



**TRANSPORTATION CABINET**

Frankfort, Kentucky 40622  
www.transportation.ky.gov/

**Steven L. Beshear**  
Governor

**Michael W. Hancock, P.E.**  
Secretary

July 9, 2013

CALL NO. 104  
CONTRACT ID NO. 131042  
ADDENDUM # 2

Subject: McCracken County, STP 0601 (175)  
Letting July 12, 2013

(1)Added - Special Note - Pages 55(a)-55(b) of 108

Proposal revisions are available at <http://transportation.ky.gov/Construction-Procurement/>.

If you have any questions, please contact us at 502-564-3500.

Sincerely,

A handwritten signature in blue ink that reads "Ryan Griffith".

Ryan Griffith  
Acting Director  
Division of Construction Procurement

RG:ks  
Enclosures



An Equal Opportunity Employer M/F/D

1-2025.00  
 US 60, McCracken County

**SPECIAL NOTE FOR DOWEL BAR AND TIE BAR PLACEMENT IN JPC PAVEMENT**

This Special Note will apply where indicated on the plans or in the proposal. Section references herein are to the Department’s 2012 Standard Specifications for Road and Bridge Construction.

**1.0 DESCRIPTION.** This Special Note applies when new JPC pavement is placed on a project. Allowable tolerances are outlined for both dowel bar and tie bar placement in driving lanes and shoulders. Concrete patches will not be tested under this special note except for the instance where corrective work is required on the placement of new JPC pavement which may require concrete patching. Testing will include longitudinal joints between driving lanes and shoulders if the shoulders are constructed with JPC pavement. Transverse joints in the shoulders will not be tested. No concrete patching will be tested except for repairs required on new JPC pavement. *Working with concrete requires at least seven days or more of curing time. The concrete should be dry for at least 24 hrs prior to testing.*

This Special Note specifies the allowable tolerances for placement of dowel bars and tie bars in JPC pavement.

**2.0 MATERIALS.** Conform to Subsection 501 or 502.

**3.0 CONSTRUCTION.**

**3.1 Dowel Bars.** Transverse dowel bars, which are generally in baskets, should be located in the center of the slab vertically. They should not be skewed or rotated. Contrary to Section 501 of the Standard Specification and Standard Drawing RPS-020-13, place dowel bars to the tolerances shown in the table below.

<b>Dimension</b>	<b>Tolerance</b>
Horizontal offset	± 1 inch
Longitudinal translation	± 3 inches
Horizontal skew	½ inch, max
Vertical skew	½ inch, max
Vertical depth	<p>The minimum distance below the concrete pavement surface must be:  <math>DB = T/3 + 1/2</math> inch</p> <p>Where:            DB = vertical distance in inches, measured from the concrete pavement surface to any point along the top of dowel bar; and            T = actual concrete pavement thickness at joint location, in inches.</p> <p>The maximum distance below the surface to any point along the dowel bar should be <math>2T/3</math>.</p>

1-2025.00  
US 60, McCracken County

Dowel bars determined to be out of tolerance are to be marked in the field with marking paint. Corrective work will be required with the following circumstances:

- if 3 or more bars are higher than  $T/3 + \frac{1}{2}$  inch from the top of the slab or lower than  $2T/3$  (as measured from the top) for the bottom of the slab
- if 3 or more bars are rotated longitudinally 3 inches or more
- if more than two consecutive joints have any bars that are skewed vertically or horizontally

Any corrective work shall be completed in accordance with the 2012 SN 11J – Special Note for Full Depth Concrete Pavement Repair. Contrary to Special Note 11J, all joint repairs completed due to corrective work shall be sealed with silicone rubber unless approved by the Engineer.

**3.2 Tie Bars.** Install tie bars at a depth equal to  $\frac{1}{2}$  of the slab thickness. Tie bars shall be perpendicular to the longitudinal joint and parallel with the concrete pavement surface. Installation shall be to the tolerances outlined below.

- Not less than  $\frac{1}{2}$  inch below the saw cut depth of the joints
- 2" clearance from pavement surface and bottom of pavement

Corrective action will be required for the following circumstances:

- 2 consecutive tie bars are missing or outside of the tolerance listed above
- 4 or more bars in a slab are missing or outside of the tolerances listed (does not have to be consecutive)

The correction shall be made by cross stitching to place the new tie bars accordingly.

#### 4.0 MEASUREMENT

**4.1 Testing Limits.** All driving lanes and shoulders requiring load transfer assemblies will be tested with Ground Penetrating Radar (GPR) equipment. All longitudinal joints will be tested. The Kentucky Transportation Center (KTC) will perform all testing.

**4.2 Validation.** A minimum of one location per lane mile will be cored to verify GPR testing. Two 4 inch cores shall be obtained at each location. One core will be taken on each dowel bar end to expose both ends and allow physical measurements. KTC will conduct coring while the contractor shall patch all core holes.

July 9, 2013