

## SPECIAL PROVISIONS FOR CONCRETE RAMPS AND STEPS

Clayton County STPN-076-1(16)--2J-22

Effective Date November 16, 2021

THE STANDARD SPECIFICATIONS, SERIES 2015, ARE AMENDED BY THE FOLLOWING MODIFICATIONS AND ADDITIONS. THESE ARE SPECIAL PROVISIONS AND THEY SHALL PREVAIL OVER THOSE PUBLISHED IN THE STANDARD SPECIFICATIONS.

## 150766.01 **DESCRIPTION.**

Provide forming and installation of concrete ramps and steps at locations, heights, and depths as indicated on plans.

### 150766.02 MATERIALS.

- **A.** Concrete: Use Class C concrete complying with Section 2403 of the Standard Specifications as well as all related sections. Inspection shall be per Iowa DOT Materials I.M.s.
- **B.** Reinforcing steel: comply with Section 4151 of the Standard Specifications for epoxy coated reinforcement.
- **C.** Expansion joint: comply with Article 4136.03, A of the Standard Specifications.
- **D.** Forms: comply with Section 2403 of the Standard Specifications.

### 150766.03 CONSTRUCTION.

- **A.** Prepare subgrade: in fill areas, construct and compact subgrade to 95% of maximum standard proctor density.
- **B.** Forming: comply with Article 2403.03, B of the Standard Specifications.
- **C.** Concrete: Deposit concrete for the full depth of the concrete ramp or steps in one operation.
  - 1. Concrete mixing.
    - a. Comply with Article 2403.02, D of the Standard Specifications.
    - b. When using ready-mixed concrete, comply with ASTM C 94.

# 2. Concrete placing.

- a. Comply with Article 2403.03, C of the Standard Specifications.
- **b.** Do not place concrete when the air temperature is less than 40°F without the approval of the Engineer. When placement of concrete below 40°F is allowed, comply with Article 2403.03, F of the Standard Specifications.
- **c.** Place concrete continuously in each section until complete. Do not allow more than 30 minutes to elapse between depositing adjacent layers of concrete within each section.
- d. Comply with Article 2403.03, D of the Standard Specifications for concrete vibration.
- **e.** Form 1 1/2 inch by 3 inch keyed construction joints at locations shown in the contract documents.
- **f.** Provide a broom finish on portions of structure that are to become part of exposed pavement, or finish as detailed in plan sheets.
- **D.** Reinforcing steel: comply with Section 2404 of the Standard Specifications. Provide a minimum 2 inches of cover on all reinforcing steel.

#### 150766.04 METHOD OF MEASUREMENT.

Measurement will be the area of concrete ramps and steps in square feet for each type of concrete ramp and step. For concrete steps,  $\mp$ the length will be the horizontal length between expansion joints, and the width will include curbs. For the concrete ramp, the length and width of the pay limits are shown on the plans. The concrete ramp area for payment includes the lower landing, ramp, and upper landing.

## 150766.05 BASIS OF PAYMENT.

## A. Concrete steps.

- 1. Payment will be at the unit price per square foot of concrete steps.
- 2. Unit price includes, but is not limited to, all materials, equipment, and labor required to provideing reinforcement, expansion joint material, and preparation of subgrade.

## B. Concrete ramps.

- 1. Payment will be at the unit price per square foot of concrete ramps.
- 2. Unit price includes, but is not limited to, all materials, equipment, and labor required to provideing reinforcement, expansion joint material, PVC weep holes, and preparation of subgrade, forming and placing concrete as shown on the plan.