

Work Plan for Special Experimental Project No. 14 (SEP-14)

Michigan Department of Transportation
Programmatic use of Type 1 and Type 2 Fixed Price Variable Scope Contracting
On Capital Preventative Maintenance Projects
Original Date: December 17, 2012
Revised August 13, 2014

Introduction

The Michigan Department of Transportation (MDOT) proposes to programmatically use fixed price variable scope contracting on various Capital Preventative Maintenance (CPM) projects under the provisions of Special Experimental Project No. 14 (SEP 14).

Purpose

The purpose of fixed price variable scope (FPVS) contracting is to use a fixed or maximum dollar amount in the bidding process to construct the greatest amount of work with the available project budget. Because the proposed work on CPM projects is typically consistent throughout the project locations and the final segment end point can be adjusted, MDOT expects to gain more value for the dollar by using this innovative contracting method.

Scope

MDOT has developed two types of FPVS procurements requiring approval through this SEP-14 Work Plan. This Work Plan only applies to CPM projects using Type 1 and 2 procurements. Non-CPM projects using a Type 1 or 2 procurement will require a separate approval unless otherwise directed by the FHWA.

Type 1: Type 1 FPVS projects receive bids by a unit of work that can be completed for a stated fixed price. The selected contractor is the bidder that proposes the most units of work for the given fixed price. For example, a HMA crack sealing project would be bid by the lane miles a contractor can complete based on the fixed price provided in the contract. In the event of a tie, bidders will be required to submit a revised price for the amount of work originally bid, and the bidder with the lowest price would be the selected contractor.

MDOT has used Type 1 FPVS procurements for multiple crack sealing and chip sealing CPM projects.

Type 2: Type 2 FPVS projects receive bids by a unit of work that can be completed for a maximum fixed price. Contractors also bid a price for the work that is below the maximum price. The work that will be completed is identified at the time of the bid. The selected contractor is first determined by the bidder that proposes the most units of work for the price they bid. If two or more contractors propose the same amount of work, then the successful bidder is determined by which of those contractors proposed the lowest maximum price. For example, the single Type 2 project MDOT has let received bids based on the square yards of epoxy overlay that can be completed and a price to complete the work included in the bid. The square yards bid had to place an epoxy overlay over an entire bridge deck (a partial bridge deck was not acceptable), and the price bid had to be below the maximum price. In the event of a tie, bidders will be required to submit a revised price for the amount of work originally bid, and the bidder with the lowest price would be the selected contractor.

Submittal Requirements to FHWA for Type 1 and Type 2 FPVS Projects:

MDOT will provide the FHWA-Michigan Division with the CPM projects that will use a Type 1 or Type 2 FPVS procurement method. The FHWA-Michigan Division will also be provided the contract documents related to FPVS for approval prior to its initial use on a project. After initial approval, the

contract documents will be used on future FPVS CPM projects without additional review. Non-CPM FPVS projects will require an individual SEP-14 approval unless otherwise directed by the FHWA-Michigan Division.

Schedule

Innovative Contracting projects, including FPVS projects, are identified through an annual call for projects, and individually throughout the year as a need arises. The FHWA-Michigan Division will be provided the projects included in this SEP-14 Work Plan after MDOT initially reviews and approves the projects. If the list of project changes, MDOT will provide FHWA-Michigan Division an updated list as appropriate for approval. FHWA-Michigan Division will coordinate with FHWA-Headquarters for approval.

Evaluation

In order to evaluate the success of this innovative contracting method, MDOT will assess the completed work under each contract compared to a typical design-bid-build project. To accomplish this, MDOT will estimate the amount of work that would be expected to be constructed using the fixed dollar amount. Estimating will be performed by using our traditional estimating methods that are based on recent bidding history. This process will allow MDOT to determine the value received by using the FPVS method compared to traditional design-bid-build project delivery.

Industry reaction will also be measured by comparing the bids on similar contracts to the number of bids received on the fixed price variable scope contracts.

Reporting

MDOT will prepare and submit a report to the FHWA. The report will be submitted annually and will include an evaluation of all projects completed within the last calendar year. The report will contain an overall evaluation of the project along with any suggestions and recommendations for improving the process.