

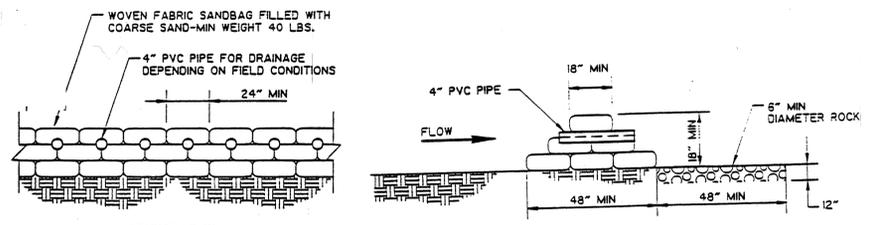
Erosion and Sediment Control BMP Notes

- REFER TO THIS PROJECT EROSION CONTROL PLAN FOR BEST MANAGEMENT PRACTICES (BMP) FOR GUIDANCE. THE CONTRACTOR SHALL VERIFY THAT THE BMP'S SHOWN ARE SUITABLE FOR HIS WORK PLAN AND MODIFY THE PROJECT EROSION CONTROL PLAN TO SUIT EACH WORK ACTIVITY AS PROVIDED BY THE STATE WATER RESOURCES CONTROL BOARD (SWRCB) ORDER NO. 99-08
- IN CASE OF EMERGENCY, CONTRACTOR IS REQUIRED TO IMMEDIATELY RESPOND AND CONSTRUCT EROSION CONTROL DEVICES ACCORDING TO PROJECT SPECIFICATIONS AND THE FOLLOWING NOTES:
- REFER TO CALTRANS STORM WATER QUALITY HANDBOOKS FOR BMP DETAILS (AVAILABLE AT WWW.DOT.CA.GOV/HG/CONSTRUC/CONSTRUCTION.SITE.BMPS.PDF)
- DURING THE RAINY SEASON THE AMOUNT OF EXPOSED SOIL ALLOWED AT ANY ONE TIME SHALL NOT EXCEED THAT WHICH CAN BE ADEQUATELY PROTECTED BY THE OWNER IN THE EVENT OF A RAINSTORM. A WEATHER-TRIGGERED BMP ACTION PLAN AND 125% OF ALL SUPPLIES NEEDED TO IMPLEMENT THE PLAN SHALL BE RETAINED ON THE JOB SITE IN A MANNER THAT ALLOWS FULL DEPLOYMENT AND COMPLETE INSTALLATION IN 24 HOURS. ALL OTHER BMP'S SHALL BE DEPLOYED ON AN ON-GOING BASIS.
- THE CONTRACTOR IS RESPONSIBLE TO INSURE COMPLIANCE WITH ALL APPLICABLE STORMWATER REGULATIONS AT ALL TIMES. THE BMP'S THAT HAVE BEEN INCORPORATED INTO THIS PLAN SHALL BE IMPLEMENTED AND MAINTAINED TO EFFECTIVELY PREVENT THE POTENTIALLY NEGATIVE IMPACTS OF THIS PROJECT'S CONSTRUCTION ACTIVITIES ON STORMWATER QUALITY. THE MAINTENANCE OF THE BMP'S IS THE CONTRACTOR'S RESPONSIBILITY, AND FAILURE TO PROPERLY INSTALL OR MAINTAIN THE BMP'S MAY RESULT IN ENFORCEMENT ACTION BY OTHERS. IF INSTALLED BMP'S FAIL, THEY MUST BE REPAIRED OR REPLACED WITH AN ACCEPTABLE ALTERNATE AS SOON AS SAFE TO DO SO.
- THE CONTRACTOR SHALL BE RESPONSIBLE AND SHALL TAKE ALL NECESSARY PRECAUTIONS TO PREVENT PUBLIC TRESPASS ONTO AREAS WHERE IMPOUNDED WATERS CREATE A HAZARDOUS CONDITION. NECESSARY PRECAUTIONS MAY INCLUDE, BUT NOT BE LIMITED TO, APPROPRIATE PERIMETER FENCING.
- FIBER ROLLS AND NECESSARY MATERIALS SHALL BE AVAILABLE ON SITE AND STOCKPILED AT CONVENIENT LOCATIONS TO FACILITATE RAPID CONSTRUCTION OF TEMPORARY DEVICES OR TO REPAIR ANY DAMAGED EROSION CONTROL MEASURES WHEN RAIN IS IMMINENT. A STAND-BY CREW SHALL BE MADE AVAILABLE AT ALL TIMES DURING THE RAINY SEASON.
- THE CONTRACTOR IS RESPONSIBLE TO REPAIR ANY EROSION DAMAGE TO THE SLOPES, PADS OR STREETS SHOWN ON THESE PLANS WHETHER THE SLOPES ARE EXISTING OR NEW SLOPES, UNTIL THE PROJECT IS ACCEPTED BY THE OWNER.
- THE PROPERTY OWNER IS OBLIGATED TO INSURE COMPLIANCE WITH ALL APPLICABLE STORMWATER REGULATIONS AT ALL TIMES. THE BMP'S (BEST MANAGEMENT PRACTICES) THAT HAVE BEEN INCORPORATED INTO THIS PLAN SHALL BE IMPLEMENTED AND MAINTAINED TO EFFECTIVELY PREVENT THE POTENTIALLY NEGATIVE IMPACTS OF THIS PROJECT'S CONSTRUCTION ACTIVITIES ON STORMWATER QUALITY. THE MAINTENANCE OF BMP'S IS THE PERMITEE'S RESPONSIBILITY, AND FAILURE TO PROPERLY INSTALL OR MAINTAIN THE BMP'S MAY RESULT IN ENFORCEMENT ACTION BY THE COUNTY OF SAN DIEGO OR OTHERS. IF INSTALLED BMP'S FAIL, THEY MUST BE REPAIRED OR REPLACED WITH AN ACCEPTABLE ALTERNATE WITHIN 24 HOURS, OR AS SOON AS SAFE TO DO SO.
- ALL AREAS TO BE USED FOR MATERIAL DELIVERY AND STORAGE, WASTE HANDLING AND ALL OTHER STAGING ACTIVITIES SHALL CONFORM TO THE FOLLOWING BMP'S (IF APPLICABLE): WM-1 THROUGH WM-10, AND NS-1 THROUGH NS-10.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE INSPECTION AND MODIFICATION OF THE EROSION CONTROL DEVICES, THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE CONTINUAL MAINTENANCE OF THE EROSION CONTROL DEVICES. IN THE EVENT OF FAILURE OR REFUSAL TO PROPERLY MAINTAIN SAID DEVICES, THE OWNER MAY CAUSE EMERGENCY MAINTENANCE WORK TO BE PERFORMED TO PROTECT ADJACENT PRIVATE AND PUBLIC PROPERTY, THE COST OF WHICH SHALL BE CHARGED TO THE CONTRACTOR (INCLUDING ALL MOBILIZATION FEES).
- TEMPORARY EROSION CONTROL DEVICES WHICH INTERFERE WITH WORK SHALL BE RELOCATED OR MODIFIED AS THE WORK PROGRESSES, AS APPROVED BY THE OWNER.
- ALL LOOSE SOIL AND DEBRIS SHALL BE REMOVED FROM THE STREET AREAS UPON STARTING OPERATIONS AND PERIODICALLY THEREAFTER AS NECESSARY OR AS DIRECTED BY THE OWNER.
- STAND-BY CREWS SHALL BE MADE AVAILABLE BY THE CONTRACTOR FOR EMERGENCY WORK DURING RAINSTORMS AND SHALL BE ALERTED BY THE CONTRACTOR.
- EROSION CONTROL PROVISIONS SHALL INCLUDE AND COMPLEMENT DRAINAGE PATTERNS DURING THE CURRENT AND FUTURE PHASES OF GRADING.
- GRADED AREAS AROUND THE SITE PERIMETER MUST DRAIN AWAY FROM THE FACE OF SLOPES AT THE CONCLUSION OF EACH WORKING DAY.
- PAVED STREETS, SIDEWALKS, AND OTHER IMPROVEMENTS SHALL BE MAINTAINED IN A NEAT AND CLEAN CONDITION, FREE OF LOOSE SOIL, CONSTRUCTION DEBRIS, AND TRASH IN ACCORDANCE WITH BMP SC-7.
- IT IS THE CONTRACTOR'S RESPONSIBILITY TO KEEP THE PUBLIC STREETS FREE FROM ALL MUD, DUST, OR OTHER DEBRIS. AT A MINIMUM, THIS SHALL INCLUDE STREET SWEEPING AT THE END OF EACH DAY OF GRADING ACTIVITY.
- DEVICES SHOWN ON PLANS SHALL NOT BE MOVED OR MODIFIED WITHOUT APPROVAL OF THE ENGINEERING INSPECTOR.
- THE CONTRACTOR SHALL RESTORE ALL EROSION CONTROL DEVICES TO WORKING ORDER TO THE SATISFACTION OF THE CITY ENGINEER AFTER EACH RUN-OFF PRODUCING RAINFALL.
- THE CONTRACTOR SHALL INSTALL ADDITIONAL EROSION CONTROL MEASURES AS MAY BE REQUIRED BY THE COUNTY ENGINEER DUE TO UNCOMPLETED GRADING OPERATIONS OR OR UNFORESEEN CIRCUMSTANCES WHICH MAY ARISE.
- THE CONTRACTOR SHALL BE RESPONSIBLE AND SHALL TAKE NECESSARY PRECAUTIONS TO PREVENT PUBLIC TRESPASS ONTO AREAS WHERE IMPOUNDED WATERS CREATE A HAZARDOUS CONDITION.

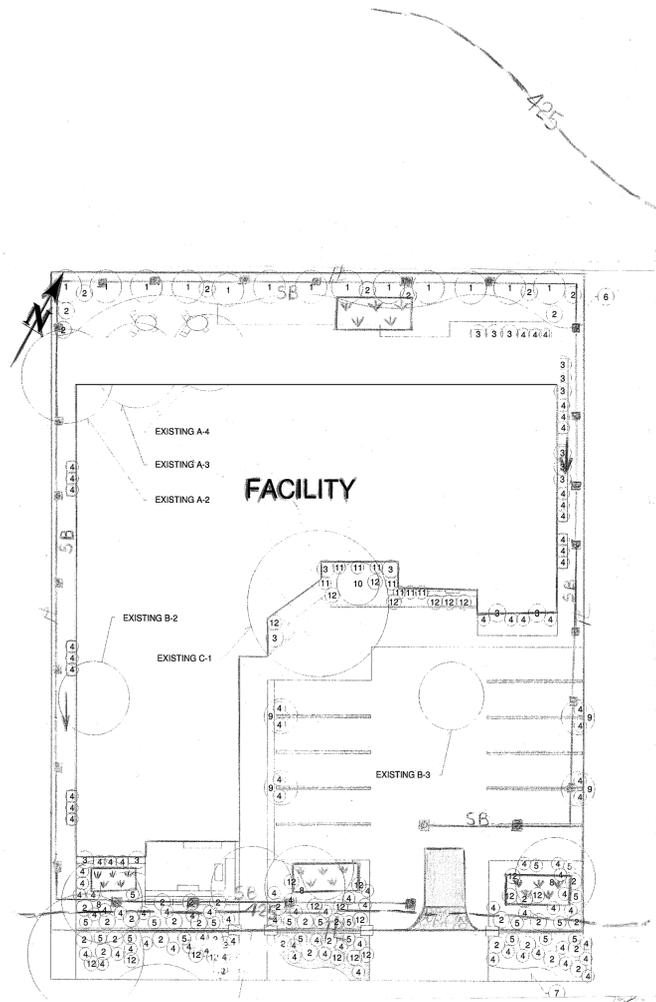
- ALL EROSION CONTROL MEASURES REQUIRED TO RETAIN SEDIMENT ON-SITE AND TO SAFELY DISCHARGE ANY ACCELERATED RUNOFF GENERATED BY THE PROJECT SHALL BE INSTALLED DURING THE INITIAL CONSTRUCTION PHASE OF THE PROJECT.
- THE CONSTRUCTION AND MAINTENANCE OF ALL EROSION CONTROL SYSTEMS SHALL BE IN SUBSTANTIAL CONFORMANCE WITH THE APPROVED EROSION CONTROL PLAN.
- THE CONTRACTOR SHALL TAKE THE NECESSARY STEPS TO PROTECT THE PROJECT AND ADJACENT PROPERTY FROM ANY EROSION AND SILTATION THAT RESULT FROM CONSTRUCTION OPERATIONS BY APPROPRIATE MEANS (FIBER ROLLS, TEMPORARY DESILTING BASINS, DIKES, SHORING, ETC.) UNTIL SUCH TIME THAT THE PROJECT IS COMPLETED AND ACCEPTED FOR MAINTENANCE BY THE OWNER. CONTRACTOR SHALL COMPLY WITH STORM WATER POLLUTION PREVENTION PLAN (SWPPP).
- ALL REMOVABLE PROTECTIVE DEVICES SHOWN SHALL BE IN PLACE AT THE END OF EACH WORKING DAY WHEN THE FIVE (5) DAY RAIN PROBABILITY FORECAST EXCEEDS FORTY PERCENT (40%), SILT AND OTHER DEBRIS SHALL BE REMOVED AFTER EACH RAINFALL.
- ALL GRAVEL BAGS SHALL BE BURLAP TYPE WITH 3/4 INCH MINIMUM AGGREGATE.
- ALL EROSION CONTROL DEVICES WITHIN THE DEVELOPMENT SHOULD BE MAINTAINED DURING AND AFTER EVERY RUNOFF PRODUCING STORM, IF POSSIBLE, MAINTENANCE CREWS WOULD BE REQUIRED TO HAVE ACCESS TO ALL AREAS.
- ANY PROPOSED ALTERNATE CONTROL MEASURES MUST BE APPROVED IN ADVANCE BY ALL RESPONSIBLE AGENCIES: I.E., COUNTY ENGINEER, DEPARTMENT OF SANITATION AND FLOOD CONTROL, OFFICE OF ENVIRONMENTAL MANAGEMENT, ETC.
- EQUIPMENT AND WORKERS FOR EMERGENCY WORK SHALL BE MADE AVAILABLE AT ALL TIMES DURING THE RAINY SEASON. ALL NECESSARY MATERIALS SHALL BE STOCKPILED ON SITE AT CONVENIENT LOCATIONS TO FACILITATE RAPID CONSTRUCTION OF TEMPORARY DEVICES WHEN RAIN IS IMMINENT.
- DURING THE RAINY SEASON THE AMOUNT OF EXPOSED SOIL ALLOWED AT ONE TIME SHALL NOT EXCEED THAT WHICH CAN BE ADEQUATELY PROTECTED BY THE PROPERTY OWNER IN EVENT OF A RAINSTORM. 125% OF ALL SUPPLIES NEEDED FOR BMP MEASURES SHALL BE MAINTAINED ON THE JOB SITE IN A MANNER THAT ALLOWS FULL DEPLOYMENT AND COMPLETE INSTALLATION IN 48 HOURS OR LESS OF A FORECAST RAIN.
- ALL BUILDING PADS SHOULD BE SLOPED TOWARDS THE DRIVEWAYS AND VELOCITY CHECK DAMS PROVIDED AT THE BASE OF ALL DRIVEWAYS DRAINING INTO THE STREET.
- GRAVEL BAGS AND FILL MATERIAL SHALL BE STOCKPILED AT INTERVALS, READY FOR USE WHEN REQUIRED.

Storm water Quality Notes Construction BMPs

- THE CONTRACTOR SHALL BE RESPONSIBLE FOR CLEANUP OF ALL SILT AND MUD ON ADJACENT STREET(S), DUE TO CONSTRUCTION VEHICLES OR ANY OTHER CONSTRUCTION ACTIVITY AT THE END OF EACH WORK DAY, OR AFTER A STORM EVENT THAT CAUSES A BREACH IN INSTALLED CONSTRUCTION BMP'S WHICH MAY COMPROMISE STORM WATER WITHIN ANY STREET(S). A STABILIZED CONSTRUCTION EXIT MAYBE REQUIRED TO PREVENT CONSTRUCTION VEHICLES AND EQUIPMENT FROM TRACKING MUD OR SILT ON TO THE STREET.
- ALL STOCKPILES OF UNCOMPACTED SOIL THAT ARE INTENDED TO BE LEFT UNPROTECTED FROM EROSION FOR A PERIOD GREATER THAN SEVEN CALENDER DAYS ARE TO BE PROTECTED (MIN. 6-MIL. POLYETHYLENE). ALL REMOVABLE DEVICES SHALL BE IN PLACE AT THE END OF EACH WORKING DAY WHEN THE FIVE DAY RAIN PROBABILITY FORECAST EXCEEDS 40%.
- A CONCRETE WASHOUT SHALL BE PROVIDED ON ALL PROJECTS WHICH PROPOSE THE CONSTRUCTION OF ANY CONCRETE IMPROVEMENTS WHICH ARE TO BE POURED IN PLACE ON SITE (MIN. 3m IN WIDTH AND 3m IN LENGTH WITH SANDBAGS AND 60-MIL PLASTIC LINER).
- THE CONTRACTOR SHALL RESTORE ALL EROSION/SEDIMENT CONTROL DEVICES TO WORKING ORDER AFTER EACH RUN-OFF PRODUCING RAINFALL OR AFTER ANY MATERIAL BREACH IN EFFECTIVENESS.
- ALL SLOPES THAT ARE CREATED OR DISTURBED BY CONSTRUCTION ACTIVITY MUST BE PROTECTED AGAINST EROSION AND SEDIMENT TRANSPORT AT ALL TIMES.
- THE STORAGE OF ALL CONSTRUCTION MATERIALS AND EQUIPMENT MUST BE PROTECTED AGAINST ANY POTENTIAL RELEASE OF POLLUTANTS INTO THE ENVIRONMENT.

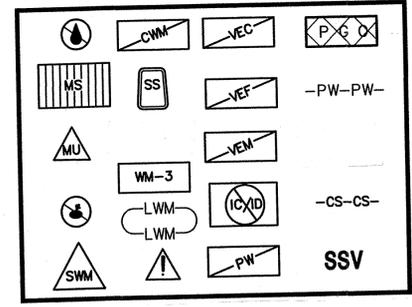


FRONT VIEW
CROSS-SECTION
DETAIL A - SAND BAG BARRIER



LEGEND

ITEM	DETAIL OR STD. DWG. (NOTE-2)	SYMBOL
WATER CONSERVATION PRACTICES	NS-1	
PAVING AND GRINDING OPERATIONS	SC-5/SC-6 NS-3 W/SC-10	
ILLEGAL DISCHARGE/ILLEGAL DUMPING REPORTING	NS-6	
POTABLE WATER / IRRIGATION	NS-7	-PW-PW-
VEHICLE AND EQUIPMENT CLEANING	NS-8	-VEC-VEC-
VEHICLE AND EQUIPMENT FUELING	NS-9	-VEF-VEF-
VEHICLE AND EQUIPMENT MAINTENANCE	NS-10	-VEM-VEM-
SILT FENCE	SC-1	
STREET SWEEPING AND VACUUMING	SC-7	SSV
BONDED FIBER MATRIX / HYDROSEEDING	SS-4,5	
FIBER ROLL	SC-5	
STABILIZED CONSTRUCTION ENTRANCE/EXIT WITH MUD PLATES	TC-1	
SAND BAG BARRIER (SEE DETAIL A)	SC-8	
MATERIAL DELIVERY AND STORAGE	WM-1	
MATERIAL USE	WM-2	
STOCKPILE MANAGEMENT AND STORAGE	WM-3	-CS-CS-
SPILL PREVENTION AND CONTROL	WM-4	
SOLID WASTE MANAGEMENT	WM-5	
HAZARDOUS WASTE MANAGEMENT	WM-6	
CONCRETE WASTE MANAGEMENT	WM-8	-CWM-CWM-
SANITARY/SEPTIC WASTE MANAGEMENT	WM-9	
LIQUID WASTE MANAGEMENT	WM-10	



STAGING AREA BMP'S
LOCATION OF STAGING AREA TO BE DETERMINED BY CONTRACTOR. CONTRACTOR TO COMPLY W/ ALL STAGING AREA BMP'S SHOWN ON THESE PLANS.

of
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Designer:
Change:

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SWM PLANS

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San Diego, Ca.

Owner:

Designed By:
Eric Iscan
Date: 10/8/2008