Part 512 - Construction

Subpart A – General Information

512.0 Introduction

Engineering conservation practices and project structures must be installed in accordance with approved drawings and specifications if the practice is to serve its intended purpose and expected service life with anticipated normal operation and maintenance. In order to achieve proper installation, NRCS has standardized construction practices and procedures to promote a common understanding between all parties involved with the design and installation of an engineering practice. Quality assurance (QA) activities are an important part of NRCS standard construction practices.

512.1 Scope

This policy applies to all conservation engineering practices, structures, and systems in every NRCS program for engineering job approval classes I through VIII as defined in part 501 of this manual. QA activities may vary in accordance with complexity and hazard class of the structures. In subparts A and B of this manual, sections 512.03, 512.10, 512.11, 512.12, and 512.14 do not apply to nonproject work (as defined in section 512.02 below).

512.2 Definitions

- A. Owner.—The party responsible for contracting for construction. The owner pays the contractor and accepts the completed work. The owner may be NRCS (Federal contract), a contracting local organization (CLO), or a private individual or group.
- B. Contract.—A mutually binding legal relationship obligating the seller to furnish the supplies or services (including construction) and the buyer to pay for them. For purposes of this part contracts can be considered to fall within three basic categories:
 - (1) Federal Contract.—This contract type is governed by the Federal Acquisition Regulation (FAR) and is administered by NRCS.
 - (2) CLO Contract.—This contract is governed by the CLO's contracting regulations amended to include requirements set forth in a project agreement between NRCS and the local sponsor. The local sponsor administers the contract.
 - (3) Private Contracts.—This contract is between a private individual or group and a contractor.
- C. Contractor.—The individual or firm that performs the construction or installs the project or conservation measure. Contractors are responsible for providing a finished product in accordance with plans and specifications, quality control, and safety. Project sponsors may function as a contractor under provisions that may include division of work, performance of work, or force account.
- D. Contracting Officer (CO).—A Federal employee with the authority to enter into, administer, and terminate contracts on behalf of the Government and who may bind the Government only to the extent of the authority delegated to them. COs ensure performance of all necessary actions for effective contracting, ensure compliance with the terms of the contract, and safeguard the interests of their governmental unit in its contractual relationships. COs should request and consider the advice of specialists in audit, law, engineering, information security, transportation, and other fields as appropriate. A CO is required only on Federal contracts. A non-Federal contracting official, similar to a Federal CO, is required for a CLO contract. Other non-Federal contracts may not require a CO;

the owner or someone assigned by the owner has the authority to enter into, administer, and terminate the contract.

- E. Project Engineer.—The project representative for the owner who is assigned technical and contract administration duties as outlined in the quality assurance plan (QAP) and, for Federal contracts, in the appointment letter issued by the CO. The project engineer may be an NRCS employee, an employee of an architectural and engineering (A&E) firm under contract with NRCS or a CLO, or an employee of the CLO or partnership agency. The main responsibility of the project engineer is to verify that the construction complies with the plans and specifications.
- F. Government Representative (GR).—An NRCS employee responsible for protecting the Government's interest and maintaining close working relations with the CLO for all construction work performed under contracts administered by a CLO. If the project agreement specifies that NRCS has QA responsibility for a construction contract, then the GR must be an engineer.
- G. Contracting Officer's Representative (COR).—If the project is a Federal contract, a COR may be appointed by the CO. If the procurement activity is related to engineering, construction, or both, then the COR must be an engineer whose primary duties are QA responsibilities, such that the Government's interests are protected. The NRCS CO will appoint, by letter, a COR for design and construction contracts. The COR may be the project engineer or the project QA inspector.
- H. Project QA Inspector.—Responsible for QA testing, engineering surveys, daily documentation of project activities, coordination with the contractor's quality control personnel, maintenance of the project files, and "as-built" documentation. The NRCS CO will appoint, in writing, project QA inspectors with the qualifications outlined in the QA plan on Federal contracts. The State conservation engineer (SCE) appoints the project QA inspectors if the CLO project agreement states that NRCS will provide QA.
- I. Project Work.—Activities in support of work installed under Federal or locally awarded contract and project agreement with a local sponsor as authorized by programs such as the Emergency Watershed Protection (EWP) Program.
- J. Nonproject Work.—Activities in support of planning, design, and installation of conservation practices and systems by landowner or group engaged contractors, for which a project agreement is not utilized.
- K. Value Engineering Change Proposal (VECP).—A proposal submitted by a contractor under the value engineering (VE) provisions of the FAR that would create acquisition savings for the Government through a change in the project's plans, designs, or specifications as defined in the contract. The contractor and the Government share the savings if a VECP is accepted. Any proposed change to an engineering structure must be approved by the designer and a person with the appropriate job approval authority.

512.3 Value Engineering

A. Authority

- (1) 48 CFR Parts 48 and 52 describe the policy and procedures for using and administering VE techniques in contracts.
- (2) Office of Management and Budget Circular A-131, "Value Engineering," requires Federal agencies to use VE as a management tool, where appropriate, to reduce program and acquisition costs.
- B. Contractors may use VECP to—

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- (1) Voluntarily suggest design alternatives that may be more economical or less costly to install, where both the owner and contractor would benefit.
- (2) Identify and submit to the Government methods for performing work more economically. FAR, Part 48, "Value Engineering," provides the terms and conditions. Consideration of any VECP must include the comparison of future costs of operation and maintenance and other costs that may be affected as a result of the change.
- C. Contractors must submit VECPs in writing, including supporting computations, drawings, rationale, or some combination of these showing how the requested change will result in both cost savings and a product that is technically equivalent or superior.

D. States' Responsibilities

- (1) Each State will establish internal guidelines for processing VECPs and procedures for funding the contractor's share of the collateral savings.
- (2) Approval of VECPs must be reported to the SCE.
- E. Written requests for changes to conservation engineering practices proposed by the contractor should be handled similar to a VECP. When the change is technically acceptable (meets NRCS standards and specifications), the decision to accept the change remains with the landowner-operator. NRCS will provide adequate review of the proposal and provide the decision maker with the necessary information to support the acceptance or rejection of the proposal. Any proposed change to an engineering structure must be approved by a person with the appropriate engineering job approval authority.