

OFFICE MEMORANDUM

- **DATE:** March 17, 2014
- TO: Region Engineers Region Associate Construction Engineers Region Construction Engineers TSC Managers TSC Construction Engineers
- FROM: Gregory C. Johnson, P.E. Chief Operations Officer

Randel R. Van Portfliet, P.E. Bureau Director of Field Services

SUBJECT: Bureau of Highway Instructional Memorandum 2014-03 Construction Value Engineering Change Proposal (VECP) (Supersedes BOH IM 2002-08)

The Federal Highway Administration (FHWA) Construction Program Guide notes that Value Engineering Change Proposals (VECP) are post-award value engineering proposals made by construction contractors during the course of construction under a value engineering clause in the contract. Furthermore, federal documentation has defined VECPs as "a construction contract provision which encourages the contractor to propose changes in the contract requirements which will accomplish the project's functional requirements at a less cost or improve value or service at no increase or a minor increase in cost. The net savings of each proposal is usually shared with the contractor at a stated reasonable rate."

The Construction VECP must follow the Special Provision for Value Engineering Change Proposal (VECP). The VECP special provision is placed in all projects. VECPs submitted by the contractor are value engineering concepts, principles, and techniques applied at the construction stage of a project. Submittal of VECPs from the contractor is intended to promote lower costs, provide a better product, improve safety, or shorten contract time. The proposed VECP should not significantly delay the completion of the project or impair the essential functions or characteristics of the project in any manner, including but not limited to, service life, economy of operation, ease of maintenance, desired appearance, impact on utilities and right-of-way, or the design and safety standards.

The Special Provision for Value Engineering Change Proposal (VECP) is the instrument used to provide and maintain an effective program of VECPs. The special provision provides the contractor with monetary incentive to participate in cost saving techniques. The department also

encourages VECPs where there may be no cost savings, but improves the design or construction, or shortens the contract time of a project.

The following procedures have been established to process and evaluate VECP submittals. These procedures apply to all MDOT projects, local agency projects let through MDOT, and any projects that use federal aid or state funding.

Refer to Table A, Value Engineering Change Proposal (VECP) Evaluation Process, and proceed as follows for evaluation and/or approval of the contractor's VECP:

- 1. When the contractor submits a conceptual or final VECP, it must include all items required by the special provision and Form 1962, Value Engineering Change Proposal. The form is available on the MDOT forms web page. The form and all required information is to be submitted to the construction/project engineer. The construction/project engineer will provide an electronic copy to all of the parties on the form distribution list.
- 2. The construction/project engineer shall evaluate the VECP submittal. The construction/project engineer's recommendation and/or decision must be coordinated with input from the project designer, Operations Field Services, Construction Field Services, the Associate Region Engineer for Development, the Region Engineer, and/or the project manager, as appropriate. The project designer/manager must be engaged on all VECP submittals to ensure that value engineering suggestions that were evaluated during the design process are fully understood by the construction/project engineer. A value engineering suggestion during the design phase may have been rejected for valid reasons and this information must be provided to the construction/project engineer. The construction/project engineer must coordinate the VECP review with the design project manager to ensure that proposed VECP work does not conflict with any mitigation commitments from the environmental clearance phase. After the construction/project engineer documents their review and action, along with supporting information, the VECP will proceed as outlined in Table A. Each reviewer should then document their decision for the next reviewer as appropriate.
- 3. The Value Engineering Decision Team (VEDT) will be used for VECP submittals with total savings of \$1,000,000 or greater. Permission may be granted for the contractor to present the VECP orally to the VEDT, but all the data needed for evaluation shall be submitted in writing. The construction/project engineer and design engineer will provide input to this team. If VEDT action is required, activities will be coordinated through the Construction Operations Engineer in the Construction Field Services Division. The VEDT membership will consist of the following individuals (or their designee):
 - a. Engineer of Construction Field Services
 - b. Engineer of Design
 - c. Engineer of Operations Field Services
 - d. Region Engineer (of respective region)
 - e. Administrator of the Development Services Division (if a local agency project)

- 4. Projects that are classified as FHWA Projects of Division Interest (PoDI) are to be coordinated directly with the respective FHWA Area Engineer. When the VECP is received by the construction/project engineer, they will contact the FHWA Area Engineer responsible for that project. Based on the scope and content of the VECP, the FHWA Area Engineer will determine what FHWA approval is required. For non-PoDI projects (known as MDOT Oversight), FHWA approval is not required.
- 5. If the VECP is approved, the construction/project engineer will notify the contractor within the proposed change deadline. The construction/project engineer will then prepare and submit the necessary contract modification. Proper documentation is to be attached, included, or referenced in the contract modification. The construction/project engineer is to review the VECP submittal for applicability of liquidated damages if additional contract, stage or open to traffic time is approved. If additional time is approved the construction/project engineer will determine if a time extension will be approved with or without the assessment of liquidated damages. If liquidated damages are assessed as part of the VECP these damages are to be included in the VECP contract modification. The contract modification will be used for final cost approval. Payment shall be in accordance with the Special Provision for Value Engineering Change Proposal (VECP). An electronic copy of the contract modification and all attachments is to be forwarded to the Construction Operations Engineer in the Construction Field Services Division. In lieu of forwarding paper documentation the use of a ProjectWise project link is suggested.
- 6. If the proposed change is rejected, the construction/project engineer will send documented notification to the contractor, and will include the reasons for the rejection. The notification must also note, as stated in the VECP special provision, that the decision is final and there are no appeals. A copy of this notification of rejection is to be provided to the Construction Operations Engineer in the Construction Field Services Division.
- 7. All construction and design personnel (MDOT, local agency, and consultant) are to keep track of the time they spend reviewing the VECP. This information is to be forwarded to the Construction Field Services Division, Attention Construction Operations Engineer when all reviews are complete. The information will be used to track administrative costs of the VECP process and for annual FHWA reporting.
- 8. An annual report will be compiled to summarize costs and savings of the VECP program and distributed to design and construction staff. This information will also be used for FHWA annual reporting.
- 9. The cost savings pay item to be used is, "Value Engineering", with a pay item code of 1200000 and the pay unit is dlr (dollars) for all contract modifications. This pay item will provide the contractor with their portion of the approved VECP amount and is to be used regardless of the number of VECP submittals.
- 10. Approved VECPs will be reviewed for possible inclusion in the design of future applicable projects as well as applicable design standards and manuals. It is the

responsibility of the Construction Operations Engineer in the Construction Field Services Division to coordinate applicable specifications and design standard changes with the Design Division and the Statewide Design Alignment Team (SDAT).

TOTAL VECP SAVINGS	CONSTRUCTION / PROJECT ENGINEER	TSC MANAGER	VEDT
\$250,000 or less	Final Approval or Rejection (within 14 calendar days)	Сору	N/A
Greater than \$250,000 to \$1,000,000	Recommend Approval or Rejection (within 7 calendar days)	Final Approval or Rejection (within 14 calendar days)	N/A
\$1,000,000 or greater	Recommend Approval or Rejection (within 7 calendar days)	Сору	Final Approval or Rejection (within 14 calendar days)

Table A - Value Engineering Change Proposal (VECP) Evaluation Process

Time frames may be extended by mutual agreement between the construction/project engineer and the contractor, per the VECP special provision.

If you have any questions, please contact Jason Gutting, Engineer of Construction Operations, at <u>guttingj@michigan.gov</u> or 517-636-6334.

Chief Operations Officer

Bureau Director of Field Services

FHWA Approval: 03/11/14

BOFS:CFS:JJG:mnn

Index: Special Provisions

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