

Contour Buffer Strips

Virginia Conservation Practice Job Sheet

332



Definition

Narrow strips of permanent, herbaceous cover established around the hill slope, and alternated down the slope with wider cropped strips that are farmed on the contour.

Criteria

Strip Arrangement

At least one buffer strip shall be established across the slope and alternated with wider crop strips farmed on the contour.

Buffer Strip Vegetation:

Buffer strips shall be established to permanent vegetation consisting of grasses, legumes or grass-legume mixtures. Once established, buffer strips shall have at least 95% cover during periods of highest erosion risk in crop strips.

Buffer Strip Width:

The width of buffer strips shall be at least 15 feet for grass strips and at least 30 feet when legumes make more than 50% of the stand.

Crop Strip Width:

The maximum width of cropped strips will not exceed limits based on slope length and steepness (see Standard for details).

The width of the cropped strip shall be selected

to accommodate a multiple of the width of the farming equipment to be used in the system.

Minimum Row Grade:

Crop rows must have sufficient slope to ensure runoff water does not pond and cause unacceptable crop damage.

Maximum Row Grade:

Field slope length and steepness ("LS") values shall be determined for each area to be treated and shall then be used as the basis for determining maximum design row grades.

At least 75% of cropped area to be contoured shall have rows with a maximum design grade of either (a) 2% or (b) ½ of the field slope steepness, whichever is less.

The remaining 25% or less of cropped area to be contoured shall have rows with a maximum design grade of either (a) 3% or (b) ½ of the field slope steepness, whichever is less.

The maximum allowable design row grade is only permitted within 150 feet of a stable outlet.

System Layout

When the row grade of any crop strip reaches the maximum allowable design grade, a buffer strip will be established and grade corrected for the layout of the next crop strip.

Row Markers

Permanent vegetated buffer strips shall serve as permanent contour or row markers.

Stable Outlets

All concentrated runoff from furrows in contouring systems shall flow to properly-designed stable outlets.

NOTE: This summary does not address all requirements and considerations in the VA Contour Buffer Strips Standard (VA-332). Consult the Standard for further details.

General Information

Client: _____ County: _____
 Field Office: _____ Contract #: _____
 Farm #: _____ Tract #: _____
 Field # and acreage: _____

Client’s Purpose(s) (check all that apply)

- Reduce sheet & rill erosion.
- Reduce transport of sediment, other solids and the contaminants attached to them.
Note: This purpose triggers additional requirements to include in Specifications below – consult Standard.

Practice Specifications

Follow all specifications and recommendations below for practice installation & implementation.

Fields to be Contoured – List & Description

Identify fields or conservation management units (CMUs) to be contoured. Provide LS values and design row grades for each.

Field or CMU ID or description	Field slope LS values		Planned row grades	
	Slope length (ft.)	Slope steepness (%)	Minimum row grade (%)	Maximum row grade (%)

Detailed Map or Sketch – See Attached

Standard requires a map or sketch showing the following minimum elements: (a) Location & width of buffer strips & other permanent row markers; (b) Location & type of stable outlets; (c) Locations with 150 feet of stable outlets suitable for maximum row grades.

Buffer Strips & Permanent Row Markers – Establishment Plans / Designs

Include all specifications for establishment of buffer strips or other permanent row markers, such as strip width, type of vegetation, planting recommendations, etc. Refer to attachments as needed.

Stable Outlets – Establishment Plans / Designs

Include all specifications for establishment of grassed waterways, field borders, filter strips, terraces, or other stable outlets designed to handle concentrated flow from contour system furrows. Refer to attachments as needed.

Crop Management – Specifications & Recommendations

Specify crop rotation, residue levels, ridge heights, etc. necessary for contouring system to function as planned. Refer to attachments including Cropping System Description & Evaluation Spec Sheet as needed.

Additional Specifications & Recommendations

Include additional requirements or recommendations for successful design, installation, and implementation, including complementary practices. Refer to attachments as needed.

Operation & Maintenance (O&M)

Carry out all of the following actions to ensure that the planned contouring system functions as intended after initial installation & implementation.

Minimum O&M Requirements

1. Conduct all tillage, planting, and other field operations parallel to established row markers in order to maintain planned row grades.
2. Retain and maintain original width and alignment of buffer strips and all row markers in accordance with the original system design and layout.
3. Maintain vigorous stand of vegetation on buffer strips. Use mowing heights and management appropriate to species selected. Control weeds, soil test, and lime/fertilize as needed.
4. Inspect established buffer strips periodically for damage caused by erosion, drought, livestock, herbicides, etc. Promptly correct any problems identified.
5. Inspect the system periodically for sediment accumulation above or just below upslope edge of buffer strips. Spread sediment evenly upslope in crop strips or relocate/renovate buffer strips as needed.
6. Continuously monitor the contoured crop strips for row breakovers and/or excessive scouring along row furrows. Take steps to correct any problems detected as soon as possible.
7. Maintain diversions or terraces installed in conjunction with a contour farming system in accordance with their respective original design, layout, and construction.
8. Periodically inspect and maintain grassed waterways, field borders, filter strips, turn strips, or other measures used to receive and convey runoff and/or used to facilitate equipment operation.
9. Carry out crop management recommendations on crop strips necessary for successful performance of the contouring system. This includes implementing planned rotations and ridge heights.

Additional O&M Recommendations

Provide any additional practical guidance for actions to ensure the long-term effectiveness of practice.

Planner Certification

The contour buffer strip practice planned in this job sheet fulfills minimum requirements of Virginia NRCS Conservation Practice Standard 332.

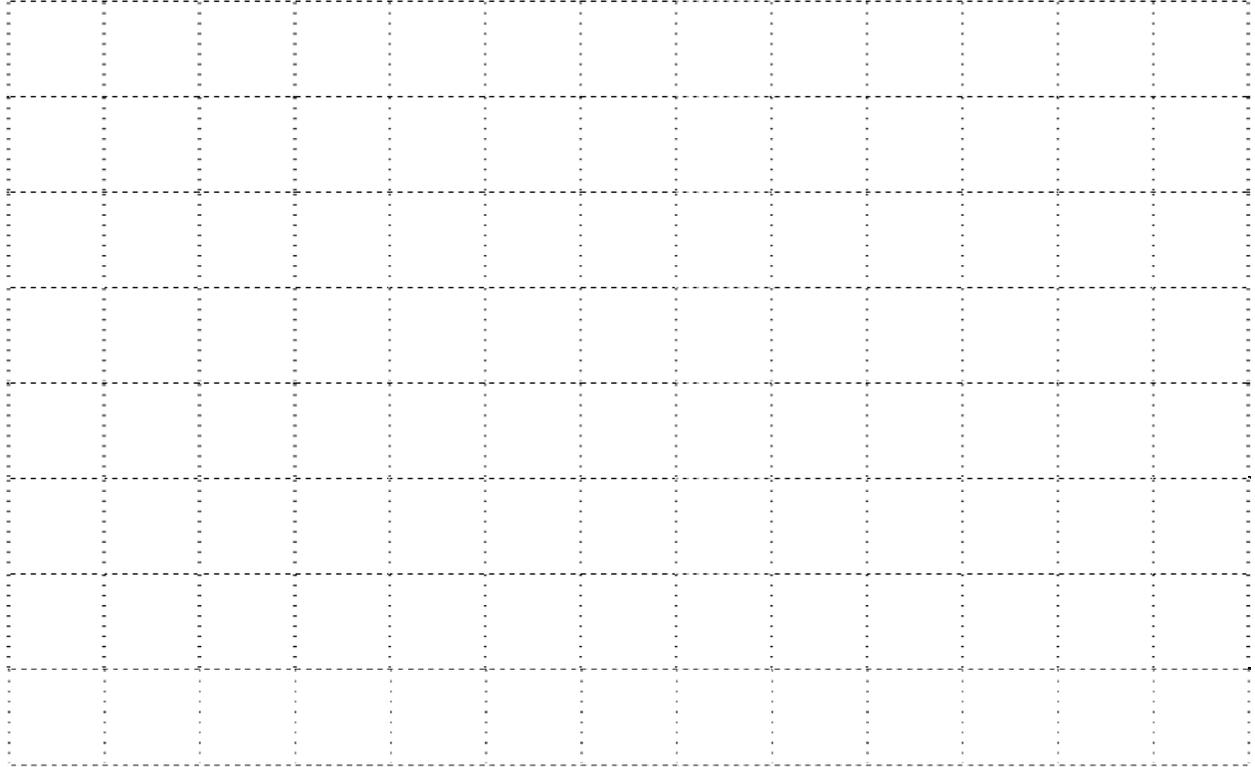
Signature_____
Title_____
Date**Certification of Practice Completion**

The contour buffer strip practice planned in this job sheet has been completed and maintained according to NRCS specifications (indicate in Specifications any changes to planned activities and acreage).

Signature_____
Title_____
Date

If needed, an aerial view or a side view of the practice can be shown below. Other relevant information, complementary practices and measures, and additional specifications may be included.

Scale 1"= _____ ft. (NA indicates sketch not to scale: grid size=1/2" by 1/2")



Additional Specifications and Notes:

A large empty rectangular box for providing additional specifications and notes.

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