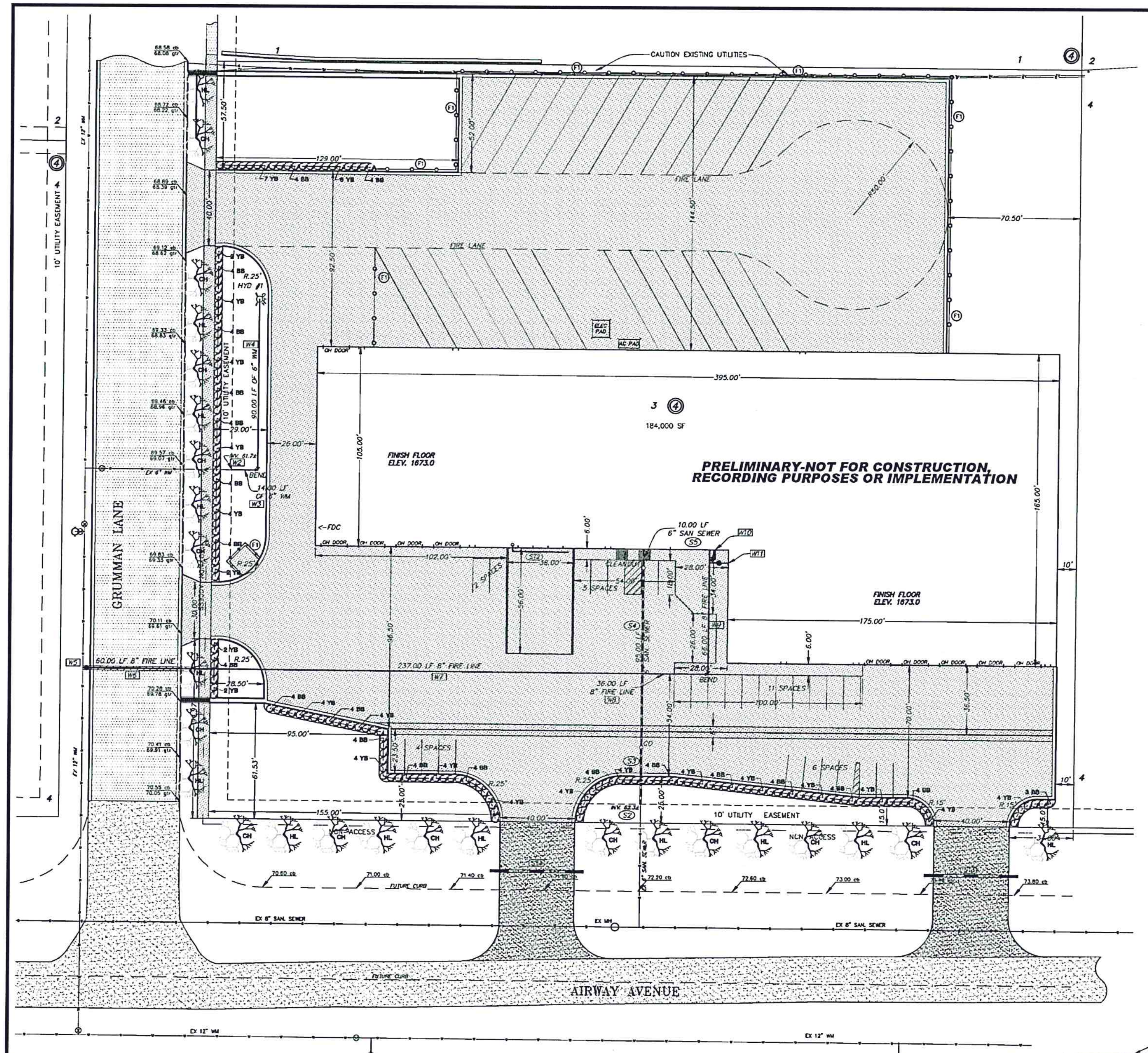


GENERAL LANDSCAPING NOTES FOR ALL SHEETS

L1 ALL CONTRACTORS WISHING TO SUBMIT BIDS FOR THIS LANDSCAPING PROJECT SHALL BE RESPONSIBLE FOR FIELD VERIFYING ALL CONDITIONS.

L2 PROTECT THE IMPROVEMENTS ON SITE AND ON THE ADJOINING PROPERTIES. PROVIDE BARRICADES, COVERINGS OR OTHER TYPE OF PROTECTION AS NECESSARY TO PREVENT DAMAGE AND TO SAFEGUARD AGAINST INJURY TO EXISTING UTILITIES.

L3 DAMAGE THAT OCCURS TO PLANTS DURING TRANSPORTATION AND INSTALLATION WILL BE THE RESPONSIBILITY OF THE LANDSCAPE CONTRACTOR.

L4 ALL PLANTING BEDS SHALL BE INSTALLED WITH 3" OF 2" CRUSHED ROCK MULCH, LANDSCAPE FABRIC WITH A MINIMUM WEIGHT OF 4 OZ./SY, AND WHEREVER NECESSARY, 6" COMMERCIAL GRADE BLACK PLASTIC EDGING TO CONTAIN THE PLANTING BED.

L5 ALL LANDSCAPE PLANTINGS ARE TO BE WATERED BY THE LANDSCAPE CONTRACTOR THE SAME DAY THAT THE PLANTING OCCURS. IF WATER IS NOT AVAILABLE AT THE BUILDING, THE LANDSCAPE CONTRACTOR SHALL PROVIDE ALTERNATIVE METHODS FOR WATERING.

L6 SOLITARY TREES DO NOT NEED TO BE EDGED AROUND, HOWEVER ORGANIC WOOD MULCH SHALL BE PLACED AROUND THE TREE IN A MUTTLE RING THAT CONFORMS TO THE DETAIL PROVIDED FOR TREE PLANTINGS.

L7 CONTRACTOR SHALL PROVIDE WRITTEN WARRANTIES CONFIRMING THE FOLLOWING:

FURNISHED TREES GUARANTEED TO LIVE AND REMAIN STRONG, VIGOROUS, AND HEALTHY CONDITION FOR 365 DAYS MINIMUM FROM DATE LANDSCAPE INSTALLATION IS ACCEPTED AS COMPLETED.

L8 LANDSCAPE CONTRACTOR SHALL BE RESPONSIBLE FOR WATERING AND CARING FOR ALL PLANT MATERIAL, AND OTHER LANDSCAPING IMPROVEMENTS UNTIL THE DATE OF FINAL INSPECTION AND APPROVAL.

TOPSOIL NOTES

T1 TOPSOIL IS STOCKPILED ON SITE AND WILL BE PLACE FOR THE LANDSCAPE CONTRACTOR TO SPREAD AND FINISH GRADE. ALL PORTIONS OF THE SITE NOT RECEIVING CONCRETE, CURB & GUTTER OR OTHER IMPROVEMENTS SHALL BE COVERED WITH A MINIMUM OF 6" OF TOPSOIL AND SEEDED ACCORDING TO SPECIFICATIONS.

T2 TOPSOIL SHALL BE PLACED AND SEEDED AS SOON AS PRACTICAL TO MINIMIZE WIND AND WATER EROSION. BACKFILL BEHIND CURB AND GUTTERS AND SIDEWALK AS SOON AS REASONABLE TO PREVENT STANDING WATER AND PROTECT THE IMPROVEMENTS.

SEEDING NOTES

S1 CLEAR AND GRUB SITE BEFORE SEEDING ENSURING THAT THE SITE IS IN A SMOOTH CONDITION WITH NO DEBRIS OR ROCKS LARGER THAN 2" IN DIAMETER.

S2 FERTILIZE SOIL DURING THE SEEDING PROCESS USING AN APPROPRIATE APPLICATION PROCESS. FERTILIZER SHALL BE 10-10-10 AND APPLIED AT A RATE OF 4 LBS. PER 1000 SQUARE FEET.

S3 SEED SHALL BE DRILL SEEDED TO A DEPTH OF 1/4" TO 1/2" AND SHALL BE EVENLY SPREAD. AFTER SEED HAS BEEN SOWN, THE SOIL SHALL BE REPACKED IMMEDIATELY AFTER THE SEED IS APPLIED TO FIRM THE SOIL AROUND THE SEED. NO SEED SHALL BE PLACED ON DAYS WHERE THE WIND IS STRONG ENOUGH TO PREVENT IT FROM BEING PROPERLY IMBEDDED INTO THE SOIL.

S4 SEED MUST SHOW A DENSITY OF 20 TO 30 SEEDLINGS PER SQUARE FOOT BEFORE ACCEPTANCE WILL OCCUR. THE CONTRACTOR SHALL FURNISH AND REPLACE WITHOUT ADDITIONAL COMPENSATION THEREFORE, ANY SEED FOR AREAS THAT HAVE NOT GERMINATED, HAVE DIED, OR ARE DAMAGED TO THE EXTENT THAT REPLACEMENT IS REQUIRED TO CONFORM TO THE REQUIREMENTS OUTLINED ABOVE. THE CONTRACT WARRANTY PERIOD SHALL ALSO APPLY TO THIS ITEM.

S5 CONTRACTOR SHALL BE RESPONSIBLE TO REPAIR ANY EROSION SCARS OR WASHOUTS UNTIL THE DATE THAT FINAL SEED STAND IS ACCEPTED. SEE EROSION CONTROL PLAN FOR EROSION CONTROL METHODS.

FENCING NOTES

F1 A 6' HIGH FENCE SHALL BE INSTALLED WHERE DEPICTED ON THE PLANS.

PLANT PALETTE

	SYM.	COMMON NAME	SCIENTIFIC NAME	SIZE	QNTY.
TREES	HL	HONEYLOCUST	Gleditsia triacanthos	2" Cal.	13
	CH	COMMON HACKBERRY	Tilia americana	1-1/2" Cal.	13
SHRUBS	BB	CRIMSON PYGMY BARBERRY	Berberis thunbergii 'Crimson Pygmy'	2 Gallon	83
	YB	GOLDEN CAROUSEL BARBERRY	Berberis 'Bailsel'	2 Gallon	89

LANDSCAPING REQUIREMENTS

REQUIRED STREET TREES:
3 PER 100 FEET = 26 TREES

PROVIDED STREET TREES:
26 TREES

REQUIRED PERIMETER PARKING:
CONTINUOUS HEDGE

PROVIDED PERIMETER PARKING:
CONTINUOUS HEDGE

STORM SEWER

ST1 MATERIALS AND CONSTRUCTION METHODS SHALL COMPLY WITH CITY OF BISMARCK SPECIFICATIONS. ALL BACKFILL SHALL BE 95% OF STANDARD PROCTOR AT RECOMMENDED MOISTURE CONTENT. TESTING IS CONSIDERED INCIDENTAL.

ST2 INSTALL 30.00 LF OF ACO DRAIN KLASSIKDRAIN – K300 STEEL EDGE RAIL SLOPED CHANNEL SYSTEM WITH TYPE 8510 SLOTTED DUCTILE IRON GRATE PER MANUFACTURES SPECIFICATIONS. GRATE ELEVATION 69.00. COORDINATE WITH MECHANICAL FOR CONNECTION TO SUMP PUMP.

ST3 INSTALL 50.00 LF 12" CULVERT; E INV. 72.70, W INV. 72.45.

ST4 INSTALL 50.00 LF 12" CULVERT; E INV. 71.55, W INV. 71.30.

SANITARY SEWER

S1 MATERIALS AND CONSTRUCTION METHODS SHALL COMPLY WITH CITY OF BISMARCK SPECIFICATIONS. ALL BACKFILL SHALL BE 95% OF STANDARD PROCTOR AT RECOMMENDED MOISTURE CONTENT. TESTING IS CONSIDERED INCIDENTAL.

S2 CONNECT TO EXISTING 6" SANITARY SEWER APPROXIMATE INV. 62.3±.

S3 INSTALL 30.00 LF 6" SANITARY SEWER AT 0.7667% AND 6" CLEANOUT; INV 62.53.

S4 INSTALL 95.00 LF 6" SANITARY SEWER AT 0.7579% AND 6" CLEANOUT; INV. 63.25.

S5 INSTALL 10.00 LF 6" SANITARY SEWER AT 0.8000% AND TEMPORARY CAP; INV. 63.33. VERIFY WITH MECHANICAL CONTRACTOR FOR LOCATION AND ELEVATION OF CONNECTION INTO BUILDING.

WATERMAIN

W1 MATERIALS AND CONSTRUCTION METHODS SHALL COMPLY WITH CITY OF BISMARCK SPECIFICATIONS. ALL BACKFILL SHALL BE 95% OF STANDARD PROCTOR AT RECOMMENDED MOISTURE CONTENT. WATERLINES SHALL BE CHLORINATED, PRESSURE TESTED AND FLUSHED. TESTING IS CONSIDERED INCIDENTAL. COORDINATE WITH MECHANICAL CONTRACTOR FOR LOCATION AND ELEVATIONS OF CONNECTIONS INTO BUILDING.

W2 CONNECT TO EXISTING 6" WATERMAIN APPROXIMATE INV. 61.7±.

W3 INSTALL 14.00 LF 6" WATERMAIN AND 90° BEND; INV. 61.82.

W4 INSTALL 90.00 LF 6" WATERMAIN AND 6" HYDRANT; INV. 63.00.

W5 CONNECT TO EXISTING 12" WATERMAIN WITH 12" X 8" TAPPING SLEEVE AND 8" VALVE; APPROXIMATE INV. 61.7±.

W6 BORE 60.00 LF 8" FIRE LINE; INV. 61.70

W7 INSTALL 237.00 LF 8" FIRE LINE; INV. 60.50.

W8 INSTALL 35.00 LF 8" FIRE LINE AND 90° BEND; INV. 61.50.

W9 INSTALL 65.00 LF OF 8" FIRE LINE AND TEMPORARY CAP; INV. 65.00.

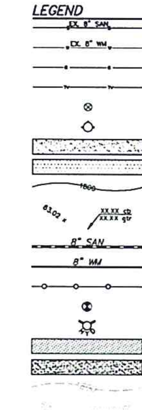
W10 CONNECT TO 8" FIRELINE WITH 1 1/2" TAPPING SADDLE AND VALVE 5' FROM BUILDING. OFFSET 3' FROM 8" FIRE LINE AND INSTALL 5.00 LF OF 1 1/2" WATER SERVICE AND TEMPORARY CAP INV. 65.00.

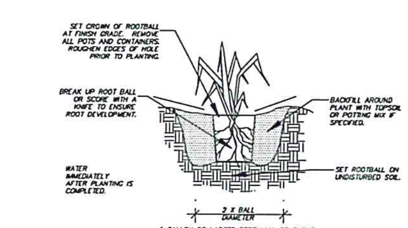
W11 CONNECT TO 8" FIRELINE WITH 1 1/2" TAPPING SADDLE AND VALVE 7' FROM BUILDING. INSTALL 10.00 LF OF 1 1/2" WATER SERVICE AND TEMPORARY CAP INV. 65.00.

WATER HYDRANT SCHEDULE

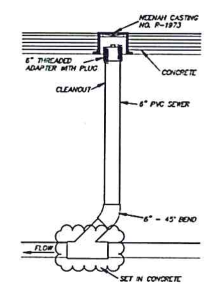
HYDRANT NO.	HYD #1
PIPE SIZE	6"
GROUND LINE	71.00
INVERT ELEV.	63.00

LEGEND

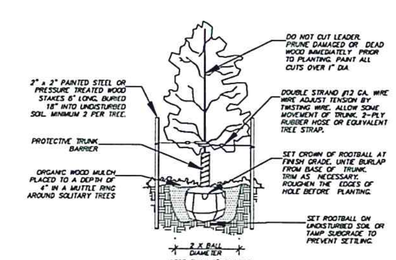




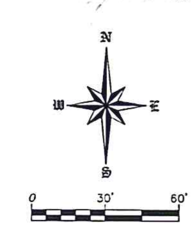
SHRUB/PERENNIAL PLANTING DETAIL
TYPICAL FOR ALL SHRUBS AND PERENNIALS NTS



CLEAN OUT DETAIL



TREE PLANTING DETAIL
TYPICAL FOR ALL DECIDUOUS, SINGLE-TRUNK, TREES NTS



SCALE – 1" = 30'
NGVD 29 DATUM
MAY 24, 2016
REVISED: JUNE 24, 2016

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The location of existing underground utilities are shown in an approximate way only and have not been independently verified by the owner or its representatives. The Contractor shall determine the exact location of all existing utilities before commencing work, and agrees to be fully responsible for any and all damages which might be occasioned by the Contractor's failure to exactly locate and preserve any and all underground utilities.

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REVISIONS	DATE
REVISED PER FIRE SUPRESSION REQUIREMENTS	5/27/2016
REVISED PER CITY COMMENTS	6/24/2016

DIMENSION, UTILITY & LANDSCAPE PLAN

LOT 3, BLOCK 4, TRILLIUM FOURTH ADDITION
BISMARCK, NORTH DAKOTA

SWENSON, HAGEN & COMPANY P.C.
909 Basin Avenue
Bismarck, North Dakota 58504
sheng@swensonhagen.com
Phone (701) 223-2600
Fax (701) 223-2606
Surveying
Hydrology
Land Planning
Civil Engineering
Landscape & Site Design
Construction Management

DRAWN BY: TR
CHECK BY: JP
DATE: 5-24-2016
FILE DESC:
COMPUTER FILE:
P:\Bismarck\Trillium\Trillium 4th\ Lot 3 Block 4 Site Plan.dwg

SHEET
C2.0

APPROVED BY FORESTRY
LANDSCAPE ARBORIST 6-30-16
TITLE DATE

APPROVED BY PLANNING
PLANNER 6.30.16
TITLE DATE