

TRACT "F-2", LANDS OF SPRINGER  
SITUATE WITHIN SECTION 14, TOWNSHIP 11 NORTH, RANGE 3 EAST, N.M.P.M., ZONE MAP C-17  
CITY OF ALBUQUERQUE  
BERNALILLO COUNTY, NEW MEXICO

SCHEDULE/SEQUENCING OF CONSTRUCTION:

- |    |  |         |
|----|--|---------|
| 1. | SITE/GRUB CLEARANCE                      | 5 DAYS  |
| 2. | SEDIMENT POND CONSTRUCTION               | 5 DAYS  |
| 3. | EARTHWORK FOR SITE                       | 10 DAYS |
| 4. | CONSTRUCTION OF PAVEMENT STRUCTURES      | 45 DAYS |
| 5. | CONSTRUCTION OF DRAINAGE COMPONENTS      | 10 DAYS |
| 6. | INSTALLATION OF LIGHT POLES              | 5 DAYS  |
| 7. | INSTALL FINAL LANDSCAPING AND IRRIGATION | 10 DAYS |

GENERAL NOTES:

1. KEEP DIRT AND DEBRIS ON THE SITE.
2. CLEAN FUGITIVE DIRT/DEBRIS FROM STREET AT END OF EACH DAY.
3. MAINTAIN GOOD HOUSEKEEPING.
4. SEE BMP DETAILS FOR INSPECTION AND MAINTENANCE DETAILS.
5. FINAL STABILIZATION OF ENTIRE SITE WILL BE BY PAVEMENT AND LANDSCAPING.

APPLICANT  
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DANNY JOHNSON

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MATT DRAGER

**CIVIL ENGINEER**  
WARE MALCOMB  
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MATTHEW KUEHN, P.E.

**SHEET INDEX.**

1	E
2-3	E

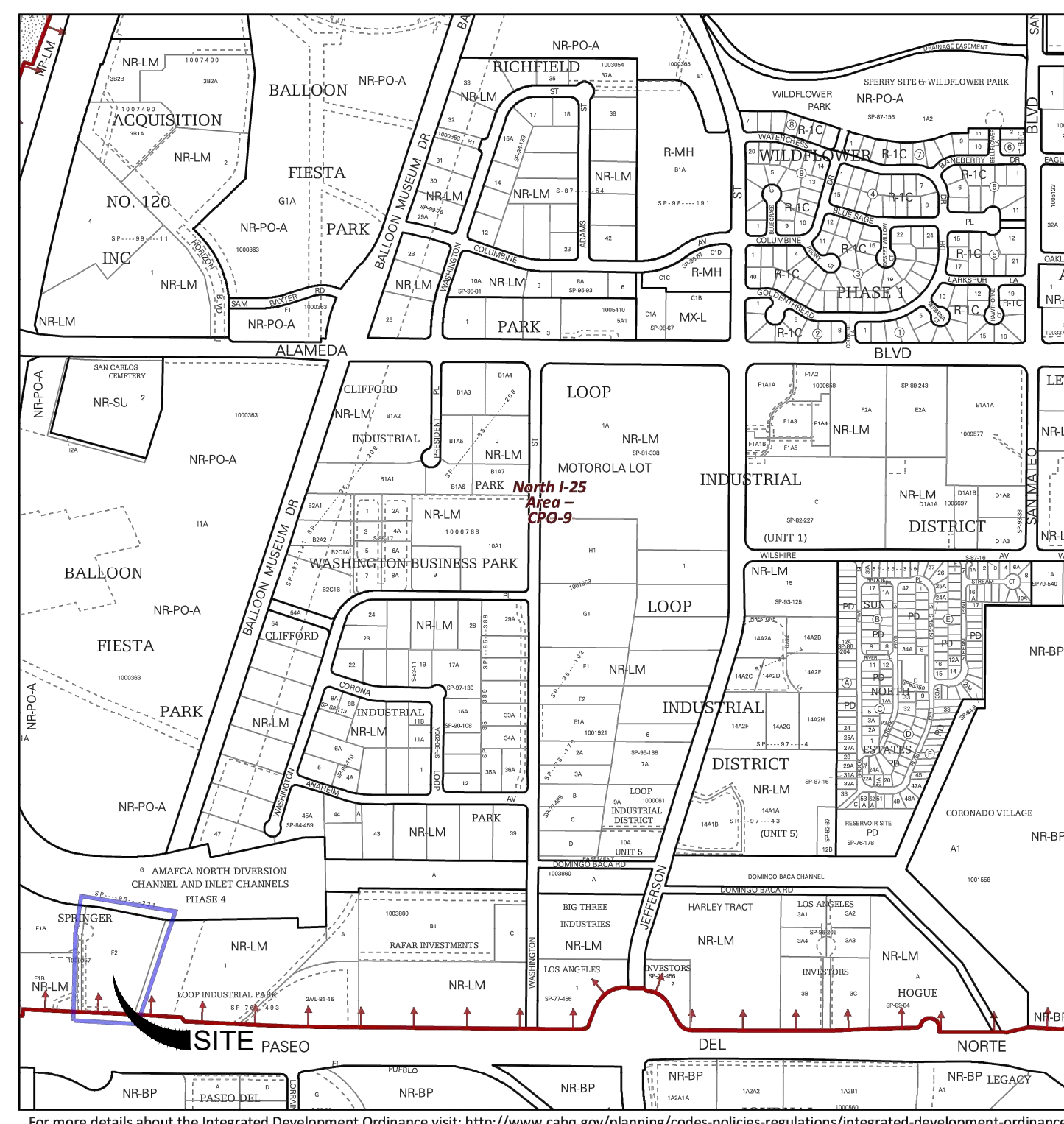
## EROSION & SEDIMENT CONTROL PLAN

### BMP DETAILS

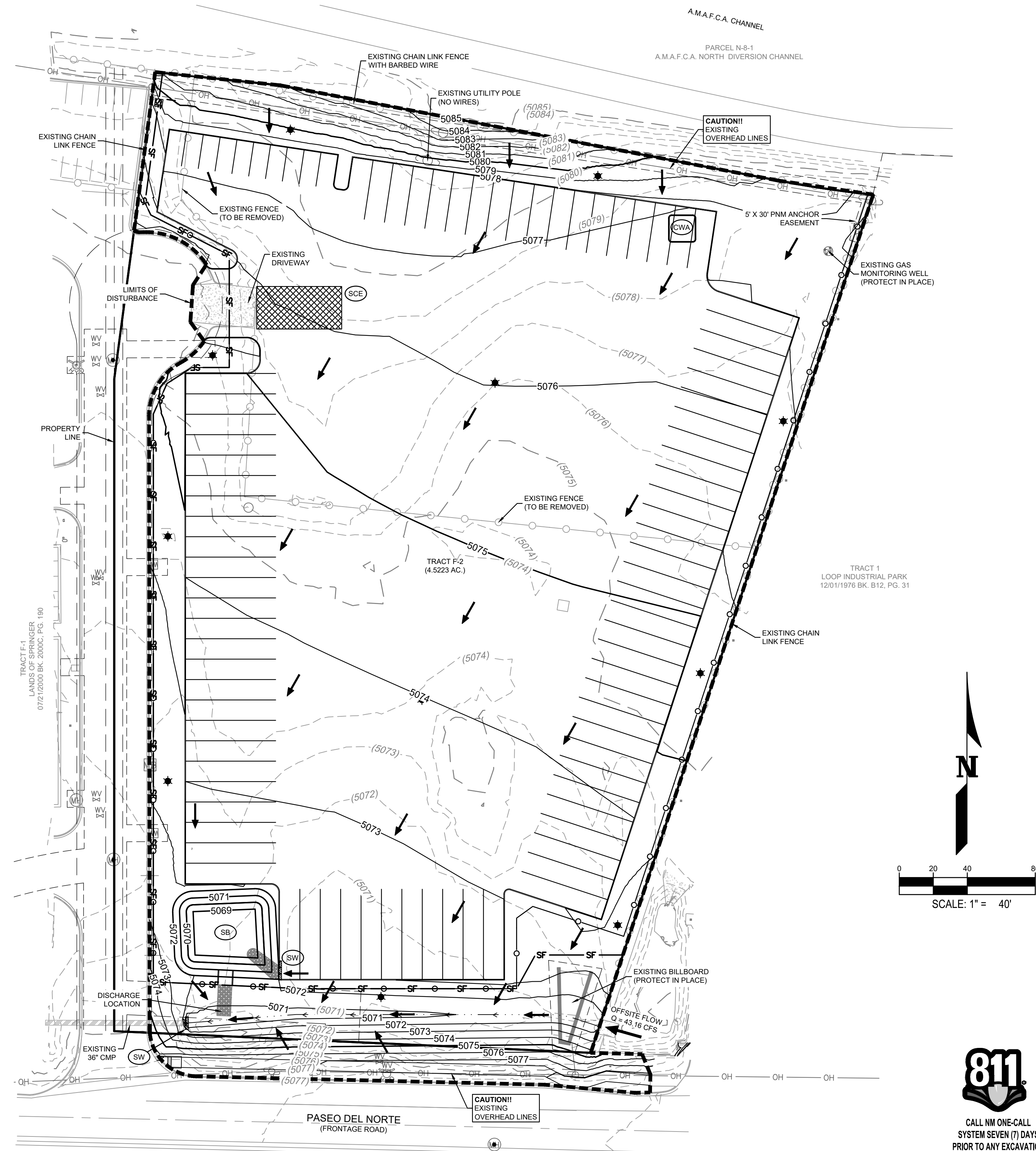
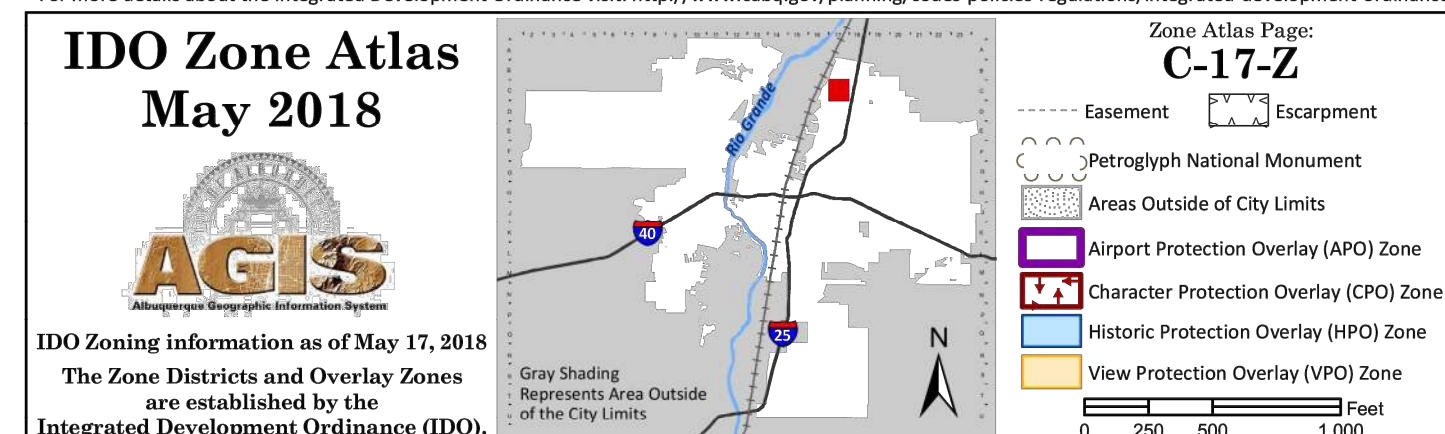
ESC PLAN STANDARD NOTES:

1. ALL EROSION AND SEDIMENT CONTROL (ESC) WORK ON THESE PLANS, EXCEPT AS OTHERWISE STATED OR PROVIDED HEREON SHALL BE PERMITTED, CONSTRUCTED, INSPECTED, AND MAINTAINED IN ACCORDANCE WITH:
  - a. THE CITY ORDINANCE § 14-5-2-11, THE ESC ORDINANCE,
  - b. THE EPA'S 2017 CONSTRUCTION GENERAL PERMIT (CGP), AND
  - c. THE CITY OF ALBUQUERQUE CONSTRUCTION BMP MANUAL.
2. ALL BMP'S MUST BE INSTALLED PRIOR TO BEGINNING ANY EARTH MOVING ACTIVITIES EXCEPT AS SPECIFIED HEREON IN THE PHASING PLAN. CONSTRUCTION OF EARTHEN BMP'S SUCH AS SEDIMENT TRAPS, SEDIMENT BASINS, AND DIVERSION BERMS SHALL BE COMPLETED AND INSTALLED PRIOR TO ANY OTHER CONSTRUCTION OR EARTHWORK. SELF-INSPECTION IS REQUIRED AFTER INSTALLATION OF THE BMP'S AND PRIOR TO BEGINNING CONSTRUCTION.
3. SELF-INSPECTIONS - AT A MINIMUM A ROUTINE COMPLIANCE SELF-INSPECTION IS REQUIRED TO REVIEW THE PROJECT FOR COMPLIANCE WITH THE CONSTRUCTION GENERAL PERMIT ONCE EVERY 14 DAYS AND AFTER ANY PRECIPITATION EVENT OF 1/4 INCH OR GREATER UNTIL THE SITE CONSTRUCTION HAS BEEN COMPLETED AND THE SITE DETERMINED AS STABILIZED BY THE CITY. REPORTS OF THESE INSPECTIONS SHALL BE KEPT BY THE PERSON OR ENTITY AUTHORIZED TO DIRECT THE CONSTRUCTION ACTIVITIES ON THE SITE.
4. BMP'S SHALL BE INSPECTED AND MAINTAINED UNTIL ALL DISTURBED AREAS ARE STABILIZED IN ACCORDANCE WITH THE FINAL STABILIZATION CRITERIA (CGP § 2.14.B). GENERALLY ALL DISTURBED AREAS OTHER THAN CROPLAND MUST HAVE A UNIFORM PERENNIAL VEGETATION THAT PROVIDES 70 PERCENT OR MORE OF THE COVER PROVIDED BY NATIVE VEGETATION OR SEED THE DISTURBED AREA AND PROVIDE NON-VEGETATIVE MULCH THAT PROVIDES COVER FOR AT LEAST THREE YEARS WITHOUT ACTIVE MAINTENANCE. FINAL STABILIZATION MUST BE DOCUMENTED ON SELF-INSPECTION REPORTS AND APPROVED BY THE CITY OF ALBUQUERQUE PRIOR TO REMOVAL OF BMP'S AND DISCONTINUATION OF INSPECTIONS.

**NOTE:**  
POND TO BE CONSTRUCTED AS THE FIRST ITEM OF EARTHWORK  
CONSTRUCTION AND TO BE MAINTAINED AS A SEDIMENT TRAP  
DURING CONSTRUCTION.



For more details about the Integrated Development Ordinance visit: <http://www.cabq.gov/planning/codes-policies-regulations/integrated-development-ordinance>



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FOR AND ON BEHALF  
OF WARE MALCOMB

3801 PASEO DEL NORTE NE  
EROSION & SEDIMENT CONTROL  
ALBUQUERQUE, NEW MEXICO 87113  
EROSION & SEDIMENT CONTROL PLAN

[illegible]

JOB NO.:	PHX20-4023
PA / PM:	MK
DRAWN BY:	WE
DATE:	01/05/2021
PLOT DATE:	01/05/2021

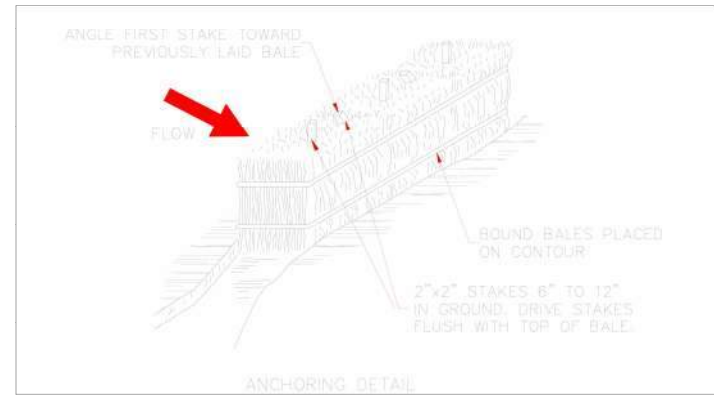

SHEET  
**ES-1**

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Sheet    **1**    of    **3**

NOT FOR CONSTRUCTION



Straw Bale	Applications
	<ul style="list-style-type: none"><li>✓ Perimeter Control</li><li>✓ Slope Protection</li><li>✓ Sediment Trapping</li><li>✓ Channel Protection</li><li>✓ Temporary Stabilization</li><li>✓ Permanent Stabilization</li><li>✓ Waste Management</li><li>✓ Housekeeping Practices</li></ul>
<b>DESCRIPTION</b> A temporary barrier can be constructed of straw bales anchored with posts or stakes, which intercepts sediment-laden runoff from small, disturbed areas. Straw-bales barriers can provide filtration or serve as a dam/device to direct flow.	<b>Targeted Constituents</b> <ul style="list-style-type: none"><li>✓ Sediment</li><li>✓ Nutrients</li><li>✓ Toxic Materials</li><li>✓ Oil and Grease</li><li>✓ Floatable Materials</li><li>✓ Construction Wastes</li></ul>
<b>PRIMARY USE</b> Straw bales barriers trap sediment-laden runoff from small, relatively level areas; velocity reduction causes sediment to settle out.	<b>Impact</b> <ul style="list-style-type: none"><li>✓ Significant</li><li>✓ Medium</li><li>✓ Low</li><li>Unknown or Questionable</li></ul>
<b>APPLICATIONS</b> Straw bales barriers treat flow from small sites for short-duration projects. Can be used as check dams on small watercourses. Problems with uniformity, degradation and installation; residential applications suggested. <b>Sheet-Flow Applications</b> <ul style="list-style-type: none"><li>Place the bales in a single row, lengthwise on the contour, with ends of adjacent bales tightly abutting.</li></ul>	
<b>LIMITATIONS</b> Due to a short effective life caused by biological decomposition, straw bales must be replaced after a period of no more than 3 months. During the wet and warm seasons, however, they must be replaced more frequently as is determined by periodic inspections for structural integrity. Straw bale dikes are not recommended for use with concentrated flows. The effectiveness of straw bales in reducing sediment is very limited. Improperly maintained, straw bales can have a negative impact on the water quality of the runoff.	

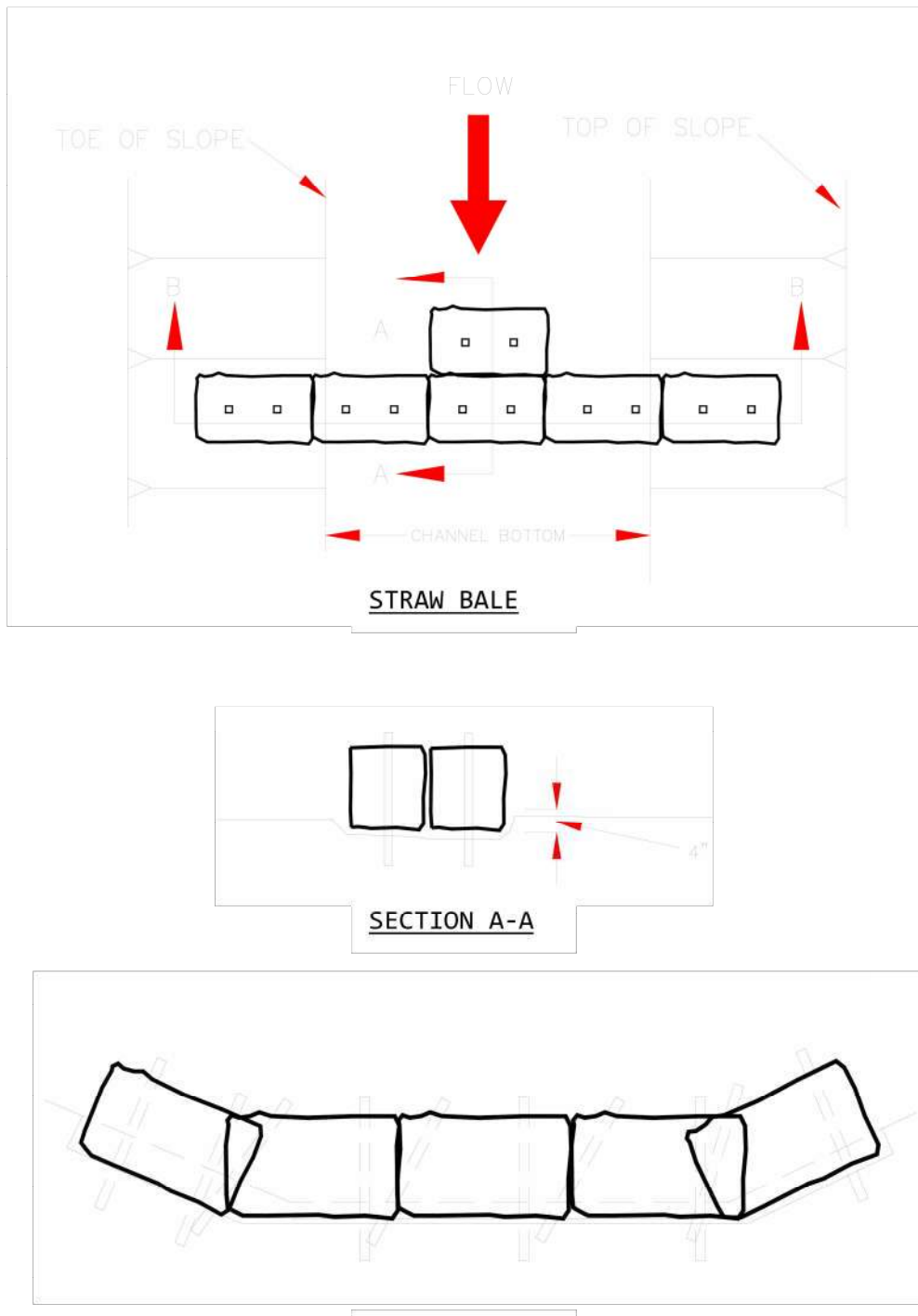
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Straw Bale (continued)
<b>MAINTENANCE REQUIREMENTS</b> Straw bales shall be replaced if there are signs of degradation such as straw located downstream from the bales, structural deficiencies due to rotting straw in the bale, or other signs of deterioration. Sediment should be removed from behind the bales when it reaches a depth of approximately 6 inches. <b>NOTES</b> <ul style="list-style-type: none"><li>The straw bale barrier must be entrenched, anchored, and backfilled. A trench should be excavated the width of a bale and the length of the proposed barrier to a minimum depth of 4 inches. After the bales are staked, the excavated soil must be backfilled against the barrier. Backfill soil should conform to the ground level on the downhill side and should be built up to 4 inches against the uphill side of the barrier.</li><li>Each bale must be securely anchored by at least two wooden stakes driven toward the previously laid bale to force the bales together. Stakes should be driven 6–12 inches into the ground. Stakes should have a minimum diameter or cross section of 2 inches.</li><li>All bales must be either wire-bound or string-tied.</li><li>Fill gaps between bales by wedging with straw.</li><li>Along toe of fills, install the straw bales along a level contour and leave enough area behind the barrier for runoff to pond and sediment to settle. A minimum of 5 feet away from the fill toe is recommended.</li><li>Inspect frequently during construction. Repair or replacement should be made as promptly as needed.</li><li>Remove sediment accumulated against the straw bale barrier when it reaches half the exposed barrier height.</li><li>Remove bales after they have served their usefulness.</li><li>Trenches where straw bales were located should be graded and stabilized.</li></ul>

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A4-10

Straw Bale (continued)


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A4-11

Concrete Waste Management	Applications
<b>DESCRIPTION</b> Concrete waste management prevents or reduces the discharge of pollutants to storm water by conducting washout offsite, performing onsite washout in a designated area, and training employees and subcontractors. <b>APPLICATIONS</b> The following low-cost measures will help reduce storm water pollution from concrete wastes: <ul style="list-style-type: none"><li>Store dry and wet materials under cover, away from drainage areas.</li><li>Avoid mixing excess amounts of fresh concrete or cement onsite.</li><li>Perform washout of concrete trucks offsite or in designated areas only.</li><li>Do not wash out concrete trucks into storm drains, open ditches, streets, or streams.</li><li>Do not allow excess concrete to be dumped onsite except in designated areas.</li><li>For onsite washout:<ul style="list-style-type: none"><li>Locate washout area at least 50 feet from storm drains, open ditches, or water bodies. Prevent runoff from this area by constructing a temporary pit or bermed area large enough for liquid and solid waste.</li><li>Wash out wastes into the temporary pit where the concrete can set, be broken up, and then disposed of properly.</li></ul></li><li>When washing concrete to remove fine particles and expose the aggregate, avoid creating runoff by draining the water to a bermed or level area.</li><li>Do not wash sweepings from exposed aggregate concrete into the street or storm drain. Collect and return sweepings to aggregate base stock pile, or dispose in the trash.</li><li>Train employees and subcontractors in proper concrete waste management.</li></ul> <b>LIMITATIONS</b> Offsite washout of concrete wastes may not always be possible. <b>MAINTENANCE REQUIREMENTS</b> Inspect subcontractors to ensure that concrete wastes are being properly managed. If using a temporary pit, dispose of hardened concrete on a regular basis.	<ul style="list-style-type: none"><li>✓ Perimeter Control</li><li>✓ Slope Protection</li><li>✓ Sediment Trapping</li><li>✓ Channel Protection</li><li>✓ Temporary Stabilization</li><li>✓ Permanent Stabilization</li><li>✓ Waste Management</li><li>✓ Housekeeping Practices</li></ul>
	<b>Targeted Constituents</b> <ul style="list-style-type: none"><li>✓ Sediment</li><li>✓ Nutrients</li><li>✓ Toxic Materials</li><li>✓ Oil and Grease</li><li>✓ Floatable Materials</li><li>✓ Construction Wastes</li></ul>
	<b>Impact</b> <ul style="list-style-type: none"><li>✓ Significant</li><li>✓ Medium</li><li>✓ Low</li><li>Unknown or Questionable</li></ul>

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A5-13

Dust Control	Applications
<b>DESCRIPTION</b> A comprehensive dust control plan is used to limit offsite sedimentation by controlling the sites potential for producing airborne fugitive dust and track-out of sediments. Sediments that are transported from construction sites by storm water runoff, wind, erosion and vehicle trackout are often re-dispersed to the air by subsequent vehicular traffic and high winds. Likewise, these sediments may be transported by the next rainfall into public storm sewer systems. Implementation of control measures to minimize the generation of fugitive dust from construction sites will also limit the quantity of sediments in storm water. <b>APPLICATIONS</b> Primary sources of dust from development and construction activities are: <ul style="list-style-type: none"><li>Grading Operations (land clearing and earthmoving)</li><li>Drilling and blasting</li><li>Batch drop operations (loader operation)</li><li>Exposed areas, cleared unstabilized areas</li><li>Vehicle traffic on unpaved surfaces</li><li>Sediment tracking on paved surfaces</li><li>Blasting and wrecking ball operations</li><li>Soil and debris storage piles</li></ul> The contractor is responsible for complying with the requirements of the air pollution control permit, if required. The approach to reduce air pollution from construction sites should require: <ul style="list-style-type: none"><li>Dust control plans for construction or land-clearing projects</li><li>Enforcement activities with priority given to citizen complaints</li><li>Maintenance of records by contactors</li></ul> Many of the reasonably available control measures for controlling fugitive dust from construction sites can also be implemented as BMPs for storm water pollution prevention. The following BMPs can be used: <ul style="list-style-type: none"><li>Pave, vegetate, or chemically stabilize access points to paved roads.</li><li>Provide covers for trucks transporting materials that contribute dust.</li></ul>	<ul style="list-style-type: none"><li>✓ Perimeter Control</li><li>✓ Slope Protection</li><li>✓ Sediment Trapping</li><li>✓ Channel Protection</li><li>✓ Temporary Stabilization</li><li>✓ Permanent Stabilization</li><li>✓ Waste Management</li><li>✓ Housekeeping Practices</li></ul>
	<b>Targeted Constituents</b> <ul style="list-style-type: none"><li>✓ Sediment</li><li>✓ Nutrients</li><li>✓ Toxic Materials</li><li>✓ Oil and Grease</li><li>✓ Floatable Materials</li><li>✓ Construction Wastes</li></ul>
	<b>Impact</b> <ul style="list-style-type: none"><li>✓ Significant</li><li>✓ Medium</li><li>✓ Low</li><li>Unknown or Questionable</li></ul>

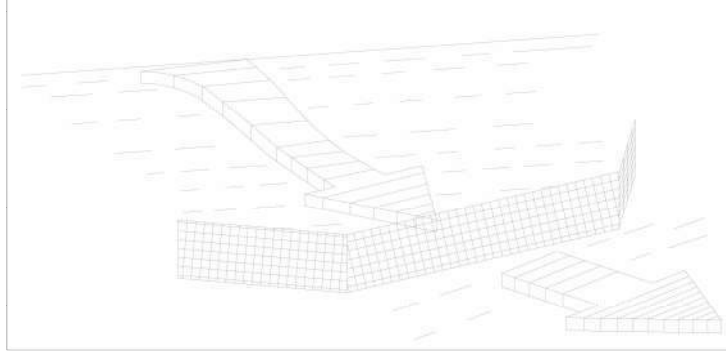
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A1-3

Dust Control	Applications
<b>DESCRIPTION</b> A comprehensive dust control plan is used to limit offsite sedimentation by controlling the sites potential for producing airborne fugitive dust and track-out of sediments. Sediments that are transported from construction sites by storm water runoff, wind, erosion and vehicle trackout are often re-dispersed to the air by subsequent vehicular traffic and high winds. Likewise, these sediments may be transported by the next rainfall into public storm sewer systems. Implementation of control measures to minimize the generation of fugitive dust from construction sites will also limit the quantity of sediments in storm water. <b>APPLICATIONS</b> Primary sources of dust from development and construction activities are: <ul style="list-style-type: none"><li>Grading Operations (land clearing and earthmoving)</li><li>Drilling and blasting</li><li>Batch drop operations (loader operation)</li><li>Exposed areas, cleared unstabilized areas</li><li>Vehicle traffic on unpaved surfaces</li><li>Sediment tracking on paved surfaces</li><li>Blasting and wrecking ball operations</li><li>Soil and debris storage piles</li></ul> The contractor is responsible for complying with the requirements of the air pollution control permit, if required. The approach to reduce air pollution from construction sites should require: <ul style="list-style-type: none"><li>Dust control plans for construction or land-clearing projects</li><li>Enforcement activities with priority given to citizen complaints</li><li>Maintenance of records by contactors</li></ul> Many of the reasonably available control measures for controlling fugitive dust from construction sites can also be implemented as BMPs for storm water pollution prevention. The following BMPs can be used: <ul style="list-style-type: none"><li>Pave, vegetate, or chemically stabilize access points to paved roads.</li><li>Provide covers for trucks transporting materials that contribute dust.</li></ul>	<ul style="list-style-type: none"><li>✓ Perimeter Control</li><li>✓ Slope Protection</li><li>✓ Sediment Trapping</li><li>✓ Channel Protection</li><li>✓ Temporary Stabilization</li><li>✓ Permanent Stabilization</li><li>✓ Waste Management</li><li>✓ Housekeeping Practices</li></ul>
	<b>Targeted Constituents</b> <ul style="list-style-type: none"><li>✓ Sediment</li><li>✓ Nutrients</li><li>✓ Toxic Materials</li><li>✓ Oil and Grease</li><li>✓ Floatable Materials</li><li>✓ Construction Wastes</li></ul>
	<b>Impact</b> <ul style="list-style-type: none"><li>✓ Significant</li><li>✓ Medium</li><li>✓ Low</li><li>Unknown or Questionable</li></ul>

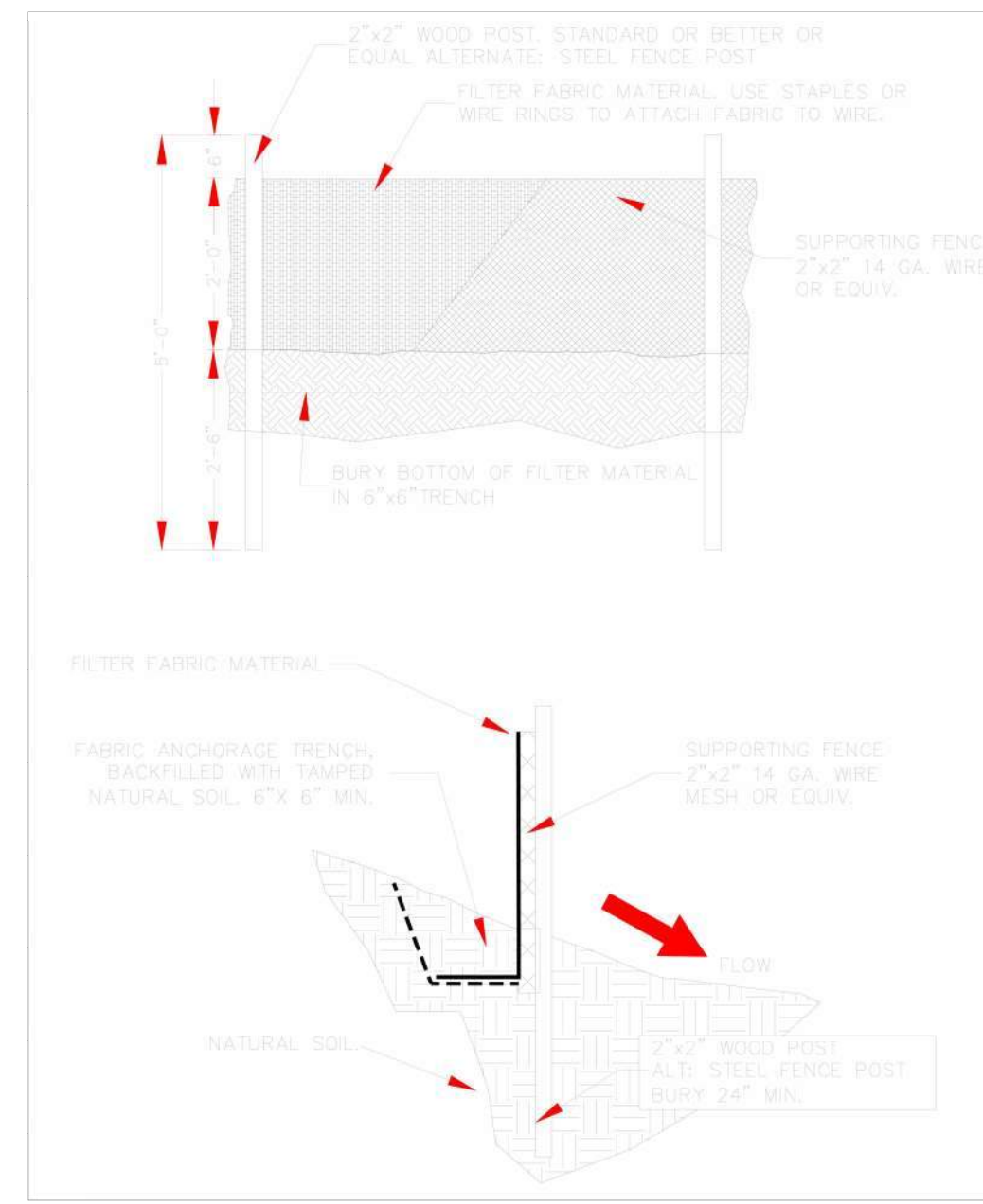
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A1-4

Silt Fence	Applications
	<ul style="list-style-type: none"><li>✓ Perimeter Control</li><li>✓ Slope Protection</li><li>✓ Sediment Trapping</li><li>✓ Channel Protection</li><li>✓ Temporary Stabilization</li><li>✓ Permanent Stabilization</li><li>✓ Waste Management</li><li>✓ Housekeeping Practices</li></ul>
<b>DESCRIPTION</b> A silt fence consists of geotextile fabric supported by backing stretched between posts, with the lower edge securely embedded in soil downstream of disturbed areas. Intercepts runoff in the form of sheet flow and provides filtration, sedimentation, and velocity reduction. <b>PRIMARY USE</b> Silt fences are used as perimeter control downstream of disturbed areas, and for non-concentrated sheet-flow conditions. <b>APPLICATIONS</b> Silt fences provide an economical way to mitigate overflow, non-concentrated flows, and as a perimeter control device. Best with coarse to silty soil types and to control wind erosion on sandy soils. <b>LIMITATIONS</b> Minor ponding will likely occur at the upstream side of the silt fence, resulting in minor localized flooding. Fences that are constructed in swales or low areas subject to concentrated flow may be overtopped, resulting in failure of the filter fence. Silt fences subject to areas of concentrated flow (waterways with flows >1 cfs) are not acceptable. Silt fence can interfere with construction operations; therefore, planning of access routes onto the site is critical. Silt fence can fail structurally under heavy storm flows, creating maintenance problems and reducing the effectiveness of the system. <b>MAINTENANCE REQUIREMENTS</b> Inspections should be made on a weekly basis, especially after large storm events. If the fabric becomes clogged, it should be cleaned or, if necessary, replaced. Sediment should be removed when it reaches approximately one-half the height of the fence.	<ul style="list-style-type: none"><li>✓ Sediment</li><li>✓ Nutrients</li><li>✓ Toxic Materials</li><li>✓ Oil and Grease</li><li>✓ Floatable Materials</li><li>✓ Construction Wastes</li></ul>
	<b>Impact</b> <ul style="list-style-type: none"><li>✓ Significant</li><li>✓ Medium</li><li>✓ Low</li><li>Unknown or Questionable</li></ul>

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A4-5

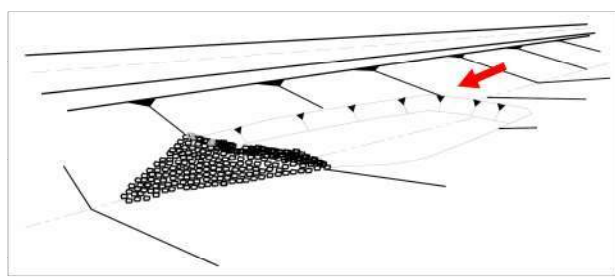
Silt Fence (continued)


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A4-6



**WARE MALCOMB**  
CIVIL ENGINEERING



### Targeted Constituents

Sediment

## Nutrients

Oil and Grease

Electable Materials

### Construction Wastes

## Impact

## Significant

Medium

Low

Unknown or Questionable

10

A4-19

3801 PASEO DEL NORTE NE  
EROSION & SEDIMENT CONTROL  
ALBUQUERQUE, NEW MEXICO 87113  
BMP DETAILS

## EXCAVATED

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A4-22