1.0 APPLICABILITY

Table 1 provides an overview of the various project types and required submittals for projects within the boundaries of the County of Humboldt's Municipal Separate Storm Sewer System (MS4) permit area and the cities of Arcata, Eureka, Fortuna, and Trinidad, which are subject to the MS4 General Permit. MS4 General Permit Boundary Maps are attached and can also be obtained from the County or City Department with project location jurisdiction. The requirements for stormwater management are determined by the type and scale of the project.

Table 1 - Applicable Post-Construction Standards Based on Project Type

Type of Project	**Required Submittals:**
Exempt Projects Exempt Projects include: • Projects that create or replace less than 2,500 square feet (SF) of impervious surface; • Interior remodels and routine maintenance or repair such as exterior wall surface replacement; • Reroofing of an existing building; • Asphalt or paving overlays and resurfacing of existing surfaces. "Replacement, Development, or Redevelopment" is defined as work that replaces existing surfaces down to subgrade and are not exempt; and • Linear Underground Projects (LUPs) unless the LUP has a discreet location that has greater than or equal to 5,000 SF of newly constructed impervious surface	• Stormwater Information Sheet
Small Projects Small Projects include: • Single-Family Homes, not part of a larger plan of development, that create or replace greater than or equal to 2,500 SF of impervious surface; and • Projects that create or replace greater than or equal to 2,500 SF and less than 5,000 SF of impervious surface	• Stormwater Information Sheet • Follow instructions in Part B of this manual. • Small Project Stormwater Control Plan (SCP)
Regulated Projects Regulated Projects include: • Projects other than Single-Family Homes that create or replace greater than or equal to 5,000 SF of impervious surface.	• Stormwater Information Sheet • Follow instructions in Part C of this manual. • Preliminary SCP (discretionary projects) • Final SCP (all regulated projects)
Regulated Redevelopment, Roads, and Linear Underground Projects Regulated Redevelopment, Roads, and Linear Underground Projects include: • See MS4 Permit, Section E.12.c for additional description and details of applicable Redevelopment, Road, and Linear Underground Project requirements.	• Requirements vary; contact County or City department with project jurisdiction.
Hydromodification Projects: Hydromodification projects are: • Specific Regulated Projects, projects that create and/or replace greater than or equal to 1 acre of impervious surface and create a net increase in impervious surface. • A project that does not increase impervious surface area over the pre-project condition is not a hydromodification management project (MS4 permit Sec. E.12.f). • Projects with greater than or equal to 1 acre of Land Surface Disturbance may be subject to the State Construction General Permit (CGP) Post-Construction Standards and shall comply with theHumboldt Low Impact Development (LID) Stormwater Manual, Regulated Project Post-Construction Standards in lieu of CGP Post-Construction Standards, if project location falls within the MS4 General Permit areas.	• Requirement is: post-project runoff shall not exceed estimated pre-project flow rate for the 2-year, 24-hour storm. • See Regulated Projects above • Follow instructions in Part C of this manual
Definition of Impervious Surface: A surface covering or pavement of a developed parcel of land that prevents the land's natural ability to absorb and infiltrate rainfall/stormwater. Impervious surfaces include, but are not limited to: roof tops, walkways, patios, driveways, parking lots, storage areas, impervious concrete and asphalt, and any other continuous watertight pavement or covering. Landscaped soil and pervious pavement, including pavers with pervious openings and seams, underlain with pervious soil or pervious storage material, such as a gravel layer sufficient to hold the specified volume of rainfall runoff, are not impervious surfaces. **Definition of Land Surface Disturbing Activities**: Any construction or demolition activity, including, but not limited to: clearing of vegetation, grading, grubbing, and disturbance to the ground such as stripping of top soils, soil compaction, excavation, and stockpiling or any other activity that results in a land disturbance that changes the physical condition of land forms, soils, vegetation, and hydrology.	

The following flow chart is designed to aid in determining your project type (Figure 1.).

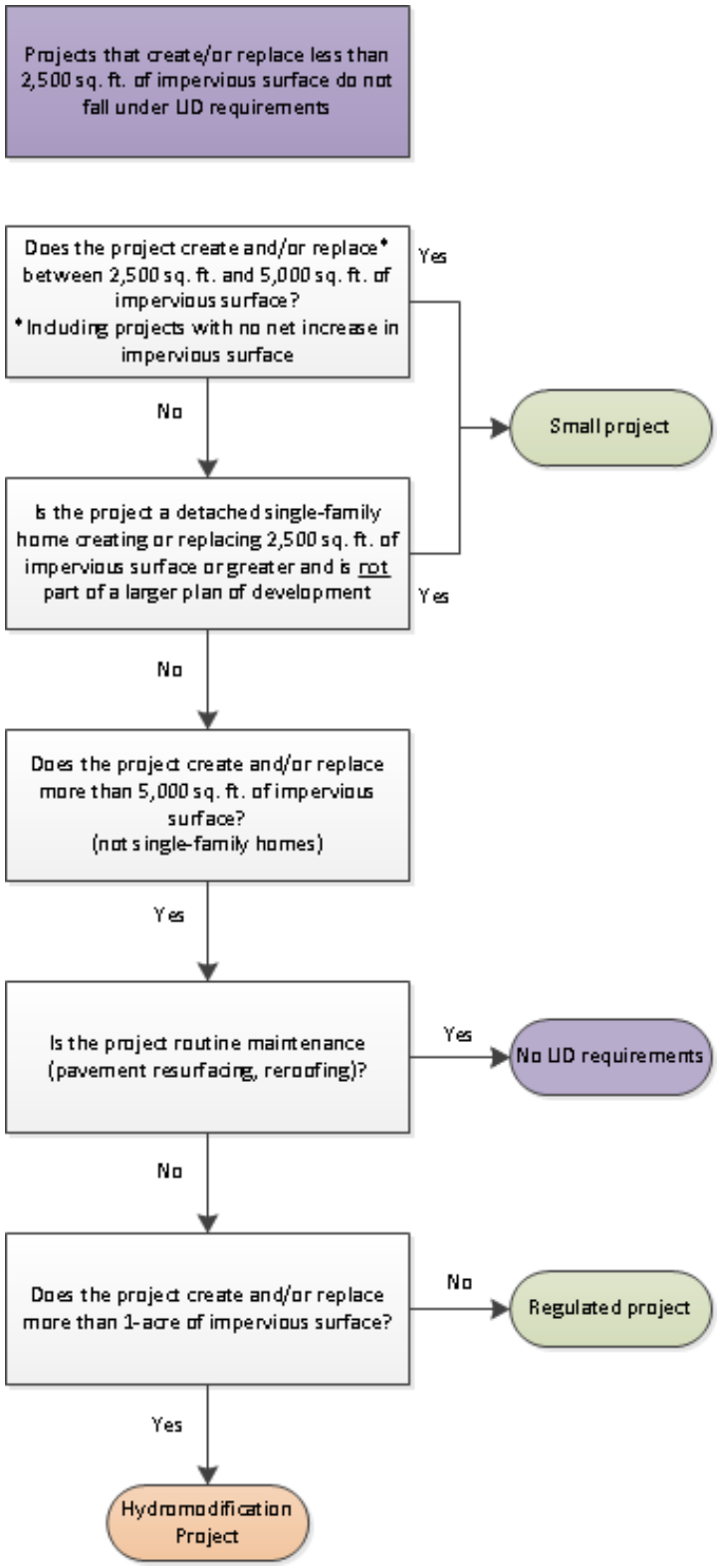


Figure 1. Project Type Identification

Small Projects Calculator
Humboldt Low Impact Development Stormwater Manual

Project Information						*Formulas/Notes*
DMA Name:						
Total Post-Project Impervious Surface Area (square feet)			A		square feet	
24 hour - 85th Percentile Design Storm			B	-	inch	**B** = Select Design Storm Value (0.65-inch Humboldt Bay Area, 1.3-inch Shelter Cove)
Impervious Surface Runoff Value (Potential Stormwater Runoff due to impervious surface area and design storm value)			C		Gallons per 24 hours	**C = A x B x 0.083 x 7.48**
Pervious Self-Retaining Area (SRA) Credit (if applicable, if none enter 0)						
Self-Retaining Area (square feet)		-	SRA Credit		square feet	**SRA Credit = Self-Retaining Area x Multiplier** Select **Multiplier** (3.5 Humboldt Bay Area, 1.3 Shelter Cove)
Site Design Measure Credits						
Tree Planting and Preservation						
New Trees		# of trees				
100 square feet per deciduous tree	D		E		square feet	**E = D x 100**
200 square feet per evergreen tree	F		G		square feet	**G = F x 200**
Existing Trees (Credit for 50% of existing canopy area)		Canopy diameter (feet)				
Tree #1	H_1		J_1		square feet	$J_1 = 3.14 \times (H_1/2)^2 \times 0.50$
Tree #2	H_2		J_2		square feet	$J_2 = 3.14 \times (H_2/2)^2 \times 0.50$
Tree #3	H_3		J_3		square feet	$J_3 = 3.14 \times (H_3/2)^2 \times 0.50$
Rain Barrel or Cisterns (55 gallon minimum)						
Square foot credit per gallon based on 24-hour, 85th Percentile Design Storm	K	-				**K** = Select square foot credit per gallon (2.48 Humboldt Bay Area, 1.24 Shelter Cove)
		Gallons				
Rain Barrels	L		M		square feet	**M = L x K**
Cisterns	N		O		square feet	**O = N x K**
~~**Infiltration Trench/Basin (55 gallon minimum = 21 ft^{3**})**~~		~~cubic feet~~				
~~volume(ft^3) = length x width x depth~~	~~P~~		~~Q~~		~~square feet~~	~~**Q = P x R x K x 7.48**~~
~~porosity (approximate %)~~	~~R~~	~~35%~~				
Impervious Area Disconnection Credit per square foot of impervious area feeding into pervious area			S		square feet	**S** = Enter square foot value
Soil Quality Improvement						
Credit per square foot of soil quality improvement			T		square feet	**T** = Enter square foot value
Green Roof						
Credit per square foot of green roof installation			U		square feet	**U** = Enter square foot value
PPPP (Porous Asphalt, Pervious Concrete, Permeable Pavers)						
Credit per square foot installed			V		square feet	**V** = Enter square foot value
Vegetated Swales						
Credit per square foot of vegetated swale			W		square feet	**W** = Enter square foot value
Stream Setbacks and Buffers						
Credit per square foot of stream setback and buffer#			X		square feet	**X** = Enter square foot value
Credits Total			Y		square feet	**Y = SRA Credit + E + G + J_1 + J_2 + J_3 + M + O + Q + S + T + U + V + W + X**
Post-Project Impervious Surface Area minus Site Design Measure Credits			Z		square feet	**Z = A - Y**
NEW Impervious Surface Runoff Value (Potential Stormwater Runoff due to impervious surface area and design storm after implementation of Site Design Measures)			AA		Gallons per 24 hours	**AA = Z x B x 0.083 x 7.48**
Percent reduction in Impervious Surface Runoff Value*			BB		%	**BB = ((C - AA) / C) x %100**

***The MS4 General Permit requires a calculation of the project runoff reduction resulting from the use of site design measures. However, there is no numeric standard or target for runoff reduction required for Small Projects.**

~~****Infiltration Trench/Basin calculations are based on porosity (35%). Increased trench dimensions (volume) are required to meet 55 gallon minimum capacity.**~~

Green — Fill In [Enter Value]	Conversions Used:
Red — Calculated Value	1 inch = 0.083 feet
Black — Fixed Value/Selectable Value	1 cubic foot = 7.48 gallons
Small Projects Calculator, Version 2.0 - June 29, 2016	# check with agency with project area jurisdiction for requirements

STORMWATER INFORMATION SHEET

Instructions

Construction and development projects within portions of unincorporated Humboldt County (McKinleyville, the greater Eureka area, and Shelter Cove) and the Cities of Eureka, Arcata, Fortuna, and Trinidad are subject to stormwater runoff and pollution control requirements of State Water Resources Control Board Water Quality Order No. 2013-0001-DWQ; NPDES General Permit No. CAS0000004 [Municipal Separate Storm Sewer (MS4) General Permit].
The following checklist is to be completed by you (the applicant) to determine which plans and specifications for stormwater runoff control are required as part of a Building or Development Permit application for projects located in areas subject to MS4 requirements.

I. Construction Project Information and Checklist (Completed by Applicant)

Site Location Address: | Assessor Parcel Number (APN):

Anticipated Construction Start Date: | Anticipated Construction Completion Date:

Total area of Land Surface Disturbance: square ft. or acres | If project disturbs ≥ 1 acre of land surface then provide the State Construction General Permit WDID No.:

Check and/or list all applicable permits directly associated with project construction or grading activity:
- ☐ State Construction General Permit (CGP)
- ☐ State 401 Water Quality Certification
- ☐ U.S. Army Corps 404 Permit
- ☐ CA Fish and Wildlife 1600
- ☐ Other (list): _____

Is the construction site part of larger common plan of development or sale (check as applicable)? ☐ YES ☐ NO ☐ Unknown

Name of larger common plan/project (if applicable):

Impervious Surface Area:

Pre-Project Impervious Surface:	New or Replaced Impervious Surface:	Total Post-Project Impervious Surface:
square ft.	square ft.	square ft.

Check Project Type as determined from LID Manual Part A, Table 1 - Applicable Post-Construction Standards Based on Project Type

Project Type:	Notes:
☐ Exempt	Sign and Certify this form.
☐ Small Project	Sign and Certify this form. Follow instructions in Part B of LID Manual.
☐ Regulated Project	Sign and Certify this form. Follow instructions in Part C of LID Manual
☐ Regulated Project with ≥ 1 acre of created or replaced impervious surface	Sign and Certify this form. Follow instructions in Part C of LID Manual.
☐ Regulated Redevelopment, Roads, or Linear Underground Project	Sign and Certify this form. Requirements vary; contact County or City Department with project jurisdiction.

Stormwater runoff from the project site discharges to (check as applicable):
- ☐ Storm Drain System (including road side ditches and other conveyances)
- ☐ Directly to waters of the State or U.S. (e.g. river, lake, stream, ocean, wetland) Name of Waterbody:

Name of nearest waterbody receiving runoff from site:

Indicate distance from project site to nearest watercourse: ft.

If your project is covered under the State Water Resources Control Board Construction General Permit (CGP), attach a copy of the submitted Stormwater Pollution Prevention Plan (SWPPP) including the Notice of Intent and WDID Number.

If a CGP is not required for your project, submit appropriate construction site BMP plans as required by County or City Department with project jurisdiction.

II. Certification (Completed by Owner or Authorized Applicant/Agent)

I, the below signed, confirm that I have accurately described my project to the best of my ability, and that I have not purposely omitted any detail affecting my project's classification for stormwater regulation

Printed Name:

Signature: | Date:

III. For Official Use Only

Permit No.: | Submittal Date: | Received By:

Small Construction Site Stormwater Erosion and Sediment Control Plan

Projects less than (<) 1.0 Acre within County of Humboldt MS4 Areas

Construction Site Project Name:	
Site Address:	
APN:	**Permit Application Number:**

Instructions:
To help you develop your construction project Erosion and Sediment Control Plan (ESCP), the County of Humboldt has created this ESCP Template. The template is designed to help you develop an ESCP for a construction or grading project that will have less than one-acre of disturbed soil and is not be subject to the State Water Resources Control Board Construction General Permit.

Applicant - Complete the following sections (below):

A. Signature and Certification
B. Nature of Construction Activity
C. Construction Site Best Management Practices

Shaded areas to be completed by County Staff

A. Signature and Certification:

I, the below signed, confirm that I have accurately selected BMPs for my project and that I have not purposely omitted any detail affecting my project. I hereby certify that BMPs selected to control stormwater pollution from project activities will be designed in accordance with the approved BMP Fact Sheet or equivalent, which are attached to this plan.

Signature:_____ Date:_____

Print Name:_____

I am the : ☐ Owner ☐ Authorized Representative

☐ Yes
☐ No

Notes

B. Nature of Construction Activity

Provide a general description of the nature of the construction activities at your project (Example: Construction of 10 x 30 deck; 120 square foot addition to an existing home; new16 x 24 garage and driveway).

1. General Description of Project:

_____

_____

_____

_____

_____

_____

_____

_____

☐ Yes ☐ No Notes	2. Attach a site plan depicting site specific BMP locations or include reference to construction plans showing site specific BMP locations. Show site slopes, storm drains, and waterways. Also attach proposed BMP sheets: ☐ BMP Site Plan(s) are attached. or ☐ BMP Site Plan(s) are included with the submitted construction plans. List Figure/Plan Numbers_____
	C. Construction Site Best Management Practices **Select an effective combination of Best Management Practices (BMPs) from each category**: (I) Scheduling and Preservation (II) Erosion Control (III) Sediment Control (IV) Non-Stormwater and Material Management BMPs Select a minimum of one control measure from each category. However, install all BMPs as necessary based on project specific activities to prevent and control construction related pollutants. Check the box next to the selected BMPs that will be implemented for your project. Check or provide the rational for the selected BMPs. Check the box and provide a reason for BMPs selected as Not Applicable. BMPs shall be continually implemented and maintained throughout the project until activities are complete, and disturbed areas are stabilized with permanent erosion controls. Inspect and maintain BMPs before and after rain events, and as required to control pollutant sources and protect water quality.
	Category I – Scheduling and Preservation
☐ Yes ☐ No ☐ Not Applicable	**1. Scheduling** (Schedule and plan construction activities to minimize exposed soil and avoid rainy weather) For more information see the following BMP factsheets: CASQA EC-1 or CALTRANS SS-1
Notes:	☐ Yes Rationale: ☐ Scheduling and sequencing of construction activities is planned to reduce the amount and duration of soil exposed to erosion by wind, rain, runoff, and vehicle tracking. ☐ Other:
	☐ Not Applicable (provide explanation)

☐ Yes ☐ No ☐ Not Applicable	**2. Preservation of natural features, vegetation, and soil** For more information see the following BMP factsheets: CASQA EC-2 or CALTRANS SS-2
Notes:	☐ Yes Rationale: ☐ Preservation of existing vegetation is planned to minimize removing or disturbing existing trees, shrubs, and grasses that will be used to protect the soil from erosion. ☐ Other:
	☐ Not Applicable (provide explanation)
	Category II - Erosion Control BMPs
☐ Yes ☐ No ☐ Not Applicable	**3. Drainage swales or lined ditches to control stormwater flow** For more information see the following BMP factsheets: CASQA EC-9 or CALTRANS SS-9
Notes:	☐ Yes Rationale: ☐ Drainage swales or lined ditches are planned to convey runoff to a desired location and may be used to divert site runoff around the construction site, divert runoff from stabilized areas and disturbed areas, and direct runoff into sediment basins or traps. ☐ Other:
	☐ Not Applicable (provide explanation)
☐ Yes ☐ No ☐ Not Applicable	**4. Mulching or hydroseeding to stabilize disturbed soils.** For more information see the following BMP factsheets: CASQA EC-4, EC-6, EC-8 or CALTRANS SS-4,SS-6, SS-8
Notes:	☐ Yes Rationale: ☐ Mulching is planned to reduce erosion by protecting bare soil from rainfall impact, increasing infiltration, and reducing runoff. ☐ Hydroseeding is planned, in combination with mulch or other cover, to revegetate disturbed areas. ☐ Other:
	☐ Not Applicable (provide explanation)

☐ Yes ☐ No ☐ Not Applicable	**5. Erosion control to protect slopes** For more information see the following BMP factsheets: CASQA EC-7 or CALTRANS SS-7
Notes:	☐ Yes Rationale: ☐ Erosion control blankets (or equivalent) are planned on project area slopes for covering disturbed soil surfaces to reduce erosion from rainfall impact, hold soil in place, and absorb and hold moisture near the surface. ☐ Other: ☐ Not Applicable (provide explanation)
☐ Yes ☐ No ☐ Not Applicable	**6. Other Proposed Erosion Control BMPs** As necessary based on site specific conditions.
Notes:	☐ BMP : _____ ☐ Rationale: _____ ☐ BMP : _____ ☐ Rationale: _____ ☐ BMP : _____ ☐ Rationale: _____
	Category III - Sediment Control BMPs
☐ Yes ☐ No ☐ Not Applicable	**7. Protection of storm drain inlets** For more information see the following BMP factsheets: CASQA SE-10 or CALTRANS SC-10
Notes:	☐ Yes Rationale: ☐ Storm drain inlet protection is planned to temporarily pond runoff before it enters the storm drain, allowing sediment to settle. ☐ Storm drain inlet protection is planned using a geotextile fabric (or equivalent) to filter stormwater and remove sediment. ☐ Other: ☐ Not Applicable (provide explanation)

☐ Yes ☐ No ☐ Not Applicable	**8. Perimeter Sediment Control** For more information see the following BMP factsheets: CASQA SE-1, SE-5, SE-8, SE-9, SE-12, SE-13 or CALTRANS SC-1, SC-5, SC-8, SC-9 [note: fiber rolls (CASQA SE-5 and CALTRANS SC-5) must be made of wild-life friendly biodegradable and natural materials)
Notes:	☐ Yes Rationale: ☐ Perimeter sediment control consisting of silt fence, fiber rolls, sandbag barrier, straw bale barrier, compost socks, or equivalent are planned to intercept stormwater runoff and detain and filter sediment-laden water. ☐ Other:
	☐ Not Applicable (provide explanation)
☐ Yes ☐ No ☐ Not Applicable	**9. Sediment trap or sediment basin** For more information see the following BMP factsheets: CASQA SE-2 or CALTRANS SC-2
Notes:	☐ Yes Rationale: ☐ A sediment basin or trap is planned to temporarily detain sediment-laden water allowing sediment to settle out before the runoff is discharged. ☐ Other:
	☐ Not Applicable (provide explanation)
☐ Yes ☐ No ☐ Not Applicable	**10. Stabilized Construction Entrance/Exits** For more information see the following BMP factsheets: CASQA TC-1 or CALTRANS TC-1
Notes:	☐ Yes Rationale: ☐ Construction entrances and exits stabilization is planned to reduce the tracking of sediment and debris from the project site to roadways. ☐ Other:
	☐ Not Applicable (provide explanation)

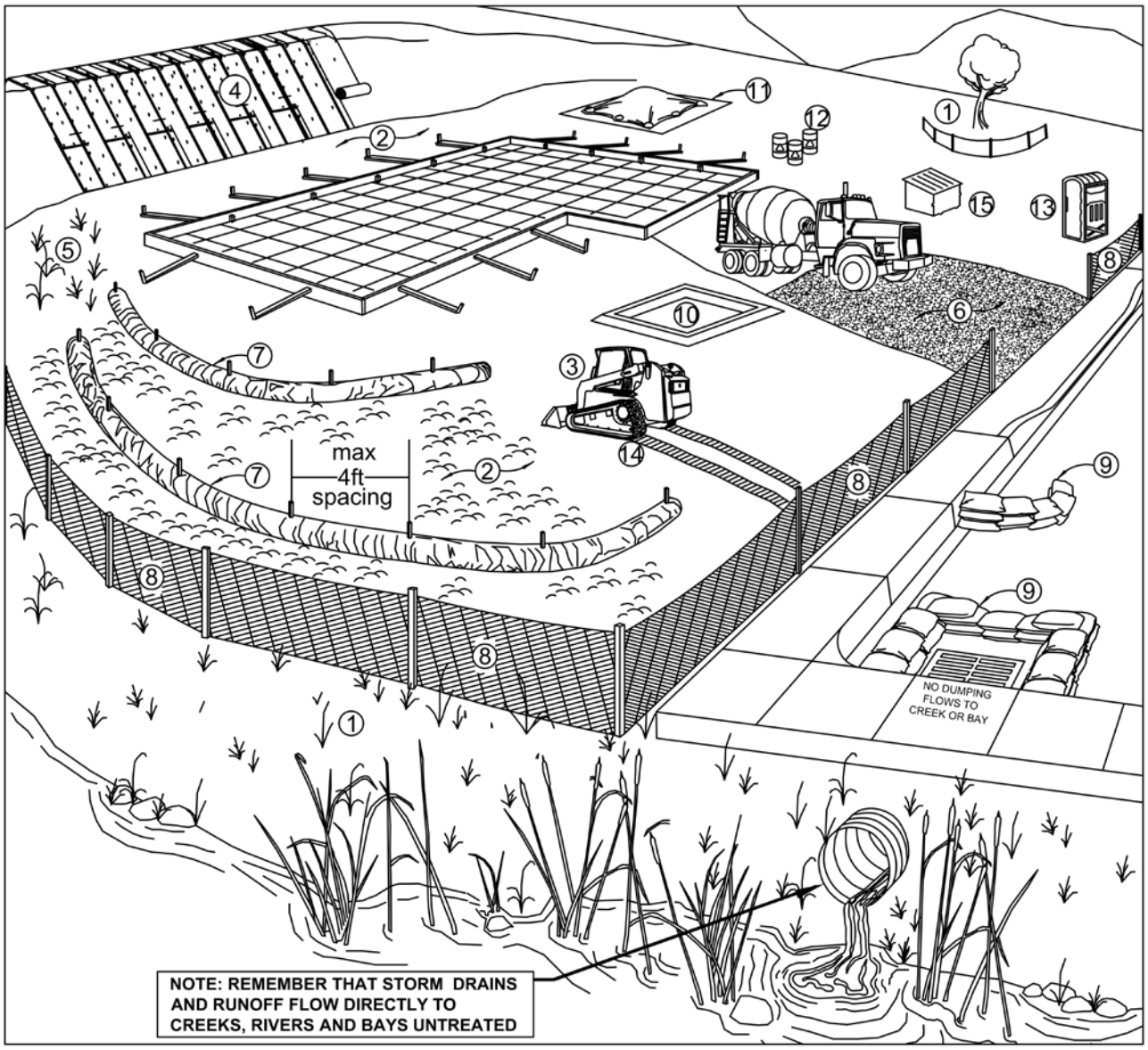
☐ Yes ☐ No ☐ Not Applicable	**11. Wind Erosion Control** For more information see the following BMP factsheets: CASQA WE-1 or CALTRANS WE-
Notes:	☐ Yes Rationale: ☐ Wind erosion or dust control measures are planned to prevent or alleviate dust generated by construction activities. ☐ Other:
	☐ Not Applicable (provide explanation)
Notes:	**12. Other Proposed Sediment Control BMPs** As necessary based on site specific conditions. ☐ BMP : _____ ☐ Rationale: _____ ☐ BMP : _____ ☐ Rationale: _____
	Category IV – Non-Stormwater and Material Management BMPs
☐ Yes ☐ No ☐ Not Applicable	**13. Material handling and waste management** For more information see the following BMP factsheets: CASQA WM-1,WM-2, WM-5, WM-6, WM-7 WM-9, WM-10 or CALTRANS WM-1, WM-2, WM-5, WM-6, WM-7 WM-9, WM-10
Notes:	☐ Yes Rationale: ☐ Minimizing the storage of hazardous materials onsite, storing materials in watertight containers and/or completely enclosed facilities, installing secondary containment, conducting regular inspections, and training employees and subcontractors are planned to prevent, reduce, or eliminate the discharge of pollutants from material delivery and storage to the stormwater system or waterways. ☐ Other:
	☐ Not Applicable (provide explanation)

☐ Yes ☐ No ☐ Not Applicable	**14. Stockpile Management** For more information see the following BMP factsheets: CASQA WM-3 or CALTRANS WM-3
Notes:	☐ Yes Rationale: ☐ Stockpile management and storage procedures and practices, such as suitable cover and perimeter control, are planned to reduce or eliminate air and stormwater pollution from material stockpiles. ☐ Other: ☐ Not Applicable (provide explanation)
☐ Yes ☐ No ☐ Not Applicable	**15. Management of washout areas (concrete, paints, stucco, etc.)** For more information see the following BMP factsheets: CASQA WM-8 or CALTRANS WM-8
Notes:	☐ Yes Rationale: ☐ Concrete or other material washout activities are planned for onsite areas within appropriate containment facilities to prevent the discharge of concrete or other material discharge to the stormwater system or waterways. ☐ Other: ☐ Not Applicable (provide explanation)
☐ Yes ☐ No ☐ Not Applicable	**16. Vehicle and Equipment Cleaning, Fueling, and Maintenance** For more information see the following BMP factsheets: CASQA NS-8, NS-9, NS-10 or CALTRANS NS-8, NS-9, NS-10
Notes:	☐ Yes Rationale: ☐ Vehicle and equipment cleaning activities are planned for offsite designated facilities to prevent the discharge of pollutants to stormwater system or waterways. ☐ Vehicle and equipment fueling is planned for offsite facilities or in designated areas with proper spill controls to prevent the discharge of pollutants to stormwater system or waterways. ☐ Vehicle and equipment maintenance activities are planned for offsite facilities or in designated areas with proper spill controls to prevent the discharge of pollutants to stormwater system or waterways. ☐ Other: ☐ Not Applicable (provide explanation)

☐ Yes ☐ No ☐ Not Applicable	**17. Spill prevention and control** For more information see the following BMP factsheets: CASQA WM-4 or CALTRANS WM-4
Notes:	☐ Yes Rationale: ☐ Maintaining spill cleanup materials, stopping the source of spills, containing and cleaning up spills, properly disposing of spilled materials, and training employees are planned to prevent or reduce the discharge of pollutants to stormwater system or waterways. ☐ Other
	☐ Not Applicable (provide explanation)
Notes:	**18. Other Non-Stormwater and Material Management BMPs** As necessary based on site specific conditions. ☐ BMP : _____ ☐ Rationale: _____ ☐ BMP : _____ ☐ Rationale: _____ ☐ BMP : _____ ☐ Rationale: _____

Humboldt County Stormwater Pollution Prevention Program

Example Construction Site Best Management Practices (BMPs)



Erosion Controls	Sediment Controls	Good Housekeeping
Scheduling (not shown on graphic)	6. Tracking Controls	10. Concrete Washout
1. Preserve Vegetation & Creek Set Backs	7. Fiber Rolls	11. Stockpile Management
2. Soil Cover	8. Silt Fence	12. Hazardous Material Management
3. Soil Preparation/ Roughening	9. Drain Inlet Protection	13. Sanitary Waste Management
4. Erosion Control Blankets	NS Trench Dewatering	14. Equipment and Vehicle Maintenance
5. Revegetation		15. Litter and Waste Management

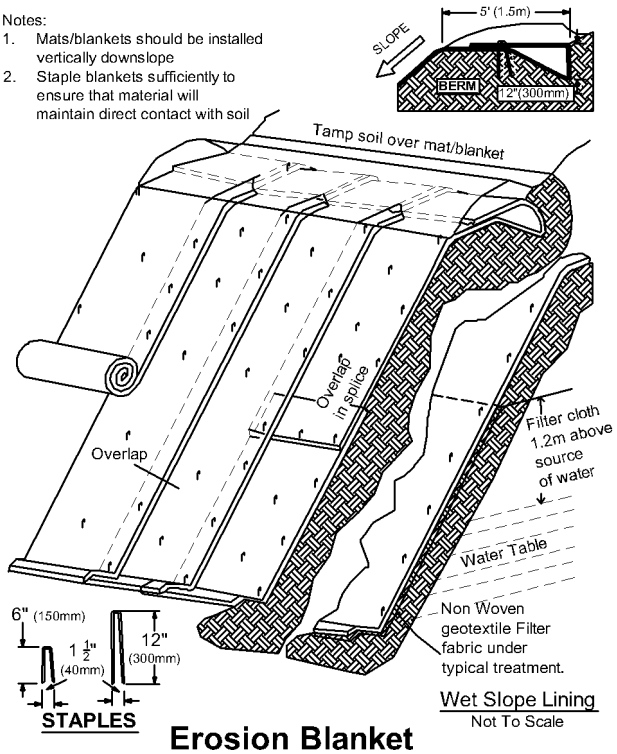
Note: Select an **effective combination of control measures from each category**, Erosion Control, Sediment Control, and Good Housekeeping. Control measures shall be **continually implemented and maintained throughout the project** until activities are complete, disturbed areas are stabilized with permanent erosion controls, and the local agency has signed off on permits that may have been required for the project. **Inspect and maintain the control measures** before and after rain events, and as required by the local agency or state permit.

More detailed information on the BMPs can be found in the related California Stormwater Quality Association (CASQA) and California Department of Transportation (Caltrans) BMP Factsheets. CASQA factsheets are available by subscription in the *California Best Management Practices Handbook Portal: Construction* at http://www.casqa.org. Caltrans factsheets are available in the *Construction Site BMP Manual March 2003* at http://www.dot.ca.gov/hq/construc/stormwater/manuals.htm.

Modifiefed with permission from the Marin County Stormwater Pollution Prevention Program (MCSTOPPP)

Control Measure		General Description
Erosion Control Best Management Practices		
N/A	Scheduling	Plan the project and develop a schedule showing each phase of construction. Schedule construction activities to reduce erosion potential, such as scheduling ground disturbing activities during the summer and phasing projects to minimize the amount of area disturbed. *For more info see the following factsheets: CASQA: EC-1; or Caltrans: SS-1*.
1	Preserve Existing Vegetation and Creek Setbacks	Preserve existing vegetation to the extent possible, especially along creek buffers. Show creek buffers on maps and identify areas to be preserved in the field with temporary fencing. Check with the local Planning and Public Works Departments for specific creek set back requirements. *For more info see the following factsheets: CASQA: EC-2; or Caltrans: SS-2.*
2	Soil Cover	Cover exposed soil with straw mulch and tackifier (or equivalent). *For more info see the following factsheets: CASQA: EC-3, EC-5, EC-6, EC-7, EC-8, EC-14, EC-16; or Caltrans: SS-2, SS-4, SS-5, SS-6, SS-7, SS-8.*
3	Soil Preparation/ Roughening	Soil preparation is essential to vegetation establishment and BMP installation. It includes soil testing and amendments to promote vegetation growth as well as roughening surface soils by mechanical methods (decompacting, scarifying, stair stepping, etc.). *For more info see the following factsheets: CASQA: EC-15.*
4	Erosion Control Blankets	Install erosion control blankets (or equivalent) on disturbed sites with 3:1 slopes or steeper. Use wildlife-friendly blankets made of biodegradable natural materials. Avoid using blankets made with plastic netting or fixed aperture netting. See: http://www.coastal.ca.gov/nps/Wildlife-Friendly_Products.pdf. *For more info see the following factsheets: CASQA: EC-7; or Caltrans: SS-7.*
5	Revegetation	Re-vegetate areas of disturbed soil or vegetation as soon as practical. *For more info see the following factsheets: CASQA: EC-4; or Caltrans: SS-4.*
Sediment Control Best Management Practices		
6	Tracking Controls	Stabilize site entrance to prevent tracking soil offsite. Inspect streets daily and sweep street as needed. Require vehicles and workers to use stabilized entrance. Place crushed rock 12-inches deep over a geotextile, using angular rock between 4 and 6-in. Make the entrance as long as can be accommodated on the site, ideally long enough for 2 revolutions of the maximum tire size (16-20 feet long for most light trucks). Make the entrance wide enough to accommodate the largest vehicle that will access the site, ideally 10 feet wide with sufficient radii for turning in and out of the site. Rumble pads or rumble racks can be used in lieu of or in conjunction with rock entrances. Wheel washes may be needed where space is limited or where the site entrance and sweeping is not effective. *For more info see the following factsheets: CASQA: TC-1; TC-3; or Caltrans: TC-1; TC-3.*
7	Fiber Rolls	Use fiber rolls as a perimeter control measure, along contours of slopes, and around soil stockpiles. On slopes space rolls 10 to 20 feet apart (using closer spacing on steeper slopes). Install parallel to contour. If more than one roll is used in a row overlap roll do not abut. J-hook end of roll upslope. Install rolls per either Type 1 (stake rolls into shallow trenches) or Type 2 (stake in front and behind roll and lash with rope). Use wildlife-friendly fiber rolls made of biodegradable natural materials. Avoid using fiber rolls made with plastic netting or fixed aperture netting. See: http://www.coastal.ca.gov/nps/Wildlife-Friendly_Products.pdf. Manufactured linear sediment control or compost socks can be used in lieu of fiber rolls. *For more info see the following factsheets: CASQA: SE-5 (Type 1); SE-12, SE-13; or Caltrans: SC-5 (Type 1 and Type 2).*
8	Silt Fence	Use silt fence as a perimeter control measure, and around soil stockpiles. Install silt fence along contours. Key silt fence into the soil and stake. Do not use silt fence for concentrated water flows. Install fence at least 3 feet back from the slope to allow for sediment storage. Wire backed fence can be used for extra strength. Avoid installing silt fence on slopes because they are hard to maintain. Manufactured linear sediment control can be used in lieu of silt fences. *For more info see the following factsheets: CASQA: SE-1; SE-12; or Caltrans: SC-1.*
9	Drain Inlet Protection	Use gravel bags, (or similar product) around drain inlets located both onsite and in gutter as a last line of defense. Bags should be made of a woven fabric resistant to photo-degradation filled with 0.5-1-in washed crushed rock. Do not use sand bags or silt fence fabric for drain inlet protection. *For more info see the following factsheets: CASQA: SE-10; or. Caltrans: SC-10.*
Good Housekeeping Best Management Practices		
10	Concrete Washout	Construct a lined concrete washout site away from storm drains, waterbodies, or other drainages. Ideally, place adjacent to stabilized entrance. Clean as needed and remove at end of project. *For more info see the following factsheets: CASQA: WM-8; or .Caltrans: WM-8.*
11	Stockpile Management	Cover all stockpiles and landscape material and berm properly with fiber rolls or sand bags. Keep behind the site perimeter control and away from waterbodies. *For more info see the following factsheets: CASQA: WM-3 or Caltrans: WM-3.*
12	Hazardous Material Management	Hazardous materials must be kept in closed containers that are covered and within secondary containment; do not place containers directly on soil. *For more info see the following factsheets: CASQA: WM-6; or Caltrans: WM-6.*
13	Sanitary Waste Management	Place portable toilets near stabilized site entrance, behind the curb and away from gutters, storm drain inlets, and waterbodies. Tie or stake portable toilets to prevent tipping and equip units with overflow pan/tray (most vendors provide these). *For more info see the following factsheets: CASQA: WM-9; or Caltrans: WM-9.*
14	Equipment and Vehicle Maintenance	Prevent equipment fluid leaks onto ground by placing drip pans or plastic tarps under equipment. Immediately clean up any spills or drips. *For more info see the following factsheets: CASQA: NS-8, NS-9, and NS-10; or Caltrans: NS-8, NS-9, and NS-10.*
15	Litter and Waste Management	Designate waste collection areas on site. Use watertight dumpsters and trash cans; inspect for leaks. Cover at the end of each work day and when it is raining or windy. Arrange for regular waste collection. Pick up site litter daily. *For more info see the following factsheets: CASQA: WM-5; or Caltrans: WM-5.*

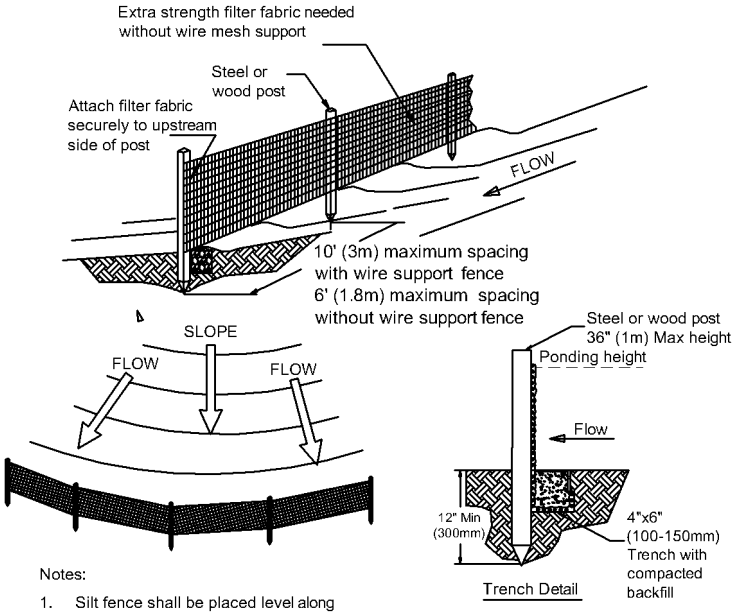
Notes:
1. Mats/blankets should be installed vertically downslope
2. Staple blankets sufficiently to ensure that material will maintain direct contact with soil



Wet Slope Lining
Not To Scale

Erosion Blanket

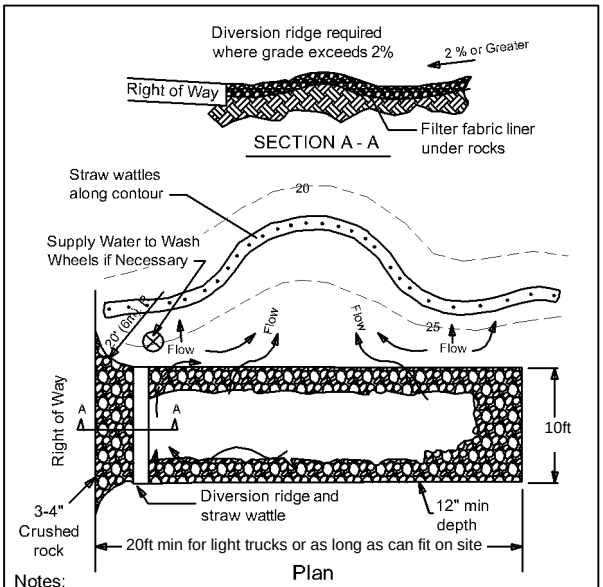
Note: Actual layout determined in the field.



Notes:
1. Silt fence shall be placed level along slope contours to maximize ponding efficiency with the ends curved uphill to improve ability to retain water.
2. Inspect and repair fence after each storm event and remove sediment when accumulation reaches 1/3 of the barrier height.
3. Removed sediment shall be deposited to an area that will not contribute sediment off-site and can be permanently stabilized

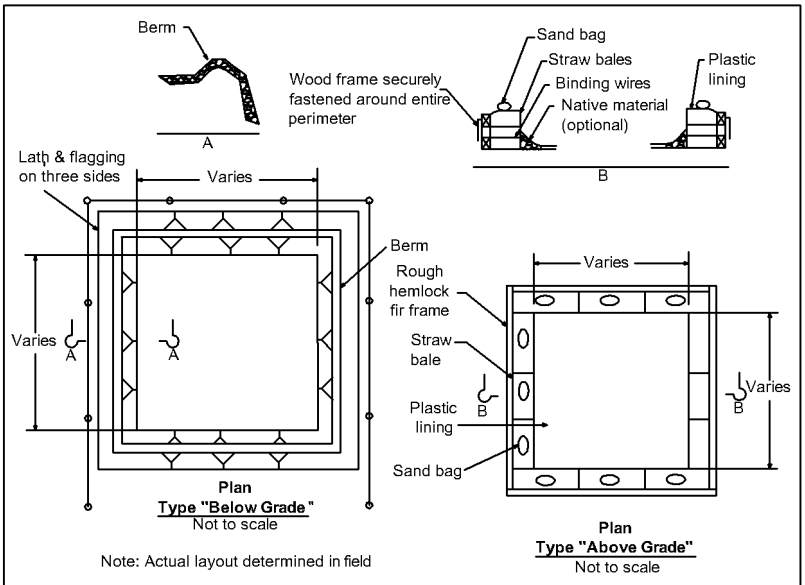
Silt Fence

NOT TO SCALE



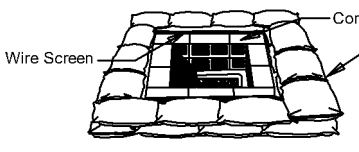
Notes:
1. The entrance shall be maintained to prevent sediment tracking or flowing onto public right-of-ways. This may require top dressing, repair and/or cleanout or other measures that trap sediment.
2. When necessary, wheels shall be cleaned prior to entering public right-of-way.
3. When washing is required, it shall be done on an area stabilized with crushed stone that drains into an approved sediment trap or sediment basin. Rumble plates or tire wash can be added.

Site Entrance



Note: Actual layout determined in field

Concrete Washout



Catch Basins with Gravel Bags

(Do not use sand bags near inlets)