University of Nebraska-Lincoln 2018 Annual Report

NPDES Permit: NER 310000 (sMS4)

Requirement: MCM 1 Public Education			
Reference	BMP 1.01 Public Education		
	(Part IV.B.1.a.1)		
	1. The permittee must develop and implement a comprehensive stormwater education and outreach program for the MS4. The SWMP must, at a minimum: a) Define the goals and objectives of the program based on defined high priority, community-wide issues; b) Define the target audience(s); c) Maintain and update appropriate messages for targeted residential, construction, industrial, and commercial issues; d) Define methods and process of distribution; e) Distribute appropriate educational materials and media to the target audience each year, using whichever methods and procedures determined appropriate by the permittee.		
Responsible	EHS: Environmental Specialist		
Strategy	(a) EHS will continue to publish and update storm water educational information on the EHS web site.		
	(b) EHS will continue to include a storm water awareness message in general Injury and Illness Prevention Program (IIPP) training, which targets new employees and paid students.		
	(c) EHS will continue to distribute storm water awareness information at gatherings specifically targeting new students.		
	(d) EHS will continue to publish articles related to storm water in the EHS listserv.		
	EHS will continue to collaborate with UNL Communications to publish information in Nebraska Today and Next@Nebraska on newly installed post-construction controls and UNL's SMS4 Permit and SWMP.		
Measurable Goals	All Years:		
	1. At least annually, review and update storm water educational information contained on EHS's web site.		
	2. At least annually, sponsor a storm water awareness booth at a large student event.		
	3. At least annually, publish a storm water awareness article in the EHS list serve.		
	 At least annually, submit a news article for publication in Nebraska Today and Next@Nebraska highlighting either newly installed post-construction structural controls or certain aspects of UNL's SWMP. 		
Report	 Date, nature of the large student event(s) with an EHS sponsored booth, estimated number of students that visited the booth, and summary of relevant information presented/distributed (during the prior year). EHS will be hosting a booth at earth day activities on April 27, 2019. The following articles were distributed via the EHS listserv: Solicitation for comments on UNL's Stormwater Management Plan, April 4, 2018; "Wisely Green for a Clean Stream" (lawn fertilizers), June 7, 2018; "Hidden Stormwater Control" (underground detention system at the 		

 Summary of changes made to the EHS web site relative to available educational materials (during the prior year). Number of persons completing an EHS training module that contains a storm water awareness message (during the prior year). 	 new Health Center/College of Nursing), November 8, 2018. In addition, an article on the underground detection system at the Health Center/College of Nursing was submitted for publication consideration to Nebraska Today and Next@Nebraska on November 28, 2018. A link to the "City of Lincoln Alternative Stormwater Best Management Practices Guidelines" was added to the EHS web site. During calendar year 2018, two thousand six hundred ten (2610) people completed EHS Injury and Illness Prevention training. This training module contains stormwater awareness information. Additional stormwater related training is described in MCM 6. 	
N/A		
CM 2 Outreach and Involvement		
 BMP 2.01 Outreach and Involvement (Part IV.B.1.a.2) 2. The permittee must provide a stormwater public involvement program that involves the public in the planning and implementation of programs and activities related to the development and implementation of the SWMP. At a minimum, the permittee must: a) Provide public notice of opportunities to review and comment on all new rules, ordinances, regulations and SWMP revisions drafted by the MS4; b) Create opportunities for citizens to participate in the implementation of storm water controls; and c) Ensure the public can easily find information about the permittee's SWMP. 		
EHS: Environmental Specialist		
 EHS will maintain the on-line Stormwater Pollution Reporter tool. EHS will solicit feedback on UNL's SWMP and proposed revisions by: Adding language to the EHS web site asking for comments and suggestions from the campus community. 		
	 3. Summary of changes made to the EHS web site relative to available educational materials (during the prior year). 4. Number of persons completing an EHS training module that contains a storm water awareness message (during the prior year). N/A N/A N/A Itreach and Involvement BMP 2.01 Outreach and Involvement (Part IV.B.1.a.2) 2. The permittee must provide a stormwater p public in the planning and implementation of the SW Provide public notice of opportunities to revordinances, regulations and SWMP revisions for citizens to participate in the implementa the public can easily find information about EHS: Environmental Specialist 1. EHS will maintain the on-line Stormwater Pc 2. EHS will solicit feedback on UNL's SWMP an a. Adding language to the EHS web site aski cramus community 	

	 Soliciting comments and suggestions with announcements published in the EHS listserv. 	
	c. Soliciting comments and suggestions at meetings of the Chancellor's University Safety Committee, which has broad faculty and staff representation.	
	 Soliciting comments and suggestions by sending written notice to or attending a meeting of ASUN (Student Government) 	
	EHS will announce publication of its annual report and solicit feedback using the same mechanisms described above.	
Measurable Goals	Year 1:	
	UNL's SMS4 permit and SWMP will be published on the EHS web site. Within one month of posting to the EHS web site, EHS will solicit feedback using the mechanisms described above.	
	All Years:	
	1. EHS will solicit comment from the campus community of proposed significant changes to UNL's SWMP as described above. EHS will provide at least one month for receiving comments on proposed changes. All comments and EHS responses will be published to the EHS web site for a minimum of one month prior to finalizing any changes.	
	2. EHS will announce publication of its annual storm water report and solicit comment from the campus community as described above. EHS will respond to all comments in writing and maintain records of comments and responses for the duration of the permit term. These records will be made available to the campus community upon request.	
	UNL's most current SMS4 permit and SWMP will be available on the EHS web site for public viewing throughout the permit term.	
Report	Summary of public notices, including date, content, and mechanisms of distribution.1. UNL's SWMP was posted to the EHS web page in December 2017. NDEQ's General permit and fact sheet were published upon notice of acceptance of UNL's SWMP in June 2018	
	 Solicitations for review and comment on UNL's SWMP were made as follows: Notice was published on the EHS web site in December 2017; an email was sent to ASUN Student Government on January 8, 2018; notice was given at the January 16, 2018 meeting of the Chancellor's University Safety Committee; articles were published in the EHS listserv on December 19, 2017 and April 4, 2018. Solicitation for review and comment on UNL's SW 	
Evaluation: Environmental Indicators of Effectiveness	N/A	

Requirement: MCM 3 Illicit Discharge Detection Elimination			
Reference	BMP 3.01 Enforcement Plan		
	(Part IV.B.2.a.1.a)		
	a. The permittee must, as part of the IDDE program, develop an enforcement plan or mechanism following the requirements of Parts III.A and B of this permit.		
Responsible	EHS: Environmental Specialist		
Strategy	EHS will continue to have and implement an Enf	orcement Response Plan	
Measurable Goals	All Years: The formal written Enforcement Plan will be implemented. The plan will be reviewed annually for needed modifications/updates.		
Report	EHS will report substantial changes made to the Enforcement Plan with each annual report.	UNL's current Enforcement Plan was reviewed in December 2018. No changes to the plan were deemed necessary at this time. There were no circumstances in 2018 requiring implementation of the plan.	
Evaluation: Environmental Indicators of Effectiveness	N/A		
Reference	Divir 5.02 iviappilig		
	 b. A storm sewer system map showing the location of all outfalls and the names and location of all waters of the state that receive discharges from those outfalls. If the SMS4 system connects to another MS4 system, the outfall drainage areas can be limited to those that drain only to the permittee's system. Connections and interactions to other MS4 systems need to be delineated; 		
Responsible	Utilities: GIS Project Manager		
Strategy	The GIS Project Manager is informed of all projects that involve changes to the existing storm water system through the UNL construction management process.		
Measurable Goals	All Years: The GIS Project Manager will update the GIS system as changes are made to the storm sewer system to ensure that current information is readily available.		
Report	The GIS map will be available for review by the permitting authority upon request. No reporting.	No reporting required. PDFs of current campus maps were received by EHS from the GIS coordinator on December 18, 2018. Current maps are published on the EHS web site.	

Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	 BMP 3.03 Dry-Weather Field Screening (Part IV.B.2.a.1.c): The IDDE program must include or address: c. Outfall field screening procedures and priority locations to investigate for detecting illicit discharges; I. The permittee must document written dry weather field screening and analytical monitoring procedures which are to be used at a number of outfall locations specified in the SWMP each year to detect discharges to the MS4; II. The screening procedures must identify the minimum staff, equipment, and discharge evaluation process used by the permittee; and III. The permittee must document the basis for its selection of each priority location and maintain a current list of all priority locations identified in the system. 	
Responsible	EHS: Environmental Specialist	
Strategy	 EHS will continue to conduct dry weather inspections of all safely accessible UNL outfalls that are 8" or greater in size. Inspections will be conducted in accordance with the IDDE written procedures described in the introductory narrative of this MCM. A current map listing all qualifying outfalls will continue to be maintained, as described in BMP 3.02. 	
Measurable Goals	All Years: EHS will inspect all safely accessible qualifying outfalls and maintain associated documentation. In addition, the storm sewer map will be updated to include newly installed qualifying outfalls as described in BMP 3.02.	
Report	 Report percentage of qualifying outfalls for which a dry weather inspection was completed during the previous year. Report rationale/reason why any qualifying outlet was not inspected during the previous year. Provide a summary of illicit discharges identified through dry weather monitoring during the prior year's inspections. 100% of qualifying outlets were inspected during calendar year 2018. Two outlets had sediment accumulation, attributed to adjacent agricultural operations. Corrective measures will be implemented in 2019. 	
Evaluation: Environmental Indicators of Effectiveness	None	
Reference	BMP 3.04 Illicit Discharge Investigation and Response(Part IV.B.2.a.1.d & e): The IDDE program must include or address:	

	 d. Procedures, staff, and equipment required for investigating and tracing the source of all identified illicit discharge; (i) The permittee must report immediately the occurrence of any dry weather flows believed to be an immediate threat to human health or the environment to NDEQ by calling (402) 471-2186 or (402) 471-4545 after business hours, weekends, and holidays; and (ii) The permittee must document all investigations to track at a minimum the date(s) the illicit discharge was observed; the results of the investigation; any follow-up of the investigation; and the date the investigation was closed. e. Procedures for removing the source of the discharge using the Enforcement Response Plan in Part III.B: (i) Once the source of the illicit discharge has been determined, the permittee must take immediate action so the responsible party of the problem can be notified, and require the responsible party to conduct all necessary corrective actions to eliminate the non-storm water discharge as soon as practicable; (ii) The permittee must document all interactions with potentially responsible parties as well as follow-up investigations to confirm illicit discharge have been removed 		
Responsible	EHS: Environmental Specialist		
Strategy	 EHS will continue to investigate all identified and reported illicit discharges and conduct appropriate follow-up investigations and actions in accordance with UNL's IDDE written procedures (which include all regulatory requirements described in Part IV.B.2.a.1.d & e of the General Permit) and as described in the narrative for this MCM. EHS will implement its Enforcement Response Plan as described in BMP 3.01. 		
Measurable Goals	All Years: EHS will take action to eliminate all identified illicit discharges to UNL's storm sewer system.		
Report	Summarize nature of each illicit discharge identified during the previous year and actions taken to eliminate the discharge.	 During calendar year 2018, six (6) potential illicit discharges were reported/identified and all were investigated. Three of the incidents (Animal Sciences, Barkley, Beadle Center) were associated with breakage of water or irrigation distribution pipes. In all cases, water supply was shut-off quickly after discovery and repairs to the system made. One report (Memorial Stadium) involved a contractor washing concrete dust to the storm sewer, but the contractor promptly ceased the activity when made aware that such actions are prohibited at UNL. One report (Massengale) involved a site in process of having a bioretention basin installed that was lacking 	

Evaluation:	 Sediment promptly One reporrelease of mechanic UNL prom LLCHD and storm sew product fr 	controls. Inlet protection was installed by the contractor. rt (Hamilton Hall) involved a propylene glycol following al failure of a fan coil unit. optly notified NDEQ and d took action to clean the ver system and recover rom Salt Creek.
Environmental Indicators of Effectiveness	previous year. Potential illicit discharge samples were not collected in 2018, therefore there is no data to report.	
Reference	BMP 3.05 Non-Stormwater Discharges	
	(Part IV.B.2.a.1.f): The IDDE program must include or address:	
	 The following categories of non-storm water discharges or flows addressed only if they are identified as significant contributors or routine water line flushing, landscape irrigation, diverted stream uncontaminated ground water infiltration (as defined in 40 CFR is pumped ground water, discharges from potable water sources, fl conditioning condensation, irrigation water, springs, water from drains, lawn watering, individual residential car washing, flows fit wetlands, dechlorinated swimming pool discharges, and street we emergency firefighting activities are excluded from the effective storm water and need only be addressed where they are identific pollutants to waters of the State of Nebraska). i. The permittee may also provide a list of other similar, occasid storm water discharges that will not be addressed as illicit di discharges must not be reasonably expected to be significant MS4, because of either the nature of the discharges or cond for allowing these discharges to your MS4. ii. You must document in your SWMP any local controls or con exempt non-storm water discharges that is determined to amounts of pollutants to your MS4. 	(i.e., illicit discharges) shall be f pollutants to your SMS4: flows, rising ground waters, 35.2005(20)), uncontaminated foundation drains, air crawl space pumps, footing form riparian habitats and vash water (discharges from e prohibition against non- ed as significant sources of onal, and incidental non- fischarges (these incidental . These non-storm water t sources of pollutants to the itions you have established ditions placed on additional wision prohibiting any be contributing significant
Responsible	EHS: Environmental Specialist	
Strategy	List of Additional Incidental Non-Stormwater Discharges:	
	Building flooding, recirculating water pump failures, other water overflows, drainage of sumps used to test water pumps, all of w the event of emergency.	line breaks, leaks, and hich are infrequent or occur in
	Local Controls:	

	All such discharges must be free of any sheen/film, color, turbidity, odors, or other unusual condition (e.g., off-gassing, foaming, etc.) and not likely to contain other pollutants.		
Measurable Goals	All Years: None.		
Report	Any changes to local controls.	No changes to Local Controls were made during calendar year 2018.	
Evaluation: Environmental Indicators of Effectiveness	Report all analytical sampling data generated from incidental discharges from the previous year, if analytical testing is conducted. Samples from incidental discharges were not collected in 2018, therefore there is no data to report.		
Reference	 BMP 3.06 Adjacent MS4 Cooperation (Part IV.B.2.a.2&3) 2. If illicit connections or illicit discharges are observed related to an adjacent MS4 coverter's municipal storm source system than the permittee must patify the other 		
	 operator within 48 hours of discovery or as soon as practicable. 3. If another operator notifies the permittee of an illegal connection or illicit discharge to the municipal separate storm sewer system then the permittee must follow the requirements specified in Part IV.B.2.a.1.b-d. 		
Responsible	EHS: Environmental Specialist		
Strategy	EHS will continue to maintain cooperative reporting and investigation practices with the City of Lincoln, as described in UNL's IDDE procedure.		
Measurable Goals	1. EHS will refer all suspected illicit discharges that originate up-gradient to UNL's SMS4 to the City of Lincoln within 48 hours of discovery.		
	2. EHS will investigate all reports of suspected illicit discharges received from the City of Lincoln, in accordance with UNL's IDDE investigation procedures.		
Report	Summarize number and nature of reports forwarded to the City and received from the City, including actions taken to eliminate illicit discharges originating on UNL's property.	No reports of potential illicit discharges were reported to UNL by the City. No reports of potential illicit discharges were reported to the City by UNL.	
Evaluation: Environmental Indicators of Effectiveness	N/A		
Reference	 BMP 3.07 Public Reporting of Non-Storm Water Discharges and Spills (Part IV.B.a.2.b.1-3) 1) The permittee must promote, publicize, and facilitate public reporting of illicit discharges or water quality impacts associated with discharges into or from MS4s. 		

	 The permittee must develop a written spill/dumping response procedure, and a flow chart or phone tree, or similar list for internal use, that shows the procedures for responding to notification regarding illicit discharges, the various responsible agencies and their contacts, and who would be involved in illicit discharge incidence response, even if it is a different entity other than the permittee. The permittee must conduct inspections in response to complaints and follow-up inspections as needed to ensure that corrective measures have been implemented by the responsible party to achieve and maintain compliance. 	
Responsible	EHS: Environmental Specialist	
Strategy	 EHS will continue to maintain the public reporting mechanism, Stormwater Reporter, on the EHS web page and promote reporting of potential illicit discharges by the campus community as part of the public education and outreach initiatives described in MCM 1 and 2. UNL's IDDE procedure contains spill/dumping response procedures and contact information for various departments and agencies that may need to be notified. UNL's IDDE procedure addresses tracking, investigation, and follow up on all reports of illicit discharges. 	
Measurable Goals	All Years:	
	EHS will respond to all reports of potential illicit discharges and retain documentation of the nature of the complaint and EHS follow-up actions, as described in UNL's IDDE procedures.	
Report	 Summary of public reports that EHS received during the prior year, nature of the discharge based on EHS investigation, and actions taken to eliminate the discharge. Report substantial changes made to UNL's IDDE procedures. 	Potential illicit discharge investigations are summarized in the report for BMP 3.04. No substantial changes were made to UNL's IDDE procedure.
Evaluation: Environmental Indicators of Effectiveness	Report analytical results of water quality sampling conducted in response to illicit discharge investigations, if conducted. Potential illicit discharge samples were not collected in 2018, therefore there is no data to	
Reference	 BMP 3.08 Illicit Discharge Education and Training (Part IV.B.2.c) 1) The permittee must develop and implement a training program for all municipal field staff, which, as part of their normal job responsibilities, may come into contact with or 	
	 otherwise observe an illicit discharge or illicit connection to the storm sewer system. Training program documents must be available for review by the permitting authority. 2) The SWMP must identify the frequency or implement a strategy for training staff identified in Part IV.B.2.c.1 above on the identification of an illicit discharge or connection. The permittee must document and maintain records of the training provided and the staff trained. 	

Responsible	EHS: Stormwater Specialist	
Strategy	1. EHS will implement a field staff illicit discharge detection training program.	
	2. Target Audience: appropriate employees that are beyond the scope of MCM 6 training, within EHS, Utilities, Landscape Services, and Building Maintenance Departments.	
	3. Annually, EHS will schedule a training session with each participating department to train employees who have not previously attended a training session (e.g., new hires). EHS will distribute refresher training materials on an annual basis to employees who have been previously trained. Refresher training format may be instructor-led, web-based, or through distribution of written materials.	
	4. EHS will maintain records of training to include: names, department and role/title of persons trained, dates of training, and summary of training materials.	
Measurable Goals	Year One:	
	1. Identify field staff that are required to participate in the training.	
	2. Deliver training to field staff.	
	All Subsequent Years:	
	1. Design refresher training materials and distribute to previously trained staff.	
	Deliver training to newly hired field staff.	
Report	 Number of newly trained staff, by department. Number of staff receiving refresher training, by department. 	During calendar year 2018, two hundred sixty-six (266) "field staff" received initial training, representing the following departments: Building Systems Maintenance, Utilities, Campus Recreation, Nebraska Unions, Facilities Planning and Construction, Housing, and Transportation Services. Refresher training is not due until 2019.
Evaluation: Environmental Indicators of Effectiveness	N/A	

Requirement: MCM 4 Construction Site Runoff Control		
Reference	BMP 4.01 Enforcement	
	(Part IV.B.3.b)	
	The permittee must, as part of the construction requirements and control measures, develop an enforcement plan or mechanism following the requirements of Parts III.A and B of this permit	
Responsible	EHS: Environmental Specialist	

Strategy & Measurable Goals			
See BMP 3.01. UNL's enforcement response plan addresses construction sites.			
Report	See BMP 3.01		
Evaluation: Environmental Indicators of Effectiveness	None		
Reference	BMP 4.02 Site Plan Review and Approval		
	(Part IV.B.3.c)		
	 The permittee must require each operator of a construction activity described in Part IV.B.3.a to prepare and submit for review an erosion and sediment control plan prior to the disturbance of land for the permittee's review and written authorization (operator must submit Part III.B.2 of the NDEQ NPDES General Permit Number NER 160000 for Storm Water Discharges from Construction Sites to Waters of the State of Nebraska). The permittee must implement site plan review procedures that meet the following minimum requirements: The permittee must not approve any erosion and sediment control plan unless it contains appropriate site-specific construction site control measures that meets the minimum local requirements for storm water protection of construction activity. The permittee must use qualified individuals, knowledgeable in the technical review of erosion and sediment control plan using a checklist or similar process. The permittee must and not prove that is continually updated of all active public and private construction sites authorized by the permittee within the MS4 boundary. 		
Responsible	EHS: Environmental Specialist		
Strategy	UNL General Specifications for construction require contractors to submit an Erosion and Sediment Control Plan (ESCP) for review and approval by EHS prior to commencing earth disturbing activities. At a minimum, EHS staff reviewing and approving ESCPs will have a bachelor's degree, one year related experience, and successfully completed a NDOR Erosion and Sediment Control Inspector course or equivalent. Reviews are conducted and documented in accordance with written procedures. A current inventory of permitted construction sites is maintained by EHS.		
Measurable Goals	All Years: EHS will have reviewed and approved ESCPs for 100% of all construction sites subject to NDEQ's Construction General Permit initiated during the previous year, and will have review documentation on file for every site		
Report	Percentage of new construction sites subject to NPDES Construction General Permit requirements for which EHS reviewed and	EHS reviewed and approved the Erosion and Sediment Control Plan for all (100%) construction sites subject to NDEQ's	

Evaluation: Environmental Indicators of Effectiveness	approved an erosion and sediment control plan during the prior year. N/A	Construction General Permit that were initiated in 2018 (Loop Road, East Campus Recreation Courts, Gass Field Turf Replacement, and Gymnastics Facility).
Reference	 BMP 4.03 Construction Site Inspection and Enforcement (Part IV.B.3.d) 1. The permittee must inspect public and private construction activity according to local procedures with a strategy documented in the SWMP. 2. The permittee must provide trained and qualified inspectors for municipal inspections. The permittee must also develop and implement written procedures outlining the local inspection and enforcement procedures. Inspections of construction permit by requesting a copy of any application or Notice of Intent (NOI) or other relevant application form during initial inspections; (b) Review the applicable erosion and sediment control plan and conduct a thorough site inspection to determine if control measures have been selected, installed, implemented, and maintained according to the plan; (c) Assess compliance with the permittee's ordinances and permits related to storm water runoff, including the implementation and maintenance of designated MCM; (d) Visually observe and record non-storm water runoff, and the receiving stream to determine if sediment has moved offsite; (e) Provide a written or electronic inspection report generated from findings in the field. 3. The permittee must track the number of inspections for the inventoried construction sites throughout the reporting period. Inspection findings must be documented and maintained for review by the permitting authority. 4. Based on site inspection findings, the permittee must take all necessary follow-up actions (i.e., re-inspection, enforcement) to ensure compliance in accordance with the permittee's Enforcement Response Plan required in Part III.B. These follow-up and enforcement actions must be tracked and maintained for review by the permitting 	
Responsible	EHS: Environmental Specialist	
Strategy	Qualified EHS staff (as described in BMP 4.02) w following frequency: (a) At least 2 (two) times a year; (b) Upon report of a concern;	vill inspect permitted construction sites at the

	(c) When needed to verify correction of deficiencies identified during a previous inspection.	
	Inspections will be conducted in accordance with written procedures.	
	Inspection reports will be documented and transmitted to the General Contractor and UNL Project Manager. Contractors will be required to submit a written response describing actions taken to correct deficiencies identified during the audit process. As necessary, EHS will implement UNL's Enforcement Response Plan to correct identified deficiencies	
Measurable Goals	All Years: EHS staff will adhere to the described frequencies of inspection and existing written procedures for conducting construction site inspections, including record keeping, follow-up, and enforcement actions.	
Report	 Percentage of permitted sites that EHS inspected at the targeted frequency. Summary of substantial changes made to the written construction site inspection procedures during the prior year. 	 During 2018, all (100%) of the permitted construction sites were inspected by EHS at the targeted frequency described in the strategy. In addition to the sites identified in 3.01, the following permitted sites were inspected: Nebraska Veterinary Diagnostic Center (NOT filed 5/14/18), City Campus Thermal Energy (NOT filed 2/12/18), and University Health Center/College of Nursing (NOT filed 6/18/18). No substantial changes were made to the construction site inspection procedures in 2018.
Evaluation: Environmental Indicators of Effectiveness	NA	
Reference	 BMP 4.04 Staff Training (Part IV.B.3.e) e. The permittee must ensure that the staff whose primary job duties are related to implementing the construction storm water program, including permitting, plan review, construction site inspections, and enforcement, are trained to conduct these activities. Training must be made available, sponsored, or required in a strategy established in the SWMP for erosion and sediment control/storm water inspectors, plan reviewers, and third-party inspectors and plan reviewers. 	
Responsible	EHS: Environmental Specialist	
Strategy	At a minimum, assigned staff will have a bachelor's degree, one year related experience, and have successfully completed a NDOR Erosion and Sediment Control Inspector course or equivalent. In addition, assigned staff will review UNL's SWMP and review and adhere to associated written procedures.	
Measurable Goals	EHS will maintain training records for all persons authorized to implement BMP 4.02 or 4.03	

Report	Names of staff persons assigned responsibilities under BMP 4.02 and 4.03 and a summary of their qualifications.	The following individuals were assigned responsibilities under BMP 4.02 or 4.03: Brenda Osthus, Dean Brame, Bruce Haley, Nicholas Jenkins. See Appendix A for a summary of each person's qualifications.
Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	 BMP 4.05 Construction Site Operator Education (Part IV.B.3.f.1) 1. The permittee must make publically available educational materials to construction site operators in a strategy outlined in the SWMP. (a) The permittee must either provide information on existing training opportunities or develop new training for construction operators on control measure selection, installation, implementation, and maintenance as well as overall program compliance. (b) The permittee must develop or utilize existing outreach tools (i.e., brochures, posters, website, plan notes, manuals etc.) aimed at educating construction operators on installation, implementation and maintenance of storm water controls, as well as overall program compliance. (c) The permittee must make available appropriate outreach materials to all construction operators who will be disturbing land within the MS4 boundary. (d) The permittee must provide information on the installation and maintenance of controls on the permittee's website or made publically accessible by whichever methods and procedures are determined appropriate by the permittee and approved 	
Responsible	EHS: Environmental Specialist	
Strategy	 EHS will continue to participate in pre-construction meetings with General Contractors to discuss their obligations under NDEQ's NPDES Construction General Permit and UNL's SMS4 NPDES permit. EHS will provide instruction on where to access educational and informational materials. EHS will make available existing stormwater manuals, brochures and other education materials aimed at education and outreach of construction best management practices on the EHS website and inform contractors of how to access information using various means, such as e-Builder communications, Contract Specifications, and verbal instruction. At present, this includes links to federal, state, and local agencies, as well as professional organizations. Information links include general awareness. As part of the audits discussed in BMP 4.03 (construction site inspections), EHS will 	
	reterence appropriate educational materials deficiencies	s to assist contractors to correct identified
Measurable Goals	All Years of the Permit:	

	1. Annually, EHS will review/ enhance the materials made available for the purpose of General Contractor education and outreach.	
	2. EHS will participate in a pre-construction meeting with every General Contractor for newly permitted sites	
Report	 Summary of changes made to educational and outreach materials related to construction best management practices. Percentage of newly permitted sites where EHS held a pre-construction meeting with the General Contractor. There were four newly permitted construction sites at UNL in 2018 (EC Courts, Gass Practice Field, Loop Road, and Gymnastics). While EHS did not hold a pre-construction meeting with the General Contractor at any of these sites, on-site inspections and discussions were conducted at or shortly after ground-breaking. 	
Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	 BMP 4.06 Public Involvement (Part IV.B.3.f.2) Public Involvement – The permittee must have procedures for tracking complaints and submitting information by the public regarding construction projects and must also provide the permittee's response if a response is given. 	
Responsible	EHS: Environmental Specialist	
Strategy	 EHS will continue to maintain the public reporting mechanism, Stormwater Reporter, on the EHS web page and promote reporting of potential complaints by the campus community as part of the public education and outreach initiatives described in MCM 1 and 2. EHS will track, investigate and follow up on all public complaints regarding construction projects, in accordance with UNL's written construction site inspection procedures discussed in BMP 4.03 	
Measurable Goals	All Years	
	 EHS will maintain our existing procedure for reporting suspected illicit discharges including specific concerns related to construction projects (<u>http://ehs.unl.edu/sop/s-</u> stormwater IDDE.pdf). This procedure is publicly available on the EHS website. 	
	2. EHS will respond to 100% of concerns reported by the public and retain documentation of the nature of the complaint and EHS follow-up actions (which will be summarized in the annual report).	

	3. EHS will maintain our on-line public reporting mechanism (<i>Stormwater Reporter</i>) on the EHS web page	
Report	Summary of each complaint received and actions taken to resolve each complaint.	No public complaints were received relative to permitted construction sites in 2018.
Evaluation: Environmental Indicators of Effectiveness	Report any water quality sampling done in response of the second	onse to public reporting.

Requirement: MCM 5 Post Construction Management Program		
Reference	BMP 5.01 Site Performance Standards	
	(Part IV.B.4.b)	
	 Within the permit term, new permittees must adopt local post construction storm water standards for designing, installing, implementing, and maintaining storm water control measures which include BMPs that infiltrate, evapotranspire, harvest, and/or use storm water discharges. Existing permittees must review their current ordinances to ensure compliance with the permit in one year. 	
	2) Within the permit term, new permittees must adopt local storm water discharge design standards that consider parameters such as site discharge volume, rate, duration, and frequency for new development and redevelopment sites. The local storm water discharge design standards must describe the site design strategies, control measures, and other practices deemed necessary by the permittee to protect pre-development hydrology to the maximum extent practicable. Existing permittees must review their current ordinances to ensure compliance with the permit in one year.	
Responsible	EHS: Environmental Specialist	
Strategy	EHS will identify and assemble a group of primary stakeholders (e.g., Facilities Planning and Construction, Environmental Health and Safety, Landscape Services, Utilities, Campus Planning, etc.) to review the current water quality and water quantity standards contained in the UNL Design Guidelines.	
Measurable Goals	Year One : UNL will review existing performance standards to determine if changes are appropriate or necessary.	
	Ongoing All Years: Maintain site performance standards.	
Report	Report any changes to performance standards made during the preceding year.	Stakeholders met in September 2018, reviewed UNL's Design Guidelines for water quality and water quantity standards and decided that no changes are necessary at this time (other than language changes to enhance clarity).
Evaluation: Environmental	NA	

Indicators of Effectiveness		
Reference	 BMP 5.02 Post-Construction Site Plan Review (Part IV.B.4.c.1.a) 1. To ensure that all applicable new development and redeveloped sites conform to the performance standards required in Part IV.B.4.b the permittee must conduct project review, approval, and enforcement procedures that include: (a) Procedures for the site plan review and approval process(es) and modification when changes to an approved plan are desired. 	
Responsible	EHS: Environmental Specialist	
Strategy	 EHS and FPC will continue to collaboratively review all designs for projects that are subject to UNL's storm water standards, including the stormwater calculations submitted by the Architect at the design phase. Reviews will be documented in UNL's current construction tracking/recordkeeping system(s), as described in EHS's Internal Operating Procedure, <i>BMP 5.02 Post-</i> <i>Construction Plan Review and Approval</i> 	
Measurable Goals	Ongoing All Years: Conduct and document the site plan reviews for all (100%) of applicable construction projects.	
Report	All Years: Percentage of applicable construction projects initiated in the prior year that were reviewed and approved.	 No new construction projects of 0.5 to < 1.0 acre were initiated in 2018. Four construction projects of 1.0 acre or more were initiated in 2018. All (100%) of these projects were reviewed for conformance to UNL's design guidelines for water quality and quantity and approved. Gass field: Simple turf replacement project. Not applicable. East Campus Courts: Met or exceeded water quality and water quality goals. Gymnastics: Met water quality goal; design waiver for water quantity due to site constraints and area waiver granted by City for Innovation Campus area. Loop Road: Met or exceeded water quality goals.
Evaluation: Environmental	none	

Indicators of Effectiveness		
Reference	 BMP 5.03 As-Builts (Part IV.B.4.c.1.b) (b) A requirement for submittal of "as-built" certifications in a schedule defined in the SWMP and approved by the NDEQ. 	
Responsible	FPC: Project Manager EHS: Environmental Specialist	
Strategy	UNL Project Managers will ensure that As-Builts are submitted by the Architect, in accordance with existing contract provisions and as soon as feasible after substantial completion but no later than the end of the Contractor one-year warranty period. EHS will monitor construction documents to ensure that "As Builts" are on-file, and communicate deficiencies to the Project Manager as needed.	
Measurable Goals	All Years of Permit: 100% of applicable development sites will have relevant construction documents related to post-construction structural BMPs on file, including deviations from or modifications to approved designs.	
Report	All Years of Permit: Report percentage of applicable projects completed within the prior year for which complete as-built information is on file.	"As builts" are on file for all sites completed in 2018 that were subject to UNL's stormwater quality and quantity standards (Thermal Energy, EC Parking Lot, EC Courts, University Health Center/College of Nursing, Loop Road, and Nebraska Vet Diagnostic Center).
Evaluation: Environmental Indicators of Effectiveness	none	
Reference	 BMP 5.04 Installation Inspections Part IV.B.4.d.1: 1) Procedures must be established to assure all structural storm water control measures installed and implemented meet the approved plans and are maintained in perpetuity. 	
Responsible	FPC: Project Managers	
	EHS: Environmental Specialist	
Strategy	 Inspection of installation/implementation of storm water controls A/E Inspection: Existing UNL A/E Agreement provisions require periodic and final inspection by the Architect to ensure that all work conforms to Construction Documents. Issuance of a 	

	final certificate of completion is also contingent upon the Architects determination that the work complies with approved design parameters.		
	2. Maintained in perpetuity		
	UNL Design Guidelines state: "Selected BMPs shall be specified in final design documents, and final construction documents shall contain schedules and procedures for inspection and maintenance of the BMPs." This schedule of maintenance activities will be uploaded into the appropriate department's (e.g., Landscape Services, Utility Services) work order system so that assets are maintained into perpetuity. Maintenance inspections are carried out through BMP 6.09		
Measurable Goals	All Years: 100% of all newly-constructed structural post-construction BMPs at sites subject to post-construction design criteria will be inspected by the A/E.		
Report	All Years: Percent of construction sites with new post- construction structural BMPs completed in the prior year that were inspected by the A/E and verified as meeting design criteria.	All (100%) of the sites with post- construction structural BMPs completed in 2018 were inspected by the A/E: University Health Center/College of Nursing, Loop Road, Nebraska Veterinary Diagnostic Center (NVDC), and City Campus Thermal Energy Storage. All met design criteria, except the bioretention basin at NVDC. Installation deficiencies will be corrected by the contractor in 2019.	
Evaluation: Environmental Indicators of Effectiveness	None		
Reference	 BMP 5.05 Public Reporting (Part IV.B.4.d.2) 2) The permittee must establish procedures to respond to complaints and notifications to ensure the long-term maintenance of structural controls. 		
Responsible	EHS: Environmental Specialist		
Strategy	EHS will track, investigate and follow up on all public complaints regarding post- construction BMP maintenance. Public reporting is encouraged through the mechanisms described in MCM 1 & 2.		
Measurable Goals	 All Years: 1. EHS will continue to maintain the public reporting mechanism, Stormwater Reporter, on the EHS web page. 2. EHS will maintain our procedure for reporting suspected maintenance issues http://ehs.unl.edu/sop/s-stormwater_IDDE.pdf). This procedure is publicly available on the EHS website. 		

	3. EHS will respond to all public complaints and s EHS follow-up actions in the annual report.	ummarize the nature of each complaint and
Report	 All Years: 1. Number and summary of complaints received and follow-up actions. 2. Summary of any changes to related procedures resulting from a complaint. 	EHS did not receive any complaints regarding post-construction BMP maintenance in calendar year 2018.
Evaluation: Environmental Indicators of Effectiveness	Report any water quality sampling done in respon Not applicable	nse to public reporting.
Reference	 (Part IV.B.4.e) 1. The permittee must maintain a current inventory of certified post-construction structural storm water control measures installed and implemented at new development and redeveloped sites, including both public and private sector sites located within the permit area. 2. A survey or number of new post-construction BMPs sorted by type (bio-retention, catch basins, etc.) must be included in the annual report. 3. Based on inspections conducted under Part IV.B.4.f, the permittee must update the inventory as appropriate where changes occur in property ownership or the specific control measures implemented at the site. This inventory must be maintained and available for review by the permitting authority. 	
Responsible	Utilities: GIS Project Manager	
Strategy	New post-construction storm water controls at sites subject to UNL's Design Guidelines storm water standards will be inventoried and tracked using the campus GIS system, including details on the type of BMP.	
Measurable Goals	All Years: 100% of all post-construction structural BMPs subject to UNL Design Guidelines installed after the effective date of UNL's coverage under the SMS4 General NPDES permit are inventoried in UNL's GIS system, including details of type.	
Report	 All Years: 1. Percentage of new development and redevelopment sites completed during the previous year for which permanent structural BMPs are inventoried in UNL's GIS system. 	 100% of sites with permanent structural BMPs completed in 2018 are inventoried in UNL's GIS. The following permanent structural BMPs were completed in 2018.

	 Number of post-construction permanent BMPs at new development and redevelopment sites completed during the previous year, sorted by type. 	 a. Student Health Center/College of Nursing: sub-surface detention system (Storm Tech) b. Loop Road: bioretention planters (10) and permeable pavers (9 sections between planters) c. City Campus Thermal Energy Storage: 1 bioretention basin. d. EC Courts: Turf Infiltration Note: Several features were included in the Nebraska Veterinary Diagnostic Center, which was substantially complete in 2017; however, improvements to the bioretention basin and numerous small rain garden areas continued in 2018, and will extend into 2019.
Evaluation: Environmental Indicators of Effectiveness	None	
Reference	 BMP 5.07 Post-Construction Storm Water Inspection and Enforcement (Part IV.B.4.f.) 1) The permittee must conduct post-construction inspections for completed project sites covered under Part IV.B.4 to verify that performance standards have been met in a strategy defined in the SWMP. A description of inspection and reporting procedures be developed and kept of file for review. 2) The permittee must document and maintain records of inspection findings and any enforcement actions taken and make them available for review by the permitting authority. 	
Responsible	EHS: Environmental Specialist	
Strategy	UNL Inspection: UNL will augment the A/E inspect relevant and appropriate UNL personnel (e.g., Ut near the time of substantial completion of the pr been constructed as designed. This inspection w Internal Operating Procedures, <i>BMP 5.07 Post-Co</i> Enforcement: Any control that does not conform the final punch list of work that must be corrected implement its Enforcement Response Plan to ach	ction in BMP 5.04 with an inspection by ilities, Landscape Architect, EHS etc.) at or oject to verify post-construction BMPs have ill be conducted in accordance with EHS <i>onstruction Inspection and Enforcement</i> . to design requirements will be added to ed by the contractor. As needed, UNL will nieve design performance standards.
Measurable Goals	All Years: 100% of all newly-constructed structure to post-construction design criteria will be inspective remedy deficiencies.	ral post-construction BMPs at sites subject ted by UNL staff, and action taken to

Report	All Years: Percent of construction sites with new post-construction structural BMPs completed in the prior year that were inspected by UNL and the percentage found to conform to design standards.	As EHS has learned since drafting this SWMP, UNL personnel collaborate with the A/E to generate a "punch list" for every project nearing completion. Therefore, this BMP is redundant to BMP 5.04 and will therefore be removed from UNL's SWMP.
Evaluation: Environmental Indicators of Effectiveness	None	

Requirement: MCM 6 Pollution Prevention and Good Housekeeping			
Reference	BMP 6.01 Mapping and Inventory (Part IV.B.5.a)		
	 a. Municipal Facility and Control Inventory 1) The permittee must develop and maintain an inventory of municipally-owned or operated facilities and storm water controls that is available for review by the permitting authority. 2) The permittee must identify on a map where the municipally-owned or operated facilities are located within the MS4. The map must be maintained and updated regularly and be available for review by the permitting authority. 		
Responsible	Utility Services: GIS Project Manager		
Strategy	UNL's GIS Project Manager is informed of construction projects on the UNL campus and ensures that campus GIS maps are updated to reflect changes.		
Measurable Goals	All Years: Update maps as needed in response to campus changes.		
Report	The GIS map will be available for review by the permitting authority upon request. No reporting.NA. No Reporting Requirement. Regardless, GIS maps are up-to-date.		
Evaluation: Environmental Indicators of Effectiveness	N/A		
Reference	 BMP 6.02 Municipally-Owned or Operated Facility Assessment (Part IV.B.5.b) 1) The permittee must maintain current assessments of all municipally-owned or operated facilities identified in Part IV.B.5.a. The strategy and description of the assessment procedure 		
Evaluation: Environmental Indicators of Effectiveness Reference	N/A BMP 6.02 Municipally-Owned or Operated Facility Assessment (Part IV.B.5.b) 1) The permittee must maintain current assessments of all municipally-owned or operated facilities identified in Part IV.B.5.a. The strategy and description of the assessment procedure must be included in the annual report.		

Responsible Strategy	 2) The permittee must identify "high-priority" facilities that have a high potential to generate storm water pollutants. High priority facilities are facilities which have the high potential to generate storm water pollutants. A description of the evaluation criteria for determining "high-priority" must be included in the annual report. 3) The permittee must document the results of the assessments and maintain copies of all site evaluation documents used to conduct the assessment. EHS: Environmental Specialist UNL's criteria for designating a facility as "high priority" is summarized in UNL's Runoff Control. 	
	Plan. Final designation as "high priority" is based on known activities and final visual inspection of the site by EHS.	
Measurable Goals	Ongoing all years : UNL will conduct and document assessments as new facilities are built or established.	
Report	 Changes to EHS's assessment strategy to identify "high priority" facilities made during the reporting period will be included in the annual report. A list of newly identified "high priority" facilities made during the reporting period will be included in the annual report. No changes were made to UNL's assessment strategy for designating "high priority" facilities in 2018. UNL's assessment strategy is described in UNL's Runoff Control Plan, an excerpt of which is included in Appendix B. The full plan is available at <u>https://ehs.unl.edu/Runoff Control Plan 2017-12.pdf</u>. No new high priority facilities were established in 2018. 	
Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	 BMP 6.03 Runoff Control Plans (Part IV.B.5.c) 1) The permittee must develop and maintain facility-specific Runoff Control Plans for "high priority" facilities to control the contribution of pollution in storm water runoff. (a) For each "high priority" facility or operation identified in Part IV.B.5.b, the permittee must develop or maintain a site-specific RCP that identifies storm water control measures, inspection strategy, and visual monitoring procedures. (b) A copy of the facility-specific Runoff Control Plan must be maintained and be available for review by the permitting authority. The RCP must be kept on-site at each of the municipally owned or operated facilities' offices for which it was completed. The RCP must be updated as necessary. 2) All "high priority" municipally-owned or operated facility Runoff Control Plans must include provisions for general good housekeeping practices, storage of de-icing materials, fueling 	
Responsible	EHS: Environmental Specialist	

Strategy	UNL has developed a written Runoff Control Plan that covers all high priority facilities at UNL. A copy of this plan will be on file at each location.	
Measurable Goals	Year One: EHS will ensure that a copy of UNL's RCP is on file at each high priority facility.	
	All Subsequent Years: EHS will review newly identified high priority facilities	v the RCP for needed changes and place a copy of the plan at s as they are built or established.
Report	 Year One: Percentage of high priority facilities that have a RCP on file at their location. All Subsequent Years: Summary of newly built or established high priority facilities during the previous year and changes made to the RCP related to newly identified facilities. 	UNL's Runoff Control Plan was distributed to the Manager of each High Risk Facility at the time of initial training (BMP 3.08; BMP 6.07; BMP 6.10). The Runoff Control Plan was reviewed and revised on January 8, 2019 and revised copies were distributed to Managers of high risk facilities. No new high risk facilities were identified at UNL in 2018. In addition, EHS inspected every high risk facility for adherence to the UNL Runoff Control Plan and other good housekeeping/pollution prevention measures (copies of inspection records are on file).
Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	 BMP 6.04 Inlet Maintenance (Part IV.B.5.d.1.a&e) 1) MS4 storm water inlets and catch basin maintenance (a) The permittee must develop a strategy to inspect and clean storm water inlets as needed in the SWMP. The results of the implementation of this strategy shall be included in the annual report. (e) The permittee must develop a procedure to dewater and dispose of materials extracted from catch basins so that water removed during the catch basin cleaning process and waste material will not reenter the MS4. 	
Responsible	Utilities Services: Utility Plant Manager EHS: Environmental Specialist	
Strategy	 Utilities Services and/or EHS staff will inspect and clean UNL owned inlets and catch basins under the following strategy: Catch basins will be inspected annually and cleaned as needed. Inlets within 100' down gradient from construction sites 1 acre or greater in size will be inspected and cleaned as necessary prior to filing of a NOT for the site and following substantial stabilization of the site. Inlets specifically associated with an illicit discharge during the previous year will be inspected the subsequent year to verify that the condition leading to the illicit discharge no 	

	 Inlets that have required maintenance during the previous year for clogging or other discharge malfunction will be inspected during the subsequent year to verify that the conditions leading to the malfunction no longer exist. 	
	In collaboration with UNL's Utilities Department, EHS will establish a written procedure for inspection and cleaning of inlets and basins and inspectors will be trained to the SOP. The SOP will include evaluation of physical condition; indicators of pollutants (trash, debris, sanitary sewage, oil sheen, discoloration, etc); and management of recovered debris/material.	
Measurable Goals	Year one: Establish an inventory of all inlets and basins requiring inspection. Establish the inlet inspection and maintenance procedure and train applicable staff. Verify that inspection and maintenance activities are captured in the appropriate Department's work order system, or otherwise documented.	
	document inspection of each.	
Report	 All Years of Permit: Percentage of inlets/basins scheduled for inspection with completed inspections. Number of basins/inlets inspected where corrective action was needed and a summary of actions taken. 	UNL Utility Services has not identified any underground structures on City or East campus that would be classified as catch basins, described in item 1 of the strategy above, therefore, no inspections are needed at this time. Utility Services will continue to monitor newly installed structures and inventory any that are classified as catch basins for future inspection. Inlets described in items 2-4 of the strategy above have been inspected and work orders have been or will be established as needed to ensure proper operation/sanitation. During 2018, five distinct areas were reported with inlet issues, all were related to needed repairs and were resolved.
Evaluation: Environmental Indicators of Effectiveness	Report any analytical testing done in response to inlet clean-outs. No analytical testing was conducted.	
Reference	BMP 6.05 Inlet Awareness Labels(Part IV.B.5.d.1.b)b. The permittee must have a plan to label inlets with a legible storm water awareness message.	
Responsible	EHS: Environmental Specialist Utilities: Utility Plant Manager	
Strategy	EHS will meet with the campus stakeholder group (described in MCM 3 & 5) to evaluate/determine:	
	a) Current design guidelines regarding inlet labels and address any changes deemed necessary to be applied to future projects.	
	 b) Criteria for identifying existing, un-labeled, high-priority inlets and identifying funding sources and timelines for retrofitting these with inlet awareness labels/messages. 	

Measurable Goals	Year One:	
	a) Establish acceptable means and methods for future inlet labeling and update UNL's Design Guidelines accordingly.	
	b) Establish criteria for designating existing "high risk" inlets. Inventory existing "high risk" inlets and establish a funding source and schedule for labeling.	
	All Subsequent Years: Label drains as applicable by Design Guidelines or high priority inlet schedule.	
Report	Year One: Provide a summary of inlet labeling design guidelines, and criteria used to identify existing high-priority inlets. Subsequent Years: Provide a summary of changes made to the design guidelines, and status of progress in labeling of existing high-priority inlets.	Stakeholders met in September 2018. Current design standards specify stamped concrete inlet labeling for newly installed curb inlets. Existing high priority curb inlets were determined to be those that are located in surface lot resident student parking and those surface lots in the immediate vicinity of Memorial Stadium for the following reasons: 1) opportunity to reach large numbers of people for educational awareness; 2) large density of persons; 3) highest likelihood of threat for do-it- yourself maintenance on vehicles and vehicles with unrepaired fluid leaks. Establishing a schedule and funding source will occur in 2019.
Evaluation: Environmental Indicators of Effectiveness		
Reference	 BMP 6.06 Open Drainage Maintenance (Part IV.B.5.d.1.c-d) (c) The permittee must visually monitor permittee-owned open channels and other drainage structures for debris and evidence of ongoing dumping in a strategy defined in the SWMP. (d) The permittee shall include a plan for the removal of trash and debris from open channels and other drainage structures. The plan shall be detailed in the SWMP and approved by the NDEQ. The permittee must document drainage structure maintenance activity in a log that is to be made available for review by the permitting authority upon request. 	
Responsible	Landscape Services: Assistant Director, Landscape Operations	
	EHS: Environmental Specialist	
Strategy	Landscape Services will visually monitor all safely accessible UNL owned open channels annually for debris and structural integrity. All waste material will be containerized and disposed of as refuse at a permitted municipal waste landfill, unless meeting criteria of regulated waste, then disposed via EHS in accordance with	
	local, state, and federal rules and regulations as applicable.	

	Any structural maintenance activity will be logged or forwarded to the appropriate agency, if not within the responsibility/authority of UNL.		
	All inspection records will be maintained.		
Measurable Goals	All Years: Inspect open drainage channels annually, and maintain a log of associated maintenance activity.		
Report	All Years: Percentage of scheduled vs. completed inspections.	All (100%) UNL-owned/maintained open channels on City and East Campus were inspected in 2018. All (100%) open channels on Innovation Campus were inspected in early 2019.	
Evaluation: Environmental Indicators of Effectiveness	Report any analytical results taken No analytical samples were taken.		
Reference	BMP 6.07 Municipal Activities and Operations		
	 (Part IV.B.5.d.2) (a) The permittee must implement a set of pollution prevention measures that, when applied during municipal O&M activities, will reduce the discharge of pollutants in storm water. (b) All pollution prevention measures implemented at municipal facilities must be visually inspected in a strategy defined in the SWMP to ensure they are working properly; a log of inspections must be maintained and made available for review by the permitting authority upon request. 		
Responsible	EHS: Environmental Specialist		
Strategy	Groups of employees that work within O&M at UNL such as plumbers, painters, certified pesticide applicators, etc., not previously identified under a Runoff Control Plan, that could potentially impact stormwater during the course of their work activities will follow pollution prevention measures to prevent negative impacts to stormwater. These pollution prevention measures are detailed in UNL's RCP and the employees subject to this BMP will receive training on UNL's RCP. EHS will inspect each group annually to ensure that they are adhering to pollution prevention		
	measures and maintain associated documentation.		
Measurable Goals	Year One:		
	EHS will identify and train groups of	affected employees.	
	All Subsequent Years:		
	1. EHS will inspect affected O&M g	roups annually	
	2. EHS WIII review UNL'S KCP annua	materials annually to affected employees, and refresher	
	training will include any changes ma	de to UNL's RCP.	

Report	 List of inspected groups, and groups of employees receiving training. Significant changes to UNL's RCP. 	Also see the report for BMP 3.08, many of the people identified there are also covered under this BMP. Employees receiving training represented the following departments: Building Systems Maintenance, Utilities, Campus Recreation, Nebraska Unions, Facilities Planning & Construction, Housing, and Transportation Services. No significant changes were made to UNL's Runoff Control Plan in 2018.
Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	BMP 6.08 Street Sweeping	
	(Part IV.5.d.3)	
	(a) The permittee must sweep municipally-owned and maintained streets, roads, and public parking lots in accordance with a strategy defined in the SWMP.	
	(b) The permittee must provide a procedure to dewater and dispose of street sweeper waste material. This procedure must ensure that water and material will not reenter the MS4.	
Responsible	Landscape Services: Assistant Director of Landscape Operations	
	Parking Services: Director	
Strategy	Landscape Services will sweep UNL owned streets and surface parking lots annually in the spring. UNL street sweepers do not utilize liquid in the operation. Streets and surface lots are visually monitored throughout the rest of the year and cleaned as needed.	
	All waste material from street sweepers are collected at a designated area at City and East Campus Landscape Services where it is not able to reenter the MS4 system and then properly disposed at a permitted municipal waste landfill.	
	Parking Services cleans all parking garages annually in the summer, with steamer equipment that recovers all liquid. Recovered liquid is disposed in the sanitary sewer. Filtered sediment is collected and accumulated in a manner not exposed to precipitation and disposed of at a permitted municipal waste landfill.	
Measurable Goals	All Years: Clean streets and parking l	lots at frequency defined.
Report	Summarize any changes to schedule or means of disposal.	No changes were made to the schedule or means of disposal for waste material generated from street sweeping or garage cleaning. Open parking lots and streets were swept/cleaned at the targeted frequency. However, parking garages were not cleaned in calendar year 2018 due to staffing issues.

Evaluation: Environmental Indicators of Effectiveness	None	
Reference	BMP 6.09 Maintenance of Municipally-Owned and/or Maintained Structural Storm Water Controls	
	(Part IV.5.d.4)	
	(b) The permittee must inspect an structural storm water controls	d maintain if necessary municipally-owned or maintained s in accordance with a frequency provided in the SWMP.
	(c) The permittee must also maintain municipally-owned or maintained green infrastructure practices through regularly scheduled maintenance activities.	
Responsible	Utilities Service: Utility Plant Manager	
	Landscape Services: Assistant Director of Landscape Operations	
	EHS: Environmental Specialist	
Strategy	 (a) Utility Services will inspect and perform maintenance, if necessary, on all underground stormwater structural controls at least annually or at a frequency recommended by the manufacturer for proprietary systems. 	
	(b) Landscape Services will inspect all above ground green infrastructure and structural storm water controls at least annually.	
Measurable Goals	All Years: All structural and green infrastructure controls will be inspected and maintained at the required frequency.	
Report	Percentage of Preventative Maintenance inspections conducted on stormwater controls.	Eighteen (18) sites on City and East Campuses feature post- construction structural controls (PCSWC). PCSWCs were inspected at 15 of the 18 sites in 2018. The remaining 4 sites will be inspected during the first half of 2019.
Evaluation: Environmental Indicators of Effectiveness	N/A	
Reference	 BMP 6.10 Training and Education (Part IV.5.e) The permittee must develop and implement an employee training program for employees involved in implementing pollution prevention and good housekeeping practices in this part. The permittee must also identify and track all personnel requiring training and records must be maintained. The training program and target audience must be described in the SWMP. 	

Responsible	EHS: Environmental Specialist	
Strategy	EHS will implement its RCP training programs and include affected employees of "high risk" facilities, as well as O&M employees described in BMP 6.07.	
	In collaboration with management of these departments/facilities, EHS will specifically identify affected employees and update the roster of affected employees annually.	
	Affected employees will receive full RCP training once, and will be provided with refresher training materials annually.	
	EHS will maintain training records for individual employees and records of the materials used for initial and refresher training.	
Measurable Goals	Year One: EHS will identify and delive	ver training to affected employees.
	All Subsequent Years:	
	 EHS will update the roster of affected employees at least annually, and deliver full RCP training to newly identified affected employees. 	
	2. Refresher training materials will be provided to previously trained employees at least annually.	
	3. EHS will review training materials at least annually and update as needed.	
	EHS will maintain records indicating the names of employees receiving training, a summary of the content of the training, date of training, and name of the person conducting the training or other method of delivery.	
Report	Year One: Status of completion of training materials. All Subsequent Years: Number of employees, by department, completing training during the reporting period.	As reported for BMP 3.08, two hundred sixty-six (266) UNL staff received initial training in 2018, representing the following departments: Building Systems Maintenance, Utilities, Campus Recreation, Nebraska Unions, Facilities Planning and Construction, Housing, and Transportation Services. Refresher training is not due until 2019. This is a combination of "field staff" (as described in BMP 3.08) and employees at "high risk facilities."
Evaluation: Environmental Indicators of Effectiveness		
Reference	BMP 6.11 Contractor Requirements and Oversight (Part IV.5.f)	
	Any contractors hired by the permittee to perform municipal maintenance activities that have the potential to impact storm water quality must be contractually required and overseen by the permittee to ensure compliance with all of the storm water control measures, good housekeeping practices, and facility-specific Runoff Control Plans described above. The contract must also state who is responsible for overall management and implementation of your pollution prevention/good housekeeping program and, if different, who is responsible for each of the BMPs identified for this program.	

Responsible	Leadership of the UNL department issuing the contract for work by the contactor	
Strategy	UNL includes language in contracts for municipal maintenance activities obligating contractors to comply with storm water control measures, good housekeeping practices, and runoff control plans. UNL employees are instructed to notify EHS of any condition that is or could result in an illicit discharge.	
Measurable Goals	No illicit discharges will occur related to municipal maintenance activities conducted by outside contractors.	
Report	Summary of nature of all illicit discharges attributed to municipal maintenance activities conducted by outside contractors during the reporting period.	No illicit discharges associated with municipal maintenance activities conducted by an outside contractor were reported or discovered by EHS during calendar year 2018.
Evaluation: Environmental Indicators of Effectiveness	None	

Appendix A UNL EHS Staff Summaries of Qualifications

Brenda Osthus

- I. Educational Background
 - a. B.S. Medical Technology, Northwest Missouri State University, 1986
 - b. Masters of Legal Studies, University of Nebraska-Lincoln, 1995
- II. Professional Experience
 - a. Chemist III, State of Nebraska Department of Environmental Quality, 1987-1992
 - b. Hazardous Materials Specialist, University of Nebraska-Lincoln, Department of Environmental Health and Safety, 1992-1998
 - c. Director, University of Nebraska-Lincoln, Department of Environmental Health and Safety, 1998-present
- III. Professional Certifications/Professional Development
 - a. Certified Hazardous Materials Manager, 1995
 - b. NDOT Certified Erosion and Sediment Control Inspector (#2098), 2017
 - c. Illicit Discharge Detection and Elimination Course, StormwaterOne, 2017

Dean Brame

- I. Educational Background
 - a. M.S., Agronomy, emphasis in contaminant transport and remediation in soil and groundwater
 - b. B.S., Natural Resources, emphasis in soil science and hydrogeology
- II. Professional Experience
 - a. Stormwater Specialist, University of Nebraska Lincoln, Department of Environmental Health and Safety, 2018
 - b. Designed and oversaw installation of erosion control BMPs including: slope adjustments, armoring, weirs, check dams, and ¼-acre detention pond. Schlumberger, Conway, AR, 2013
 - c. Conducted sediment and erosion control compliance inspections of BMPs surrounding a protected wetland during arsenic remediation activities. B&L Landfill, Federal Way, WA. 2010-2011
 - d. Conducted sediment and erosion control compliance inspections of BMPs and piling walls during excavation and dewatering of contaminated sediment from the Duwamish River. Boeing Plant 2 and Jorgensen Forge, Seattle, WA. 2010-2011
 - e. Ensured compliance with erosion control provisions during soil borrow excavation and tailings dam covering operations. Inspected BMPs required during monsoon season to protect waterways from mine tailings runoff. Phelps Dodge Copper Mine, Tyrone, NM, 2007-2008
- III. Professional Certifications/Professional Development
 - a. NDOT Certified Erosion and Sediment Control Inspector (#2150), 2018
 - b. State of Washington Certified Erosion and Sediment Control Lead (#24036), 2009

Bruce Haley

- I. Educational Background
 - a. BS, Geology, University of Oklahoma, 1984
- II. Professional Experience
 - a. Quarterly audits and inspections of LLRW site in Boyd County, NE, 1994-1998
 - b. UNL Project Manager of EPA lead Superfund Project, 2005-present
- III. Professional Certifications/Professional Development
 - a. Certification in Hydrogeology, Oklahoma State University, 1988
 - b. Basic Auditor Course, Jacobson Helgoth Consultants, 1994

- c. NDOT Interim Erosion and Sediment Control Inspector, 2017
- d. NDOT Completion of Erosion and Sediment Control Inspector, 2018

Nicholas Jenkins

- I. Educational Background
 - a. B.S. Fisheries and Wildlife, University of Nebraska-Lincoln
- II. Professional Experience
 - a. EHS Technician, University of Nebraska-Lincoln, Department of Environmental Health and Safety, 2017present
 - b. Environmental Scientist I, Smith Environmental and Engineering, Westminster, CO, 2015-2016. Installation/inspection of BMPs, hydroseeding, herbicide/pesticide application, wetland restoration.
- III. Professional Certifications/Professional Development
 - a. NDOT Certified Erosion and Sediment Control Inspector (#2157), 2018
 - b. Colorado DOT Erosion Control Supervisor (#24502), expires May 2019
 - c. Colorado Certified Operator of herbicide/pesticide (#32258), expires March 2020

Appendix B

UNL's Strategy for Designating High Priority Facilities (Excerpt from UNL's Runoff Control Plan)

UNL uses the following criteria to designate a facility as "high risk":

- 1. Emergency generator locations where a release is likely to reach a storm drain inlet during refueling operations, considering size of the tank, distance to the storm inlet, surface characteristics (concrete, grass, etc.), and topography of the surrounding area;
- 2. Pesticide/herbicide bulk loading/unloading areas if a release is likely to reach a storm drain inlet;
- 3. Bulk chemical storage areas if a release occurs through mishandling or loading and unloading and the release is likely to enter a storm drain inlet;
- 4. 90-day hazardous waste storage facilities if, considering maximum container size and proximity of storm drains and topography, a release during loading/unloading is likely to reach a storm drain inlet (all other waste handling operations are conducted inside the facilities and the facilities are designed to provide containment of releases);
- 5. Outdoor, uncovered, confined animal holding facilities (e.g., pens or unprotected outdoor storage of animal feed, manure, bedding, etc.);
- 6. Storage of de-icing materials in a manner that could impact stormwater;
- 7. Commercial-like refuse support operations (e.g., compactors, garbage truck storage, refuse container storage, etc.);
- 8. Facility maintenance operations if storage or use practices make it likely that chemicals or other pollutants may reach a storm drain inlet through either normal operations or a release during use, mishandling, loading, or unloading.