City of Lufkin
TCSS Manual

EROSION CONTROL STANDARDS

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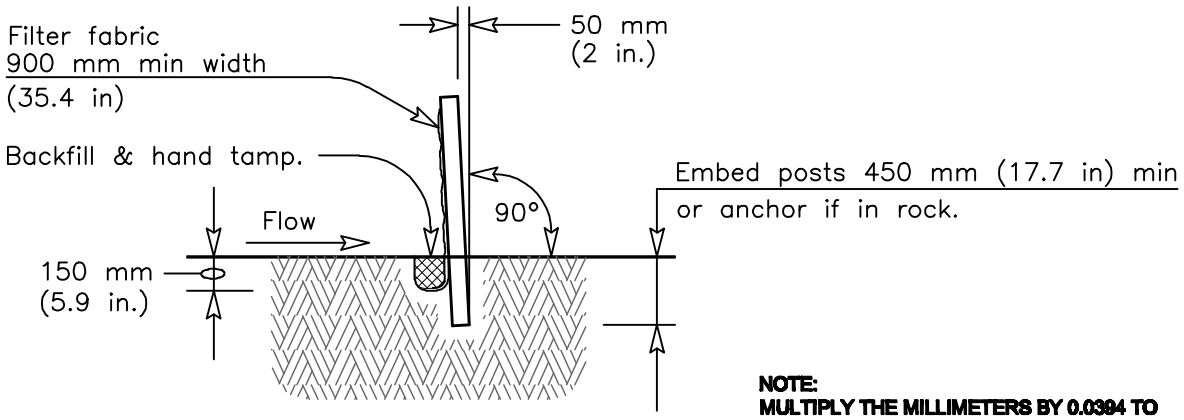

NOTE:
MULTIPLY THE MILLIMETERS BY 0.0394 TO CONVERT TO INCHES. (OR 1 IN = 25.4 MM)

SECTION A–A

SEDIMENT CONTROL FENCE USAGE GUIDELINES

A sediment control fence may be constructed near the downstream perimeter of a disturbed area along a contour to intercept sediment from overland runoff. A 2 year storm frequency may be used to calculate the flow rate to be filtered.

Sediment control fence should be sized to filter a max. flow through rate of 0.07 $\frac{m^3/sec}{m^2}$. Sediment control fence is not recommended to control erosion from a drainage area larger than .8 ha.

GENERAL NOTES

1. The guidelines shown hereon are suggestions only and may be modified by the Engineer.

01-SEDCONT.Dwg

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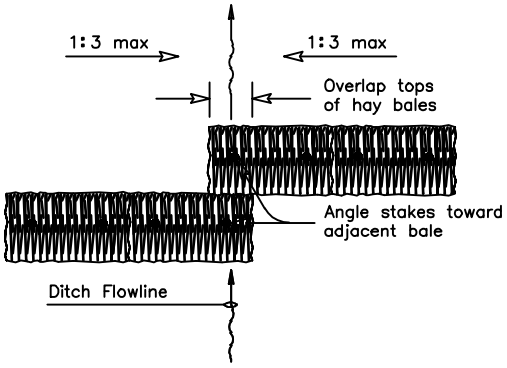
EROSION CONTROL STANDARDS

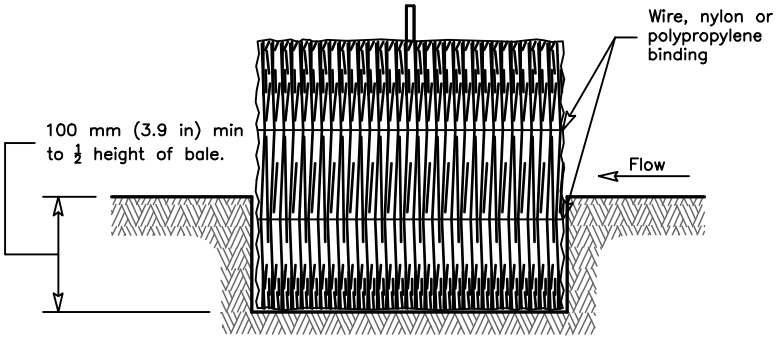
SEDIMENT CONTROL SILT FENCE DETAIL

01

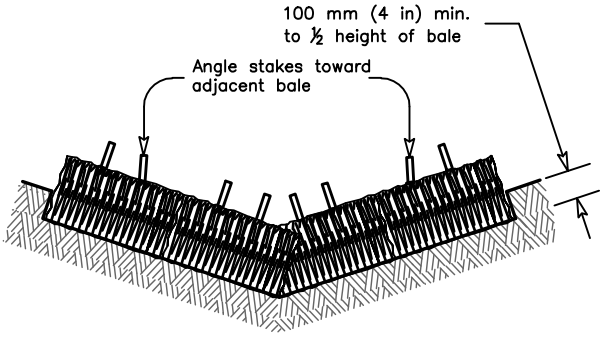
10-29-03



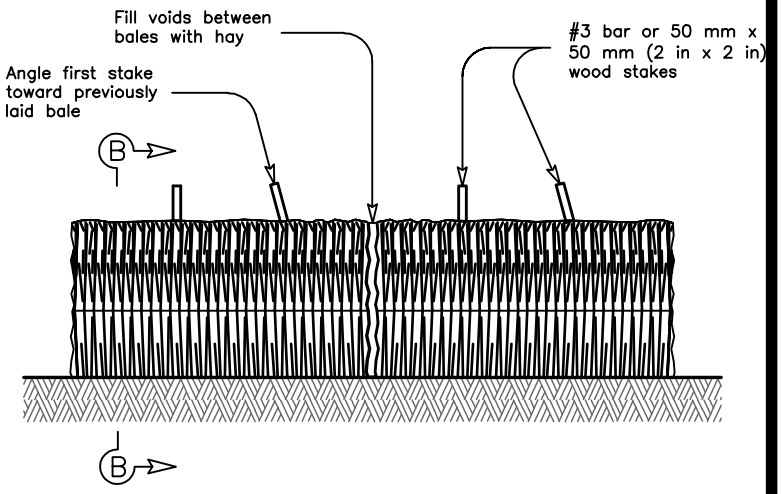
PLAN VIEW



SECTION B–B



PROFILE VIEW



BALED HAY FOR EROSION CONTROL

BALED HAY USAGE GUIDELINES

A Baled Hay installation may be constructed near the downstream perimeter of a disturbed area along a contour to intercept sediment from overland runoff. A two year storm frequency may be used to calculate the flow rate to be filtered. The installation should be sized to filter a maximum flow thru rate of 0.004 $\frac{m^3/sec}{m^2}$ of cross sectional area. Baled hay may be used at the following locations:

1. Where the runoff approaching the baled hay flows over disturbed soil for less than 30 meters. If the slope of the disturbed soil exceeds 10%, the length of slope upstream the baled hay should be less than 15 meters.
2. Where the installation will be required for less than 3 months.
3. Where the contributing drainage area is less than .2 ha.

For Baled Hay installations in small ditches, the additional following considerations apply:

1. The ditch sideslopes should be graded as flat as possible to maximize the drainage flowrate thru the hay.
2. The ditch should be graded large enough to contain the overtopping drainage when sediment has filled to the top of the baled hay.

Bales should be replaced usually every 2 months or more often during wet weather when loss of structural integrity is accelerated.

GENERAL NOTES

1. Hay bales shall be a minimum of 750 mm (29.5 in) in length and weigh a minimum of 22.5 kilograms (49.6 lb).
2. Hay bales shall be bound by either wire or nylon or polypropylene string. The bales shall be composed entirely of vegetable matter.
3. Hay bales shall be embedded in the soil a minimum of 100 mm (4 in) and where possible one–half the height of the bale.
4. Hay bales shall be placed in a row with ends tightly abutting the adjacent bales. The bales shall be placed with bindings parallel to the ground.
5. Hay bales shall be securely anchored in place with #3 bar or 50 mm x 50 mm (2 in x 2 in) wood stakes, driven through the bales. The first stake shall be angled towards the previously laid bale to force the bales together.
6. The guidelines shown hereon are suggestions only and may be modified by the Engineer.

R = Radius
D = Diameter
All unit–less dimensions are millimeters

02-SEDCONT_HAT.Dwg

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EROSION CONTROL STANDARDS

SEDIMENT CONTROL BAILED HAY DETAIL

02

10-29-03

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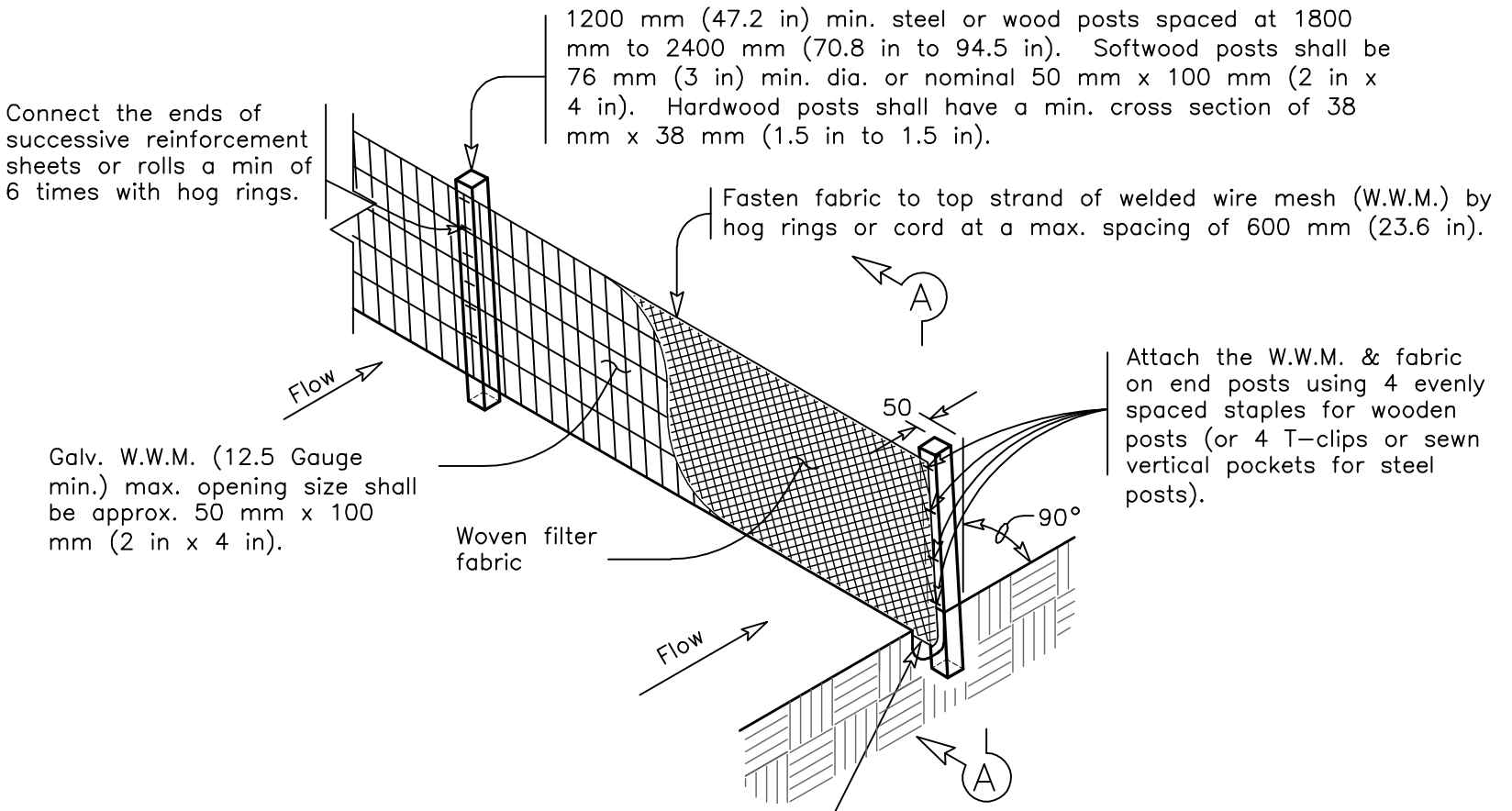
EROSION CONTROL STANDARDS

TEMPORARY SEDIMENT CONTROL FENCE

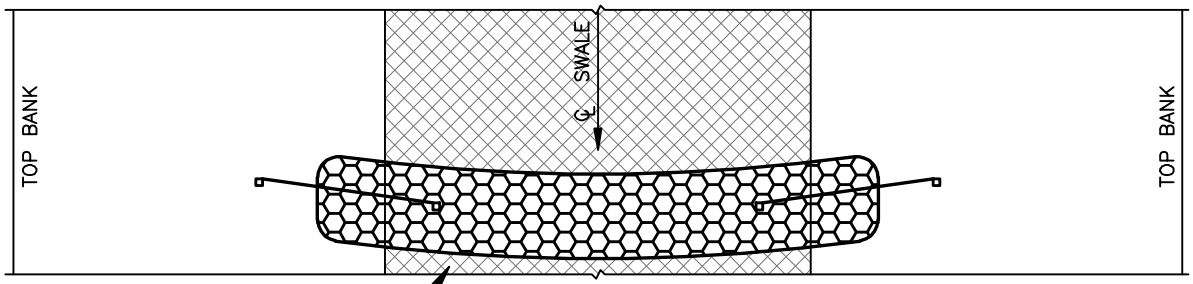
03

10-29-03

03-TEMP_SEDCONT.Dwg

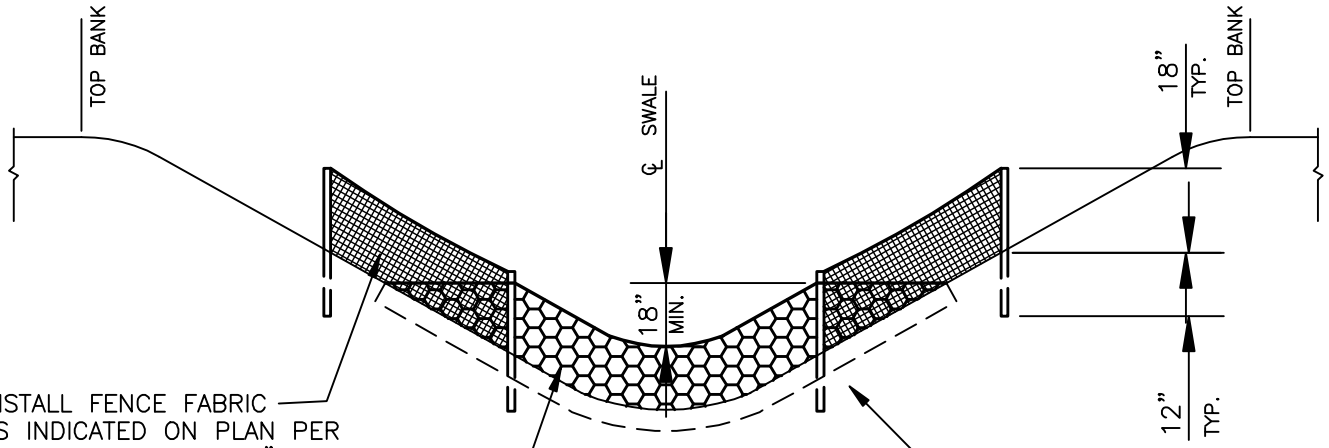


TEMPORARY SEDIMENT CONTROL FENCE



EROSION MAT PER AMERICAN EXCELSIOR CURLEX HIGH VEL, MIRAFI 1800 MIRAMAT OR APPROVED EQUAL.

PLAN

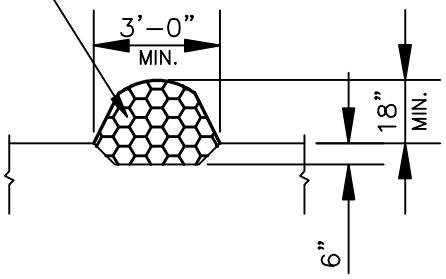


INSTALL FENCE FABRIC AS INDICATED ON PLAN PER AMERICAN EXCELSIOR "SILT STOP" SEDIMENT FENCE OR APPROVED EQUAL.

ELEVATION

1" X 2" STAKE (MIN.) @ 3' MAX. SPACING (TYP.).

4" TO 6" ROCK PLACED ACROSS CHANNEL (TYP.).



SECTION

04-RCKDAM.Dwg

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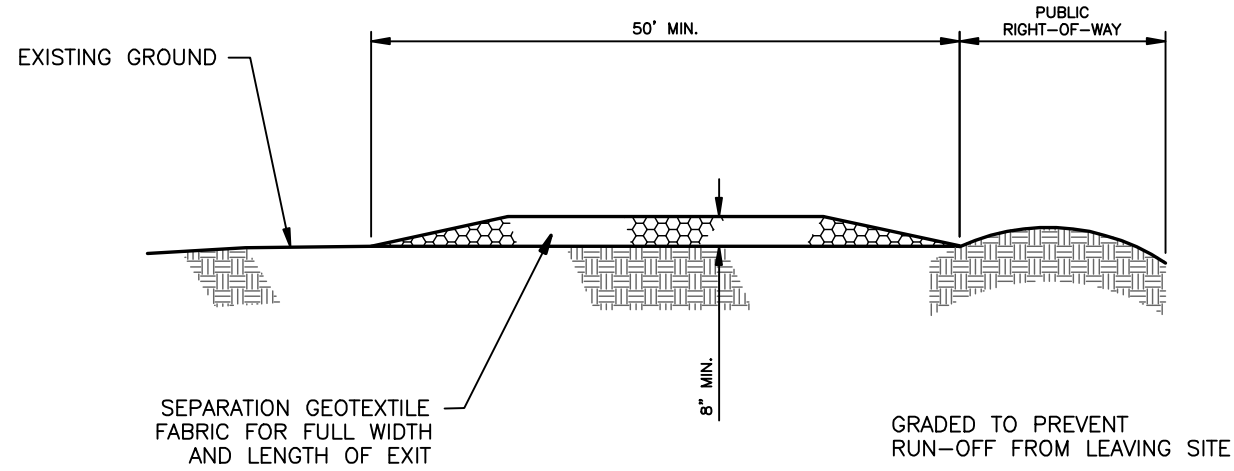
EROSION CONTROL STANDARDS

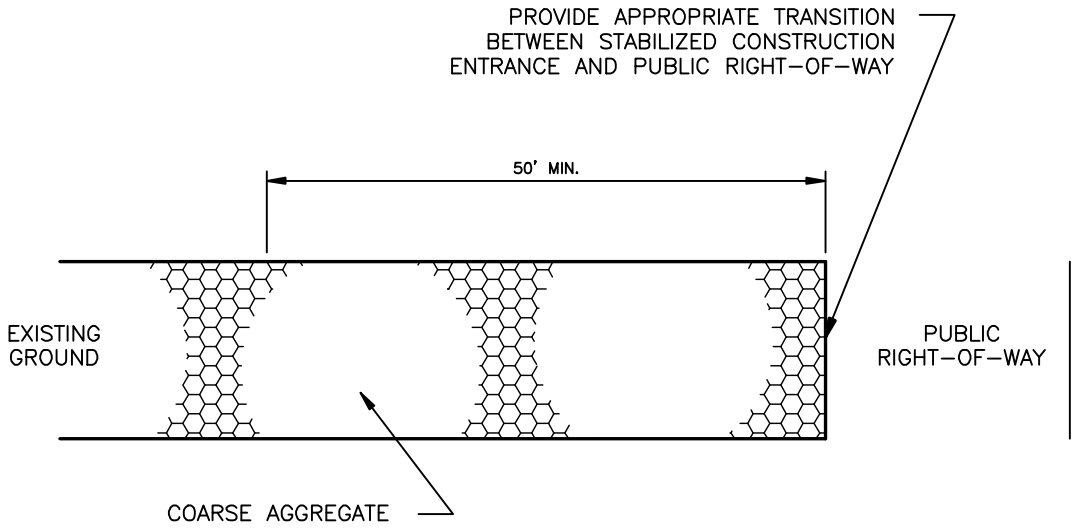
ROCK CHECK DAM

04

10-29-03



PROFILE



SC

SYMBOL

PLAN VIEW

GENERAL NOTES

1. LENGTH SHALL BE AS SHOWN ON THE CONSTRUCTION DRAWINGS, BUT NOT LESS THAN 50 FEET.
2. THICKNESS SHALL NOT BE LESS THAN 8 INCHES.
3. WIDTH SHALL NOT BE LESS THAN THE FULL WIDTH OF ALL POINTS OF INGRESS OR EGRESS.
4. STABILIZATION FOR OTHER AREAS SHALL HAVE THE SAME AGGREGATE THICKNESS AND WIDTH REQUIREMENTS AS THE STABILIZED CONSTRUCTION EXIT, UNLESS OTHERWISE SHOWN ON THE CONSTRUCTION DRAWINGS.
5. STABILIZED AREAS MAY NOT BE WIDENED OR LENGTHENED TO ACCOMMODATE A TRUCK WASHING AREA, WHEN SHOWN ON THE CONSTRUCTION DRAWING. AN OUTLET SEDIMENT TRAP MUST BE PROVIDED FOR THE TRUCK WASHING AREA.

05-CONST_EXIT.Dwg

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EROSION CONTROL STANDARDS

STABILIZED CONSTRUCTION EXIT

05

01-14-04