NON-BIDDING PROPOSAL

NOTE: Quantity Sheets are no longer included in the electronic proposal. Please download these separately from the Contract Procurement web site.

TRANSPORTATION CABINET
Department of Highways
Frankfort, Kentucky 40622

PROPOSAL NO. _____
PROJECT CODE NO. 03-0092

LETTING OF FEBRUARY 14, 2003
Sealed Bids will be received in the Division of Contract Procurement and/or the Auditorium located on the 1st Floor of the State Office Building until 10:00 A.M., EST, on FEBRUARY 14, 2003 Bids will be publicly opened and read at 10:00 A.M., EASTERN STANDARD TIME.

PROJECT IDENTIFICATION AND DESCRIPTION:

FE GR 03 0000002, CAMPBELL-OWEN COUNTIES

Cleaning and Painting.

(6)

GEOGRAPHIC COORDINATES:
LATITUDE - 38° 58' NORTH
LONGITUDE - 84° 18' WEST

COMPLETION DATE ESTABLISHED FOR PROJECT: NOVEMBER 15, 2003

LIQUIDATED DAMAGES SEE STANDARD SPECIFICATIONS

REQUIRED BID PROPOSAL GUARANTY: Not less than 5% of the total bid.

(Check guaranty submitted: Cashier's Check |__| Certified Check |__| Bid Bond |__|)

BID BONDS WHEN SUBMITTED WILL BE RETAINED WITH THE PROPOSAL.

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IV	INSURANCE
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VI	BID ITEMS
VII	CERTIFICATION

BID..... |__|

SPECIMEN..... |__|

PROPOSAL ISSUED TO: _____

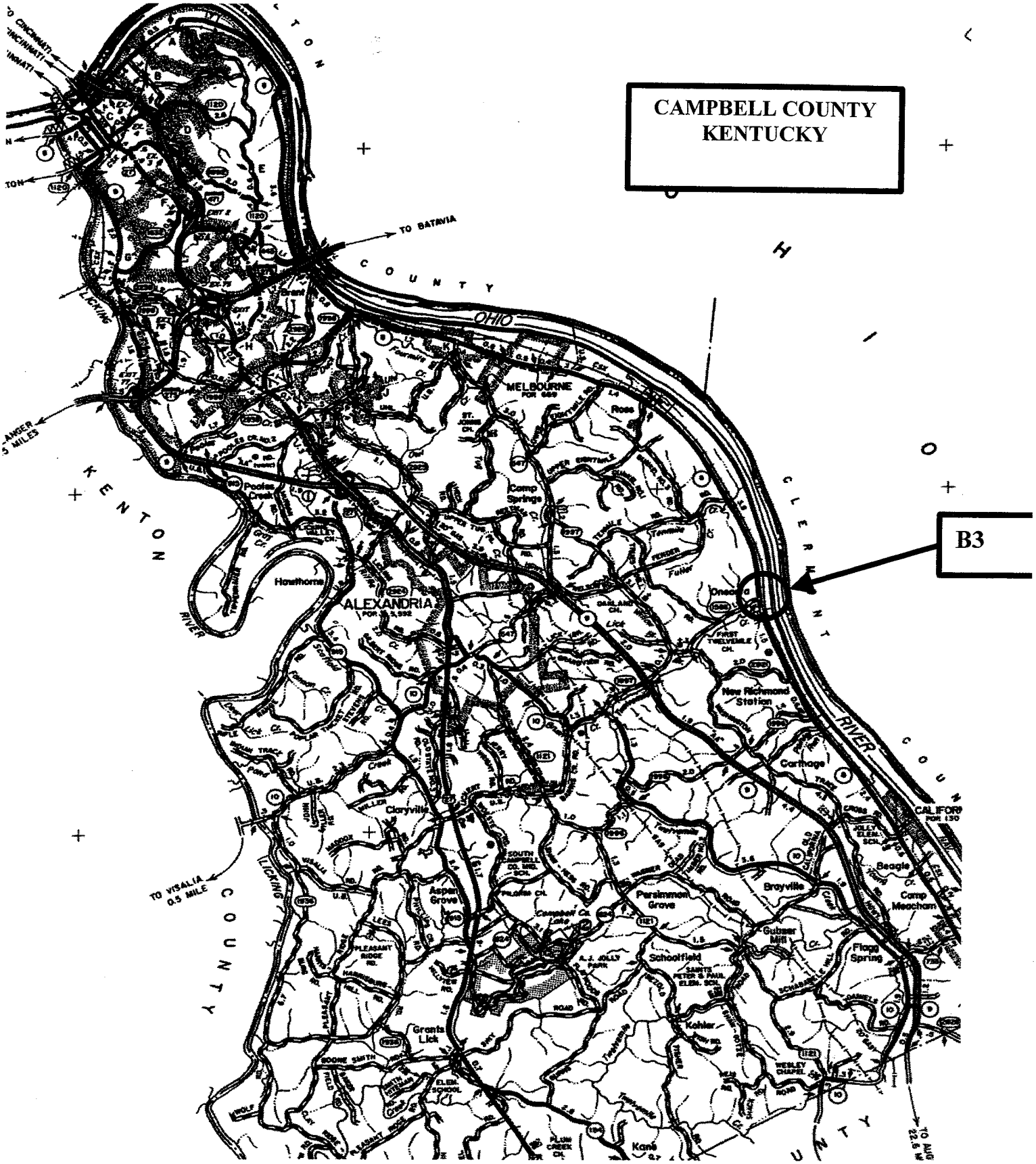
_____
Address City State Zip

PART I

SCOPE OF WORK

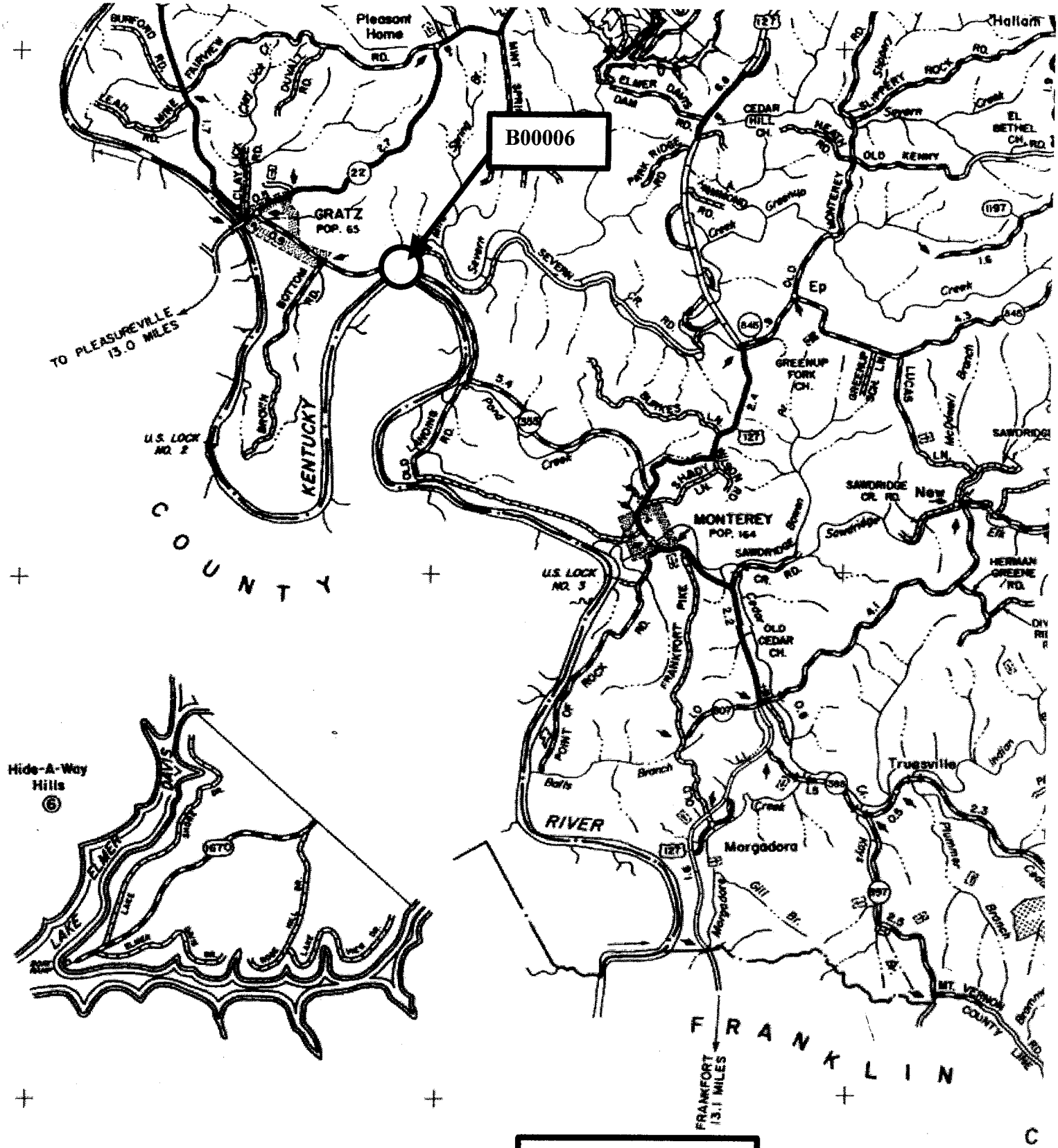
1. Project Detail

a. See Sketches (2 Sheets), Description Summary and Material Summary	Attached
b. Special Notes Applicable to Project	Attached
c. Supplemental Specifications	Attached
d. Special Notes for Cleaning and Painting Campbell & Owen Counties	Attached


CAMPBELL COUNTY
KENTUCKY
B3
TO BATAVIA
OHIO
RIVER
KENTON
COUNTY
CLERMONT
COUNTY
MELBOURNE
ALEXANDRIA
Hawthorne
Pooles Creek
Camp Springs
Ross
Oneonta
New Richmond Station
Carthage
Claryville
Aspen Grove
Persimmon Grove
Brayville
Beagle
Camp Meacham
Gubser Mill
Flagg Spring
Schoolfield
Kohler
Grants Lick
Kane
TO VISALIA 0.5 MILE
LICKING
RIVER

(1)

B00006



Owen County
Kentucky

NATIONAL OR STATE FOREST, PARK OR RESERVATION

COUNTY SEAT

OTHER CITIES AND TOWNS

AIRFIELD, SANITED FACILITIES

LANDING AREA OR STRIP (INCLUDING PRIVATE AIR FIELDS)

(2)

FE GR 03 0000002, CAMPBELL-OWEN COUNTIES DESCRIPTION SUMMARY

COUNTY	PROJECT NUMBER	DESCRIPTION
Campbell	FE02 019 0008 B00003	1. The Maysville-Newport Road (KY 8). Bridge over Twelve Mile Creek (MP 17.930).
Owen	FE02 094 0355 B00006	2. The Monterey-Gratz Road (KY 355). Bridge over Severn Creek (MP 4.480).

fegr2.xls
CAMPOWEN

MATERIAL SUMMARY

PROJECT	CLEAN & PAINT STRUCT STEEL	M & C TRAFFIC
(SUBSECTION)	LS	LS
CAMPBELL	1.00	1.00
OWEN	1.00	1.00
TOTAL	2.00	2.00

SPECIAL NOTES APPLICABLE TO PROJECT

THE FOLLOWING STANDARD DRAWINGS APPLY TO THIS PROJECT AND MAY BE OBTAINED BY CONTACTING THE DEPARTMENT OF HIGHWAYS, DIVISION OF DESIGN, AT A COST OF $0.50 PER COPY:

Lane Closure Two-Lane Highway Case I (TTC-100)
Lane Closure Two-Lane Highway Case II (TTC-105)
Miscellaneous Traffic Control Devices (TTD-100)
Miscellaneous Traffic Control Devices (TTD-105)
Post Splicing Detail (TTD-110)
Arrow Panel (TTD-115)

2000 SPECIFICATIONS
Any reference in the plans or proposal to the ***Standard Specifications for Road and Bridge Construction, Edition of 1998***, and ***Standard Drawings, Edition of 2000*** are superseded by ***Standard Specifications for Road and Bridge Construction, Edition of 2000*** and ***Standard Drawings, Edition of 2003.***

2001 SUPPLEMENTAL SPECIFICATIONS
The ***2001 Supplemental Specifications*** to the 2000 Standard Specifications for Road and Bridge Construction shall apply to this project.

PROPOSAL ADDENDA
All Addenda to this proposal must be incorporated into the proposal when the bid is submitted to the Kentucky Department of Highways. Failure to use the correct and most recent bid sheet(s) may result in the bid being rejected.

BID SUBMITTAL
Bidder must use the Department's Highway Bid Program available on the internet web site of the Department of Highways, Division of Contract Procurement. (www.kytc.state.ky.us/contract)

The Bidder must download the bid items created from the web site to prepare a bid proposal for submission to the Department. The bidder must insert the completed bid item sheets printed from the Program into the bidder's proposal and submit with the disk created by said program.

JOINT VENTURE BIDDING
Joint Venture bidding is permissible. However, both companies MUST purchase a bidding proposal. Either proposal may be submitted but must contain the company names and signatures of both parties where required. A joint bid bond of 5% may be submitted for both companies or each company may submit a separate bond of 5%.

UNDERGROUND FACILITY DAMAGE PROTECTION
The contractor is advised that the Underground Facility Damage Protection Act of 1994, became law January 1, 1995. It is the contractor's responsibility to determine the impact of the act regarding this project, and take all steps necessary to be in compliance with the provisions of the act.

ASPHALT BASE PRICE
The Asphalt Base Price shall be **$170.00 (english)** as applicable in **Section 109.07** of the ***2000 Standard Specifications.***

Supplemental Specifications to The Standard Specifications for Road and Bridge Construction, 2000 Edition (Effective with the February 14, 2003 Letting)

SUBSECTION: 102.07.01 General.
REVISION: Replace the first sentence with the following:

Submit the Bid Proposal on the forms furnished by the Department including the Highway Bid Program bid item sheets and disk created from the Department's internet web site.

SUBSECTION: 102.07.02 Computer Bidding.
REVISION: Replace the subsection with the following:

Subsequent to ordering a Bid Proposal for a specific project, use the Department's Highway Bid Program on the internet web site of the Department of Highways, Division of Contract Procurement. Download the bid item quantities from the Department's web site to prepare a Bid Proposal for submission to the Department. Insert the completed bid item sheets printed from the Highway Bid Program into the Proposal and submit along with the disk created by said program.

In case of a dispute, the Bid Proposal and bid item sheets created by the Highway Bid Program take precedence over any bid submittal.

Furthermore the Department takes no responsibility for loss, damage of disks or the compatibility with the bidder's computer equipment or software.

SUBSECTION: 102.08 IRREGULAR BID PROPOSALS.
REVISION: Add the following to the first set of items:

4) Fails to submit a disk created from the Highway Bid Program

SUBSECTION: 102.08 IRREGULAR BID PROPOSALS.
REVISION: Replace 1) of the second set of items with the following:

1) when the Bid Proposal is on a form other than that furnished by the Department or printed from other than the Highway Bid Program , or when the form is altered or any part is detached.

SUBSECTION: 103.05 REQUIREMENT OF CONTRACT BOND.
REVISION: Replace the first sentence of the first paragraph with the following:

To be acceptable to the Department, the surety must have a minimum A. M. Best rating of an "A-", be listed on the U.S. Treasury Listing of approved sureties for an amount equal to or greater than the amount of the bond and be an admitted carrier in the Commonwealth of Kentucky.

Replace the last sentence of the first paragraph with the following:

If at any time during the performance of the Contract the surety company falls below the minimum acceptable requirements, the Contractor shall file a new bond in an amount established by the Commissioner, or his designee, within 14 calendar days of such failure to meet the minimum requirements.

Add the following to the end of the subsection:

The Department reserves the right to copy the surety on all of its communications with the Contractor concerning the Contractor's performance, or performance deficiencies, on the project and further reserves the right to communicate directly with the surety to inform them of the Contractor's performance, or performance deficiencies, on the bonded project.

SUBSECTION: 108.02 PRECONSTRUCTION CONFERENCE.
REVISION: Add the following to the first paragraph:

Include a plan for updating the schedule. As a minimum, the schedule must be updated whenever a situation arises or event occurs that significantly affects the progress of the work or when the Engineer directs.

SUBSECTION: 109.04.02 Cost-Plus Work.
PART: F) Overhead.
REVISION: Add the following new part:

F) Overhead. The Department will pay for overhead cost associated with administering the work, not to exceed 5 percent, when the work is done by a Subcontractor.

SUBSECTION: 112.03.01 General Traffic Control.
PART: G) Signs.
REVISION: Replace the first sentence with the following:

Completely cover all lettering and symbols on existing, permanent, and temporary signs which do not properly apply to the current traffic phasing, and maintain the covering until the signs are Applicable or are removed.

SUBSECTION: 112.03.01 General Traffic Control.
PART: I) Temporary Traffic Signals.
REVISION: Replace the MUTCD reference "Section 4B" with "Chapter 4D"

SECTION: 201 STAKING.
Delete the section and replace with the following:

201.01 DESCRIPTION. When listed as a bid item, furnish all personnel, equipment, stakes, and hubs necessary to construct the roadway and appurtenant structures to the grade and alignment specified in the Contract. When no bid item is listed, the Department will perform staking.

201.02 MATERIALS AND EQUIPMENT. Reserved.

201.03 CONSTRUCTION

201.03.01 Contractor Staking. Perform all necessary surveying under the general supervision of a Professional Engineer or licensed Land Surveyor.

The Department's Engineer will perform the following:

1) Provide adequate referencing of control points to allow prompt re-establishment of the survey centerline, right of way, ramps, crossroads, and frontage roads during construction.
2) Set permanent or temporary bench marks as required.
3) Take any cross sections to verify the accuracy of the original ground information.
4) Take "check sections" to verify that construction is to grade and alignment as specified in the Contract.

The Contractor will perform the following:

1) Re-establish the centerline and set such additional points as may be necessary for construction of the project. Verify the accuracy of the horizontal and vertical control as established by the Department's Engineer before beginning construction.
2) Establish clearing lines so that the project may be cleared without violating the limits of the right of way.
3) Set slope stakes right and left of the survey centerline at 50' to 100' intervals to guide the contractor in constructing the cuts and fills. These stakes are generally set to shoulder grade for fills and ditch grade for cuts. The cut or fill information, slope, and distance from centerline should be on the front face of the stake; the station number should be on the back of the stake. This stake should be guarded with a lath that has the station number written on the side facing the centerline.
4) Grade Stakes (Bluetops). Fine grade control will be set to aid the Contractor in establishing the typical sub-grade section. When using conventional transit and chain methods this fine grade control will be established by setting hubs(referred to as blue tops) every fifty feet to the sub-grade section. These blue tops are set to the hundredth of a foot in elevation and are located left and right of pavement centerline, usually at the edge of metal. Bluetops will be set for the top of sub-grade and the top of aggregate base and/or drainage blanket material. Refer to Section 204.03.10 and Section 302.03.06 for construction tolerances of sub-grade and aggregate base or drainage blanket.
5) Stake all structures (bridges, culverts, pipe, and other appurtenances) so that they can be built to the proper line and grade as shown on the plans and to perform the function for which they were designed.

revision continued

201.03.02 Department Staking. The Department's Engineer will set all stakes necessary for the construction of the roadway and appurtenant structures to the proper grade and alignment in accordance with the contract.

201.03.03 Electronic Surveying. The Department encourages the use of new and advanced technology in the construction of its roads and structures. However, the following restrictions apply:

1) Tolerances are unchanged. Refer to Section 204.03.10 and Section 302.03.06.
2) Sub-grade check sections are to be done every 500' in tangent sections and every 100' in curves using conventional survey methods to establish bluetops and to verify the correct operation of the electronic equipment.
3) The Contractor will submit his electronic data files to the Department's Engineer at the beginning of the project so that the Engineer can reference the data for verification of the field work.

201.04 MEASUREMENT.

201.04.01 Contractor Staking. When listed as a bid item, the Department will measure staking as lump sum. The Department will not measure surveying required to correct any errors or inaccuracies resulting from construction operations for payment.

201.04.02 Department Staking. The Department will not measure quantities for payment. When any stakes are disturbed due to unwarranted negligence of the Contractor, the Department will measure the work required to reset the stakes and deduct the cost from monies due the Contractor.

201.04.03 PAYMENT. The Department will make payment for the completed and accepted quantities under the following:

Code	Pay Item	Pay Unit
2726	Staking	Lump Sum

The Department will consider payment as full compensation for all work required under this section.

SUBSECTION: 204.03.08 Disposal of Wasted Materials.
REVISION: Add the following to the end of the second paragraph:

The Department will pay for the geotechnical investigation and analysis of the proposed waste area when one is requested by the Engineer. Ensure all work is performed by a pre-qualified geotechnical consultant and according to the Department's Geotechnical Manual.

SUBSECTION: 206.04.01 Embankment-in-Place.
REVISION: Add the following:

The Department may make adjustments to embankment-in-place projects when there is actually unanticipated waste on the project. Waste generated by the project phasing will not be considered for adjustment. The Department will make an adjustment for the actual costs incurred by the Contractor.

SUBSECTION: 208.03.03 Application of Chemical.
PART: B) Lime.
NUMBER: 3)
REVISION: Replace the second sentence with the following:

Use only when saturated soil conditions exist and the slurry method would worsen the situation or when weather conditions prohibit the use of slurry.

SUBSECTION: 208.03.06 Curing and Protection.
REVISION: Replace the first sentence of the fourth paragraph with the following:

Do not allow any traffic or equipment on the finished surface until 7 days above 40 °F curing is completed or the roadbed cores achieve a minimum strength requirement of 75 psi.

SUBSECTION:	208.04.02 Lime.
REVISION:	Add the following to the end of the second paragraph: When hydrate or quicklime is furnished for dry application, the Department will measure the actual quantity applied to the roadbed.
SUBSECTION:	212.03.03 Permanent Seeding and Protection.
PART:	A) Seed Mixtures for Permanent Seeding.
REVISION:	Replace with the following: A) Seed Mixture for Permanent Seeding. Use seed Mixture No. I, No. III, or as the Contract specifies. Mixture No. I: 75% Kentucky 31 Fescue (Festuca arundinacea) 10% Red Top (Agrostis alba) 5% White Dutch Clover (Trifolium repens) 10% Rygrass, perennial (Lolium perenne) Mixture No. III: 30% Kentucky 31 Fescue (Festuca arundinacea) 15% Red Top (Agrostis alba) 15% Partridge Pea (Cassia fasciculata) 20% Sericea Lespedeza 10% Sweet Clover – Yellow (Melitotus officinalis) 10% Rygrass, perennial (Lolium perenne)
SUBSECTION:	212.03.03 Permanent Seeding and Protection.
PART:	C) Crown Vetch.
REVISION:	Replace the first sentence with the following: Sow crown vetch seed on all areas having a slope 3:1 or steeper and consisting of soil or mixtures of broken rock and soil.
SUBSECTION:	212.03.03 Permanent Seeding and Protection.
PART:	E) Erosion Control Blanket.
REVISION:	Replace the first sentence with the following: Install erosion control blankets in ditches, except those to be paved or rock lined, to a flow depth of 1.5 feet.
SUBSECTION:	213.03.02 Progress Requirements.
REVISION:	Replace the word "may" with "will" in the second sentence of the third paragraph.
SUBSECTION:	213.03.02 Progress Requirements.
REVISION:	Replace the third sentence of the third paragraph with the following: Additionally, the Department will apply a penalty equal to the liquidated damages when all aspects of the work are not coordinated in an acceptable manner within 5 days after written notification.
SUBSECTION:	214.04 MEASUREMENT.
REVISION:	Replace the second sentence with the following: The Department will not measure fabric when the Contract indicates the fabric is incidental to the work or when the specification for another item requires incidental installation of geotextile fabric.
SUBSECTION:	302.02 MATERIALS.
REVISION:	Add the following: 302.02.03 Mixer. Equip the mixer with a water flow system with a positive cut-off control that will stop the flow of water simultaneously with any stoppage in the flow of aggregate and with valves or other devices that be easily reset when a change in the rate of flow is desired.

SUBSECTION:	401.02.01 All Asphalt Mixing Plants.
PART:	A)
REVISION:	Replace the first sentence of the second paragraph with the following: Provide a laboratory inspected and qualified according to the Department's Quality Assurance Program for Materials Testing and Acceptance and conforming to the following minimum requirements:
SUBSECTION:	401.02.01 All Asphalt Mixing Plants.
PART:	A)
REVISION:	Replace the fourth paragraph with the following: In addition to the equipment required to perform testing according to the AASHTO standards and Kentucky Methods (KM), equip each laboratory with the following minimum furnishings and equipment, conforming to the applicable specifications, as required for the type of construction specified in the Contract: 1) one workbench, at least 2.5 feet wide by 6 feet long; 2) one desk or table and 2 chairs; 3) a fire extinguisher located near the door; and 4) a first aid kit.
SUBSECTION:	401.02.01 All Asphalt Mixing Plants.
PART:	Between Items "H" and "I"
REVISION:	Insert the following new item: Recordation. Provide an automatic graphic or digital record of the production quantities according to AASHTO M156.
SUBSECTION:	401.02.01 All Asphalt Mixing Plants.
PART:	I) Thermometers.
REVISION:	Delete the third paragraph.
SUBSECTION:	401.02.04 Special Requirements for Continuous Plants.
PART:	B) Weight Calibration of Asphalt Binder and Aggregate Feed.
REVISION:	Add the following new paragraph: When equipped with aggregate weighing devices (belt scales), calibrate each cold feeder, along with the aggregate weighing devices, according to Subsection 401.02.05 A) and B).
SUBSECTION:	402.03.01 Responsibilities.
PART:	B) Setup.
REVISION:	Replace (MSG) with (G_{mm})
SUBSECTION:	402.03.01 Responsibilities.
REVISION:	Add the following: C) Process Control. After the setup period, perform the process control operations of KM 64-426.
SUBSECTION:	402.03.02 Acceptance.
PART:	A) General.
REVISION:	Add the following: Document and report all acceptance tests on the Asphalt Mixtures Acceptance Workbook (AMAW). Submit the completed AMAW for each lot to the Department within 5 working days after the completion of the lot.
SUBSECTION:	402.03.02 Acceptance.
PART:	C) Setup.
REVISION:	Add the following after the second sentence: For mixtures with a total-project quantity between 500 and 1,000 tons, perform a minimum of one process control test for AC, AV, and VMA, and report the results to the Engineer.

SUBSECTION: 402.03.03 Verification.
REVISION: Replace the first two sentences with the following:

For volumetric properties, the Department will perform a minimum of one verification test for AC, AV, and VMA for each lot according to the corresponding procedures as given in Subsection 402.03.02. For specialty mixtures, the Department will perform one AC and one gradation determination per lot according to the corresponding procedures as given in Subsection 402.03.02. However, Department personnel will not perform AC determinations according to KM 64-405.

SUBSECTION: 402.05.02 Asphalt Mixtures and Mixtures with RAP.
PART: D) Conventional and RAP Mixtures Placed Monolithically as Asphalt Pavement Wedge.
REVISION: Replace with the following:

The Department will pay as mainline mixture but use a 1.00 pay value for all properties.

SUBSECTION: 402.05.01 Specialty Mixtures.
REVISION: Add "asphalt mixtures for temporary applications" to the list of defined specialty mixtures.

SUBSECTION: 403.02.05 Release Agent.
REVISION: Replace with the following:

Provide materials conforming to KM 64-442.

SUBSECTION: 403.02.06 Transport Equipment.
REVISION: Add the following after the first sentence:

Do not load trucks that are contaminated with an unapproved release agent. When such contamination is identified after loading, reject the load. In either case, remove the truck and respective driver from the project for the duration of the project.

SUBSECTION: 403.02.09 Small Tools and Portable Equipment.
REVISION: Add the following at the end of the first paragraph:

Do not use an unapproved release agent on any small tools or equipment incidental to the paving operation.

SUBSECTION: 403.03.01 Seasonal and Weather Limitations.
REVISION: Replace "November 15" with "November 30" throughout the Subsection.

SUBSECTION: 403.03.02 Preparation of Base.
REVISION: Replace the first sentence of the eighth paragraph with the following:

Remove existing Type V markers. Fill the recess and any additional damaged area with compacted asphalt mixture within 24 hours of removal.

SUBSECTION: 403.03.03 Preparation of Mixture.
PART: A) Mixture Composition.
REVISION: Replace Part A) with the following:

A) Mixture Composition. Provide the appropriate mixture composition for the specified asphalt mixture, or substitute a higher aggregate type. When substituting a mixture of a higher ESAL class, provide a mixture of no more than one ESAL class higher than the specified asphalt mixture. Conform to the gradation requirements (control points) of AASHTO MP2 for the Superpave mixture. Unless the Engineer authorizes otherwise in writing, use the same type and source of ingredient aggregates and asphalt binder throughout the entire project for each type of mixture. For asphalt surface courses containing 100 percent polish-resistant coarse aggregate, limit the portion of non-polish-resistant fine aggregate retained on a No. 4 sieve to 5 percent of the total combined aggregates.

When using a porous aggregate, increase the asphalt binder content (AC) as needed for asphalt binder absorption by the aggregate.

The following aggregate requirements are listed in order of the highest, Type A, to the lowest, Type D:

1) Type A. Provide 100 percent of the coarse aggregate Class A sources. Ensure that 20 percent of the total combined aggregate is Class A polish-resistant fine aggregate.

Type B. Select either of the 2 following options:

revision continued

a) Provide 100 percent of the coarse aggregate from Class B sources.

b) Provide a combined aggregate, retained on the No. 4 sieve, that is a minimum of 50 percent from any Class A polish-resistant aggregate source except those identified as "Not Permitted as the polish-resistant portion of Class B blends." Submit all Class B blends to the Department for review.

For Option a) or b) above, ensure one of the following:

- 20 percent or more of the total combined aggregate is Class A polish resistant fine aggregate.
- 30 percent or more of the total combined aggregate is Class B polish resistant fine aggregate.
- 30 percent or more of the total combined aggregate is a combination of Class A and Class B polish resistant fine aggregate.

3) Type C. Ensure that 40 percent or more of the total combined aggregate is polish-resistant; Class A coarse, fine, or combination.

4) Type D. No restriction on aggregate type.

SUBSECTION: 403.03.03 Preparation of Mixture.
PART: B) Moisture Content of Mix
REVISION: Replace the third sentence with the following:

When moisture contents are 0.10 percent or greater, adjust the AC determination made on plant-produced mixture to reflect the actual AC as KM 64-434 directs.

SUBSECTION: 403.03.03 Preparation of Mixture.
PART: C) Mix Design Criteria.
REVISION: Add the following after the first sentence:

The Department will allow ESAL Class 1 mixtures to pass through the restricted zone.

SUBSECTION: 403.03.03 Preparation of Mixture.
PART: C) Mix Design Criteria.
NUMBER: 1)
REVISION: Replace the first sentence with the following:

Submit a preliminary mix design, completed using a Superpave gyratory compactor (SGC) conforming to AASHTO PP 35.

SUBSECTION: 403.03.03 Preparation of Mixture.
PART: C) Mix Design Criteria.
NUMBER: 2) Selection of Optimum AC.
REVISION: Add the following:

Ensure the optimum AC is a minimum of 5.0 percent by weight of the total mixture for all 0.5-inch nominal surface mixtures and 5.3 percent by weight of the total mixture for all 0.38-inch nominal surface mixtures.

SUBSECTION: 403.03.06 Thickness Tolerance.
TABLE: Nominal Maximum Size of Mixture vs. Thickness Range
REVISION: Delete

SUBSECTION: 403.03.09 Leveling and Wedging, and Scratch Course.
PART: A) Leveling and Wedging.
REVISION: Replace the first sentence with the following:

Conform to the gradation requirements (control points) for base, binder, or surface as applicable.

SUBSECTION: 403.03.09 Leveling and Wedging, and Scratch Course.
PART: B) Scratch Course.
REVISION: Replace the second sentence with the following:

Conform to the gradation requirements (control points) for base, binder, or surface as the Engineer directs.

SUBSECTION: 407.02.02 Aggregate.
REVISION: Change Sieve Size No. 30 to read Sieve Size No. 50.

SECTION: 404 OPEN-GRADED FRICTION COURSE
TABLE: LOT PAY ADJUSTMENT SCHEDULE FOR SPECIALTY MIXTURES
REVISION: Replace the table with the following table:

LOT PAY ADJUSTMENT SCHEDULE FOR SPECIALTY MIXTURES (TEST DEVIATION FROM JMF)

	Pay Value	Deviation From JMF (%)
Asphalt Binder Content	1.00	0.0-0.5
	0.98	0.6
	0.95	---
	0.90	0.7
	0.85	0.8
	0.75	≥ 0.9
1 1/2 inch Sieve	1.00	0-13
	0.98	14
	0.95	15-16
	0.90	17-20
	0.85	21-23
	0.75	≥ 24
1 inch, 3/4 inch, and 1/2 inch Sieves	1.00	0-9
	0.98	10
	0.95	11-12
	0.90	13-14
	0.85	15-16
	0.75	≥ 17
3/8 inch, No. 4, No. 8, No. 16, and No. 30 Sieves	1.00	0-8
	0.98	9
	0.95	10
	0.90	11-12
	0.85	13-14
	0.75	≥ 15
No. 50 Sieve	1.00	0-6
	0.98	7
	0.95	8
	0.90	9
	0.85	10
	0.75	≥ 11
No. 100 Sieve	1.00	0-3
	0.98	---
	0.95	4
	0.90	5
	0.85	---
	0.75	≥ 6
No. 200 Sieve	1.00	0.0-2.0
	0.98	2.5
	0.95	3.0
	0.90	---
	0.85	3.5
	0.75	≥ 4.0
Fineness Modulus	1.00	0.0-0.30
	0.98	0.31-0.34
	0.95	0.35-0.39
	0.90	0.40-0.46
	0.85	0.47-0.55
	0.75	≥ 0.56

SUBSECTION: 406.02.01 Tack Coat.
REVISION: Replace with the following:

Furnish any of the following asphalt materials conforming to 806: SS-1, SS-1h, or RS-1.

SUBSECTION: 406.02.03 Curing Seal.
REVISION: Replace with the following:

Furnish any of the following asphalt materials conforming to 806: RS-1, RS-2, SS-1, SS-1h, or Primer L.

SUBSECTION: 406.03.03 Application.
REVISION: Replace the temperature table with the following:

Primer L	60-120 °F
SS-1, SS-1h	70-160 °F
RS-1, RS-2	70-140 °F

SUBSECTION: 406.03.03 Application.
PART: B) Asphalt Tack Coat.
REVISION: Replace the second paragraph with the following:

When furnishing RS-1 for tack, apply it undiluted.

Replace the first sentence of the third paragraph with the following:

When furnishing SS-1 or SS-1h for tack, the Department will allow diluted or undiluted application provided uniform and complete coverage is achieved.

SUBSECTION: 407.02.02 Aggregate.
REVISION: Change Sieve Size No. 30 to read Sieve Size No. 50.

SUBSECTION: 408.04.02 Mobilization for Asphalt Pavement Milling and Texturing.
REVISION: Add the following:

For group contracts, the Department will measure the quantity for each project (subsection) that has a bid item for Mobilization for Asphalt Pavement Milling and Texturing.

SUBSECTION: 409.02 MATERIALS AND EQUIPMENT.
REVISION: Replace "KM 64-427" with the following:

the guidelines in Subsection 409.03.02

SUBSECTION: 409.03.01 Restrictions.
REVISION: Add the following sentence:

When the mixture's bid item specifies PG 76-22, limit RAP content to 20 percent or less.

SUBSECTION: 409.03.02 Preparation of Mixture.
PART: A) Mix Requirements.
REVISION: Void the Revision and replace with the following:

Conform to the Contract requirements for each mixture produced using RAP. If mixtures produced using RAP do not conform to the requirements for that mixture, complete the project using all virgin materials at no additional expense to the Department. Conform to the following table to select the appropriate grade of virgin asphalt binder to blend with the RAP:

Mixture's Bid Item	Appropriate Virgin Asphalt Binder		
	0-20% RAP	21-30% RAP	>30% RAP
PG 76-22	PG 76-22	-	-
PG 70-22	PG 70-22	PG 64-22	*
PG 64-22	PG 64-22	PG 64-22	*

* Select according to KM 64-427

SUBSECTION: 410.05 PAYMENT.
REVISION: Replace the RIDE QUALITY ADJUSTMENT SCHEDULE with the following 2 schedules:

RIDE QUALITY ADJUSTMENT SCHEDULE FOR ROADS POSTED GREATER THAN 45 MPH

IRI	Pay Value[1]
36 or Less	+0.15
37 to 46	= 1.5 x (47 – IRI)
47 to 66	0.00
67 to 76	= 1.5 x (67 – IRI)
77 or higher	Corrective work or replacement required

RIDE QUALITY ADJUSTMENT SCHEDULE FOR ROADS POSTED 45 MPH OR LESS

Rideability Index	Pay Value[1]
36 or Less	+0.15
37 to 46	= 1.5 x (47 – IRI)
47 to 85	0.00
86 or lower	Corrective work or replacement required

[1] *The Department will not apply a positive pay value for corrective work other than removal and replacement to achieve the IRI.*

SUBSECTION: 501.03.13 Finishing.
PART: H) Texturing.
REVISION: Replace the third paragraph with the following:

Form transverse grooves in the concrete with a width between 0.09 inch and 0.13 inch and a depth between 0.12 inch and 0.19 inch. Space the grooves at random intervals between 0.4 inch to 1.5 inches with no more than 50 percent of the spacing being one inch or greater.

SUBSECTION: 506.03.01 Header Curb, Valley Gutter, and Curb and Gutter (Combination).
REVISION: In the second sentence of the third paragraph replace the Subsection reference 601.03.12 with 501.02.10.
In the second sentence of the sixth paragraph replace the Subsection reference 601.03.16 with 501.03.17 D).

SUBSECTION: 508.03.03 Precast Construction.
REVISION: Replace "Subsection 605.03" in the first sentence with Section 605.

SUBSECTION: 509.03 CONSTRUCTION.
REVISION: Replace "Subsection 605.03" in the first sentence with Section 605.

SUBSECTION: 601.02.13 Forms.
PART: F) Stay-In-Place Metal Forms.
NUMBER: 1) Forms and Supports.
REVISION: Replace ASTM A 446 with ASTM A 653.
Replace ASTM A 525 with ASTM A 924.

SUBSECTION: 601.03.03 Proportioning and Requirements.
PART: A) Concrete.
TABLE: INGREDIENT PROPORTIONS AND REQUIREMENTS FOR VARIOUS CLASSES OF CONCRETE
REVISION: Add the following foot note to AA Slump:

The Department may allow the slump of AA concrete to be increased up to a 6 inch maximum, provided the w/c ratio does not exceed 0.40 and a high range water reducer (Type F or G) is used. Trial Batches will be required if producer has not previously supplied.

SUBSECTION:	601.03.03 Proportioning and Requirements.
PART:	C) Mixtures Using Type IP, IS and I(SM) Cement or Mineral Admixtures.
NUMBER:	2) Mineral Admixtures.
REVISION:	Add the following after the first sentence: Reduction of the total cement content by a combination of any mineral admixtures will be allowed, up to a maximum of 30 percent.
SUBSECTION:	601.03.03 Proportioning and Requirements.
PART:	C) Mixtures Using Type IP Cement or Mineral Admixtures.
NUMBER:	2) Mineral Admixtures.
LETTER:	b) Ground Granulated Blast Furnace Slag (GGBF Slag).
REVISION:	Replace the first sentence with the following: When added as a separate ingredient, use Grade 120 GGBF or 100 GGBF slag to reduce the quantity of cement, except do not use GGBF slag to reduce the quantity of Type IS or I(SM) cement.
SUBSECTION:	601.03.04 Classes and Primary Uses.
PART:	P) Non-Shrink Grout.
REVISION:	Replace with the following: Bonding and sealing for post-tensioning, tie-back rods and bolts, and box beams.
SUBSECTION:	601.03.09 Placing Concrete.
PART:	A) General.
REVISION:	Add the following to the fifth paragraph: When pumping, equip the delivery pipe with a nozzle, having a minimum of 2 right angles, at the discharge end.
SUBSECTION:	601.03.09 Placing Concrete.
PART:	D) Weather Limitations.
REVISION:	Replace the first sentence of the second paragraph with the following: Maintain the temperature of the mixture at or below 90 °F during placement. Unless the Engineer determines that safety concerns or other considerations prohibit a shutdown, cease concrete production when the mixture exceeds 90 °F until adequate methods are in place to reduce or maintain the mixture temperature.
SUBSECTION:	601.03.15 Opening to Traffic.
TABLE:	Required Time in Calendar Days Before Applying Significant Loads on Concrete Structures
REVISION:	Change the title of the seventh item to the following: Caps on Concrete Pile Bents, Open Column Abutments, and Piers
SUBSECTION:	606.02 MATERIALS AND EQUIPMENT.
REVISION:	Add the following subsection: 606.02.11 Coarse Aggregate. Conform to Section 805, size 9-M.
SUBSECTION:	607.03.05 Bolted Connections Using High-Strength Steel Bolts.
PART:	B) Direct Tension Indicators.
REVISION:	Replace the first two sentences of the third paragraph with the following: Under normal conditions, install the tension indicator under the non-turned element of the fastening system. Obtain the Engineer's permission before installing tension indicators under the turned element. If the Engineer determines that it is necessary to install the tension indicator under the turned element, install additional hardened washers according to the manufacturer's instructions. Add the following to the end of the fourth paragraph: The fastener assembly may also need to be replaced.

SUBSECTION:	607.03.08 Planing and Finishing.
PART:	B) Flame Cutting.
REVISION:	Replace the first sentence of the second paragraph with the following: Remove roughness exceeding these values and occasional notches or gouges no more than 3/16 inch deep, on otherwise satisfactory surfaces, by machining or grinding.
SUBSECTION:	607.03.23 Cleaning and Painting.
PART:	D) Preparation for Field Coatings.
REVISION:	Replace the second and third paragraphs with the following: After erection, including all bolting and remedial work, prepare the shop applied zinc coating for field applied intermediate coating as follows. Remove all grease, oil or other lubricants from all surfaces to be painted including lubricant or residuals from the surfaces of all galvanized nuts, bolts and washers by solvent cleaning according to SSPC SP 1. When dry overspray from the shop applied zinc coating exists, remove by sanding. High pressure water wash all structural steel at 4,500 to 5,000 psi. using clean potable water. As needed, use a non-sudsing, bio-degrable detergent to remove all surface contaminants not removed by high pressure water washing. Rinse all areas where a detergent and/or solvent was applied by pressure washing with clean potable water. Blast clean all surfaces sustaining damage to the shop applied zinc coating to the pictorial standards described in subsection B. Apply a field coat of approved zinc rich coating to all areas not possessing an acceptable shop applied zinc coating. Completely remove all rust, scale and other foreign material before applying the intermediate coating. When application of the finish coat exceeds the recoat window of the intermediate coat, abrade the surface of the intermediate coat according to the coating manufacturer's recommendations before applying the finish coat.
SUBSECTION:	607.03.23 Cleaning and Painting.
PART:	E) Application of Field Coatings.
REVISION:	Replace the second paragraph with the following: Apply paint only to clean and dry surfaces when the ambient air temperature is 40 °F or greater, the surface temperature of the steel members to be painted is at least 5 °F above the dew point, and the relative humidity is less than 90 percent. Do not apply paint to damp or frosted surfaces, nor during any period of rainfall. Replace the fifth paragraph with the following: Paint from the top of the structure toward the bottom, and proceed by sections, bays, or parts of the work, unless the Contract or Engineer directs otherwise.
SUBSECTION:	611.02.01 Concrete.
REVISION:	Replace the first sentence with the following: Conform to ASTM C 1433.
SUBSECTION:	611.03.01 Transportation and Handling.
REVISION:	Replace the first sentence with the following: Handle and store the precast units so that flexural stresses are not induced until the concrete age is 7 days or attains a compressive strength of 3,000 psi.
SUBSECTION:	611.03.02 Precast Unit Construction.
REVISION:	Add the following: 4) Contrary to ASTM C 1433 Section 10.3, assure the compressive strength of the cores tested are equal to or greater than the design strength.
SUBSECTION:	611.03.07 Joints.
PART:	A) Rubber Gaskets.
REVISION:	Replace the title with the following: A) Butyl Rubber Sealant.

SUBSECTION:	611.03.07 Joints.
PART:	B) Flexible Plastic Gaskets.
REVISION:	Replace the title with the following: B) Rubber Gaskets.
SUBSECTION:	613.05 PAYMENT.
REVISION:	Replace 8160 Structure Excavation with the following: 2203 Structure Excavation Unclassified
SUBSECTION:	614.02.01 Paint.
REVISION:	Add the following: Furnish a paint system in which all coats are produced by the same manufacturer and use the same system throughout the entire project.
SUBSECTION:	614.03.06 Paint Application.
REVISION:	Replace the first sentence of the fourth paragraph with the following: Paint from the top of the structure toward the bottom, and proceed by sections, bays, or parts of the work, unless the Contract or Engineer directs otherwise.
SUBSECTION:	701.02.03 Joint Materials.
PART:	D) Flexible Plastic Gaskets.
REVISION:	Replace with the following: D) Butyl Rubber Sealants. Conform to Section 807.
SUBSECTION:	701.02.04 Bedding Materials.
REVISION:	Replace the first sentence with the following: Use No. 8 aggregate, No. 9 aggregate, or a fine aggregate conforming to Subsection 804.08 for bedding material.
SUBSECTION:	701.02.04 Bedding Materials.
TABLE:	A1, A2, and A3 Characteristics
REVISION:	Under A3, replace "51 max" with "51 min"
SUBSECTION:	702.03.05 Joints.
PART:	A) Reinforced Concrete Pipe.
NUMBER:	2) Rubber Gaskets.
REVISION:	Replace with the following: In addition to the requirements of Subsection 701.02, use a pipe section conforming to AASHTO M 315. Use the gasket manufacturer's recommended cement and lubricant. Snugly fit the rubber gasket in the beveled surface of the tongue and groove ends of the sections to form a flexible seal under all conditions of service.
SUBSECTION:	701.03.05 Joints.
PART:	B) Corrugated Metal Pipe.
REVISION:	Void the Revision and replace with the following: Construct joints using a band with annular corrugations and a bolt, bar and strap connection. Use a minimum nominal band width of 12 inches for all pipe diameters 54 inches and smaller. Use a two-piece band with a minimum nominal width of 20 inches for all pipe diameters greater than 54 inches. Manufacture the band from the same base materials as the pipe. The pipe bands may be up to two gauges lighter than the pipe it is joining, with a minimum gauge thickness of 16. The Department may allow dimple band connections for field cut pipe. Install the connecting bands according to the manufacturer's written recommendations.
SUBSECTION:	703.02.09 Geotextile Fabric.
REVISION:	Replace Section reference 845 with 843.

SUBSECTION: 703.04.08 Geotextile Fabric.
REVISION: Add the subsection:

703.04.08 Geotextile Fabric. The Department will measure the quantity according to Subsection 214.04.

SUBSECTION: 710.02 MATERIALS.
REVISION: Add the following Subsection:

710.02.15 High Density Polyethylene (HDPE) Adjusting Rings. Conform to Section 846.

SUBSECTION: 710.03.01 Newly Constructed Small Drainage Structures.
PART: A) General.
REVISION: Replace the last sentence of the sixth paragraph with the following:

Use precast concrete, precast concrete pipe sections, cast-in-place, brick, or HDPE adjusting rings for adjustment of existing manholes according to the Standard Specifications.

SUBSECTION: 710.03.01 Newly Constructed Small Drainage Structures.
PART: B) Precast Structures Except Manholes.
REVISION: Replace the first two sentences with the following:

Only furnish products manufactured by a precast producer listed in the Department's List of Approved Materials. If the producer does not have an approved drawing for the product, submit 5 copies of shop drawings to the Engineer for review and approval.

SUBSECTION: 710.03.03 Adjusted Small Drainage Structures.
REVISION: Add the following sentence to the end of the first paragraph:

For HDPE adjusting rings, install and seal according to the manufacturer's recommendations.

SUBSECTION: 712.03.02 Type V Markers.
REVISION: Replace the first sentence of the first paragraph with the following:

Install Type V Markers in slots cut into the pavement according to the manufacturer's recommendations.

Delete the last paragraph.

SECTION: 713 PERMANENT PAVEMENT STRIPING.
REVISION: Add the following subsection:

713.03.06 Acceptance of Non-Specification Markings. If weather conditions allow, perform corrective work to bring striping retroreflectivity into conformance. If corrective work has been performed and the work meets all requirements except for minimum retroreflectivity, the Department may accept the work according to Subsection 105.04. When the Engineer determines that the markings may be left in place, the Department will accept them at a reduction in the Contract unit bid price according to the Acceptance Pay Schedule. Additionally, the Engineer may remove the striping crew for the remainder of the project according to Subsection 108.06 Part A).

The Engineer may also apply this section when corrective work cannot be performed due to weather.

Acceptance Pay Schedule – White
156 to 174 mcd/lux/square meter – 50% pay
138 to 155 mcd/lux/square meter – 25% pay
120 to 137 mcd/lux/square meter – 0% pay
< 120 mcd/lux/square meter – unacceptable

Acceptance Pay Schedule – Yellow
126 to 149 mcd/lux/square meter – 50% pay
103 to 125 mcd/lux/square meter – 25% pay
80 to 102 mcd/lux/square meter – 0% pay
< 80 mcd/lux/square meter – unacceptable

SUBSECTION:	713.03 CONSTRUCTION.
REVISION:	Replace the MUTCD references to "Part III" with "Part 3"
SUBSECTION:	714.02.03 Binder.
REVISION:	Replace the last sentence with the following: Submit the material and method of application to the Engineer and obtain written approval from the Engineer and the manufacturer of the pavement marking material before applying.
SUBSECTION:	714.03 CONSTRUCTION.
REVISION:	Replace the MUTCD references to "Part III" with "Part 3" and figure references to "3-11 and 3-12" with "3B-8 and 3B-9"
SUBSECTION:	714.03.01 Layout.
REVISION:	Replace the MUTCD reference to "Part III" with "Part 3"
SUBSECTION:	714.03.03 Application.
PART:	A) Type I Tape.
REVISION:	Add the following: When applied to concrete, cut the tape at all joints.
SUBSECTION:	714.03.04 Restrictions.
REVISION:	Replace the first paragraph with the following: Do not apply the pavement marking material when air and pavement temperatures are below 50 °F. Delete the third paragraph.
SUBSECTION:	714.03.06 Proving Period for Durable Markings.
PART:	A) Requirements.
NUMBER:	1) Type I Tape.
REVISION:	Add the following: Type I Tape is manufactured off site and warranted by the manufacturer to meet certain retroreflective requirements. As long as the material is adequately bonded to the surface and shows no sign of failure due to the other items listed in Subsection 714.03.06 A) 1), retroreflectivity readings will not be required. In the absence of readings, the Department will accept tape based on a nighttime visual observation.
SUBSECTION:	714.05 PAYMENT.
REVISION:	Replace with the following: The Department will make payment upon completion of the work. If after the proving period the markings do not meet minimum retroreflectivity requirements, the Department will adjust the payment or require corrective work according to the following:
SECTION:	804.03 Concrete.
REVISION:	Replace the last sentence with the following: The Department will waive the requirements for gradation, sand equivalent, and uncompacted voids for concrete pipe.
SUBSECTION:	804.04.04 Requirements for Combined Aggregates.
PART:	B) Sand Equivalent.
REVISION:	Replace the third paragraph with the following: The Department may waive the sand equivalent requirement provided the portion of the combined aggregate passing the No. 40 sieve is non-plastic according to AASHTO T 90.
SUBSECTION:	804.04.04 Requirements for Combined Aggregates KM.
TABLE:	Superpave Fine Aggregate Consensus Property Requirements.
REVISION:	For ESAL Class 1, Replace both dashes with 40.
SUBSECTION:	805.03.01 Soundness and Shale.
PART:	AGGREGATE USE/Portland Cement Concrete Mixtures.
REVISION:	Replace the title use "Class AA, Class S and Bridge Deck Overlays" with "Aggregate for Bridge Decks, Bridge Deck Overlays, and Bridge Barrier Walls"

SECTION: 805 COARSE AGGREGATES.
TABLE: Sizes of Coarse Aggregates.
REVISION: Replace KM 64-420 in footnote (1) with KM 64-620.

SECTION: 805 COARSE AGGREGATES.
TABLE: Aggregates Size Use.
REVISION: For Cement Concrete Structures and Incidental Construction add 9-M for Overlays to the sizes to be used column.

SUBSECTION: 805.03.03 Gradation.
REVISION: Replace the last sentence with the following:

The Department will allow blending of same source/same type aggregate to achieve designated sizes when precise procedures are used such as cold feeds, belts, weigh hoppers, or equivalent.

SUBSECTION: 805.03.04 Erodible or Unstable Material.
REVISION: Add the subsection:

805.03.04 Erodible or Unstable Material. Treat as applicable. The Department considers Size No. 57 or larger aggregate, except crushed or uncrushed gravel, non-erodible. The Department considers the following materials to be erodible or unstable:

1) Friable sandstone. The Engineer determines when sandstone is friable or non-friable.
2) Crushed or uncrushed gravel, any size.
3) Crushed coarse aggregate smaller than Size No. 57.
4) Any material with 50 percent or more passing the No. 4 sieve.

SUBSECTION: 805.04 CONCRETE.
REVISION: Replace the second paragraph with the following:

The Department will waive the requirements for gradation and finer than No. 200 for concrete pipe.

SUBSECTION: 805.10 GRANULAR EMBANKMENT.
REVISION: Replace "2 ½-inch" with "12-inch".

SUBSECTION: 805.10 GRANULAR EMBANKMENT.
PART: 1)
REVISION: Replace with the following:

1) Engineer approved shot limestone or sandstone from roadway excavation, borrow excavation, or another approved source.

SUBSECTION: 805.11 STRUCTURE GRANULAR BACKFILL.
REVISION: Replace with the following:

Provide crushed or uncrushed aggregate meeting the quality requirements of this section. When the material includes a significant amount of individual fragments greater than 1 ½ inches, the Engineer may visually accept the minus No. 200 portion. Conform to the following gradation:

Sieve Size	Percent Passing
4 inch	100
No. 4	0-10
No. 200	0-5

SUBSECTION: 805.13.03 Channel Lining, Class IA.
REVISION: Replace the first sentence with the following:

Provide crushed stone meeting the general requirements of this section.

SUBSECTION: 805.13.03 Channel Lining, Class II.
REVISION: Replace the first sentence with the following:

Provide crushed stone meeting the general requirements of this section.

SUBSECTION: 805.15 GRADATION ACCEPTANCE OF NON-SPECIFICATION COARSE AGGREGATE.
TABLE: GRADATION – COARSE AGGREGATES FOR UNDERDRAINS
REVISION: Replace "No. 200" sieve with "No. 100".

SUBSECTION: 810.03.04 Extra Protection
REVISION: Replace "mm" in the second sentence of the third paragraph with "inches".

SECTION: 810.03 REINFORCED CONCRETE PIPE.
REVISION: Add new subsection:

810.03.07 Concrete. Submit Concrete Mix Design to the Central Office Materials.

SECTION: 812.01.01 Structural Steel, All Types.
REVISION: Replace second sentence with the following:

When the supplementary requirement of this specification are specified, they exceed the requirements of ASTM A 36, A 514, A 572, A 588, and ASTM A 852.

SUBSECTION: 812.01.01 Structural Steel, All Types.
PART: A) Structural Steel.
REVISION: Delete AASHTO M 183.

SUBSECTION: 812.01.01 Structural Steel, All Types.
PART: B) High-Strength Low-Alloy Columbium-Vandium Steels of Structural Quality.
REVISION: Delete AASHTO M 223.

SUBSECTION: 812.01.01 Structural Steel, All Types.
PART: C) High-Strength Low-Alloy Structural Steel with 345 Mpa Minimum Yield Point to 4 Inches Thick.
REVISION: Delete AASHTO M 222.

SUBSECTION: 812.01.01 Structural Steel, All Types.
PART: E) High-Yield-Strength, Quenched and Tempered Alloy Steel Plate, Suitable for Welding.
REVISION: Delete AASHTO M 244.

SECTION: 813.08.05 Aluminum Alloy Rolled or Extruded Shapes.
REVISION: Replace "T-4 AND T6" with "T6".

SUBSECTION: 813.09.02 High-Strength Steel Bolts, Nuts, and Washers.
PART: A) Bolts.
REVISION:

HARDNESS NUMBER				
Bolt Size	Brinell		Rockwell C	
(in)	Min	Max	Min	Max
½ - 1	253	319	25	34

SUBSECTION: 813.13 MATTRESSES AND GABIONS.
REVISION: Replace the first sentence of the first paragraph with the following:

Conform to ASTM A 975, Style 1 or ASTM A 974, Style 1 or 2.

SUBSECTION: 814.04.01 Steel Guardrail Posts.
REVISION: Replace AASHTO M 183 in the first sentence with ASTM A 36.

SUBSECTION: 814.05.02 Composite Plastic.
REVISION: Add the following sentence to the first paragraph:

Rubber is an acceptable alternate to plastic in their composition.

SUBSECTION: 814.06 MATERIALS FOR END TREATMENTS.
PART: D) Steel Sheet (for rail plates and mounting brackets).
REVISION: Replace 570, Grade D with the 1011, Type SS, Grade 36.

SUBSECTION: 816.02 GENERAL.
REVISION: Replace ASTM D 2521 with ASTM A 239.

SUBSECTION: 816.02.02 Aluminum-Coated Steel.
REVISION: Replace 0.01 with 0.099.

SUBSECTION: 819.01.01 Steel Plates.
REVISION: Replace "Paragraph 14" in the second sentence of the second paragraph with "Table 6".

SUBSECTION: 821.03 SAMPLING AND TESTING.
REVISION: In the third sentence of the first paragraph, replace calendar days with working days.

SUBSECTION: 827.04 PERMANENT SEED.
REVISION: Replace with the following:

Conform to the requirements outlined in the "Kentucky Seed Law and Provisions for Seed Certification in Kentucky" and the "Regulations under the Kentucky Seed Law", with following exceptions:

1. Obtain seed only through registered dealers that are permitted for labeling of seed.
2. Ensure all deliveries/shipments of premixed seed are accompanied with a master blend sheet.
3. The Department may sample the seed at the job site at any time.
4. Ensure all bags and containers have an acceptable seed tag attached.

Do not use seed (grasses, native grasses and legumes) if the weed seed is over 2%, total germination (including hard seed) is less than 60%, if the seed test date is over 9 months old exclusive of the month tested, or if the limits of noxious weed seed is exceeded.

Ensure that noxious weed seeds contained in any seed or seed mixture does not exceed the maximum permitted rate of occurrence per pound.

Name of Kind	Max. No. Seeds (per pound)*
Balloon Vine (Cardiospermum Halicacabum)	0
Purple Moonflower (Ipomoea turbinata)	0
Canada Thistle (Cirsium Arvense)	0
Johnsongrass (Sorghum Halepense and Sorghum Almum and perennial rhizomatous derivatives of these species)	0
Quackgrass (Elytrigia Repens)	0
Annual Bluegrass (Poa Annua)	256
Buckhorn Plantain (Plantago Ianceolata)	304
Corncockle (Agrostemma Githago)	192
Dodder (Cuscuta spp.)	192
Giant Foxtail (Setaria Faberii)	192
Oxeye Daisy (Chrysanthemum Ieucanthemum)	256
Sorrel (Rumex Acetosella)	256
Wild Onion and Wild Garlic (Allium spp.)	96

* Seed or seed mixtures that contain in excess of 480 total noxious seeds per pound is prohibited Wildflower seed shall not be planted until approved by the MCL.

SUBSECTION: 832.02 TYPE I POSTS.
REVISION: Replace ASTM A 570 with ASTM A 1011.

SECTION: 840 RAISED PAVEMENT MARKERS
REVISION: Replace the section with the following:

840.01 TYPE IV MARKERS. Provide markers from the Department's List of Approved Materials. Type IV markers are replacement lenses for use in Type V marker castings.

840.02 TYPE V MARKERS. Provide markers from the Department's List of Approved Materials. Type V markers consist of an iron casting with a Type IV marker (mono or bi-directional) attached.

840.03 TYPE IVA MARKERS. Provide markers from the Department's List of Approved Materials. Type IVA markers are surface mounted lenses for temporary use in work zones.

840.04 SAMPLING. Obtain a manufacturer's certification for each shipment. Include with each shipment of adhesive a written statement from the manufacturer certifying that it conforms to the recommendations of the marker manufacturer, and stating the minimum temperature the adhesive can be satisfactorily mixed and applied.

840.05 PACKAGING. Suitably and substantially package all materials with the name and address of the manufacturer and vendor, contract or purchase number, kind of material, trade name, and net contents plainly marked on each package.

SUBSECTION: 843.01.01 Geotextile Fabric.
REVISION: Add the following sentence to the first paragraph:

Use circular-knit geotextile conforming to ASTM D 6707 for perforated pipe socks.

Add the following sentence to the third paragraph:

The manufacturer must participate in the National Transportation Product Evaluation Program (NTEP) for Geotextiles and Geosynthetics.

SUBSECTION: 843.01.01 Geotextile Fabric.
PART: C) Acceptance.
REVISION: Delete the burst strength requirement from each table.

SUBSECTION: 845.02.03 Wrapping.
REVISION: Replace Section 845 with Section 843, Type II.

SECTION: 846 HIGH DENSITY POLYETHYLENE (HDPE) ADJUSTING RINGS
REVISION: Add New Section:

846.01 RESIN. Use a recycled polyethylene plastic or virgin resin producing a molded part meeting the following requirements:

Melt Flow Index (ASTM D 1238)	4.0-10.0 g/10min
Density (ASTM D 792)	0.941-0.965 g/cm^3
Tensile (ASTM D 638)	2000-5000 lb/in^2
ESCR (ASTM D 1693)	Condition C

846.02 LOADING. Ensure the adjustment rings meet or exceed the loading requirements of AASHTO'S Standard Specification for HS-25 wheel loading for Highway Bridges.

SPECIAL NOTES FOR
CLEANING AND PAINTING
CAMPBELL AND OWEN COUNTIES
FEGR 03 0000002

SPECIAL NOTES FOR CLEANING AND PAINTING
CAMPBELL AND OWEN COUNTIES
DISTRICT NO. 6

SPECIAL NOTE FOR ALTERNATIVE CLEANING AND PAINTING METHODS -Page 1

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SPECIAL NOTE FOR ALTERNATIVE CLEANING AND PAINTING METHODS

Bids may be submitted for Alternate A (Wash, Cleaning, and Painting) or Alternate B (Abrasive Blast and Painting).

ALTERNATE A. (WASHING, CLEANING, AND PAINTING)

SPECIAL NOTE FOR SURFACE PREPARATION AND PAINT APPLICATION

Clean and paint all structural steel in accordance with the Kentucky Transportation Cabinet, Department of Highways, Standard Specifications for Road and Bridge Construction, Section 614 Maintenance Cleaning and Painting Steel Bridges and the following requirements:

The Contractor will submit a detailed Progress of Work Schedule to the Project Engineer at the Preconstruction Conference.

A. CONTAINMENT

Totally enclose all structural steel during **all** phases of the work. Use containment that meets the criteria for **SSPC Guide 6 – Containment Classification Class 2W** with the exception of 85% containment screens used to support the filter fabric (see **Section C**). A minimum air movement in containment is not specified but the contractor will demonstrate that the air movement in the containment will provide the necessary engineering controls to comply with OSHA requirements (i.e., lead standards as required by 29 CFR 1926).

Provide lighting ~~to~~ meet the criteria described in SSPC Guide 12 (Guide for Illumination of Industrial Painting Projects).

Quantity of emissions from containment will be assessed using Method A – Visible Emissions of SSPC Guide 6 - Level 2 Emissions. Emissions will be monitored for at least 15 minutes and reported in the logbook **(SEE SPECIAL NOTE FOR QUALITY CONTROL)** at least once for every four (4) hours of cleaning and painting. Observance of emissions at any time may require (at the discretion of the Engineer) that cleaning and/or painting cease until the containment is sufficient to prevent emissions.

The contractor will provide OSHA compliant safe access for all cleaning, painting, and inspections.

Collect wastes deposited on the containment materials daily. In addition, clean containment materials prior to moving/dismantling. The Engineer may direct additional cleaning as conditions warrant.

B. SURFACE PREPARATION

Solvent Cleaning
Prior to using any of the methods of substrate preparation specified herein, remove visible grease and oil from the surface. Clean the surface in accordance with SSPC-SP 1 to remove oil, grease, and any other surface contaminants. Only use solvents or detergents that are acceptable to the coating manufacturer and the Department. Use clean

cloths for the final wiping of the cleaned surface. Collect, handle, store, and dispose of all cleaning materials as hazardous waste.

Pressure Washing

Clean all structural steel by pressure washing. Equip spray wands used in pressure washing with 0° spinner nozzles. Equip the pressure washer(s) with calibrated gage(s) and pressure regulators to ascertain and regulate water pressure. Furnish the Engineer with two calibrated gages of the type installed on the pressure washer(s). These gages will be used to measure the water pressure at the wand. Size the pressure washers so that no combination of hose length or pressure washer placement will result in an output pressure less than 4,000 psi or more than 5,000 psi from any spray wand at any pressure washing location. Hold the wand nozzle a maximum of twelve (12) inches from the surface being pressure washed approximately normal (perpendicular) to the working surface.

Use clean, potable water for pressure washing. Do not use water from streams, ponds, lakes and rivers. At the discretion of the contractor, a non-sudsing, biodegradable detergent may be added to the water to optimize the cleaning operation. If a detergent is used, thoroughly rinse the surface afterward. After the surface is pressure washed and allowed to dry, inspect it for remaining visible dirt. Wipe the dried surface with black and white rags to ascertain cleanliness. Re-clean and rinse as necessary to remove all contaminants on the working surface. On all surfaces not cleaned satisfactorily by pressure washing, employ one or more additional methods including: 1) hand scrubbing using wet rags, 2) solvent cleaning by wiping with solvent-soaked rags, and/or 3) steam cleaning. After using any additional cleaning procedures, pressure wash those areas at the previously specified conditions.

Mechanical Surface Preparation

Remove all stratified and pack rust from all structural steel. Collect all rust debris and dispose of it with the other debris generated by pressure washing. **(See below - Section B. Collection, Handling, Storage, Transport and Disposal of Hazardous Wastes).**

After pressure washing, perform mechanical surface preparation on all surfaces not possessing clean, adherent paint (e.g. rust, loose paint, or loose mill scale). Clean those surfaces to correspond with visual standards set forth in the Steel Structures Painting Council SSPC VIS-3 "Visual Standard for Power- and Hand-Tool Cleaned Steel" for the appropriate power tools and initial surface conditions[□]. Ensure that the appropriate resulting surface condition, as shown in VIS-3 for **SSPC-SP3,** is present at the time of painting.

After tool cleaning and prior to painting, remove all residue, dirt, dust, or similar contaminants from the cleaned surface to the satisfaction of the Engineer.

[□]This standard is available as Publication No. SSPC 93-04 from the Steel Structures Painting Council, 4516 Henry Street, Pittsburgh, PA 15213-3728.

The contractor is solely responsible for any damages arising from the surface preparation operations.

C. COLLECTION, HANDLING, STORAGE, TRANSPORT AND DISPOSAL OF HAZARDOUS AND INDUSTRIAL WASTES (SEE SPECIAL NOTES FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS), AND WASH WATER.

Have a "Competent Person for lead abatement" as defined by OSHA 1926.62 on site during any operations which disturb lead.

All wastes are to be collected and placed in appropriate containers on a daily basis. **(See SPECIAL NOTE FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS).**

Hazardous wastes

The Department will provide a site on its property for the Contractor to erect a temporary waste storage facility. Store hazardous waste at that site, in a secured six-foot high chain-link fence enclosure. The enclosure shall be built in accordance with Standard Drawing No. RFC-001-07 of the Kentucky Department of Highways Standard Drawings Book, with the **exception that concrete is not required for installation of posts**. The fence of the storage area must be firmly attached to metal posts and have a locked gate. The gate must be secured to the fence post by a chain and a lock. Each side of the enclosure is to have appropriate placarding forbidding unauthorized entrance and announcing that the area is a hazardous waste/lead storage site. Cover the ground where the drums will be stored with a waterproof tarpaulin. The contractor shall maintain the tarpaulin to avoid tears or punctures. The drums will be set on skids that are placed on the tarpaulin. There must be adequate aisle space between the rows of stored drums so that the drums and labels can be inspected at any time.

The storage area is to be maintained/operated to prevent releases. The drum storage enclosure must have a spill clean-up kit. The package must include, but not be limited to shovel, broom, dustpan and absorbent material for solvents. There must be access to communications or alarms whenever authorized personnel are in the storage compound.

The designated area must be secured prior to the onset of operations at the job site.

Maintain the hazardous waste storage facility and return the site to its original state when the work is completed.

All waste/scrap materials generated during surface preparation are to be considered hazardous waste. Hazardous wastes are to be stored separate from industrial wastes. All spent solvents, not intended for further use, are also to be considered hazardous waste. Store solvent wastes in separate containers from the solid hazardous waste.

The Contractor is solely responsible for the management and the disposal of all

hazardous waste generated during the cleaning and painting operations in accordance with the Kentucky Revised Statutes, Chapter 224, Subchapter 46, and the Kentucky Administrative Regulations promulgated pursuant thereto.

The Kentucky Transportation Cabinet will file a Notification of Hazardous Waste Activity with the Kentucky Division of Waste Management to obtain an EPA Identification Number in accordance with 401 KAR 32:010, Section 3. The Cabinet will provide the Contractor with this EPA ID number to be used in hazardous waste management in compliance with 401 KAR 32:010, Section 3 (1).

The Contractor is responsible for furnishing appropriate U.S. DOT containers that are made or lined with materials which are compatible with the hazardous waste to be stored in accordance with 401 KAR 35:180, Section 3. All hazardous wastes collected at the job site will be placed in those containers for transport to the storage site. The containers will be used and managed at the job site and at the storage site in accordance with 401 KAR 35:180. Prior to the transfer of the containers of hazardous waste from the job site to the storage area, the containers will be correctly sealed, labeled, marked and placarded as defined in the pre-transport requirements of 401 KAR 32:030.

Each container will be labeled "Hazardous Waste" and the date clearly marked when the hazardous waste is *first* added to the container in compliance with 401KAR35:180, Section 4(3). That date marked is the *start date* of the seventy-five (75) day storage period

The generator for the waste under this contract is the Kentucky Transportation Cabinet. All records including the labels on the waste containers and the manifests are to be completed using the Transportation Cabinet as the generator.

The Department requires that all hazardous waste be removed within seventy-five (75) days of the accumulation start date. The Contractor will select a registered hazardous waste transporter to transport the containers of hazardous waste generated during the painting operations to a permitted hazardous waste treatment, storage or disposal facility. The hazardous waste will be manifested with a Uniform Hazardous Waste Manifest that is to be completed, in entirety, as per the regulations of 401 KAR 32:020 and 401 KAR 32:100. Copies of all manifests with the Land Disposal Restriction Notice will be provided to the project Engineer and the Central Office, Division of Construction. ***Final partial payment of 15% for the project will not be released until the Department receives all copies of the manifests (see* SPECIAL NOTE FOR PAYMENT).**

Failure to remove the hazardous waste within seventy-five (75) days will result in a performance penalty of Two Thousand Dollars ($2,000.00) per day per drum that the containers are left in storage. This penalty is in addition to any fines that may be assessed by regulatory agencies other than the Transportation Cabinet.

Industrial waste
Dispose of industrial wastes (non-hazardous wastes) such as paint buckets, paint-contaminated rags, rollers, clogged spray hoses and brushes. Store industrial waste in appropriate containers, separated from the hazardous wastes, and appropriately labeled, prior to disposal. Industrial waste containers not covered or designed to prohibit entry of water, must be included in and comply with Ground Water Protection requirements (see **SPECIAL NOTE FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS** – D. Groundwater Protection).

Waste wash water
All waste wash water will be filtered prior to release. Employ filter fabric consisting of a polypropylene, non-woven, needle-punched geotextile or equivalent. The fabric will have the following properties:

Grab tensile (ASTM D4632):	100 lbs. or greater
Apparent opening size (ASTM D4751):	0.43 mm (#40 US Sieve)
Permittivity (ASTM D4491):	0.7 - 1.0 sec. or better

Except where noted for specific structures, contractors may use 85% screens in the bottom of containment to support filter fabric. Containment must be constructed so that all wash water passes through filter fabric prior to release.

Provide written certifications from the filter fabric manufacturer(s) that the material furnished complies with the requirements of this specification.

The Department will obtain approval for release of the filtered wash water.

The Department will conduct periodic sampling of the wash water during the project.

D. PAINT APPLICATION

Do not paint areas until they have been inspected and approved by the Engineer (or at the direction of the Engineer, the Department's inspector). Apply paint only to clean and dry surfaces. Apply paint to cleaned surfaces within one (1) week of pressure washing. Regardless of the location of painting activities, do not paint during periods of any rainfall.

Prime Coat - Paint all structural steel with one (1) full coat (2.0 to 4.0 mils dry film thickness) of tinted moisture cure aluminum polyurethane. (See **SPECIAL NOTE FOR PAINT**).

Intermediate Coat - Paint all structural steel with one (1) full coat (2.0 to 4.0 mils dry film thickness) of untinted moisture cure aluminum polyurethane. (See **SPECIAL NOTE FOR PAINT**).

Finish Coat - Paint all structural steel with one (1) full finish coat (2.0 to 5.0 mils dry film thickness) of acrylic aliphatic polyurethane finish coat. (See **SPECIAL NOTE FOR PAINT**).

The finish coat shall be gray closely approaching Federal Standard No. 595B-16187.

Damages - Take all steps necessary to preclude damage to public property from paint overspray. Those steps may include changes in the type of containment. Cease spraying operations if those steps prove inadequate to prevent damage to public property. The contractor is solely responsible for any damages arising from the painting operations.

Repair of paint defects - Paint defects, such as but not limited to, pinholes, cracks, blisters, and runs may be encountered. Repair all defects in new paint.

E. PAINT STORAGE, HANDLING, SAMPLING, MIXING AND THINNING

Establish a paint storage site for receiving and storing paint delivered for use on the project. Locate the paint storage site separate from the job site. Receive all new paint at the storage site for inventory and acceptance testing. At that time, have the Contractor's QC inspector **(SEE SPECIAL NOTES FOR QUALITY CONTROL)** and the Department's inspectors independently inventory the supplied paint by batch number and quantities delivered. Their tallies should be compared and any differences resolved. The Department's inspector examines all paint containers delivered and rejects those with 1) broken seals, 2) rust, 3) altered, missing or illegible batch numbers or labels and 4) dents. The Department's inspector numbers and initials each container with an indelible marker. A representative of the Department samples each lot of material **(SEE SPECIAL NOTES FOR PAINT).** Label rejected paint containers "REJECTED" and dispose of them promptly. Store unapproved or rejected containers of paint separately from those that are approved. Allow no paint at the actual job site until the Division of Materials has approved it.

Have both the Contractor's QC inspector and the Department's inspector conduct a daily start-up inventory of containers of approved paint brought to the job site noting batch numbers and the Department inspector's container number. At the end of the work day, have the QC inspector and the Department's inspector conduct another inventory noting the number of paint containers expended, Department inspector's inventory numbers, and types of paint. Inventory paint containers brought on the job site and not used. Re-inventory those when they are taken back to the job site to be used.

The addition of solvents to paint is permitted **only** by written approval from the Division of Materials. Use only new solvents supplied by the paint manufacturer. Solvent addition must yield paint with a volatile organic compound (VOC) content equal to or less than 2.8 lb./gal. Add solvents at the job site in the presence of the Department inspector. Use only solvents from new, unopened containers with the solvent manufacturer's labeling intact. The QC inspector will record locations where solvent-thinned paint was used.

Keep solvents used for cleaning at the job site in sealed containers away from mixing operations. Collect solvents used to clean brushes, rollers, or spray equipment in sealed containers and store them as a hazardous waste.

The paint manufacturer is required to provide a technical representative at the job site when requested by the contractor or the Department at no additional cost to the Department.

F. WORKMANSHIP

All structural steel surfaces are to be properly cleaned and painted to the satisfaction of the Engineer. There will be no provision for missed areas or substandard work regardless of size of the area in question. All improperly prepared or painted surfaces are to be repaired to meet the provisions of this specification.

Allowable field variation of the color of all cured finish coats on structural steel will be 1.5 ΔE_{cmc}. These values shall be obtained from a spectrophotometer utilizing a D65 illuminant at 45° illumination and 0° viewing with a 2° observer. The reference for this test will be readings obtained on the initial test patch (**SEE SPECIAL NOTES FOR QUALITY CONTROL**). Surfaces with finish coats with color variations exceeding the 1.5 ΔE_{cmc} value will be repainted at the option of the Engineer.

SPECIAL NOTE FOR QUALITY CONTROL

The contractor performs Quality Control inspections on all areas. Employ at least one full-time staff member per shift whose sole duty is to perform quality control inspections (i.e. the QC inspector). **The QC inspector(s) must have successfully completed Commonwealth of Kentucky, Transportation Cabinet, Department of Highways Qualified Bridge Coating Inspector Training.** The QC inspector(s) must be capable of accessing, inspecting, and performing the specified quality control tests. The QC inspector(s) will identify locations requiring re-work and repairs and maintain a level of quality of specified work that is acceptable to the Engineer. All QC inspectors used on the project **must** attend the **Pre-construction meeting** and the **application of the test patch (es) on the bridge (SEE BELOW).**

Equip the QC inspector with: 1) a Tooke gage, 2) log book(s) (bound with printed page numbers), 3) a 1-1/4-inch wide dull scraper, 4) clean white and black rags, 5) a psychrometer, 6) surface temperature thermometers, 7) U.S. Weather Bureau psychrometric tables, 8) wet film thickness gauges, 9) an inspection mirror, 10) flashlight and 11) SSPC VIS 3 "Visual Standard for Power- and Hand-Tool Cleaned Steel" see the **("Mechanical Surface Preparation"** section of the **SPECIAL NOTE FOR SURFACE PREPARATION AND PAINT APPLICATION**). Promptly replace inspection equipment if lost or damaged. Direct the QC inspector to compare the readings of his instruments with those of the Department's inspector.

The Department's inspector is charged with in-progress reviews of the Contractor's operations and the performance of follow-up quality assurance (QA) inspections once the QC inspector has certified that a portion of work is complete.

Progress of Work - Work shall proceed by sections, bays or other readily identifiable parts of the structure. All work will proceed from top to bottom. The work will be broken down into adjacent sections the specific length of those sections will be agreed upon by the Contractor and the Department prior to the beginning of the cleaning and painting operations. These sections will be considered control areas for inspection purposes. Only one phase of work will be permitted in a given control area at any time. When the work within a control area reaches a specific **Quality Control Point**, no further work may be conducted until the previous work has been inspected and approved by the Department's inspector.

In any control area, Quality Control Point inspections must precede the start of succeeding phases of work. Quality Control Points are progress milestones that occur when one phase of work is complete and ready for inspection prior to continuing with the next operational step. At those points, the Contractor will provide Department's Inspectors with **safe access** to inspect all pertinent surfaces. If QA inspection indicates a deficiency, that phase of the work shall be corrected prior to beginning the next phase of work. Quality Control Points are as follows:

_____

Quality Control Point	*QA/QC Inspection Function*
1. Surface Preparation	
A. Washing and Other Cleaning	Visually inspect and conduct wiping tests to ensure the cleanliness of surfaces
B. Stratified-Rust Removal	Visually inspect to ensure removal
C. Mechanical Surface Preparation	Visually inspect for compliance with specified visual standard and test for feathered edges
2. Full Prime Coat Application	Check for dry film thickness, sealing of edges and joints, and defects in paint
3. Intermediate Coat Application	Check for dry film thickness, sealing of edges and joints, and defects in paint
4. Finish Coat Application	Check for dry film thickness, paint appearance, color and quality of application

The QC inspector will inspect prepared surfaces to determine whether those conform to the specification. Compare reference black and white rags (see test patch below) with wiping tests taken on pressure washed surfaces. Compare Steel Structures Painting Council SSPC VIS-3, "Visual Standard for Power- and Hand-Tool Cleaned Steel" for the appropriate power tools and initial surface conditions to those locations receiving mechanical surface preparation to obtain SP3. Probe edges of existing paint with a dull scraper to assure that they are tightly bonded. Test areas with cured paint for dry film paint thickness using a Tooke gage in accordance with ASTM D-4138. Inspect for areas of incomplete coating coverage and coating defects. The Department's (QA) inspector may request tests at additional sites or he may elect to perform additional tests.

The QC inspector will maintain a handwritten record of all-painting activities, operations and inspections in the log book(s). At a minimum, record the following information: 1) all paint inventory and approval information, 2) daily records of ambient conditions (including all measurements taken), 3) daily progress of work information including start-up/shut-down times, bridge locations by control numbers, structural steel components by proper terminology and pertinent operations by control points, and 4) QC/QA inspection information including the QC inspector's evaluations at control points and the Department inspector's rework comments or approvals. Make entries on consecutive pages of the logbook (in indelible ink) and make corrections by marking through mistakes with a single line. Do not remove pages or erase or obliterate entries in the logbook.

Adjacent control areas will be assigned consecutive numbers and a short description defining their location. The QC inspector will show workers where their designated control areas are to limit their work. After they have completed the work, the QC inspector will perform a 100% inspection at arm's length and will determine whether the area has been satisfactorily prepared. If work in a control area is unsatisfactory, the QC

inspector will require the workers to make the necessary corrections. The QC inspector will request that the Department's (QA) inspector examine the control area after corrections are made. If the area is satisfactory, the Department's (QA) inspector will indicate such in the logbook by placing his initials and the date of his inspection. If it is unsatisfactory, he will note the mandatory re-working in the QC inspector's logbook. After the area is re-worked to the satisfaction of the Department's (QA) inspector, he will place his initials next to the control area number. The QC inspector will maintain all logbooks at the job site at all times during the project. Make those available, upon request, to the Department's representatives. At the end of the project, submit all such logs to the Engineer for his review and records.

Prior to initiation of painting, prepare a **test patch or patches** to serve as standards for reference during the balance of the painting operations. Prepare at least one test patch for each structure. Locate the test patch(es) at ground level or near a walkway. Use the specified surface preparation on a surface (or surfaces) with at least 20 ft^2 per application method per coating.

When Central office personnel, District office personnel, and Contractor's personnel agree that the appropriate level of cleanliness and surface preparation have been achieved, the contractor may apply primer to the test patch. Apply primer, intermediate and finish coats in the presence of Central Office personnel, District Office personnel, Contractors' personnel and a technical representative of the paint manufacturer. Apply each coat in accordance with the **SPECIAL NOTE FOR SURFACE PREPARATION AND PAINT APPLICATION**. Apply a full prime coat to the entire test patch surface (at least 60 ft^2). Apply intermediate coat to at least two-thirds (40 ft^2) of the surface prepared and coated with primer. Apply finish coat to at least one-third (20 ft^2) of the surface that has been prepared and coated with primer and intermediate coat. Do not paint the reference areas until the balance of the project is completed. If the contractor's Quality Control person is removed or replaced, the test patch(es) will be reapplied.

ALTERNATE B. (ABRASIVE BLAST AND PAINTING)
SPECIAL NOTE FOR SURFACE PREPARATION AND PAINT APPLICATION

Clean and paint all structural steel in accordance with the Kentucky Transportation Cabinet, Department of Highways, Standard Specifications for Road and Bridge Construction, Section 614 Maintenance Cleaning and Painting Steel Bridges and the following requirements:

The Contractor will submit a detailed Progress of Work Schedule to the Project Engineer at the Pre-construction Conference.

A. CONTAINMENT

Totally enclose all structural steel during all phases of the work. Use containment that meets the criteria for **SSPC Guide 6 – Containment Classification Class 2A.**

> Air Movement- A minimum air movement in containment is not specified but the contractor will demonstrate that the air movement in the containment will provide the necessary engineering control to comply with OSHA worker safety requirements (i.e., lead standards as required by 29 CFR 1926).

Quantity of emissions from containment will be assessed using Method A – Visible Emissions of SSPC Guide 6 - Level 2 Emissions. Emissions will be monitored for at least 15 minutes and reported in the logbook **(SEE SPECIAL NOTE FOR QUALITY CONTROL)** at least once for every four (4) hours of cleaning and painting. Observance of emissions at any time may require (at the discretion of the Engineer) that cleaning and painting cease until the containment is sufficient to prevent emissions.

Provide proper lighting to meet the criteria described in SSPC Guide 12 (Guide for Illumination of Industrial Painting Projects).

The contractor will provide OSHA compliant safe access for all cleaning, painting, and inspections.

Collect wastes deposited on the containment materials daily. In addition, clean containment materials prior to moving/dismantling. The Engineer may direct additional cleaning as conditions warrant.

B. SURFACE PREPARATION

Solvent Cleaning

Prior to using any of the methods of substrate preparation specified herein, remove visible grease and oil from the surface. Clean the surface in accordance with SSPC-SP 1 to remove oil, grease, and any other surface contaminants. Use only solvents or detergents that are acceptable to the coating manufacturer and the Department. Use clean cloths for the final wiping of the cleaned surface. Collect, handle, store, and dispose of all cleaning materials as hazardous waste.

Stratified Rust Removal
Remove all stratified rust from all structural steel prior to abrasive blast cleaning. Collect all stratified rust debris and dispose of it with the other debris generated by abrasive blasting **(See below - Section C. Collection, Handling, Storage, Transport and Disposal of Hazardous Wastes)**.

Compressed Air
When compressed air is used for any work, use only compressed air that is free from oil and/or water. Verify the cleanliness of the compressed air in accordance with ASTM D 4285 (blotter test). Verify the cleanliness of the compressed air at least once per shift per compressor or as directed by the Engineer.

Surface Preparation Standard
Abrasive blast clean all structural steel to VIS 1-89, SSPC-SP 7 / NACE 3 (Brush Off Blast) condition. Although SSPC-Vis 1-89 refers to unpainted steel, Note 7.1 of the standard permits its use to determine the acceptability of the prepared surface. Use SSPC-Vis 1-89 to determine acceptability of the prepared surface.

Abrasive Media
Use clean, dry, uniformly graded abrasives for blast cleaning that are free of oil, soluble salts and other similar substances which could contaminate the blasted surface. Vacuum the prepared surface to remove all dust and contaminates prior to applying paint.

Provide abrasive that is sized to produce an anchor pattern profile height of 1.5 to 4.0 mils. Measure the surface profile on metal substrates in accordance with ASTM D 4417 Method C.

C. COLLECTION, HANDLING, STORAGE, TRANSPORT AND DISPOSAL OF HAZARDOUS AND INDUSTRIAL WASTES (SEE SPECIAL NOTES FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS)

Have a "Competent Person for lead abatement" as defined by OSHA 1926.62 on site during any operations which disturb lead.

All wastes are to be collected and placed in appropriate containers on a daily basis. **(See SPECIAL NOTE FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS)**.

Hazardous wastes
The Department will provide a site on its property for the Contractor to erect a temporary waste storage facility. Store hazardous waste at that site, in a secured six-foot high chain-link fence enclosure. The enclosure shall be built in accordance with Standard Drawing No. RFC-001-07 of the Kentucky Department of Highways Standard Drawings Book, with the **exception that concrete is not required for installation of posts**. The fence of the storage area must be firmly attached to metal posts and have a locked gate. The gate must be secured to the fence post by a chain and a lock. Each side of the enclosure is to have appropriate placarding forbidding unauthorized entrance and announcing that the area is a hazardous waste/lead storage site. Cover the ground where the drums will be

stored with a waterproof tarpaulin. The contractor shall maintain the tarpaulin to avoid tears or punctures. The drums will be set on skids that are placed on the tarpaulin. There must be adequate aisle space between the rows of stored drums so that the drums and labels can be inspected at any time.

The storage area is to be maintained/operated to prevent releases. The drum storage enclosure must have a spill clean-up kit. The package must include, but not be limited to shovel, broom, dustpan and absorbent material for solvents. There must be access to communications or alarms whenever authorized personnel are in the storage compound.

The designated area must be secured prior to the onset of operations at the job site.

Maintain the hazardous waste storage facility and return the site to its original state when the work is completed.

All waste/scrap materials generated during surface preparation are to be considered hazardous waste. Hazardous wastes are to be stored separate from industrial wastes. All spent solvents, not intended for further use, are also to be considered hazardous waste. Store solvent wastes in separate containers from the solid hazardous waste.

The Contractor is solely responsible for the management and the disposal of all hazardous waste generated during the cleaning and painting operations in accordance with the Kentucky Revised Statutes, Chapter 224, Subchapter 46, and the Kentucky Administrative Regulations promulgated pursuant thereto.

The Kentucky Transportation Cabinet will file a Notification of Hazardous Waste Activity with the Kentucky Division of Waste Management to obtain an EPA Identification Number in accordance with 401 KAR 32:010, Section 3. The Cabinet will provide the Contractor with this EPA ID number to be used in hazardous waste management in compliance with 401 KAR 32:010, Section 3 (1).

The Contractor is responsible for furnishing appropriate U.S. DOT containers that are made or lined with materials which are compatible with the hazardous waste to be stored in accordance with 401 KAR 35:180, Section 3. All hazardous wastes collected at the job site will be placed in those containers for transport to the storage site. The containers will be used and managed at the job site and at the storage site in accordance with 401 KAR 35:180. Prior to the transfer of the containers of hazardous waste from the job site to the storage area, the containers will be correctly sealed, labeled, marked and placarded as defined in the pre-transport requirements of 401 KAR 32:030.

Each container will be labeled "Hazardous Waste" and the date clearly marked when the hazardous waste is *first* added to the container in compliance with 401KAR35:180, Section 4(3). That date marked is the *start date* of the seventy-five (75) day storage period

The generator for the waste under this contract is the Kentucky Transportation Cabinet. All records including the labels on the waste containers and the manifests are to be completed using the Transportation Cabinet as the generator.

The Department requires that all hazardous waste be removed within seventy-five (75) days of the accumulation start date. The Contractor will select a registered hazardous waste transporter to transport the containers of hazardous waste generated during the painting operations to a permitted hazardous waste treatment, storage or disposal facility. The hazardous waste will be manifested with a Uniform Hazardous Waste Manifest that is to be completed, in entirety, as per the regulations of 401 KAR 32:020 and 401 KAR 32:100. Copies of all manifests with the Land Disposal Restriction Notice will be provided to the project Engineer and the Central Office, Division of Construction. ***Final partial payment of 15% for the project will not be released until the Department receives all copies of the manifests (see*** **SPECIAL NOTE FOR PAYMENT)**.

Failure to remove the hazardous waste within seventy-five (75) days will result in a performance penalty of Two Thousand Dollars ($2,000.00) per day per drum that the containers are left in storage. This penalty is in addition to any fines that may be assessed by regulatory agencies other than the Transportation Cabinet.

Industrial waste
Dispose of industrial wastes (non-hazardous wastes) such as paint buckets, paint-contaminated rags, rollers, clogged spray hoses and brushes. Store industrial waste in appropriate containers, separated from the hazardous wastes, and appropriately labeled, prior to disposal. Industrial waste containers not covered or designed to prohibit entry of water, must be included in and comply with Ground Water Protection requirements (see **SPECIAL NOTE FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS** – D. Groundwater Protection).

D. PAINT APPLICATION

Do not paint areas until they have been inspected and approved by the Engineer (or at the direction of the Engineer, the Department's inspector). Apply paint only to dry surfaces. Ensure that the appropriate resulting surface condition, as shown in VIS-1-89 for SSPC-SP7, is present at the time of primer application (i.e. re-treat if rust-back occurs). Do not apply paint during rainfall. Apply a three-coat system consisting of:

1. ***Prime Coat*** –Paint all structural steel with one (1) full coat (3.0 to 5.0 mils dry film thickness) of moisture cure organic zinc rich primer (see **SPECIAL NOTE FOR PAINT**)

2. ***Intermediate Coat***—Paint all structural steel with one (1) full intermediate coat (2.0 to 4.0 mils dry film thickness) of tinted moisture cure aluminum (see (**SPECIAL NOTE FOR PAINT**).

3. ***Finish Coat*** - Paint all structural steel with one (1) full finish coat (2.0 to 5.0 mils dry film thickness) of acrylic polyurethane finish (see **SPECIAL NOTE FOR PAINT**)

The finish coat shall be gray closely approaching Federal Standard No. 595B-16187.

Damages - Take all steps necessary to preclude damage to public property from paint overspray. Those steps may include changes in the type of containment or cessation of spraying operations. The contractor is solely responsible for any damages arising from the painting operations.

Repair of paint defects - Paint defects, such as pinholes, cracks, blisters, and runs etc. may be encountered. Repair all defects in new paint.

E. PAINT STORAGE, HANDLING, SAMPLING, MIXING AND THINNING

Establish a paint storage site for receiving and storing paint delivered for use on the project. Locate the paint storage site separate from the job site. Receive all new paint at the storage site for inventory and acceptance testing. At that time, have the Contractor's QC inspector **(SEE SPECIAL NOTES FOR QUALITY CONTROL)** and the Department's inspectors independently inventory the supplied paint by batch number and quantities delivered. Their tallies should be compared and any differences resolved. The Department's inspector examines all paint containers delivered and rejects those with 1) broken seals, 2) rust, 3) altered, missing or illegible batch numbers or labels and 4) dents. The Department's inspector numbers and initials each container with an indelible marker. A representative of the Department samples each lot of material **(SEE SPECIAL NOTES FOR PAINT).** Label rejected paint containers "REJECTED" and dispose of them promptly. Store unapproved or rejected containers of paint separately from those that are approved. Allow no paint at the actual job site until the Division of Materials has approved it.

Have both the Contractor's QC inspector and the Department's inspector conduct a daily start-up inventory of containers of approved paint brought to the job site noting batch numbers and the Department inspector's container number. At the end of the work day, have the QC inspector and the Department's inspector conduct another inventory noting the number of paint containers expended, Department inspector's inventory numbers, and types of paint. Inventory paint containers brought on the job site and not used. Re-inventory those when they are taken back to the job site to be used.

The addition of solvents to paint is permitted **only** by written approval from the Division of Materials. Use only new solvents supplied by the paint manufacturer. Solvent addition must yield paint with a volatile organic compound (VOC) content equal to or less than 2.8 lb./gal. Add solvents at the job site in the presence of the Department inspector. Use only solvents from new, unopened containers with the solvent manufacturer's labeling intact. The QC inspector will record locations where solvent-thinned paint was used.

Keep solvents used for cleaning at the job site in sealed containers away from mixing operations. Collect solvents used to clean brushes, rollers, or spray equipment in sealed containers and store them as a hazardous waste.

The paint manufacturer is required to provide a technical representative at the job site when requested by the contractor or the Department at no additional cost to the Department.

F. WORKMANSHIP

All structural steel surfaces are to be properly cleaned and painted to the satisfaction of the Engineer. There will be no provision for missed areas or substandard work regardless of size of the area in question. All improperly prepared or painted surfaces are to be repaired to meet the provisions of this specification.

Allowable field variation of the color of all cured finish coats on structural steel will be 1.5 ΔE_{cmc}. These values shall be obtained from a spectrophotometer utilizing a D65 illuminant at 45° illumination and 0° viewing with a 2° observer. The reference for this test will be readings obtained on the initial test patch (**SEE SPECIAL NOTES FOR QUALITY CONTROL**). Surfaces with finish coats with color variations exceeding the 1.5 ΔE_{cmc} value will be repainted at the option of the Engineer.

SPECIAL NOTE FOR QUALITY CONTROL

The contractor performs Quality Control inspections on all areas. Employ at least one full-time staff member whose sole duty is to perform quality control inspections (i.e. the QC inspector). The QC inspector(s) must have successfully completed **Commonwealth of Kentucky, Transportation Cabinet, Department of Highways Certified Bridge Coating Inspector Training** and be experienced with paint-related quality control. The QC inspector(s) must be capable of accessing, inspecting, and performing the specified quality control tests. The QC inspector(s) will identify locations requiring re-work and repairs and maintain a level of quality of specified work that is acceptable to the Engineer. All QC inspectors used on the project **must** attend the **Pre-construction** and the **application of the test patch(es) on the bridge (SEE BELOW).**

Equip the QC inspector with: 1) a Type II dry film thickness gauge, 2) log book(s) (bound with printed page numbers), 3) a psychrometer, 6) surface temperature thermometers, 7) U.S. Weather Bureau psychrometric tables, 8) wet film thickness gauges, 9) an inspection mirror, 10) flashlight, 11) light meter that reads in foot candles and 12) SSPC VIS 1-89 "Visual Standard for Abrasive Blast Cleaned Steel" (**SEE SECTION A. SURFACE PREPARATION**). Promptly replace inspection equipment if lost or damaged. In case of discrepancy between the QC and QA Inspector's appropriately calibrated instruments the QA Inspector's instrument readings will be accepted as correct.

The Department's (QA) inspector is charged with in-progress reviews of the Contractor's operations and the performance of follow-up quality assurance (QA) inspections once the QC inspector has certified that a portion of work is complete.

Progress of Work - Work shall proceed by sections, bays or other readily identifiable parts of the structure. All work will proceed from top to bottom of the structure. The work will be broken down into adjacent sections (control areas) separated by bulkheads. Only one phase of work will be permitted in a given control area at any time. When the work within a control area reaches a specific **Quality Control Point**, no further work may be conducted until the previous work has been inspected and approved by the Department's (QA) inspector.

In any control area, Quality Control Point inspections must precede the start of succeeding phases of work. Quality Control Points are progress milestones that occur when one phase of work is complete and ready for inspection prior to continuing with the next operational step. At those points, the Contractor will provide Department's Inspectors with OSHA compliant access to inspect all pertinent surfaces. If QA inspection indicates a deficiency, that phase of the work shall be corrected prior to beginning the next phase of work. Quality Control Points are as follows:

Quality Control Point	*QA/QC Inspection Function*
1. Surface Preparation	
A. Solvent Cleaning	Visually inspect and conduct UV light testing if necessary.
B. Stratified Rust Removal	Visually inspect to ensure removal
C. Abrasive Blast Cleaning	Visually inspect for compliance with specified visual standard.
2. Full Prime Coat Application	Check for dry film thickness, and defects in paint
3. Full Intermediate Application	Check for dry film thickness, and defects in paint
4. Finish Coat Application	Check for dry film thickness, paint appearance, color and quality of application

The QC inspector will inspect prepared surfaces to determine whether those conform to the specification (see **SPECIAL NOTE FOR SURFACE PREPARATION AND PAINT APPLICATION - Section A**). Use Steel Structures Painting Council SSPC VIS-1-89, "Visual Standard for Abrasive Blast Cleaned Steel" as an aid to determine the appropriate cleanliness.

Inspect each individual coat of paint using a Type II dry film thickness gauge according to SSPC PA 2. Inspect for areas of incomplete coating coverage and coating defects. The Department's inspector may request tests at additional sites or he may elect to perform additional tests.

The QC inspector will maintain a handwritten record of all-painting activities, operations and inspections in the log book(s). At a minimum, the following information must be recorded: 1) all paint inventory and approval information, 2) daily records of ambient conditions (including all measurements taken), 3) daily progress of work information including start-up/shut-down times, bridge locations by control numbers, structural steel components by proper terminology and pertinent operations by control points, and 4) QC/QA inspection information including the QC inspector's evaluations at control points and the Department inspector's rework comments or approvals. Make entries on consecutive pages of the logbook (in indelible ink) and make corrections by marking through mistakes with a single line. Do not remove pages or erase or obliterate entries in the logbook.

Adjacent control areas will be assigned consecutive numbers and a short description defining their location. After completion of a phase of work in a control area, the QC inspector will perform a 100% inspection at arm's length and will determine whether the area has been satisfactorily prepared. If work in a control area is unsatisfactory, the QC inspector will require the workers to make the necessary corrections. That process will be repeated as necessary until suitable corrections have been made. Thereafter, he will

request that the Department's inspector examine the control area. If the area is satisfactory, the Department's inspector will indicate such in the logbook by placing his initials and the date of his inspection. If it is not satisfactory, he will explain why and note the mandatory re-working in the QC inspector's logbook. After the area is re-worked to the satisfaction of the Department's inspector, he will place his initials next to the control area number. Maintain all logbooks at the job site at all times during the project. Make those available, upon request, to the Department's representatives. At the end of the project, submit all such logs to the Engineer for his review and records.

Prior to initiation of painting, prepare a **test patch or patches** to serve as standards for reference during the balance of the painting operations. Locate the test patch(es) at ground level or near a walkway. Use the specified surface preparation on a surface (or surfaces) with at least 20 ft^2 per application method per coating.

When Central office personnel, District office personnel, and Contractor's personnel agree that the appropriate level of cleanliness and surface preparation have been achieved, the contractor may apply primer to the test patch. Apply primer, intermediate and finish coats in the presence of Central Office personnel, District Office personnel, Contractors' personnel and a technical representative of the paint manufacturer. Apply a full prime coat to the entire test patch surface (at least 60 ft^2). Apply intermediate coat to at least two-thirds (40 ft^2) of the surface prepared and coated with primer. Apply finish coat to at least one-third (20 ft^2) of the surface that has been prepared and coated with primer and intermediate coat. Do not paint the reference areas until the balance of the project is completed. If the contractor's Quality Control person is removed or replaced, the test patch(es) will be reapplied.

SPECIAL NOTE FOR PAINT (Applies to Alternate A and Alternate B)

Use a coatings system from an approved supplier. A list of approved suppliers may be found in the Department's List of Approved Materials maintained by the Division of Materials. All paint supplied must conform to the applicable Special Notes contained in this proposal. The Department requires acceptance testing of samples obtained on a per-lot basis. The Division of Materials will perform acceptance testing. At his option, the Engineer may elect to conduct more frequent sampling and testing. Test samples may be taken at the Contractor's paint storage site. Department personnel will perform sampling. Allow (10) working days for testing and approval of the sampled paint.

Note: It is the Contractor's responsibility to maintain an adequate inventory of approved paint. The Department assumes no responsibility for lost work due to rejection of paint or approved paint subsequently found to be defective during the application process.

SPECIAL NOTE FOR ENVIRONMENTAL AND WORKER SAFETY REGULATIONS (Applies to Alternate A and Alternate B)

(A) Governing regulations

The existing paint in this project contains lead, which is classified as a hazardous (toxic) material. Be knowledgeable of and comply with, all lead-related environmental and health regulations governing the Contractor's operations. Comply with regulations current at the time the work is performed and all requirements herein. Collect, transport to waste storage sites, and store hazardous wastes in accordance with applicable environmental and health regulations. The contractor is solely responsible for collection, transport, storage and disposal of all industrial wastes.

(B) Liabilities and Obligations

The contractor is solely responsible for compliance with all applicable environmental and health regulations to the satisfaction of the applicable government regulatory agencies and the Department. The Department assumes no obligations or liabilities for work stoppages due to enforcement actions by government regulatory agencies or to related delays that the Department deems necessary.

(C) State and Local Regulatory Agencies

State and local regulatory agencies charged with enforcing **most** regulations affecting the generation of hazardous wastes and worker safety issues are:

Kentucky Occupational Safety and Health Program, Labor Cabinet, Commonwealth of Kentucky, Frankfort, Kentucky.

Natural Resources and Environmental Protection Cabinet, Commonwealth of Kentucky, Frankfort, Kentucky.

(D) Groundwater Protection

The contractor will prepare and implement a groundwater protection plan in accordance with 401 KAR 5:037.

The contractor will submit a written Deleading Compliance Program at the Pre-construction meeting. The Program will include a Worker Protection Plan, an Environmental Compliance Plan, and a Waste Management Plan. The Program will be reviewed by the Cabinet prior to beginning any work.

SPECIAL NOTE FOR PRE-BID CONFERENCE
(Applies to Alternate A and Alternate B)

District 6
Campbell County, FE02 019-0008 B00003 0017.93
Owen County, FE02 094-00355 B00006 (004.48)

The Department will conduct a Pre-Bid Conference and Field Review of the subject project on January 31, 2003 at 9:00 AM. at;
Kentucky Department of Highways
District Office (6)
421 Buttermilk Pike
P.O. Box 17130
Covington, KY 41017-0130

Any company that is interested in bidding on the subject project or being part of a joint venture must be represented at the conference by at least **one person of sufficient authority to bind the company**. No individual can represent more than one company. At the conference and, during the subsequent field review of the subject bridges, a roster will be taken of the representatives present. **Only companies represented at the conference and during the field review will be eligible to have their bids opened at the date of letting.**

During the field review, the company representatives and Department of Highways officials will travel to all the project sites. The field review is not intended for bid estimation.

The purpose of the conference and field review is to familiarize all prospective bidders with the contract requirements and the location and condition of all structures within the scope of the contract.

Department of Highways officials present at the conference and during the field review will answer questions concerning the projects.

SPECIAL NOTE FOR PAYMENT (Applies to Alternate A and Alternate B)

Payment for this work will be according to Standard Specifications for Road and Bridge Construction (2000) Section 614.05 with the following modification to Section 614.05.

Three-Coat Field Applied System. Partial payments will based on acceptance of the following:

Surface Preparation	25%
Prime Coat	20%
Intermediate Coat	20%
Finish Coat	20%
De-rigging, Touch-up, and Environmental Documentation	15%

All field painting to be paid as lump sum bid for "Cleaning and Painting".

GENERAL TRAFFIC NOTES FOR CONTROLLING AND MAINTAINING TRAFFIC (Applies to Alternate A and Alternate B)

All lane closures on this project shall be in accordance with the attached Kentucky Department of Highways Drawings Nos. TSC-200-07, TSC-201-09, TSC-202-08, TSC-260-11, TSC-261-08, TSC-265-01, TSC-270-03, and the **FHWA MANUAL FOR UNIFORM TRAFFIC CONTROL DEVICES** (current editions). Lane closures should be used only when absolutely necessary and kept to the shortest duration possible in order to minimize disruption to the traveling public. No work will be conducted over traffic at any location.

The contractor will be required to submit in writing, to the department, his complete work schedule 14 days prior to starting work. The contractor shall be required to coordinate his efforts with those of any other contractor in the construction area so as to eliminate any lane closures which conflict with this traffic note.

In the event it becomes necessary to make emergency repairs of this project by state forces or by other outside contractors, the (painting) contractor agrees to alter his work pattern as directed by the engineer so as not to interfere with the emergency work.

The contractor will be required to furnish all traffic control devices whenever his operations endanger or interfere with vehicular traffic as determined by the engineer. The contractor shall furnish any additional traffic control devices necessary to protect traffic and his workmen. Any costs associated with the added traffic control devices (including arrow boards) shall be incidental to the contract lump sum amount for "maintain and control traffic."

Placement of all devices for lane closures shall start and proceed in the direction of flow of traffic. Removal of devices shall start at the end of the construction area and proceed toward oncoming traffic. The contractor shall provide for the installation of all necessary traffic control devices before beginning work and their immediate removal as soon as work is suspended or completed. During the fully operational periods, when no lane closures are permitted, all equipment shall be totally removed from the job site. Traffic control signs shall be removed or covered (if left in a curb lane).

The contractor's vehicles shall always move with and not across or against the flow of traffic. Vehicles shall enter or leave work areas in a manner that will not be hazardous to or interfere with normal roadway traffic. Vehicles shall not park or stop except within designated work areas.

Personal vehicles will not be permitted to park within the state right-of-way. The contractor's vehicles will be prohibited from crossing the roadway and all pedestrian movement of the contractor's personnel on the roadway will be limited to within the closed work areas.

During non-working hours of each day, all trucks and equipment shall be removed from the lane closures and off the right-of-way.

If the contractor desires to deviate from the traffic control schemes outlined in these plans or proposals, he shall prepare an alternate plan and present it in writing to the engineer. The alternate plan can be used only after review and approval of the Division of Traffic, design, and construction.

Payment

Payment of the contract lump sum amount for "maintain and control traffic" shall be full compensation for all items necessary to maintain and control traffic on this project. All traffic control items shall remain the property of the contractor when the work is complete.

PART II

SPECIAL PROVISIONS APPLICABLE TO PROJECT

SPECIAL PROVISION NO.	TITLE

NO SPECIAL PROVISIONS APPLY TO THIS PROJECT

PART III

EMPLOYMENT, WAGE AND RECORD REQUIREMENTS
(Copies of each Attached)

1. Schedule of Minimum Wages Established for the Project.

2. Labor and Wage Requirements, applicable to other than Federal-Aid System Contracts. (Rev. 2-16-95)

3. Executive Branch Code of Ethics.

TRANSPORTATION CABINET
DIVISION OF CONTRACT PROCUREMENT
COMPLIANCE SECTION

PROJECT WAGE RATES **LETTING: 02-14-2003**

CAMPBELL-OWEN COUNTIES, FEGR 03 0000002
Various Routes
Cleaning and Painting

CONSTRUCTION WORKERS . . . . . MINIMUM HOURLY RATE . . . $5.15

Note: Parts III and IV of **"Labor and Wage Requirements Applicable To Other Than Federal-Aid System Projects"** do not apply to this project.

TRANSPORTATION CABINET
DEPARTMENT OF HIGHWAYS

LABOR AND WAGE REQUIREMENTS APPLICABLE TO OTHER THAN FEDERAL-AID SYSTEM PROJECTS

I. Application
II. Nondiscrimination of Employees (KRS 344)
III. Payment of Predetermined Minimum Wages
IV. Statements and Payrolls

I. APPLICATION

1. These contract provisions shall apply to all work performed on the contract by the contractor with his own organization and with the assistance of workmen under his immediate superintendence and to all work performed on the contract by piecework, station work or by subcontract. The contractor's organization shall be construed to include only workmen employed and paid directly by the contractor and equipment owned or rented by him, with or without operators.

2. The contractor shall insert in each of his subcontracts all of the stipulations contained in these Required Provisions and such other stipulations as may be required.

3. A breach of any of the stipulations contained in these Required Provisions may be grounds for termination of the contract.

II. NONDISCRIMINATION OF EMPLOYEES

AN ACT OF THE KENTUCKY
GENERAL ASSEMBLY TO PREVENT
DISCRIMINATION IN EMPLOYMENT
KRS CHAPTER 344
EFFECTIVE JUNE 16, 1972

The contract on this project, in accordance with KRS Chapter 344, provides that during the performance of this contract, the contractor agrees as follows:

1. The contractor shall not fail or refuse to hire, or shall not discharge any individual, or otherwise discriminate against an individual with respect to his compensation, terms, conditions, or privileges of employment, because of such individual's race, color, religion, national origin, sex, disability or age (between forty and seventy); or limit, segregate, or classify his employees in any way which would deprive or tend to deprive an individual of employment opportunities or otherwise adversely affect his status as an employee, because of such individual's race, color, religion, national origin, sex, disability or age (between forty and seventy). The contractor agrees to post in conspicuous places, available to employees and applicants for employment, notices to be provided setting forth the provisions of this nondiscrimination clause.

2. The contractor shall not print or publish or cause to be printed or published a notice or advertisement relating to employment by such an employer or membership in or any classification or referral for employment by the employment agency, indicating any preference, limitation, specification, or discrimination, based on race, color, religion, national origin, sex, disability or age (between forty and seventy), except that such notice or advertisement may indicate a preference, limitation, or specification based on religion, or national origin when religion, or national origin is a bona fide occupational qualification for employment.

3. If the contractor is in control of apprenticeship or other training or retraining, including on-the-job training programs, he shall not discriminate against an individual because of his race, color, religion, national origin, sex, disability or age (between forty and seventy), in admission to, or employment in any program established to provide apprenticeship or other training.

4. The contractor will send to each labor union or representative of workers with which he has a collective bargaining agreement or other contract or understanding, a notice to be provided advising the said labor union or workers' representative of the contractor's commitments under this section, and shall post copies of the notice in conspicuous places available to employees and applicants for employment. The contractor will take such action with respect to any subcontract or purchase order as the administrating agency may direct as a means of enforcing such provisions, including sanctions for non-compliance.

III. PAYMENT OF PREDETERMINED MINIMUM WAGES

1. These special provisions are supplemented elsewhere in the contract by special provisions which set forth certain predetermined minimum wage rates. The contractor shall pay not less than those rates.

2. The minimum wage determination schedule shall be posted by the contractor, in a manner prescribed by the Department of Highways, at the site of the work in prominent places where it can be easily seen by the workers.

IV. STATEMENTS AND PAYROLLS

1. All contractors and subcontractors affected by the terms of KRS 337.505 to 337.550 shall keep full and accurate payroll records covering all disbursements of wages to their employees to whom they are required to pay not less than the prevailing rate of wages. Payrolls and basic records relating thereto will be maintained during the course of the work and preserved for a period of one (1) year from the date of completion of this contract.

2. The payroll records shall contain the name, address and social security number of each employee, his correct classification, rate of pay, daily and weekly number of hours worked, itemized deductions made and actual wages paid.

3. The contractor shall make his daily records available at the project site for inspection by the State Department of Highways contracting office or his authorized representative.

Periodic investigations shall be conducted as required to assure compliance with the labor provisions of the contract. Interrogation of employees and officials of the contractor shall be permitted during working hours.

Aggrieved workers, Highway Managers, Assistant District Engineers, Resident Engineers and Project Engineers shall report all complaints and violations to the Division of Contract Procurement.

The contractor shall be notified in writing of apparent violations. The contractor may correct the reported violations and notify the Department of Highways of the action taken or may request an informal hearing. The request for hearing shall be in writing within ten (10) days after receipt of the notice of the reported violation. The contractor may submit records and information which will aid in determining the true facts relating to the reported violations.

Any person or organization aggrieved by the action taken or the findings established as a result of an informal hearing by the Division of Contract Procurement may request a formal hearing.

4. The wages of labor shall be paid in legal tender of the United States, except that this condition will be considered satisfied if payment is made by a negotiable check, on a solvent bank, which may be cashed readily by the employee in the local community for the full amount, without discount or collection charges of any kind. Where checks are used for payments, the contractor shall make all necessary arrangements for them to be cashed and shall give information regarding such arrangements.

5. No fee of any kind shall be asked or accepted by the contractor or any of his agents from any person as a condition of employment on the project.

6. No laborers shall be charged for any tools used in performing their respective duties except for reasonably avoidable loss or damage thereto.

7. Every employee on the work covered by this contract shall be permitted to lodge, board, and trade where and with whom he elects and neither the contractor nor his agents, nor his employees shall directly or indirectly require as a condition of employment that an employee shall lodge, board or trade at a particular place or with a particular person.

8. Every employee on the project covered by this contract shall be an employee of either the prime contractor or an approved subcontractor.

9. No charge shall be made for any transportation furnished by the contractor or his agents to any person employed on the work.

10. No individual shall be employed as a laborer or mechanic on this contract except on a wage basis, but this shall not be construed to prohibit the rental of teams, trucks or other equipment from individuals.

No Covered employee may be employed on the work except in accordance with the classification set forth in the schedule mentioned above; provided, however, that in the event additional classifications are required, application shall be made by the contractor to the Department of Highways and (1) the Department shall request appropriate classifications and rates from the proper agency, or (2) if there is urgent need for additional classification to avoid undue delay in the work, the contractor may employ such workmen at rates deemed comparable to rates established for similar classifications provided he has made written application through the Department of Highways, addressed to the proper agency, for the supplemental rates. The contractor shall retroactively adjust, upon receipt of the supplemental rates schedule, the wages of any employee paid less than the established rate and may adjust the wages of any employee overpaid.

11. No contractor or subcontractor contracting for any part of the contract work which may require or involve the employment of laborers or mechanics shall require or permit any laborer or mechanic in any work-week in which he is employed on such work, to work in excess of eight hours in any calendar day or in excess of forty hours in such work-week unless such laborer or mechanic receives compensation at a rate not less than one and one half times his basic rate of pay for all hours worked in excess of eight hours in any calendar day or in excess of forty hours in such work-week. A laborer, workman or mechanic and an employer may enter into a written agreement or a collective bargaining agreement to work more than eight (8) hours a calendar day but not more than ten (10) hours a calendar day for the straight time hourly rate. This agreement shall be in writing and shall be executed prior to the employee working in excess of eight (8) hours, but not more than ten (10) hours, in any one (1) calendar day.

12. Payments to the contractor may be suspended or withheld due to failure of the contractor to pay any laborer or mechanic employed or working on the site of the work, all or part of the wages required under the terms of the contract. The Department may suspend or withhold payments only after the contractor has been given written notice of the alleged violation and the contractor has failed to comply with the wage determination of the Department of Highways.

13. Contractors and subcontractors shall comply with the sections of Kentucky Revised Statutes, Chapter 337 relating to contracts for Public Works.

Revised 2-16-95

EXECUTIVE BRANCH CODE OF ETHICS

In the 1992 regular legislative session, the General Assembly passed and Governor Brereton Jones signed Senate Bill 63 (codified as KRS 11A), the Executive Branch Code of Ethics, which states, in part:

KRS 11A.040 (6) provides:

No present or former public servant shall, within six (6) months of following termination of his office or employment, accept employment, compensation or other economic benefit from any person or business that contracts or does business with the state in matters in which he was directly involved during his tenure. This provision shall not prohibit an individual from returning to the same business, firm, occupation, or profession in which he was involved prior to taking office or beginning his term of employment, provided that, for a period of six (6) months, he personally refrains from working on any matter in which he was directly involved in state government. This subsection shall not prohibit the performance of ministerial functions, including, but not limited to, filing tax returns, filing applications for permits or licenses, or filing incorporation papers.

KRS 11A.040 (8) states:

A former public servant shall not represent a person in a matter before a state agency in which the former public servant was directly involved, for a period of one (1) year after the latter of:
a) The date of leaving office or termination of employment; or
b) The date the term of office expires to which the public servant was elected.

This law is intended to promote public confidence in the integrity of state government and to declare as public policy the idea that state employees should view their work as a public trust and not as a way to obtain private benefits.

If you have worked for the executive branch of state government within the past six months, you may be subject to the law's prohibitions. The law's applicability may be different if you hold elected office or are contemplating representation of another before a state agency.

Also, if you are affiliated with a firm which does business with the state and which employs former state executive-branch employees, you should be aware that the law may apply to them.

In case of doubt, the law permits you to request an advisory opinion from the Executive Branch Ethics Commission, Room 136, Capitol Building, 700 Capitol Avenue, Frankfort, Kentucky 40601; telephone (502) 564-7954.

PART IV

INSURANCE

The Contractor shall carry the following insurance in addition to the insurance required by law:

(1) Contractor's Public Liability Insurance not less than **$100,000.00** for damages arising out of bodily injuries to or death to one person. Not less than **$300,000.00** for damages arising out of bodily injuries to or death to two or more persons.

(2) Contractor's Property Damages Liability Insurance. Not less than **$100,000.00** for all damages arising out of injury or destruction of property in any one accident. Not less than **$300,000.00** for all damages during the policy period.

(3) Contractor's Protective Public Liability and Property Damage Insurance. The contractor shall furnish evidence with respect to operations performed for him by subcontractors that he carries in his own behalf for the above stipulated amounts.

(4) The insurance required above must be evidenced by a Certificate of Insurance and this Certificate of Insurance must contain one of the following statements:

a. "policy contains no deductible clauses."

b. "policy contains a _____ deductible property
(amount)
damage clause but company will pay claim and collect the deductible from the insured."

(5) WORKMEN'S COMPENSATION INSURANCE. The contractor shall furnish evidence of coverage of all his employees or give evidence of self-insurance by submitting a copy of a certificate issued by the Workmen's Compensation Board.

PART V

STATEMENT OF INCOMPLETED WORK

1. Status of Active Prime Contracts. Attached

1. STATUS OF ALL INCOMPLETED PRIME CONTRACTS

All active prime contracts must be reported. This includes prime contracts with public and private owners and joint-ventured contracts. The names of the joint venturers must be shown when reporting these projects. A machine or typed listing reporting the status of each contract is acceptable when attached to this report; however, the total amounts on the itemized listing must be reported in the space provided below:

CONTRACT WITH	PROJECT IDENTIFICATION	PRIME CONTRACT AMOUNT	EARNINGS THROUGH LAST APPROVED ESTIMATE	TOTAL AMOUNT OF WORK REMAINING
TOTAL (Attach Summary if not itemized above)		$	$	$

PART VI

BID ITEMS

PART VII

CERTIFICATIONS

1.	Provisions Relative to Senate Bill 258 (1994)	Attached
2.	Non-Collusion Certification	Attached
3.	Certification of Bid Proposal	Attached

PROVISIONS RELATIVE TO SENATE BILL 258 (1994)

During the performance of the contract, the contractor agrees to comply with applicable provisions of:

1.	KRS 136	Corporation and Utility Taxes
2.	KRS 139	Sale and Use Taxes
3.	KRS 141	Income Taxes
4.	KRS 337	Wages and Hours
5.	KRS 338	Occupational Safety and Health of Employees
6.	KRS 341	Unemployment Compensation
7.	KRS 342	Workers Compensation

Any final determinations of a violation by the contractor within the previous five (5) years pursuant to the applicable statutes above are revealed as follows:

_____

_____

_____

_____

_____

_____

_____

_____

NON-COLLUSION CERTIFICATION

COMMONWEALTH OF KENTUCKY
COUNTY _____
PROJECT NO. _____

I, _____, _____, under
(Name of officer signing certification) (Title)

penalty of perjury under the laws of the United States, do hereby certify that

_____,
(Insert name of Individual, Joint Venture, Co-partnership, or Corporation submitting bid)

its agent, officers or employees have not directly or indirectly entered into any agreement, participated in any collusion, or otherwise taken action in restraint of free competitive bidding in connection with this proposal.

_____
(Signature)

_____
(Title)

REVISED: 8-23-89

NON-COLLUSION CERTIFICATION

COMMONWEALTH OF KENTUCKY
COUNTY _____
PROJECT NO. _____

I, _____, _____, under
(Name of officer signing certification) (Title)

penalty or perjury under the laws of the United States, do hereby certify that

_____,
(Insert name of Individual, Joint Venture, Co-partnership, or Corporation submitting bid)

its agent, officers or employees have not directly or indirectly entered into any agreement, participated in any collusion, or otherwise taken action in restraint of free competitive bidding in connection with this proposal.

_____
(Signature)

_____
(Title)

REVISED: 8-23-89

CERTIFICATION OF BID PROPOSAL

We (I) propose to furnish all labor, equipment and materials necessary to construct and/or improve the subject project in accordance with the plans, the Transportation Cabinet's Standard Specifications for Road and Bridge Construction, current edition, special provisions, notes applicable to the project as indicated herein and all addenda issued on this project subsequent to purchase of proposal.

We (I) attach a bid proposal guaranty as provided in the special provisions in an amount not less than 5% of the total bid. We agree to execute a contract in accordance with this bid proposal within 15 calendar days after the receipt of the notice of award for the project.

We (I) have examined the site of proposed work, project plans, specifications, special provisions, and notes applicable to the project referred to herein. We understand that the quantities shown herein are estimated quantities subject to increase or decrease as provided in the specifications.

_____

Name of Contracting Firm

BY: _____

Authorized Agent Title

_____

Address City State Zip Code

_____

Telephone Number

When two or more organizations bid as a joint venture, enter names of each organization and an authorized agent for each organization must sign above.