieve Size</u>	<u>Percent Passing</u> <u>by Weight</u>
1/2	100
3/8	80-100
NO. 4	55-75
10	30-50
200	4-10
Asphalt	5.0-6.0

(Percent by weight of total mix)

#### 14. ASPHALT:

Asphalt used on this bid shall be BP-1. Asphalt material used must be virgin material. No recycled asphalt products (including shingles) shall be used. All mixtures shall be mixed in an asphalt plant which has been approved by the City and shall arrive on the job site at not less than 275 degrees Fahrenheit.

#### 15. SPREADING SURFACE COURSE

For all areas of more than 1,000 square yards, the asphalt surface course shall be spread and struck off with a paver. Any irregularities in the surface of the

pavement course shall be corrected directly behind the paver. Excess material forming high spots shall be removed with a shovel or a lute, indented areas shall be filled with hot mix and smoothed with a lute or the edge of a shovel being pulled over the surface. Casting of mix over such areas shall not be permitted.

If it is impractical to use a paver or spread box in areas of 1,000 square yards or less, asphalt base and surface courses may be spread and finished by hand. Wood or steel form, rigidly supported to assure correct grade and cross-section, may be used. Broadcasting of the material shall not be permitted. Any lumps that do not break down readily shall be removed.

## 16. COMPACTION

Rolling shall start as soon as the hot mix material can be compacted without displacement. Rolling shall continue until thoroughly compacted and all marks have disappeared. Rollers shall be either steel-shelled or pneumatic-tired, vibrating, and weighing 12 – 14 tons. In areas too small for the roller, a vibrating plate compactor or hand tamper shall be used to achieve thorough compaction.

## 17. BASIS OF PAYMENT

The Bidder acknowledges that the payment per ton for asphalt pavement may vary from month to month dependent on the published Missouri Department of Transportation “Asphalt Price Index”. A current copy of the “Asphalt Price Index” is attached as a part of these specifications for informational purposes. The Bidder shall base his bid on the current asphalt price indices (January 2021) of \$395.00 per liquid ton of asphaltic oil. The monthly price per ton of asphalt applied will be calculated for adjustment, using the following equation for that published monthly price index as follows:

$$A = (B \times C) \times (D - E) \quad \text{Where:}$$

A=Adjustment for mix placed during monthly index period.

B=Tons of asphalt mix placed during the select month.

C=Percent (%) of virgin asphalt binder used in the asphalt mix.

D=Monthly price index at the time of asphalt mix placement.

E=Monthly price index at the time of the bid notification.

As an example of the above, consider the following:

EXAMPLE FOR CALCULATING ASPHALT PRICE ADJUSTMENT

Assume the following example:

Say your initial bid amount for asphalt is \$45.00 / ton.

B= Say you placed 1,000 tons of asphalt during a particular month.

C= Say the asphalt oil composition is 5.6% by weight.

D= Say the asphalt index is \$600.00 per liquid ton for the particular month.

E= Initial asphalt index of \$395.00 for January 2021 bid consideration.

$$A = (1,000 \text{ tons} \times 0.056) \times (\$600.00 - \$526.25) = \$4,130.00$$

$$\text{Adjustment per ton of asphalt} = \$4,130.00 / 1,000 \text{ tons} = \$4.13 / \text{ton}$$

$$\text{Price per ton payment} = \$45.00 + \$4.13 = \$49.13 / \text{ton}$$

The Bidder also acknowledges that the “Asphalt Price Index” may vary either upward or downward, and as such, the price paid for asphalt mix placed will also vary accordingly, upward or downward.

The bidder also acknowledges that the City may at any time cause for the addition or elimination of any planned street project.

18. ESTIMATED 2021 ASPHALT QUANTITIES

Asphalt for Street Projects:	2,000 Tons
Asphalt for Parking Lots:	250 Tons
MC-30 Base Primer:	150 Gallons
Type SS-1 or SS-1h Tack Coat:	1,200 Gallons