

CHERRY HILLS VILLAGE

Checklist for Grading, Erosion, and Sediment Control (GESC) Report and Plan

This checklist for a Grading, Erosion, and Sediment Control (GESC) Report and Plan has been adapted from both the Arapahoe County Grading, Erosion, and Sediment Control Manuals and checklist and the Southeast Metro Stormwater Authority (SEMSWA) Grading, Erosion, and Sediment Control Manuals checklist and shall be utilized for GESC Submittals within Cherry Hills Village. Report and Plans are to be consistent with the current MS4

Project Name: _____

Engineer: _____

Address: _____

Phone: _____ **Email:** _____

In addition to this checklist, please refer to the "Checklist for Developing a GESC Plan" checklists provided within the Arapahoe County GESC Manuals.

Yes	No	Requirements
I. GESC REPORT (Format shall generally follow the items below)		
		1. Contact Information:
		a. Owner
		b. Developer (if different than Owner)
		c. GESC Design Engineer (Registered Professional Engineer)
		d. Applicant (if different than above)
		2. Signature page for permittees:
		a. Owner/developer signature (acceptance of responsibility)
		b. Plan Preparer (P.E.) signature (acceptance of responsibility)
		3. General Location and Project Description:
		a. Lot, Block of Site if platted
		b. Project location including section, range and township
		c. Latitude and longitude of the site
		d. Vicinity Map
		e. Project Description
		f. Area of site
		g. Area of disturbance
		h. Area of construction if different than disturbance
		4. Existing Site Conditions:
		a. Existing topography including general location and slopes
		b. Existing vegetation
		c. Existing drainage
		d. Wetlands, irrigation ditches, and other unique features
		e. Adjacent areas
		f. Soils (soil reports from USGS)
		i. Soil names
		ii. Soil type
		iii. Hydrologic soil group
		iv. Erodibility (wind and water)
		v. Permeability
		vi. Depth
		vii. Texture
		viii. Soil Structure

		5. Areas and Earthwork Volumes:
		a. Earthwork Volumes (provide cut, fill, and net volumes) in CY
		b. Acreage of limits of disturbance
		c. Acreage of limits of construction if different than disturbed area
		6. Erosion and Sediment Control Measures:
		a. Identification of Pollutant Sources
		b. Description of the BMPs to be used
		i. Structural
		ii. Non-Structural
		iii. Additional BMPs (i.e. administrative)
		7. Timing/phasing schedule:
		a. Anticipated starting and completion dates of construction
		b. Anticipated starting and completion dates of individual phases
		c. Detailed construction sequencing for each phase
		8. Permanent stabilization:
		a. Description of how the site will be stabilized after construction is complete
		9. Stormwater management considerations:
		a. Description of how on- and off-site runoff will be handled during construction
		10. Other Potential Pollution Considerations
		a. Materials handling and spill prevention
		b. Waste management and disposal
		c. Groundwater or stormwater dewatering
		11. Inspection and Maintenance
		a. Maintenance requirements for BMPs
		i. After installation of any construction BMP
		ii. After any runoff event that causes erosion
		b. Site-specific inspection log (including the following information):
		i. Date of inspection
		ii. Name of inspector
		iii. Project name and location
		iv. Reason for inspection (i.e., after install, after runoff event, weekly inspection)
		v. Evaluation of construction BMPs
		A. Condition/status of BMPs
		B. Maintenance requirements
		C. Required actions and schedule
		12. Engineer's estimate of probable cost (installation and maintenance):
		a. Utilize spreadsheets for the Initial/Interim & Final BMPs from Arapahoe County GESC Manual
		b. Include installation of BMPs
		c. Include maintenance of BMPs during construction
		13. BMP Calculations
		14. This Checklist (filled out)
		15. Other Site Specific Information

Yes	No	Requirements
II. GESC PLAN		
		1. 24" x 36" in size, 22" x 34" also acceptable when half size sets will be produced
		2. Cover Sheet:
		a. Project name
		b. Project address or legal description
		c. Permittee/Owner's contact information
		d. Permittee/Developer's contact information
		e. Design engineer's contact information
		f. Sheet index
		g. Permittee/Owner's standard note
		h. Design Engineer's signature block with standard note, date and P.E. No.
		i. Cherry Hills Village approval block
		j. General location map (1"=1000' to 1"=8000)
		i. General vicinity of the site
		ii. Major roadway names
		iii. North arrow and written or graphic scale
		3. Index Sheet (if applicable):
		a. Show entire project area at an appropriate scale
		b. Indicate the limits of coverage of each plan sheet
		4. Initial GESC Plan (includes initial clearing, grubbing and preparation for demolition, if applicable):
		a. Scale of 1"=20" to 1"=200
		b. Property lines
		c. Existing & proposed ROW and easements
		d. Existing topography (max 2-foot contour interval, incl. 100' around site)
		e. Streets and street names labeled
		f. Adjacent properties labeled
		g. Flow directional arrows
		h. Existing Structures and natural features
		i. USGS benchmark for project (NAVD 88)
		j. Limits of disturbance and construction, including:
		i. All areas of work
		ii. Access points
		iii. Storage and staging areas
		iv. Borrow and stockpile areas (identify location if off-site)
		v. Utility tie-in locations
		vi. Stream corridors and other resource areas to be preserved
		vii. Lightly shade all areas outside of limits
		k. Locations of stockpiles
		l. Locations of storage and staging areas
		i. Equipment, fuel, lubricant, chemicals and supplies
		ii. Waste storage
		m. Locations of borrow or disposal areas
		n. Locations of temporary haul roads
		o. Locations, map symbols, and letter callouts of all Initial BMPs
		p. Sizes, dimensions and types of all Initial BMPs
		q. Standard note for legend of BMPs and symbols
		r. GESC Drawing Standard Notes and Details included or attached

		s. Cherry Hills Village approval block
		t. Other: _____
	5.	Interim GESC Plan (lot grading, site construction and revegetation):
		a. Initial GESC Plan BMPs to be screened/faded and dimensions removed
		b. Property lines (bold and clearly identifiable)
		c. Existing & proposed ROW and easements
		d. Existing topography (faded)
		e. Proposed topography (2-foot contour intervals – heavy solid lines)
		f. Streets and street names labeled
		g. Adjacent properties labeled
		h. Elevations, dimensions, location, extent and slope of all proposed grading
		i. Existing Structures and natural features to remain and all proposal structures and natural features
		j. USGS benchmark for project (NAVD 88)
		k. Limits of disturbance and construction, including:
		i. All areas of work
		ii. Access points
		iii. Storage and staging areas
		iv. Borrow and stockpile areas (identify location if off-site)
		v. Utility tie-in locations
		vi. Stream corridors and other resource areas to be preserved
		vii. Lightly shade all areas outside of limits
		l. Locations of stockpiles
		m. Locations of storage and staging areas
		i. Equipment, fuel, lubricant, chemicals and supplies
		ii. Waste storage
		n. Locations of borrow or disposal areas
		o. Locations/outlines of cut and fill areas
		p. Locations of temporary haul roads
		q. Locations, map symbols, and letter callouts of all Interim BMPs
		r. Sizes, dimensions and types of all Interim BMPs
		s. Location of proposed structures
		t. Locations of all drainage and water quality features and facilities, paved areas, retaining walls, cribbing and other permanent features
		u. Summary of cut and fill volumes showing balance on-site
		v. Standard note for legend of BMPs and symbols
		w. GESC Drawing Standard Notes and Details included or attached
		i. Reference to legend of BMPs and symbols
		ii. Shaded BMPs from Initial stage
		iii. See Construction Plans for permanent drainage facilities
		x. Permittee/Owner/developer signature (acceptance of responsibility)
		y. Plan Preparer (P.E.) signature (acceptance of responsibility)
		z. Cherry Hills Village approval block
		aa. Other: _____

6. Final GESC Plan (final completion of the site):		
		a. Initial and Interim BMPs to be screened/faded and dimensions removed
		b. Label any Initial and Interim BMPs to be removed and areas stabilized
		c. Property lines (bold and clearly identifiable)
		d. Existing & proposed ROW and easements
		e. Existing topography (faded, may be trimmed from construction areas)
		f. Proposed topography
		g. Streets and street names labeled
		h. Adjacent properties labeled
		i. Elevations, dimensions, location, extent and slope of all proposed grading
		j. Existing Structures and natural features to remain and all proposal structures and natural features
		k. USGS benchmark for project (NAVD 88)
		l. Limits of disturbance and construction, including:
		i. All areas of work
		ii. Access points
		iii. Storage and staging areas
		iv. Borrow and stockpile areas (identify location if off-site)
		v. Utility tie-in locations
		vi. Stream corridors and other resource areas to be preserved
		vii. Lightly shade all areas outside of limits
		m. Locations, map symbols, and letter callouts of all Final BMPs, including seeding, mulching, landscaping and other measures
		n. Sizes, dimensions and types of all Final BMPs
		o. Location of proposed structures
		p. Locations of all drainage and water quality features and facilities, paved areas, retaining walls, cribbing, planting and other permanent features
		q. Show seeding and mulching everywhere except impervious areas
		r. Label the BMPs to be removed prior to the end of construction:
		i. Dewatering (DW), temporary stream crossings (TSC)
		ii. Stabilized staging area (SSA), vehicle tracking control (VTC)
		iii. Inlet protection (IP)
		iv. Construction fence (CF)
		s. Summary of cut and fill volumes showing balance on-site
		t. Standard note for legend of BMPs and symbols
		u. Notation that the GESC Plan is not complete without the GESC Report
		v. GESC Drawing Standard Notes and Details included or attached
		i. Reference to legend of BMPs and symbols
		ii. Shaded BMPs from Initial and Interim stage
		iii. See Construction Plans for permanent drainage facilities
		w. Permittee/Owner/developer signature (acceptance of responsibility)
		x. Plan Preparer (P.E.) signature (acceptance of responsibility)
		y. Cherry Hills Village approval block
		z. Other: _____
7. GESC Plan Standard Notes and Details		
		a. Include Arapahoe County Standard Notes and Details