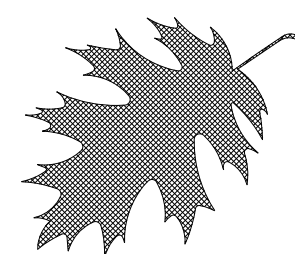
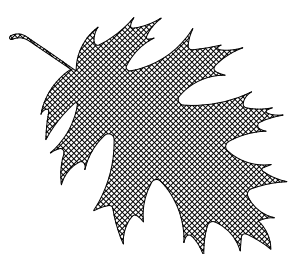


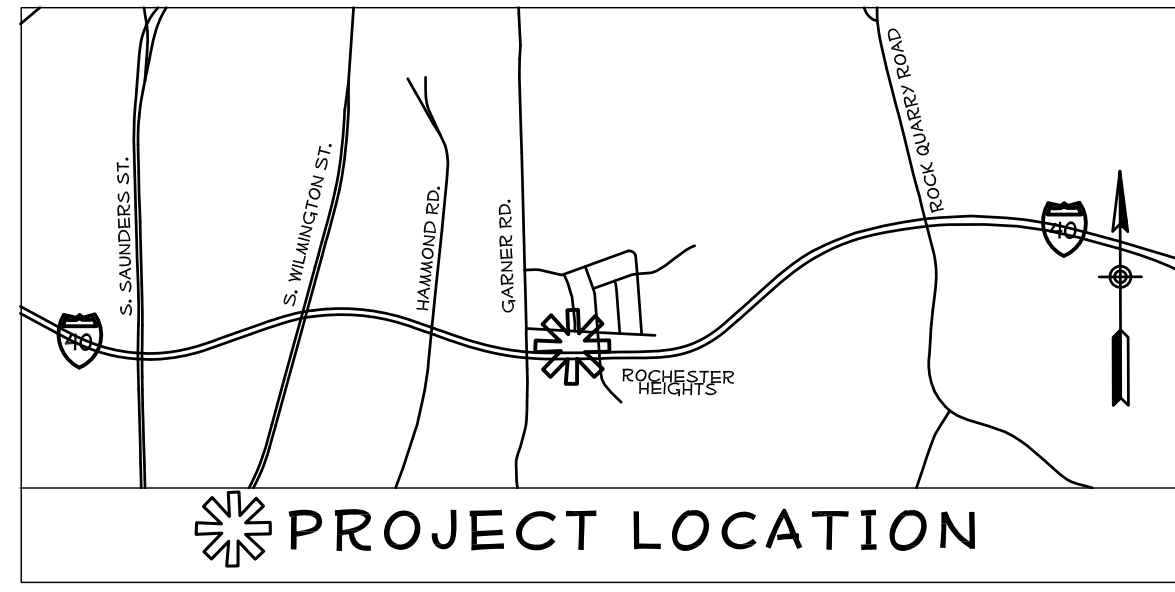
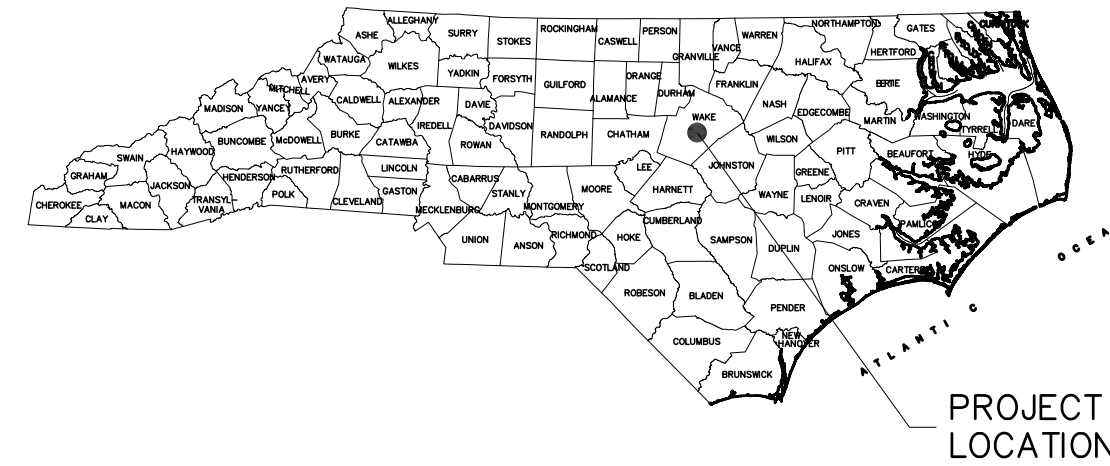
PROJECT: LANDSCAPE IMPROVEMENTS / ROCHESTER HEIGHTS / RALEIGH / I-40 & GARNER RD



PROPOSED HIGHWAY LANDSCAPE DEVELOPMENT PROJECT



T.I.P. #	STATE PROJECT W.B.S. #	SHEET #	SHEET # TOTAL
N/A	46265.3.1	L1	4
FED. PROJ. #	DESCRIPTION		DIVISION
IMS-0440(13)	LANDSCAPE		5



PLANT SCHEDULE

TREES	CODE	QTY	UNIT	BOTANICAL NAME / COMMON NAME	CONT	CAL	HEIGHT	REMARKS
	CC	4	EA	Cercis canadensis / Eastern Redbud	B & B	1.5"Cal	6' Min	Full & Heavy, Single Straight Leader
	CK	6	EA	Cornus kousa 'National' / National Kousa Dogwood	B & B	1.5"Cal	6' Min	Full & Heavy, Single Straight Leader
	LT	3	EA	Liriodendron tulipifera / Tulip Poplar	B & B	2"Cal	10' min.	Full & Heavy, Single Straight Leader
	NW	8	EA	Nyssa sylvatica 'Wildfire' / Black Gum	B & B	3"Cal		Full & Heavy, Single Straight Leader
	PT	15	EA	Pinus taeda / Loblolly Pine	#10		8' min.	Full & Heavy
	QP	4	EA	Quercus palustris / Pin Oak	B & B	2"Cal	10' min.	Full & Heavy, Single Straight Leader
	QS	3	EA	Quercus shumardii / Shumard Oak	B & B	2"Cal	10' min.	Full & Heavy, Single Straight Leader
SHRUBS	CODE	QTY	UNIT	BOTANICAL NAME / COMMON NAME	CONT	HEIGHT	REMARKS	
	IC	106	EA	Ilex cornuta 'Needlepoint' / Needlepoint Holly	#7		36" Min	Full & Heavy
	IN	24	EA	Ilex x 'Nellie R Stevens' / Nellie R Stevens Holly	#7		36" Min	Full & Heavy, Single Straight Leader
	LC	52	EA	Loropetalum chinense 'Ever Red' / Ever Red Loropetalum	#3		24" Min	Full & Heavy
	MC	121	EA	Myrica cerifera / Wax Myrtle	#7		36" Min	Full & Heavy

REFORESTATION SCHEDULE

TREES	CODE	QTY	UNIT	BOTANICAL NAME / COMMON NAME	CONT	CAL	HEIGHT	REMARKS
	CC	50	EA	Cercis canadensis / Eastern Redbud	#7			Full & Heavy; Single leader
	CK	44	EA	Cornus kousa 'National' / National Kousa Dogwood	#7			Full & Heavy
	FP	69	EA	Fraxus pennsylvanica / Green Ash	#10			Full & Heavy
	JV	94	EA	Juniperus virginiana / Eastern Red Cedar	#7			Full & Heavy
	PT	218	EA	Pinus taeda / Loblolly Pine	#3			Full & Heavy
	QP	75	EA	Quercus palustris / Pin Oak	#10			Full & Heavy
	QS	75	EA	Quercus shumardii / Shumard Oak	#10			Full & Heavy

MISCELLANEOUS

QTY	UNIT	SPEC SECTION	ITEM
36	EA	SP	Establishment
0.1	AC	1650	Wooded area cleanup
98	CY	SP	Mulch for planting
11	M/G	SP	Water for planting
7,977	SY	1670	Pre-emergence plant bed herbicide treatment
7,977	SY	1670	Post-emergent herbicidal treatment for plant beds

CONVENTIONAL SYMBOLS

County Line	-----
City or Town Line	-----
Exist. Right of Way Line Marker	-----▲-----
Prop. Right of Way Line Marker (By Others)	-----▲-----
Prop Right of Way Line Marker (By Contract)	-----▲-----
Exist. Control of Access Line	-----○-----
Prop. Control of Access Line	-----○-----
Property Line	-----E-----
Easement Line	-----E-----
Slope Stake Line	-----E-----
Exist. Fence	-----+-----
Prop. Woven Wire Fence	-----○-----
Prop. Chain Link Fence	-----■-----
Exist. Road	-----
Prop. Road	-----
Guardrail	-----T-----
Survey Line	-----+-----
Denotes Line Equality	-----●-----
Bridge	-----
Culvert	-----
Railroad	-----
Woods	-----●-----
Exist. Telephone Pole	-----○-----
Prop. Telephone Pole	-----○-----
Tower Pole and Line	-----■-----
Exist. Power Pole	-----○-----
Prop. Power Pole	-----○-----
Sanitary Sewer Line	-----SS-----
Water Line	-----
Gas Line	-----GAS-----
Picnic Shelter	-----
Regeneration	-----
Reforestation	-----

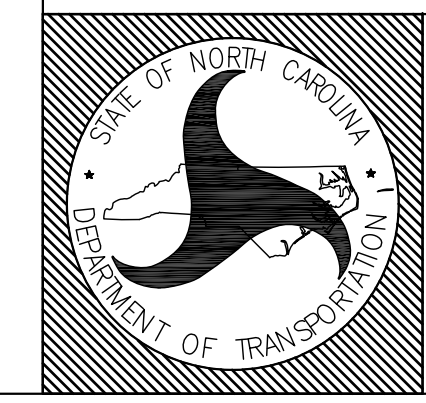
INDEX OF SHEETS:
 L1 ... TITLE SHEET,
 SUMMARY OF QUANTITIES
 LP1 - LP2 ... PLANTING PLANS
 LD1 ... PLANTING DETAIL SHEET

PREPARED BY:
OBS LANDSCAPE ARCHITECTS
 PIO BOX 28504
 RALEIGH, NC 27611
 (919) 755-0046
 WWW.OBSLA.NET

DATE: 06/30/17

REVISIONS

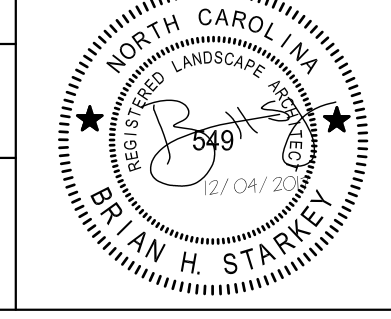
DATE	DESCRIPTION



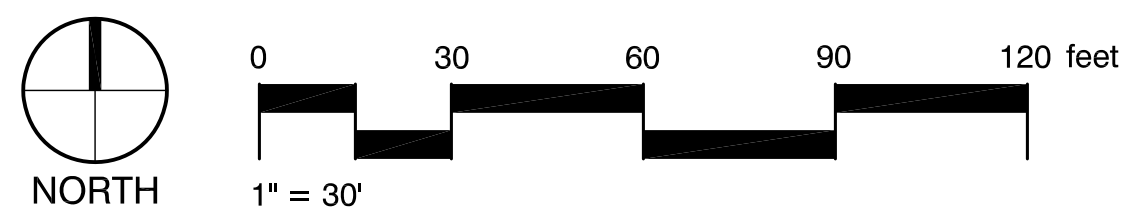
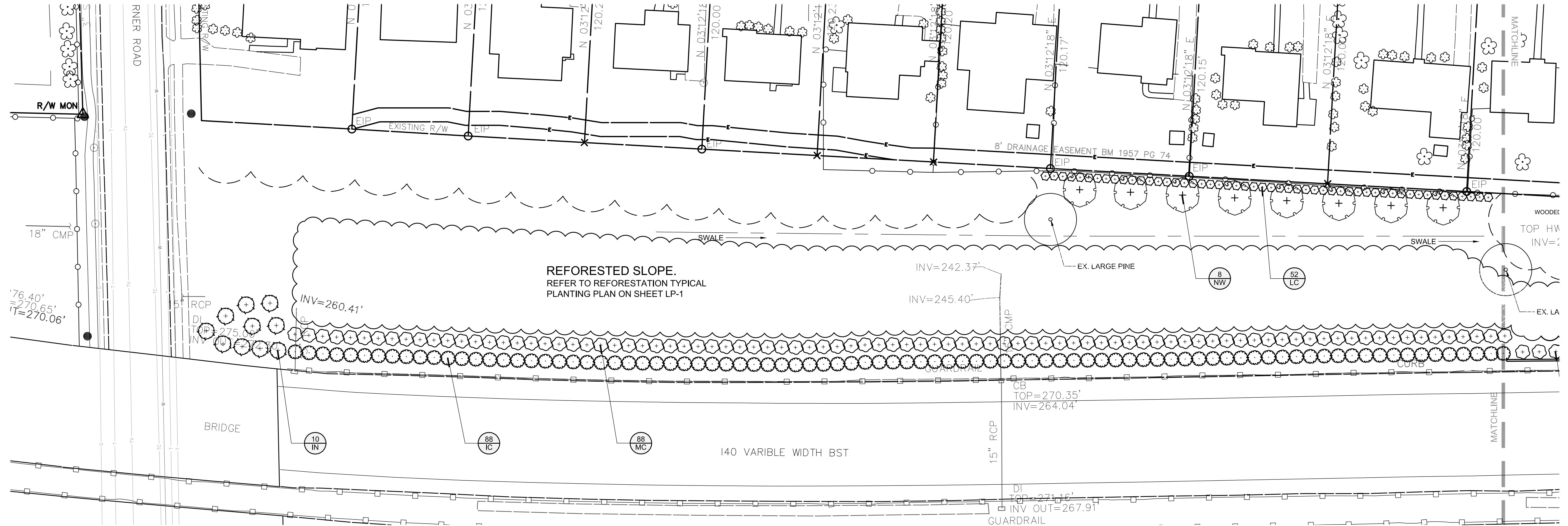
STATE OF
NORTH CAROLINA
 DEPARTMENT OF TRANSPORTATION

LOCATION: ROCHESTER HEIGHTS / RALEIGH / I-40
 TYPE of WORK: LANDSCAPE IMPROVEMENTS
 COUNTY: WAKE COUNTY

Seal:



2004 American Standard for Nursery Stock
 2018 NCDOT STANDARD SPECIFICATIONS
 PREPARED IN THE OFFICE OF:
 NCDOT- ROADSIDE ENVIRONMENTAL UNIT
 LANDSCAPE DESIGN & DEVELOPMENT SECTION
 1557 MAIL SERVICE CENTER
 RALEIGH NC 27699 919-707-2935



GENERAL PLANTING NOTES:

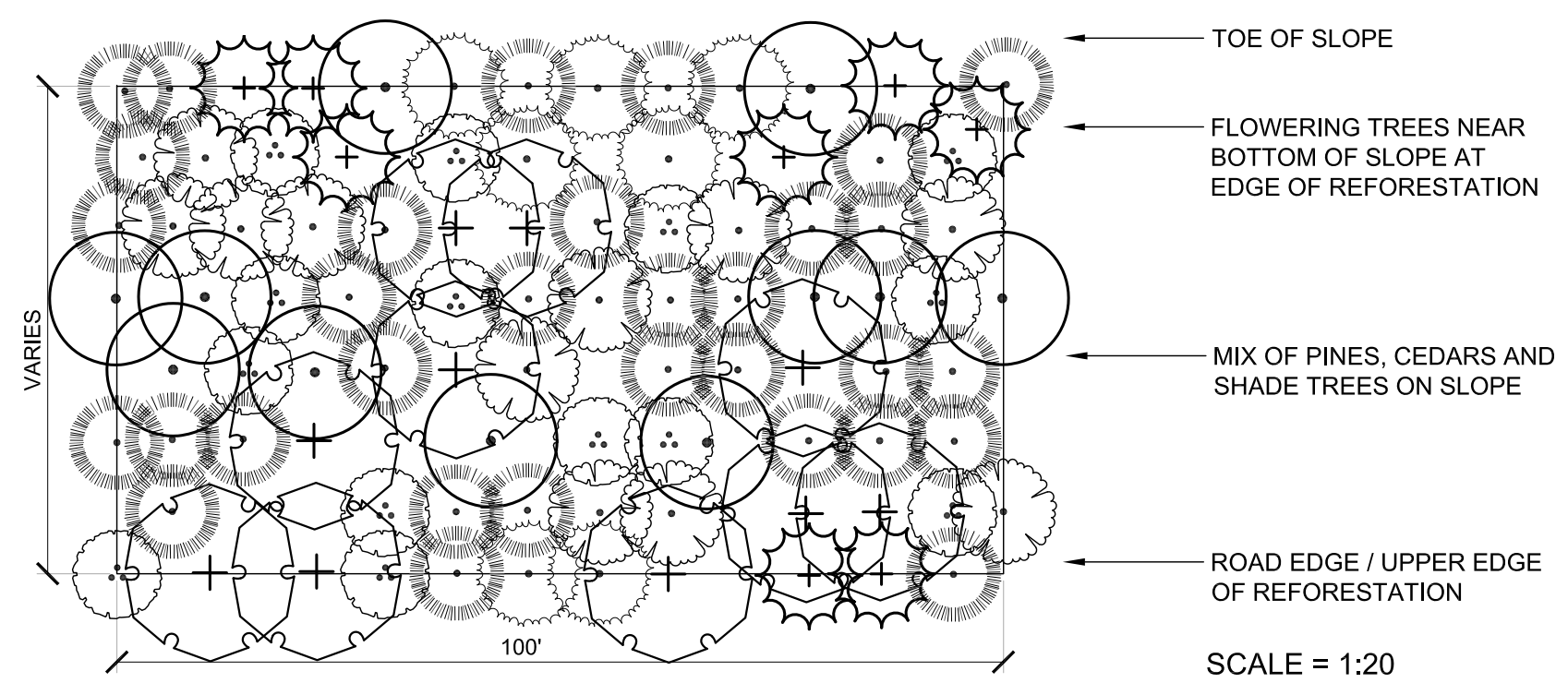
1. Identify any subsurface utilities prior to commencing work.
2. All plant materials to comply with American Standard for Nursery Stock ANSI Z60.
3. Substitutions of plant materials specified can only occur with prior approval by Landscape Architect and/or Engineer.
4. No plant shall be installed closer than 10' to the back of guardrail, or edge of pavement if no guardrail is present.
5. Install all plant materials as defined by details.
6. All trees to be installed before April 30 or after October 1.
7. All planted areas on reforested slopes to be mulched with 3" hardwood mulch.
8. All trees not on the reforested slopes to be in uniform bed of mulch with the bed edge no less than 5' and no more than 6' from the trunk of the tree.
9. Contractor to guarantee plant materials for a one year period following substantial completion.
10. Contractor to water plant material as needed until established.
11. Areas damaged by activities of contractor shall be re-established to pre-disturbance condition at no additional cost to the owner.
12. Use herbicides, pesticides, and fertilizer in a manner consistent with the federal insecticide, fungicide, and rodenticide act, NCDOT standards and specifications, and in accordance with label restrictions.
13. Contractor shall insure that all plant material is free of fire ants prior to installation.
14. Locations of plants to be flagged by contractor and verified in the field by Landscape Architect, Engineer and/or Owner prior to installation

PLANTING KEY:

- CC - *Cercis canadensis* / Eastern Redbud
- CK - *Cornus kousa* 'National' / National Kousa Dogwood
- JV - *Juniperus virginiana* / Eastern Red Cedar
- LT - *Liriodendron tulipifera* / Tulip Poplar
- NW - *Nyssa Sylvatica* 'Wildfire' / Wildfire Black Gum
- PT - *Pinus taeda* / Loblolly Pine
- QP - *Quercus palustris* / Pin Oak
- QS - *Quercus shumardii* / Shumard Oak
- FP - *Fraxus Pennsylvanica* / Green Ash
- IC - *Ilex cornuta* 'Needlepoint' / Needlepoint Holly
- IN - *Ilex x 'Nellie R Stevens'* / Nellie R Stevens Holly
- LC - *Loropetalum chinense* 'Ever Red' / Ever Red Loropetalum
- MC - *Myrica cerifera* / Wax myrtle

REFORESTATION TYPICAL PLANTING PLAN (PER 100 LF)

- NOTES:**
1. 35% OF PLANT MATERIAL TO BE LOBLOLLY PINE TREES.
 2. 35% OF PLANT MATERIAL TO BE DECIDUOUS CANOPY TREES (QUERCUS PALUSTRIS, QUERCUS SHUMARDII, FRAXUS PENNSYLVANICA).
 3. 15% OF PLANT MATERIAL TO BE DECIDUOUS FLOWERING TREES (CORNUS KOUSA, CERCIS CANADENSIS).
 4. 15% OF PLANT MATERIAL TO BE CEDARS.
 5. REFER TO PLANT SCHEDULE FOR PLANT SPECIFICATIONS & QUANTITIES.
 6. NUMBER OF TREES PER 100' VARIES BASED ON WIDTH OF PLANTING AREA.



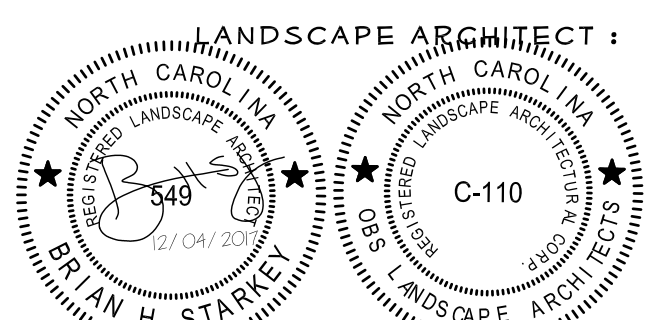
REFORESTATION NOTES

1. Limits of Reforested Areas are to be staked/flagged and approved by Owner in the field prior to installation.
2. All trees noted for Reforested Areas shall be installed on 8' staggered centers in a random fashion in order to evenly disperse species and cultivars.
3. All Reforested Areas shall be defined with white top stakes, per Specification 1670.
4. Refer to Planting Plans for extents of Reforestation Areas and species and cultivar mixes.



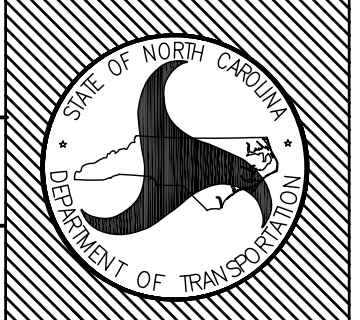
NCDOT - ROADSIDE ENVIRONMENTAL UNIT
LANDSCAPE DESIGN & DEVELOPMENT
 1557 MAIL SERVICE CENTER, RALEIGH, NC 27699-1557
 PH: 919-707-2920 FAX: 919-715-2554
[HTTP://WWW.NCDOT.ORG/DOH/OPERATIONS/DP_CHIEF_ENG/ROADSIDE/](http://www.ncdot.org/DOH/OPERATIONS/DP_CHIEF_ENG/ROADSIDE/)

ROCHESTER HEIGHTS
140 - RALEIGH, NC
 PROJECT #: **46157.11**

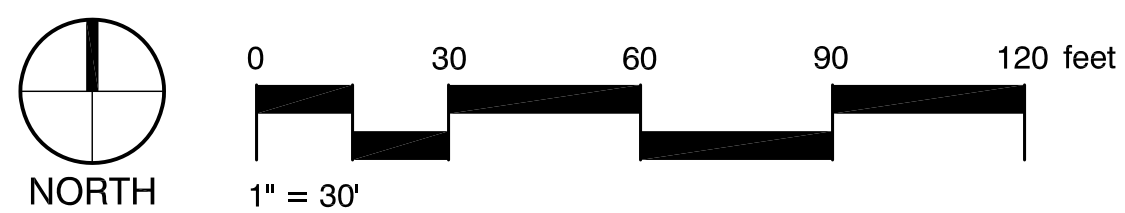
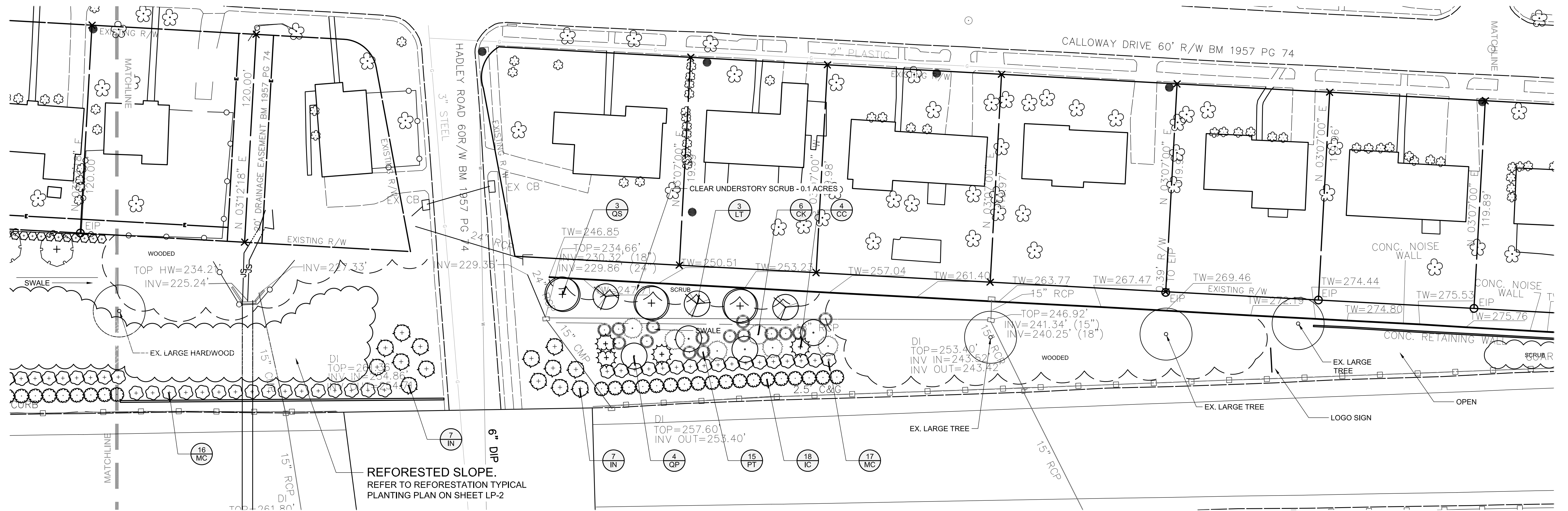


SHEET DESCRIPTION	PLANTING PLAN

PREL DESIGN DATE: 01.27.2015
CHECKED BY & DATE: BHS / 01.27.2015
FINAL DESIGN DATE: 06.30.2017



SHEET NO:
LP 1
 TOTAL SHEET NO:
4



GENERAL PLANTING NOTES:

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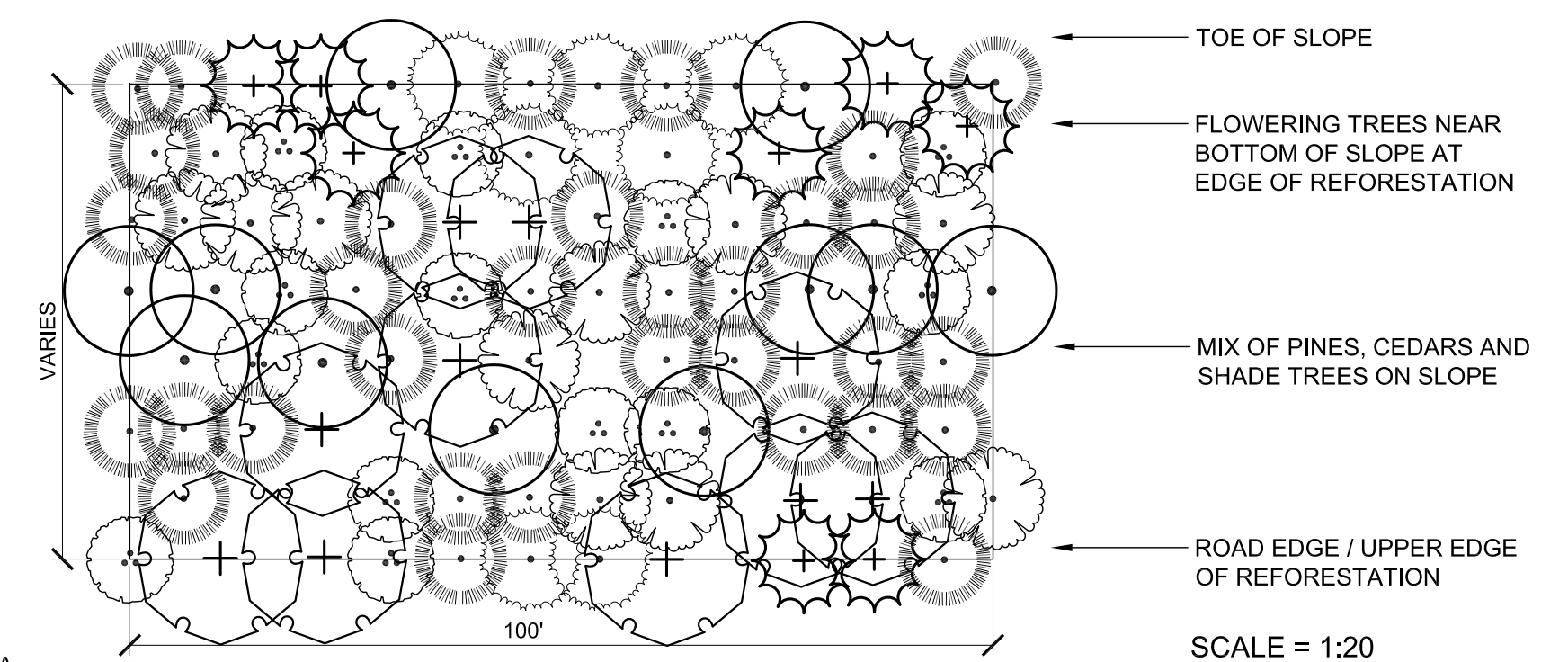
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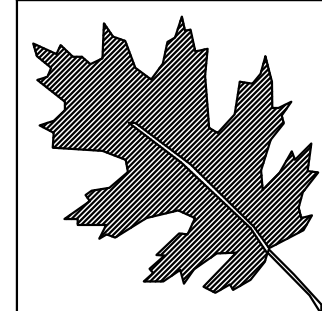
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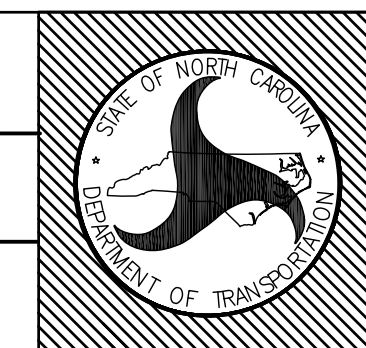
NCDOT - ROADSIDE ENVIRONMENTAL UNIT
LANDSCAPE DESIGN & DEVELOPMENT
 1557 MAIL SERVICE CENTER, RALEIGH, NC 27699-1557
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**ROCHESTER HEIGHTS
 140 - RALEIGH, NC**
 PROJECT #: **46157.11**

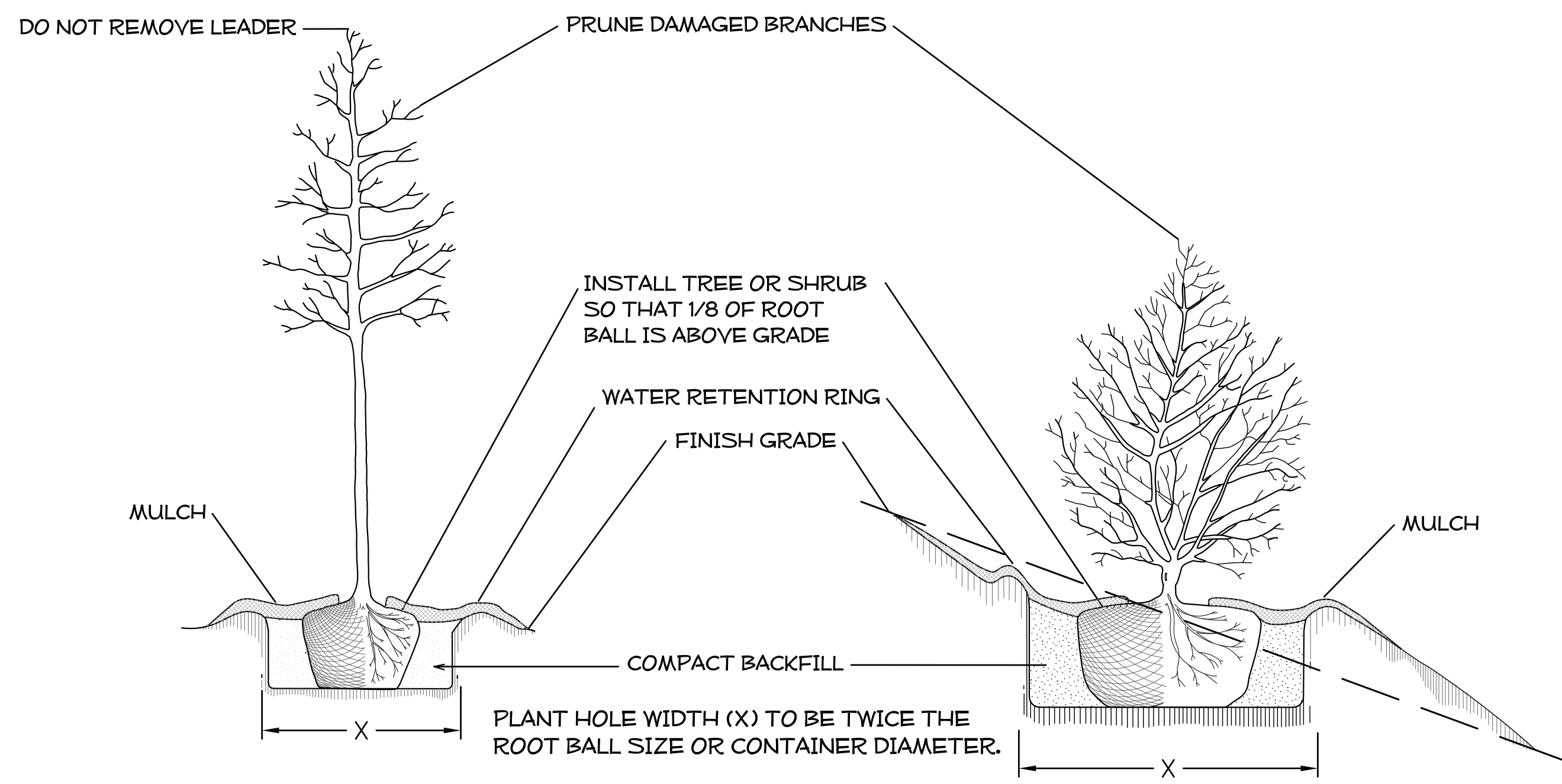


PLANTING PLAN

PREL DESIGN DATE:
01.27.2015
 CHECKED BY & DATE:
BHS / 01.27.2015
 FINAL DESIGN DATE:
06.30.2017

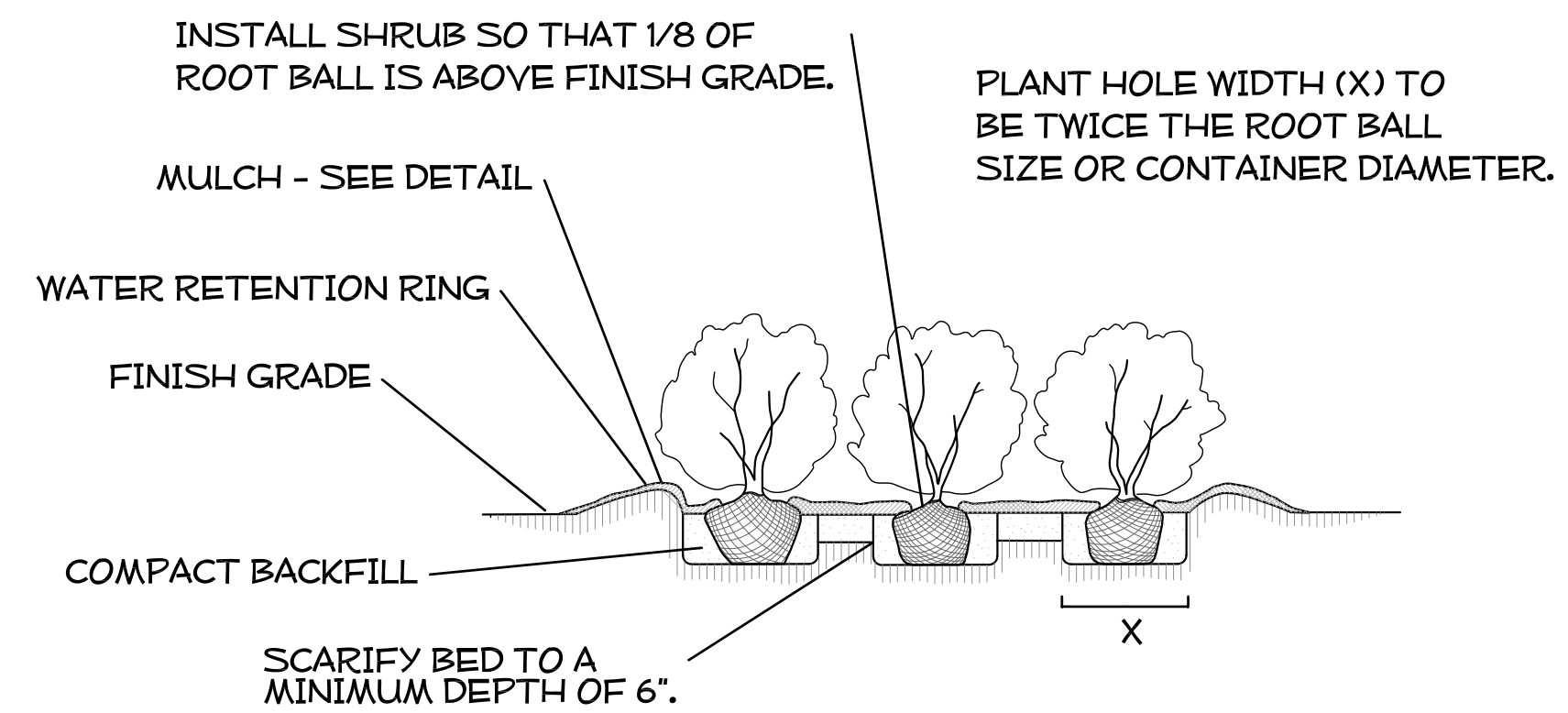


SHEET NO:
LP 2
 TOTAL SHEET NO:
4



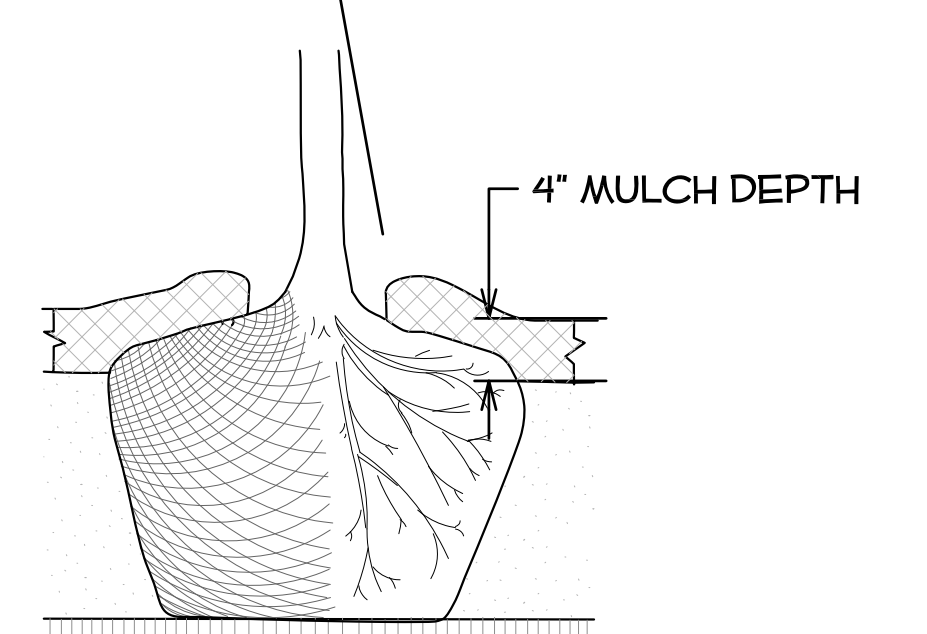
TREE OR SHRUB PLANTING DETAIL
(LEVEL GROUND)

TREE OR SHRUB PLANTING DETAIL
(SLOPING GROUND)



SHRUB BED PLANTING DETAIL

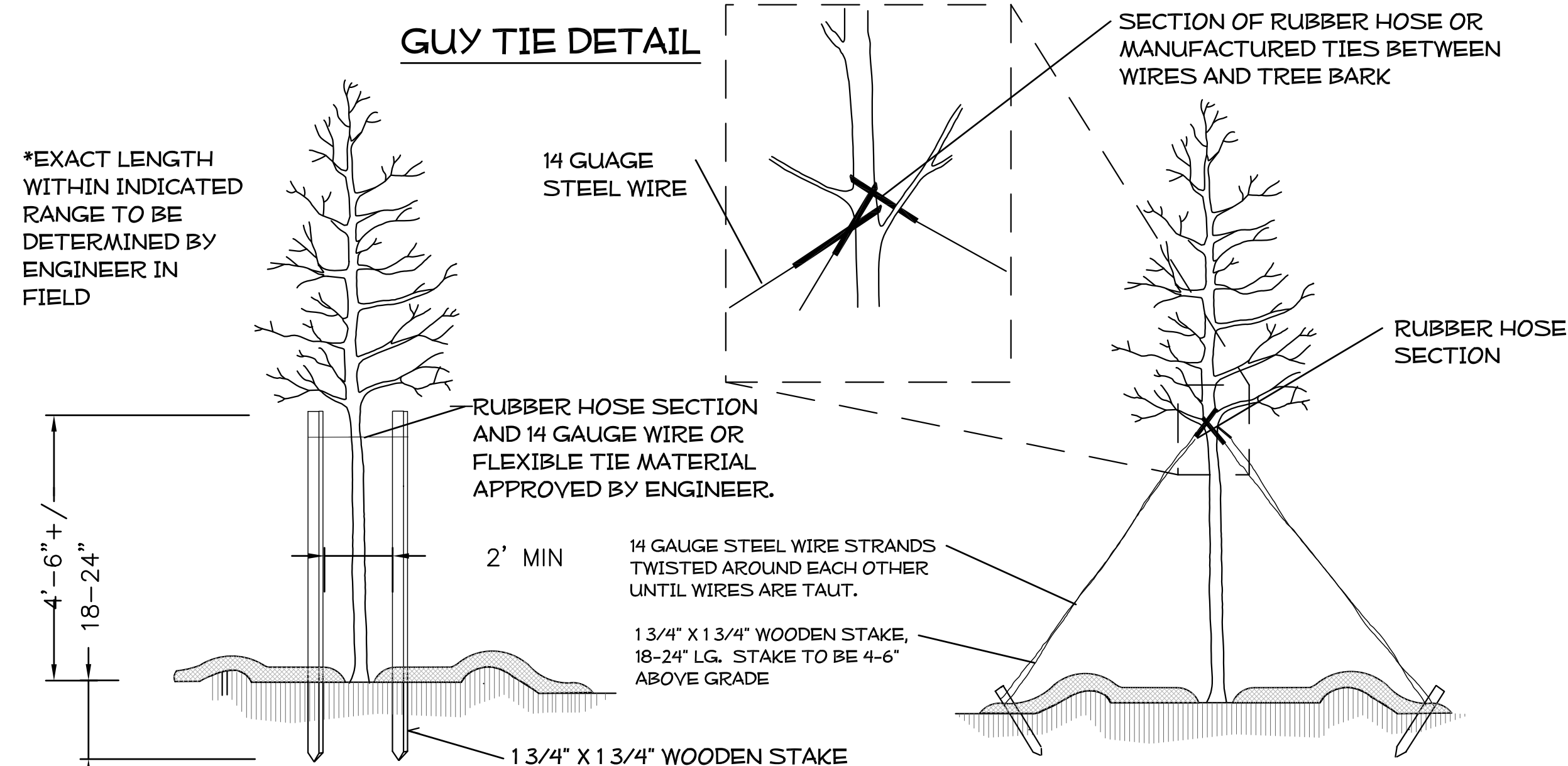
DO NOT PLACE MULCH WITHIN 2" OF TRUNK OR STEM.



MULCH DETAIL

NOTES:

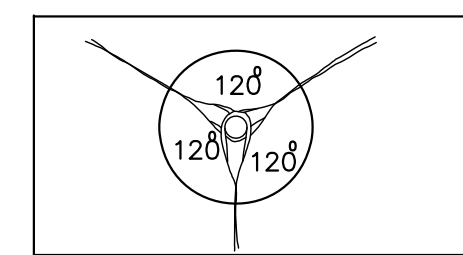
- SCHEDULE FOR PLANT HOLE SIZE: PLANT HOLE WIDTH (X) TO BE TWICE THE ROOT BALL SIZE OR CONTAINER DIAMETER.
- SEE STANDARD SPECIFICATIONS FOR PLANT BED FUMIGATION AND HERBICIDAL TREATMENT.
- APPLY FERTILIZER AT PLANTING TIME IN THE FORM OF A SLOW RELEASE PELLET OR TABLET. APPLY AT RATE RECOMMENDED BY MANUFACTURER. BOTH RATE AND FORMULATION MUST BE APPROVED BY FIELD ENGINEER PRIOR TO APPLICATION.
- REMOVE WIRE BASKET AND FOLD BURLAP BACK FROM TOP OF ROOT BALL BEFORE BACKFILLING IS COMPLETE.
- ALL PRUNING TO FOLLOW STANDARD ARBORICULTURAL PRACTICES AS SPECIFIED BY INTERNATIONAL SOCIETY OF ARBORICULTURE.
- DO NOT ATTEMPT TO STRAIGHTEN A TREE THAT HAS BEEN PLANTED AT AN ANGLE WITH THE USE OF STAKING OR GUYING. DIG TREE AND REPLANT TO UPRIGHT POSITION.



PLAN VIEW

STAKING DETAIL
(TREES 6'-10')

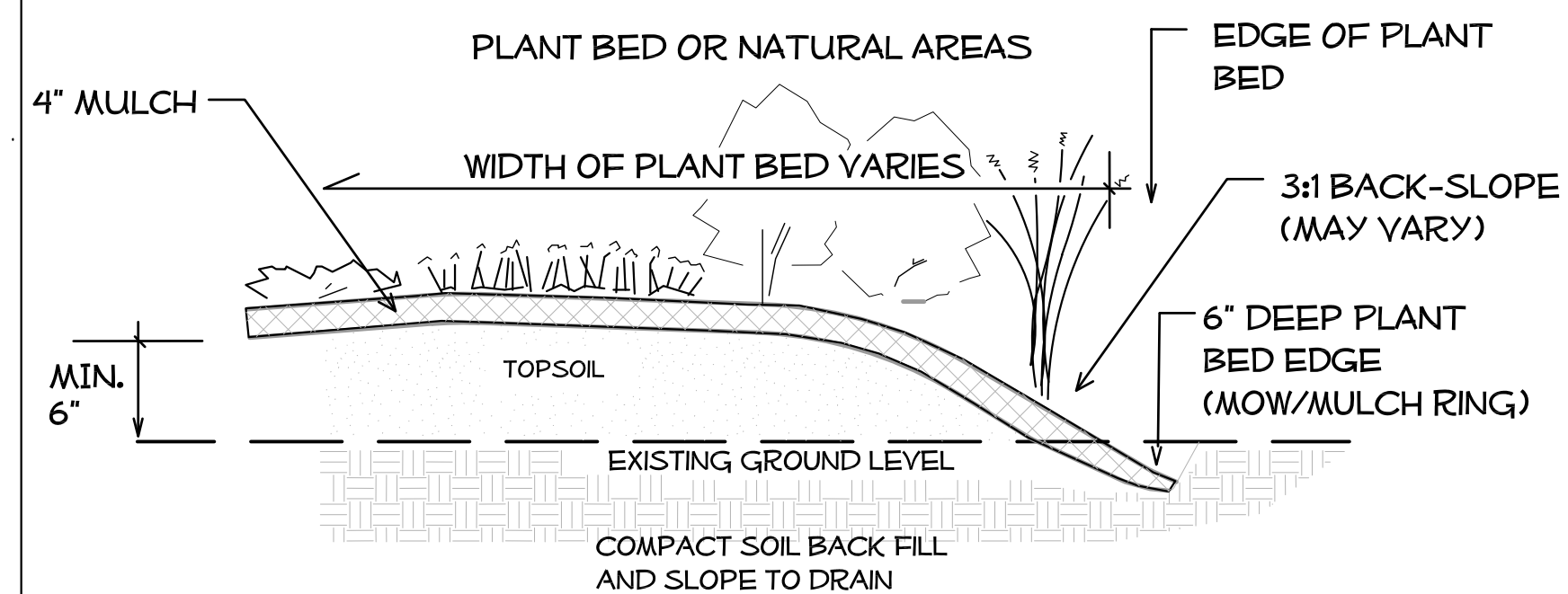
USE AS DIRECTED BY FIELD ENGINEER



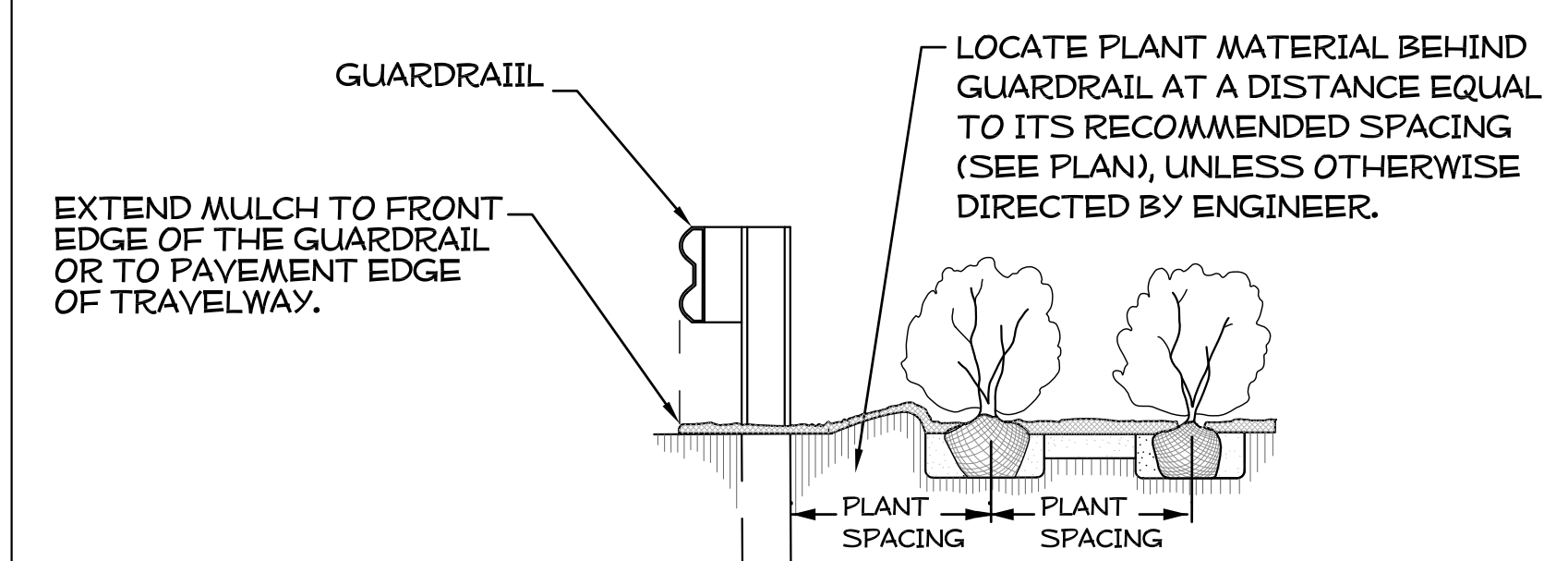
PLAN VIEW

GUYING DETAIL
(TREES 10' OR LARGER)

USE AS DIRECTED BY FIELD ENGINEER



PLANT BED EDGE DETAIL



GUARDRAIL MULCHING DETAIL

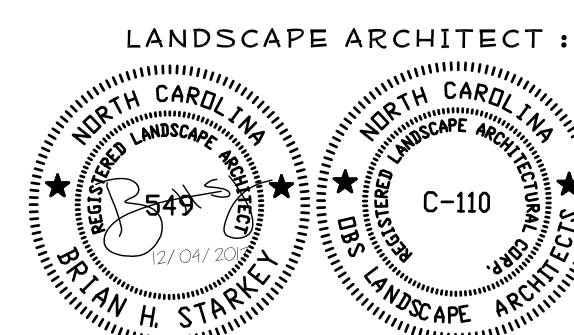
USE AS DIRECTED BY FIELD ENGINEER



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Rochester Heights
I-40, RALEIGH, NC

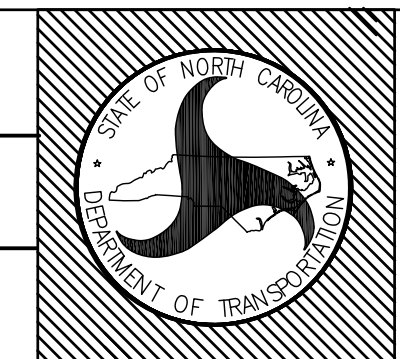
PROJECT #: **46157.11**



SHEET DESCRIPTION

PLANTING DETAILS

PREL DESIGN DATE:
01.27.2015
CHECKED BY & DATE:
BHS / 01.27.2015
FINAL DESIGN DATE:
06.30.2017



SHEET NO :
LD-1
TOTAL SHEET NO :
4