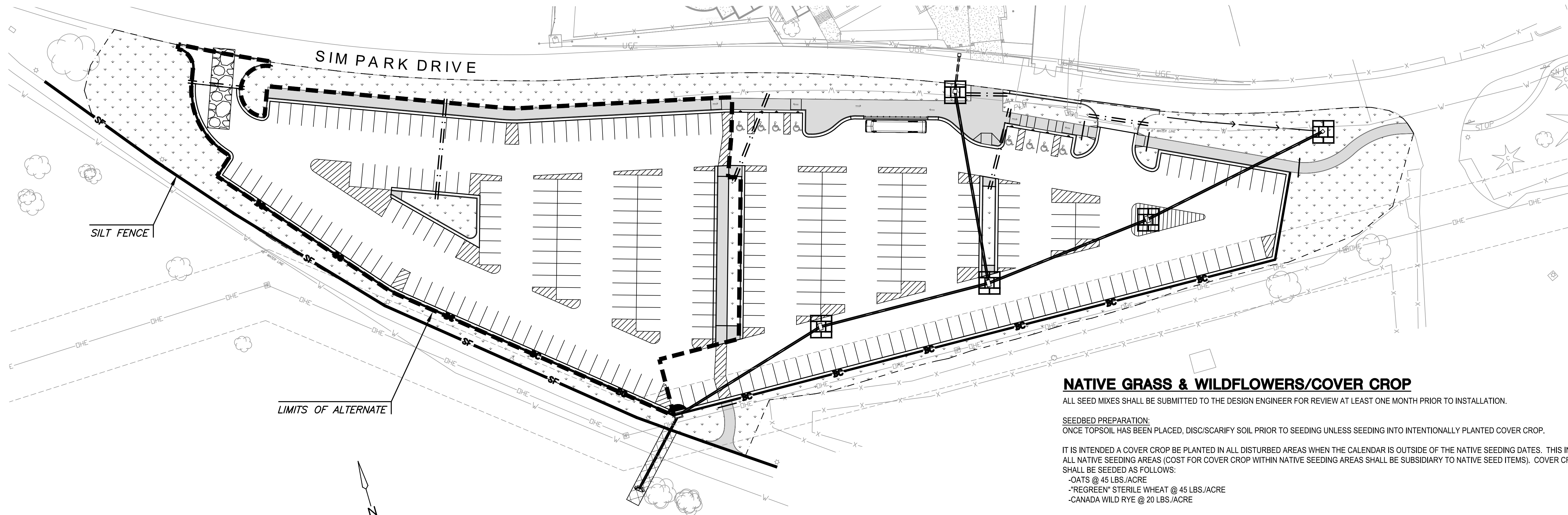


J:\PROJECTS\2019\1901010483_COW_BOTANICA PARKING EXPANSION_190483 CAD\SHITS\05 CIVIL\PAV\190483-05-4600.DWG PLOTTED: Thursday, July 15, 2021 @ 11:26AM



NATIVE GRASS & WILDFLOWERS/COVER CROP

ALL SEED MIXES SHALL BE SUBMITTED TO THE DESIGN ENGINEER FOR REVIEW AT LEAST ONE MONTH PRIOR TO INSTALLATION.

SEEDBED PREPARATION:
ONCE TOPSOIL HAS BEEN PLACED, DISC/SCARIFY SOIL PRIOR TO SEEDING UNLESS SEEDING INTO INTENTIONALLY PLANTED COVER CROP.

IT IS INTENDED A COVER CROP BE PLANTED IN ALL DISTURBED AREAS WHEN THE CALENDAR IS OUTSIDE OF THE NATIVE SEEDING DATES. THIS INCLUDES ALL NATIVE SEEDING AREAS (COST FOR COVER CROP WITHIN NATIVE SEEDING AREAS SHALL BE SUBSIDIARY TO NATIVE SEED ITEMS). COVER CROP SHALL BE SEED AS FOLLOWS:

- OATS @ 45 LBS./ACRE
- "REGREEN" STERILE WHEAT @ 45 LBS./ACRE
- CANADA WILD RYE @ 20 LBS./ACRE

SEEDING METHOD:
SEED PLACEMENT IS IMPORTANT AND SHOULD BE PLANTED NO MORE THAN 1/4" DEEP. TO ENSURE ACCURATE PLACEMENT OF SEED IT IS PREFERRED THAT SEED IS PLACED WITH A 'SEED DRILL' OR 'NO-TILL DRILL'. WHEN THIS METHOD IS NOT PRACTICAL THE SEED BED CAN BE PREPARED WITH A CULTIPACKER THEN BROADCAST SEED AND ROLL AGAIN.

MULCHING:
ONCE SEEDING HAS OCCURRED, PLACE "CERTIFIED" CLEAN STRAW/PRAIRIE HAY MULCH AT A RATE OF 2 TONS/ACRE. MULCH SHALL NOT CONTAIN WEED SEED SUCH AS JOHNSON GRASS OR BERMUDA GRASS. ALL MULCH SHALL BE ANCHORED BY CRIMPING INTO TOPSOIL WITH SUITABLE MECHANICAL EQUIPMENT. HYDRO-SEEDING MAY BE ALLOWED IF APPROVED BY THE LANDSCAPE ARCHITECT.

SEEDING RATES:
ALL SEED SHOULD BE PLACED AT A UNIFORM RATE OVER THE DELINEATED AREA AT THE SPECIFIED SEEDING RATE.

SEEDING DATES:
PLANT SEED BETWEEN MARCH 25TH AND APRIL 10TH (PREFERRED) BETWEEN FEBRUARY 15TH AND MAY 1ST (ACCEPTABLE); OR AS APPROVED BY THE LANDSCAPE ARCHITECT THROUGH COORDINATION WITH THE CONTRACTOR.

FERTILIZING:
GENERALLY FERTILIZING IS NOT REQUIRED OR RECOMMENDED FOR NATIVE GRASS OR WILDFLOWER ESTABLISHMENT AS IT WOULD PROMOTE WEED GROWTH. IN THIS INSTANCE HOWEVER, ALL WEEDS SHOULD BE KILLED PRIOR TO PLANTING. THE ONE TIME APPLICATION OF A GRANULAR FERTILIZER IS RECOMMENDED DURING ESTABLISHMENT.

WATERING:
DURING THE ESTABLISHMENT PHASE, SUPPLEMENTAL WATERING (ONCE A WEEK) FOR 4 TO 6 WEEKS MAY BE REQUIRED TO ENSURE SEED GERMINATION; THEN GRADUALLY REDUCE WATERING. A TEMPORARY IRRIGATION SYSTEM SHALL BE UTILIZED FOR INITIAL PLANT ESTABLISHMENT IF NECESSARY. ADDITIONAL WATERING WILL BE REQUIRED DURING TIMES OF PROLONGED DRY WEATHER IN THE FIRST 2 - 3 GROWING SEASONS.

MANAGEMENT DURING ESTABLISHMENT:
WEED CONTROL IS NECESSARY IN NEW SEEDING TO REDUCE COMPETITION FOR MOISTURE, NUTRIENTS AND SUNLIGHT. HERBICIDES ARE NOT RECOMMENDED, AS THEY WILL HARM THE WILDFLOWER STAND. IF NECESSARY, HERBICIDES MAY BE APPLIED USING A WICK APPLICATOR. MOWING DURING THE FIRST YEAR OF ESTABLISHMENT IS THE MOST APPROPRIATE METHOD TO REDUCE WEED POPULATIONS. MOWING MUST TAKE PLACE BEFORE THE WEEDY PLANTS PRODUCE SEED. WEEDS SHALL BE MOWED BEFORE THEY ARE 6" TALL; AS MUCH OF THE WEED SHOULD BE CUT AS POSSIBLE WITHOUT REMOVING TOO MUCH OF THE NEW GROWTH OF NATIVE GRASSES.

VEGETATION:
REVIEW AND INSPECT VEGETATION WITHIN THE PLANTING AREA ON A MONTHLY BASIS DURING THE SPRING AND SUMMER MONTHS. INSPECTION SHOULD BE PERFORMED TO DETERMINE HEALTH AND TO IDENTIFY WEEDS AND INVASIVE SPECIES. INSPECTIONS SHOULD BE PERFORMED BY A PERSON TRAINED IN PLANT IDENTIFICATION AND CHARACTERISTICS. VEGETATION SHOULD ONLY INCLUDE PLANT SPECIES AS IDENTIFIED IN THE SEED MIX SPECIFIED. ALL OTHER PLANT SPECIES NOT IDENTIFIED IN SEED MIX ARE TO BE REMOVED DURING MAINTENANCE.

FALL AND WINTER MANAGEMENT:
SEEDED AREAS SHOULD BE MOWED FOLLOWING A HARD FREEZE AND AFTER PLANTS HAVE ESTABLISHED SEEDS. IF MOWING IS USED IT SHOULD BE A TWO STEP PROCESS. MOW SITE AND THEN REMOVE TOP GROWTH. TOP GROWTH MAY BE REMOVED BY RAKING, BALING OR MOWING WITH A BAGGER BUT A LAWN VACUUM SHOULD NOT BE USED.

SATISFACTORY NATIVE STAND:
WITHIN ONE FULL GROWING SEASON AND AT THE END OF THE MAINTENANCE PERIOD, A HEALTHY, WELL-ROOTED, VIABLE NATIVE STAND SHALL BE ESTABLISHED, FREE OF BARE AREAS GREATER THAN TWO SQUARE FEET IN SIZE AND FREE OF BROADER AREAS FAILING TO ACHIEVE 85% DESIRABLE PLANT COVERAGE.

REESTABLISH NATIVE STANDS THAT DO NOT COMPLY WITH REQUIREMENTS AND CONTINUE MAINTENANCE UNTIL NATIVE STANDS ARE SATISFACTORY.

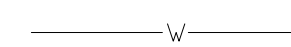

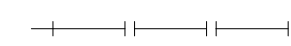
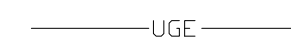

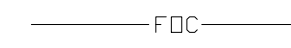
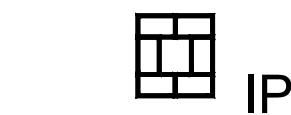

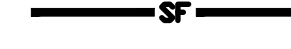



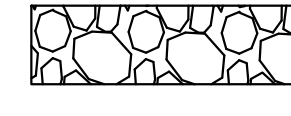
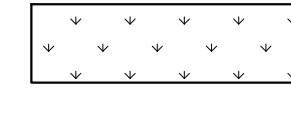

EROSION CONTROL NOTES

1. EROSION CONTROL IS TO MEET ALL FEDERAL, STATE, COUNTY AND LOCAL CODE STANDARDS.
2. IN THE EVENT THAT A PORTION OF THE SITE WILL REMAIN DISTURBED FOR MORE THAN 14 DAYS, SEEDING SHALL BE INSTALLED.
3. ALL AREAS SHALL BE FINE GRADED AND SURFACE SHALL BE FREE FROM STICKS, SMALL STONES, AND OTHER EXTRANEIOUS MATERIALS.
4. CONTRACTOR SHALL PROVIDE EROSION PROTECTION THROUGHOUT PROJECT CONSTRUCTION. THE PLAN PROVIDED HERE IS FOR FINAL PROTECTION, VARIOUS PHASES OF THIS PLAN SHALL BE IMPLEMENTED OR MODIFIED TO CONTROL EROSION. MODIFICATIONS OF THE PLAN SHALL BE APPROVED BY THE OWNER'S REPRESENTATIVE.
5. SEEDING AREAS SHALL BE PREPARED FOR PLANTING WITH COMMON AGRICULTURAL TECHNIQUES. APPROVE WITH OWNER'S REPRESENTATIVE BEFORE PLANTING.
6. ALL SEED SHALL BE DISTRIBUTED WITH AN ACCEPTABLE DRILL INTENDED FOR SUCH OPERATIONS, OR OTHER EQUIPMENT APPROVED BY THE OWNER'S REPRESENTATIVE. SEEDING DEPTH SHALL BE 1/4 OF AN INCH.
7. ALL SEEDED AREAS SHALL BE IMMEDIATELY MULCHED WITH PRAIRIE HAY AT 2 TONS/ACRE. ANCHOR MULCH BY CRIMPING INTO TOPSOIL WITH SUITABLE MECHANICAL EQUIPMENT. MULCH SHALL BE SUBSIDIARY TO PROJECT BID ITEM.
8. CONTRACTOR IS RESPONSIBLE FOR MAINTAINING AND IMPLEMENTING ALL EROSION CONTROL.
9. IN ORDER TO PREVENT SILT OR SEDIMENT FROM ENTERING ADJACENT PROPERTIES, APPROPRIATE BMP'S SHALL BE IMPLEMENTED WITHIN THE PROJECT.
10. ANY MUD TRACKED ONTO ADJACENT PAVED AREAS OR STREETS SHALL BE REMOVED AT THE END OF EACH WORK DAY.
11. PER THE REQUIREMENTS OF THE NOI/SWPPP, BMP INSPECTION REPORTS SHALL BE COMPLETED BY THE CONTRACTOR WEEKLY AND WITHIN 24 HOURS AFTER A 1/2" RAIN. REPORTS SHALL BE KEPT WITH THE SWPPP ON SITE.
12. CONTRACTOR SHALL PROVIDE A SIGN NEAR THE ENTRANCE WITH THE FOLLOWING INFORMATION:
 - A. CONTACT NAME AND INFORMATION
 - B. A COPY OF THE NOI
 - C. LOCATION OF SWPPP

SEEDING NOTES

1. **TEMPORARY SEEDING:** ALL AREAS DISTURBED WITH EXCEPTION OF PROPOSED STREET PAVEMENT BE SEED (COST SUBSIDIARY TO PROJECT) AND FERTILIZED AS FOLLOWS UNLESS PERMANENT SEEDING CAN BE INSTALLED IMMEDIATELY AFTER CONSTRUCTION:
 - OATS @ 45 LBS./ACRE
 - "REGREEN" STERILE WHEAT @ 45 LBS./ACRE
 - CANADIAN WILD RYE @ 20 LBS./ACRE
 - ANNUAL RYE @ 150 LBS./ACRE
 - 10-20-10 @ 100 LBS./ACRE
2. **PERMANENT SEEDING:** PERMANENT SEEDING SHALL CONSIST OF THE FOLLOWING MIX:
 - "PRAIRIE 3 PLUS" GRASS MIXTURE DRILLED AT 25 PLS LBS./ACRE
 PERMANENT MIX IS AVAILABLE FROM THE FOLLOWING STOCK SEED FARMS
 28009 MILL ROAD
 MURDOCK, NE 68407
 TEL: 1.800.759.1520
 www.stockseed.com
 OR APPROVED EQUAL

LEGEND

-  WATERLINE
-  SANITARY SEWER
-  STORMWATER SEWER
-  UNDERGROUND ELECTRICAL
-  GAS LINE
-  FIBER OPTIC CABLE
-  AREA INLET PROTECTION (5)
-  CURB INLET PROTECTION (1)
-  SILT FENCE (625 LF)
-  BACK OF CURB PROTECTION (1,035 LF)
-  LIMITS OF GRADING (3.8 ACRES)
-  LIMITS OF ALTERNATE
-  STABILIZED CONSTRUCTION ENTRANCE
-  TEMPORARY/PERMANENT SEEDING
BASE BID INCLUDES PERMANENT SEEDING OF WEST PARKING LOT
ALT. BIDS REMOVES WEST PARKING LOT SEEDING
-  EROSION CONTROL MAT (70 SY) (SC 150 OR APP'D EQUAL)

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EROSION CONTROL PLAN

PROJECT NO.	482-11034	
DATE	JULY 2021	
SCALE	1"=40'	
DESIGNED	DRAWN	CHECKED
JAG	CRM	GJA
NO.	REVISION	DATE

SHEET NO.