

NATURAL RESOURCES CONSERVATION SERVICE
CONSERVATION PRACTICE STANDARD

WILDLIFE WATERING FACILITY

(No.)

CODE 648

DEFINITION

Constructing, improving, or modifying watering facilities for wildlife.

available in a given area and provide year round water in most years.

PURPOSE

To provide drinking water for wildlife.

Wildlife watering facilities shall be spaced a minimum of one-half mile apart, or no closer than one-half mile from a dependable water supply.

CONDITIONS WHERE PRACTICE APPLIES

This practice applies in areas where new, additional, or improved watering places are needed to increase the range or improve the habitat of wildlife.

Wildlife watering facilities may be either embankment or excavated catch basins; a combination of the two; or improvements of small water supplies such as springs, seeps, and small brooklets. Improvements of springs or seeps that require excavating or embankments placed in creek channels or other waters of the state shall require that all appropriate federal and state permits be obtained by the landowner.

CRITERIA

General.

Wildlife watering facilities shall be installed where a lack of permanent and dependable water supplies are available for wildlife. Permanent, dependable water supplies may include perennial and year round springs, farm ponds and lakes, and permanently inundated wetlands and shallow water areas. Intermittent and wet weather springs and seasonally inundated wetlands may be considered adequate water supplies when a combination of these water sources are

Distribution of watering facilities shall be based on the wildlife species to be targeted. Specific water needs of various upland wildlife species may be found in the 'Wildlife Upland Habitat Management' standard and specification (645).

Wildlife watering facilities designed to improve intermittent springs (e.g., wet weather springs) shall contain adequate water storage capabilities to provide water through drier periods. Spring boxes or catch basins shall be

Conservation practice standards are reviewed periodically and updated if needed. To obtain the current version of this standard, contact the Natural Resources Conservation Service.

capable of storing a minimum of 50 gallons of water.

Seep dugouts and catch basins shall have a surface area of at least 1,600 square feet (approximately 0.04 acre surface area). The maximum water surface area shall not exceed 3,000 square feet (approximately 0.07 acre). Minimum water depth of a dugout shall be approximately 48 inches over at least one-third of the excavated area. The maximum water depth of a wildlife watering facility shall not exceed five (5) feet. At least one slope of the dugout shall have a slope of 4:1 or flatter to facilitate wildlife access.

Surface runoff catchments with small earth embankments intended to store more than four (4) feet of water against the embankment, or with a design surface area of 3,000 square feet or larger, shall be designed according to NRCS Practice Standard 378 (Pond). Excavated areas (pit ponds) exceeding a four (4) foot maximum depth with a water surface area of 3,000 square feet or more shall also follow the 'Pond' standard.

Additional criteria for improving wildlife habitat.

Where applicable, wildlife watering facilities shall be constructed in close proximity to adequate cover and food producing areas for wildlife. An approved habitat evaluation procedure may be applied to the proposed site as part of the site selection process.

All disturbance areas due to earthwork shall be seeded as soon after completion of construction activities as possible. Appropriate plant materials shall be selected based on the planting season immediately following the construction period. Grasses, forbs, and legumes can be planted in mixes and separately to encourage maximum plant diversity. Native plants that provide additional wildlife values shall be used to establish cover whenever possible. Specifications for establishing plant materials to control erosion and provide wildlife benefits may be found in the Wildlife Upland Habitat Management standard (645) and/or the Pasture and Hayland Planting standard (512).

CONSIDERATIONS

Sites for dugouts and embankments should have soils with adequate permeability conditions to hold water. If necessary, a water budget may be computed to determine adequacy of the drainage area, rates of runoff, infiltration, evaporation, transpiration and deep percolation for providing water storage and loss potential. Sediment delivery potential to watering facilities from sources within the drainage area should be considered. Upslope sites that may deliver high sediment may require filter strips or a diversion of runoff subject to water recharge needs.

When considering the development of a wildlife watering facility within small

water courses or concentrated flow areas, flood prone areas or areas subject to excessive runoff should be avoided. Wildlife watering facilities developed at springs or seeps that are subject to frequent overflows will require that an appropriate outlet be provided. Riprapping of the outlet may be desirable, or a pipe may be necessary to protect a spillway.

PLANS AND SPECIFICATIONS

Specifications for installation, operation, and maintenance of wildlife watering facilities shall be prepared for each site according to the Criteria, Conditions, and Operation and Maintenance described in this standard, and shall be recorded on specification sheets, job sheets, narrative statements in conservation plans, or other acceptable documentation.

OPERATION AND MAINTENANCE

Areas planned for wildlife watering facilities that are currently being grazed by domestic livestock should be fenced and domestic livestock excluded. Some limited grazing around wildlife watering facilities may be acceptable subject to the time of year and weather conditions. Grazing should not be allowed during dry times of the year or during the primary nesting season.

All herbaceous plant communities re-established on disturbed sites should be

managed to protect associated wildlife values. The use of native plants will reduce maintenance costs and provide more wildlife benefits. Mowing of these areas should be done outside the primary nesting season (April 15 to July 1). Maintain mowing heights above eight inches and mow no more often than once annually.

Other maintenance practices such as use of herbicides to control undesirable vegetation shall be planned to meet wildlife objectives. Any use of fertilizers, pesticides, and other chemicals shall not compromise the intended purpose of the practice.

Depending on site conditions and the size of the wildlife watering facility, routine maintenance to remove leaves and trash limbs may be necessary.