

**Steven L. Beshear** Governor

Frankfort, Kentucky 40622 www.Transportation.ky.gov Michael W. Hancock, P.E. Secretary

## **DESIGN MEMORANDUM NO. 01-13**

**TO:** Chief District Engineers

Design Engineers
Design Consultants

**FROM:** Jeff D. Jasper, P.E.

Director

Division of Highway Design

**DATE:** February 19, 2013

**SUBJECT:** Value Engineering Analysis Requirements Update

The federal transportation act, MAP-21, has redefined when a value engineering (VE) analysis or study is required. The law now specifies that all roadway projects on the National Highway System that have a total phase cost exceeding \$50 million and bridge projects exceeding \$40 million will require a VE study when there are any federal funds used for the project. The "total phase cost" of a project is that which is estimated for planning, environmental, design, right-of-way, utility relocation, and construction.

Any project that meets the new federal definition will require a VE study. A project manager may also opt to conduct a VE study on any project outside of the federal definition in order to benefit from this type of outside review.

The definition of what constitutes the limits of a project remains the same. The termini, as defined in the environmental document, should be used to calculate the project's total phase cost when determining eligibility. Regardless of whether the funding of a project is segmented into smaller pieces (multiple item numbers), the entire project must be reviewed using the requisite VE process. This may entail multiple VE studies if sections are being developed at differing schedules. Additionally, if a project section has been let to construction and did not receive a VE study in the past, subsequent design sections are not exempt from the VE requirement.

Finally, VE studies may be done at various times during project development, but the maximum benefit is derived when performed near the completion of preliminary design and before the NEPA process is complete. All VE studies should be either administered by or coordinated with the Value Engineering Coordinator in the Division of Highway Design to ensure federal requirements are fulfilled.

This memo supersedes the Design Memorandum No. 05-10.

JDJ:BAS:jjf

