



CONSERVATION ENHANCEMENT ACTIVITY

E666132Z3 Colorado

CONSERVATION STEWARDSHIP PROGRAM

Facilitating oak forest regeneration

Conservation Practice 666: Forest Stand Improvement

APPLICABLE LAND USE: Forest; Associated Ag Land

RESOURCE CONCERN ADDRESSED: Fish & Wildlife – Inadequate Habitat

ENHANCEMENT LIFE SPAN: 10 Years

Enhancement Description

Facilitate oak regeneration following a forest stand improvement treatment for natural oak regeneration (i.e., a regeneration cut). After a regeneration cut, oaks in the seedling and sapling stages are often out-competed by invasive brush and undesirable tree and shrub species. This enhancement will release seedling and sapling oaks from competing invasive plants and other undesirable species, and thin stump sprouts. A forester will monitor site conditions, treat competition, protect seedlings, and recommend additional follow-up treatments as needed. The enhancement protects investments in oak regeneration by providing for follow-up activities that require the expertise of a professional forester.

Criteria

States will apply general criteria from the NRCS National Conservation Practice Standard (CPS) Forest Stand Improvement (Code 666) as listed below, and additional criteria as required by the NRCS State Office.

- Develop or update a forest management plan (FMP) in consultation with NRCS personnel and a professional forester to direct the management of the property. The FMP will include guidelines for the amount of advanced oak regeneration needed to achieve the desired future condition. It will describe the types of competition or other stressors that threaten oak survival and recruitment in the area, and recommend controls such as prescribed burning, chemical, and mechanical treatments that may be needed. The FMP will also include guidelines for future inspection and monitoring, types of forest health impacts or stand damage to look for during inspections, and



CONSERVATION STEWARDSHIP PROGRAM

potential supplementary activities that may be needed to achieve additional oak regeneration and recruitment.

- This enhancement may be applied only to forest stands that have already had a seed tree, shelterwood, thinning, or other silvicultural treatment designed to regenerate oak. The stands must have sufficient existing advanced oak regeneration in the seedling and/or sapling stages. This enhancement is not appropriate when stands have reached the poletimber size class. The stands must also have evidence that the advanced oak regeneration is not “free to grow” because of competing species.
- A forestry specialist will inspect the stand and identify existing or potential species of harmful insects, tree diseases, and invasive plants, as well as other biotic and abiotic (i.e. ice storms, drought, flooding, etc.) impacts on forest growth, health, structure and/or composition.
- A forestry specialist will conduct regeneration surveys according to methods described in the NRCS National Forestry Handbook, Title 190, Section 636.2.
- The forestry specialist will make recommendations for short-term treatments as needed. A skilled laborer will implement appropriate activities such as applying mechanical and spot chemical treatments, and/or installing tree protection.
- In appropriate settings, prescribed burning may be used to control vegetative competition after oak root systems are sufficiently established to re-sprout after a fire. With the recommendation of a forestry specialist, use NRCS CPS Prescribed Burning (Code 338), or CPS Enhancement E338137Z2, Short-interval burn.
- The forestry specialist will recommend additional practices as needed to correct undesirable forest health conditions. Practices may include: NRCS CPSs Integrated Pest Management (Code 595), Brush Management (Code 314), Herbaceous Weed Control (Code 315).
- Forest stands lacking sufficient oak regeneration with no surrounding seed-producing oaks may need an enrichment planting of oak. Use NRCS CPS Tree and Shrub Establishment (Code 612). Prescribed burning may not be appropriate where trees have been recently planted.



CONSERVATION STEWARDSHIP PROGRAM

Documentation and Implementation Requirements:

Participant will:

- Prior to implementation, the participant will obtain a current or updated Forest Management Plan (FMP) that includes activities required to implement this enhancement. The FMP will identify regeneration needs, competition that impedes oak regeneration and recruitment, other forest health concerns, and activities recommended for implementation. The participant will make the FMP available for NRCS review.
- Prior to implementation, arrange for a forestry specialist to inspect the stand and perform the tasks identified in this enhancement.
- Prior to implementation, review the NRCS CPS Forest Stand Improvement (Code 666) conservation practice standard and other applicable implementation documentation and use the information to meet the criteria of this enhancement.
- During implementation, the participant and the forestry specialist will protect regenerating oak trees from damage.
- During implementation, notify NRCS if there are any planned changes, to verify they meet the enhancement criteria.
- After implementation, notify NRCS that the work has been completed, and make the following information available to NRCS: dates that inspection was conducted, methods used, and the treatments applied to remove competition and protect young oaks.

NRCS will:

- Prior to implementation, verify the enhancement activity is planned for acres that meet the criteria within the enhancement guide sheet. Verify that a forest stand improvement treatment to initiate oak regeneration was previously applied, that regenerating seedling and/or sapling oaks are present, and that oak survival is threatened by competing species and/or other environmental stressors.
- Prior to implementation, provide assistance with interpretation of a current or updated FMP on acres targeted by this enhancement.
- Prior to implementation, provide and explain the following NRCS Conservation Practice Standards as they relate to implementing this enhancement:
 - Forest Stand Improvement (Code 666)
 - Integrated Pest Management (Code 595)



CONSERVATION STEWARDSHIP PROGRAM

- Prescribed Burning (Code 338)
 - Brush Management (Code 314)
 - Herbaceous Weed Control (Code 315)
 - Tree and Shrub Establishment (Code 612)
- As needed, prior to implementation, NRCS will provide technical assistance by:
 - Preparing specifications for applying this enhancement for each site using approved specification sheets, job sheets, technical notes, and narrative statements in the conservation plan, or other acceptable documentation, and discussing the details with the participant.
 - Providing methods for conducting regeneration surveys.
 - During implementation, provide technical assistance if requested by the participant.
 - During implementation, as needed, evaluate any planned changes to verify they meet the enhancement criteria.
 - After implementation, certify that the enhancement was completed according to the NRCS CPS Forest Stand Improvement (CPS 666) specifications and the enhancement criteria.

NRCS Documentation Review:

I have reviewed all required participant documentation and have determined the participant has implemented the enhancement and met all criteria and requirements.

Participant Name _____ Contract Number _____

Total Amount Applied _____ Fiscal Year Completed _____

NRCS Technical Adequacy Signature

Date