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FINAL APPROVAL

PROJECT NUMBER: SDRSF-2017-00077

ENGINEERING

PCSO / DETENTION / DRAINAGE PLAN

EROSION CONTROL

URBAN FORESTRY

TREE ORDINANCE

CDOT

NOTE: SCHEDULE PRE-CONSTRUCTION MEETING AT LEAST 48 HRS. PRIOR TO ANY LAND DISTURBING ACTIVITY USING THE ONLINE FORM FOUND AT <http://charlottenc.gov/ld>

APPROVED

By mchapman at 10:48 am, Jul 20, 2018

APPROVED

APPROVED

APPROVED

APPROVED FOR CONSTRUCTION

CHARLOTTE-MECKLENBURG PLANNING DEPARTMENT

By: Joshua Weaver 7-20-2018

GENERAL NOTES

- A PRELIMINARY PLAN APPROVED UNDER THE PROVISIONS OF THE SUBDIVISION ORDINANCE WILL BE VALID FOR A PERIOD OF THREE YEARS. FOR SUCH APPROVAL TO REMAIN VALID BEYOND THREE, WORK ON THE SITE IN FURTHERANCE OF THE PLAN IS REQUIRED.
- THE OWNER WISHES TO SAVE CERTAIN TREES ON THE SITE. PLACE TREE BARRICADES AS SHOWN ON THE PLAN OR AS SPECIFIED BY THE OWNER BEFORE CONSTRUCTION ACTIVITY BEGINS.
- COORDINATE ALL CURB AND STREET GRADES IN INTERSECTION WITH INSPECTOR.
- ALL ROAD IMPROVEMENTS AT PUMP STATION ROAD ARE TO BE COORDINATED WITH THE CITY OF CHARLOTTE ENGINEERING DEPARTMENT PRIOR TO CONSTRUCTION.
- DEVELOPER WILL PROVIDE STREET SIGNS PER CLDSM# 50.05 (8" SIGNS ONLY).
- SIGHT TRIANGLES SHOWN ARE THE MINIMUM REQUIRED.
- IN ROLLING AND HILLY TERRAINS, SWEEPING OF THE STONE BASE AND/OR APPLICATION OF A TACK COAT MAY BE REQUIRED NEAR INTERSECTIONS. THESE REQUIREMENTS WILL BE ESTABLISHED BY THE INSPECTOR AND BASED ON FIELD CONDITIONS.
- APPROVAL OF THIS PLAN IS NOT AN AUTHORIZATION TO GRADE ADJACENT PROPERTIES. WHEN FIELD CONDITIONS WARRANT OFF-SITE GRADING, PERMISSION MUST BE OBTAINED FROM THE AFFECTED PROPERTY OWNERS.
- IN ORDER TO ENSURE PROPER DRAINAGE, KEEP A MINIMUM OF 0.5% SLOPE ON THE CURB.
- SUBSURFACE DRAINAGE FACILITIES MAY BE REQUIRED IN THE STREET RIGHT-OF-WAY IF DEEMED NECESSARY BY THE INSPECTOR.
- CURB AND GUTTER SHOWN ON PLANS ALONG PUMP STATION ROAD MAY BE ADJUSTED BASED UPON FIELD STAKING BY CITY ENGINEERING/CDOT. ASSOCIATED STORM DRAINAGE MAY ALSO REQUIRE MODIFICATION BASED UPON FIELD CONDITIONS.
- ALL STORM PIPE TO BE CLASS III RCP UNLESS OTHERWISE NOTED.
- THE PURPOSE OF THE STORM DRAINAGE EASEMENT (SDE) IS TO PROVIDE STORM WATER CONVEYANCE. BUILDINGS ARE NOT PERMITTED IN THE EASEMENT AREA. ANY OTHER OBJECTS WHICH IMPEDE STORM WATER FLOW OR SYSTEM MAINTENANCE ARE ALSO PROHIBITED.
- HIGH-DENSITY POLYETHYLENE (HDPE) STORM DRAINAGE PIPE INSTALLED WITHIN EXISTING OR PROPOSED PUBLIC STREET RIGHT-OF-WAY MUST BE APPROVED BY NCDOT/THE CITY'S INSPECTOR PRIOR TO ANY BACKFILL BEING PLACED. BACKFILL MATERIAL MUST BE APPROVED BY THE CITY INSPECTOR PRIOR TO PLACEMENT OF THE MATERIAL WITHIN THE PUBLIC STREET RIGHT-OF-WAY.
- THE DEVELOPER SHALL MAINTAIN EACH STREAM, CREEK, OR BACKWASH CHANNEL IN AN UNOBSTRUCTED STATE AND SHALL REMOVE FROM THE CHANNEL AND BANKS OF THE STREAM ALL DEBRIS, LOGS, TIMBER, JUNK AND OTHER ACCUMULATIONS.
- PE SEALED SHOP DRAWINGS FOR RETAINING WALL MUST BE SUBMITTED TO CITY ENGINEER PRIOR TO CONSTRUCTION.
- "AS-BUILT" DRAWINGS AND PLANS OF THE STORM DRAINAGE SYSTEM, INCLUDING DESIGNED DITCHES, MUST BE SUBMITTED PRIOR TO SUBDIVISION FINAL INSPECTION TO THE CITY/COUNTY ENGINEERING DEPARTMENT IN ACCORDANCE WITH THE CITY/COUNTY SUBDIVISION ORDINANCE.
- PRIOR TO PLAT RECORDECTION, OFFSITE R/W AND CONSTRUCTION EASEMENTS ARE REQUIRED TO BE OBTAINED ACCORDING TO THE GUIDELINES OF THE "OFFSITE R/W ACQUISITION PROCESS". THESE NEEDED R/W AND CONSTRUCTION LIMITS ARE CLEARLY SHOWN ON THE ROADWAY IMPROVEMENT PLAN.
- PER SECTION 18-175(E) OF CITY CODE AND SECTION 10.0 OF THE CITY'S POST CONSTRUCTION CONTROLS ADMINISTRATIVE MANUAL, ALL REQUIRED NATURAL AREAS AND/OR POST CONSTRUCTION CONTROLS EASEMENTS (PCEs) MUST BE RECORDED PRIOR TO THE ISSUANCE OF THE CERTIFICATE OF OCCUPANCY.
- THE DEVELOPER SHALL CONTACT THE CHARLOTTE DEPARTMENT OF TRANSPORTATION (CUTS JORDI, 704-336-7080) TO IDENTIFY ANY CONFLICTS WITH TRAFFIC SIGNALIZATION EQUIPMENT. 60-90 DAYS WILL BE REQUIRED TO COORDINATE RELOCATION, DEVELOPER SHALL BE RESPONSIBLE FOR ALL RELATED RELOCATION COST AND/OR ANY REPAIR COST CAUSED BY THE CONTRACTOR/DEVELOPER.
- CERTIFICATION AND STREET CUT PERMITS ARE REQUIRED FOR UTILITY CUTS ON CITY STREETS. ALLOW 7 DAYS PROCESSING FOR PERMIT. FOR INFORMATION CONTACT CHARLOTTE DEPARTMENT OF TRANSPORTATION (704-336-4025) OR VISIT [HTTP://CHARMECK.ORG/DEPARTMENTS/TRANSPORTATION/STREET-MAINTENANCE/HOME.HTM](http://charmeck.org/departments/transportation/street-maintenance/home.htm)
- NON-STANDARD ITEMS (E. PAVERS, IRRIGATION SYSTEMS, ETC.) IN THE RIGHT-OF-WAY REQUIRE A RIGHT-OF-WAY ENCROACHMENT AGREEMENT WITH THE CHARLOTTE DEPARTMENT OF TRANSPORTATION NORTH CAROLINA DEPARTMENT OF TRANSPORTATION BEFORE INSTALLATION. FOR CITY OF CHARLOTTE MAINTAINED STREETS, CONTACT CDOT AT (704) 336-3888.
- SIDEWALK WITHIN THE CITY'S R/W THAT REQUIRES REPLACEMENT AS PART OF THE DEVELOPMENT AND/OR STREET IMPROVEMENTS SHOULD BE PHASED IN SUCH A WAY AS TO MINIMIZE THE DURATION OF THE SIDEWALK CLOSURE TO THE EXTENT FEASIBLE. THE DEVELOPER SHOULD MAKE EVERY ATTEMPT TO HAVE SIDEWALK REPAIRED AND REOPENED FOR PUBLIC USE WITHIN 30 DAYS OF REMOVAL.
- ANY WORK WITHIN THE CITY'S R/W THAT REQUIRES CLOSURE OF A SIDEWALK OR TRAVEL LANE MUST BE APPROVED BY CDOT AND WILL REQUIRE A R/W USE PERMIT OR R/W LEASE DEPENDING UPON THE PROPOSED DURATION OF CLOSURE. THESE APPROVALS ARE IN ADDITION TO SITE APPROVALS AND SHOULD BE COORDINATED WITH CDOT PRIOR TO CONSTRUCTION. CONTRACTOR SHALL CONTACT CDOT AT (704) 432-1962 AT LEAST 5 BUSINESS DAYS PRIOR TO BEGINNING WORK FOR IMPACTS LESS THAN 30 DAYS. CONTRACTOR SHALL CONTACT CDOT AT (704) 336-8348 AS SOON AS POSSIBLE FOR IMPACTS GREATER THAN 30 DAYS. EVERY EFFORT SHALL BE MADE TO CONSTRUCT IMPROVEMENTS WITH MINIMAL IMPACT TO DRIVERS AND PEDESTRIANS.
- CONSTRUCTION STAGING WITHIN CITY R/W LASTING MORE THAN 30 DAYS REQUIRES A R/W LEASE AGREEMENT. CONTRACTOR SHALL CONTACT CDOT AT (704) 336-8348.
- DEVELOPER TO CONTACT CDOT (ANTHONY MENDEZ, 704-336-4971) DURING SITE PLAN PREPARATION TO DISCUSS STREET LIGHTING REQUIREMENTS. IF ANY, FOR THIS PROJECT, COORDINATE WITH CDOT AS NECESSARY TO DETERMINE LIGHTING LEVELS, LIGHTING LAYOUT AND REQUIREMENTS FOR INSTALLATION.
- DIRECT VEHICULAR ACCESS TO PUMP STATION ROAD FROM LOTS 1 AND 22 IS PROHIBITED.

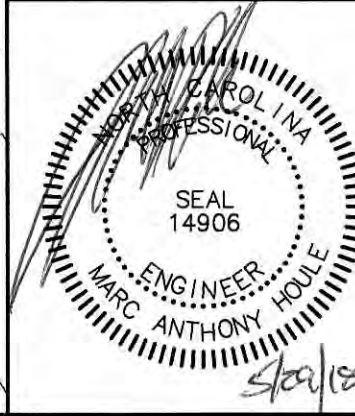
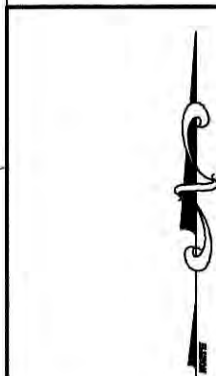
- SLOPES SHALL BE GRADED NO STEEPER THAN 2:1.
- C.O.S. - COMMON OPEN SPACE
- U.N.A. - UNDISTURBED NATURAL AREA
- S.D.E. - STORM DRAINAGE EASEMENT
- COMMON OPEN SPACE TO BE MAINTAINED BY HOMEOWNERS ASSOCIATION.
- SIDEWALKS ARE TO MEET ALL A.D.A. REQUIREMENTS FOR SLOPE AND SPACING BETWEEN TURNAROUND AREA.
- CONSTRUCTION WILL BEGIN IN MARCH OF 2018 AND WILL BE COMPLETED WITHIN 2 YEARS.
- ALL RIGHT-OF-WAY AND CURB TAPERS ARE 20:1 UNLESS OTHERWISE NOTED.
- ALL ON SITE TOPOGRAPHY IS FROM CITY OF CHARLOTTE GIS.
- ACCESSIBLE RAMPS SHALL BE INSTALLED AT ALL INTERSECTIONS PER NCDOT/CLDS #10.31 THRU 10.35.
- SANITARY SEWER WILL BE PROVIDED BY CHARLOTTE WATER.
- THERE WILL NOT BE ANY DEMOLITION LANDFILL ON SITE.

GRAPHIC SCALE



( IN FEET )  
1 inch = 100 ft.

THIS PLAN IS A FINAL DRAWING-NOT RELEASED FOR CONSTRUCTION UNLESS INITIALLED/DATED AS APPROVED:  
APPROVED: / 5/25/18  
INITIALS DATE



NO.	DATE	REVISION	BY	PROJECT NO.
3	5/29/18	PER CDOT COMMENTS	BTG	
2	04/12/18	REVISED PER CITY OF CHARLOTTE COMMENTS	YGR	
1	01/23/18	REVISED PER CITY OF CHARLOTTE AND CLIENT COMMENTS	YGR	
SHEET TITLE				PROJECT NO.
COVER SHEET				SCALE 1"=100'
PROJECT				DATE 4/25/17
MOUNTAIN GLEN				DRAWN BY ZNH
CITY OF CHARLOTTE, MECK. CO., N.C.				CHECKED BY MAH
FOR: LAND INVESTMENT RESOURCES, LLC				DRAWING NO.
				258-77
				SHT 1 OF 18



YARBROUGH WILLIAMS & HOULE, INC.  
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Charlotte, North Carolina, 28104  
704.556.1990 704.556.0505(fax)



PLAN AND PUMP STATION ROAD CONSTRUCTION PLANNING SITE 5/20/2018 3:01:11 PM



PCCO Summary		
Original Parcel ID Number(s):	023-111-15	
Development Type:	Single Family	
Subject to PCCO? Y/N	Yes	
If NO, why?		
Watershed:	WESTERN CATAWBA	
Disturbed Area (ac.):	12.48	
Site Area (ac.):	16.44	
	DA #1	DA #2
Total on-site Drainage Area (ac.):	7.70	2.52
Existing Built-upon-area (SF):	0	0
Existing BUA to be removed (SF):	0	0
Existing BUA to remain (SF):	0	0
Proposed new BUA (SF):	113,382	47,081
Proposed % BUA:	34.4%	42.9%
Density (High/Low)	HIGH	HIGH
Total Post-Project BUA for site:	171,509 S.F.	
Development of Redevelopment?	Development	
Natural Area Required (ac.):	2.88 Ac.(17.5%)	
Natural Area Provided, total (ac.):	3.056 Ac.(18.59%)	
Undisturbed Tree Natural Area Preserved(ac):	3.056 ac.	
Total Stream Buffer protected on-site (ac.):	0.00 ac.	
Transit Station Area? Y/N	No	
Distressed Business District? Y/N	No	
Mitigation Type (if applicable)	N/A	
Natural Area Mitigation? Y/N	No	
Buffer Mitigation? Y/N	No	
Total Phosphorous Mitigation? Y/N	No	



**PROJECT INFORMATION**  
GROSS SITE AREA: 17.29 AC  
AREA IN DEDICATED R/W: 0.85 ACRES  
NET SITE AREA: 16.44 ACRES  
AREA IN DUKE POWER R/W: 2.40 ACRES  
LOTS PROPOSED: 22 (1.34 DUA)  
COMMON OPEN SPACE: 1.67 ACRES(10.16%)  
ZONING: R-3 TREE SAVE INCENTIVES  
PARCEL: 023-111-15

**TYPICAL LOT AND YARD DIMENSIONS**  
MIN. LOT SIZE 21,780 s.f.  
TYP. LOT WIDTH 70'  
MIN. LOT WIDTH 70'  
TYP. FRONT SETBACK 20'  
MIN. SIDEYARD AT R/W 10'  
MIN. REAR YARD 45' EXTERIOR  
MIN. SIDE YARD 6'

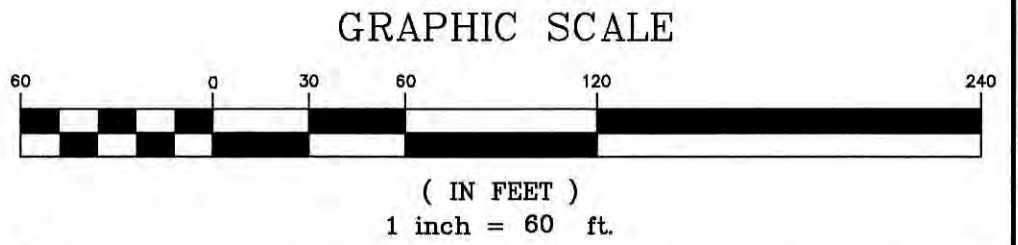
**\*TREE ORDINANCE**

**TREE SAVE AREAS:**  
• NET SITE AREA: 14.04 ACRES (GROSS AREA LESS DUKE POWER R/W AND NCDOT R/W - 3.25 ACRES )  
TREE SAVE AREA REQUIRED: 1.41 ACRES(10%)  
TREE SAVE AREA PROVIDED: 1.485 ACRES(10.58%)

**UNDISTURBED NATURAL AREAS(U.N.A.):**  
• SITE AREA: 16.44 ACRES (GROSS AREA LESS NCDOT R/W)  
• TOTAL AREA IN DUKE R/W: 2.406 AC  
2.406 x 25% = 0.602 ACRES ALLOWABLE U.N.A. IN DUKE POWER R/W  
• TOTAL UNDISTURBED NATURAL AREA REQUIRED: 3.03 ACRES  
TREE SAVE AREA PROVIDED 1.485 ACRES  
UNDISTURBED NATURAL AREA IN DUKE R/W: 0.602 ACRES  
UNDISTURBED NATURAL AREA PROVIDED: 0.969 ACRES  
TOTAL UNDISTURBED NATURAL AREA PROVIDED: 3.056 ACRES(18.59%)

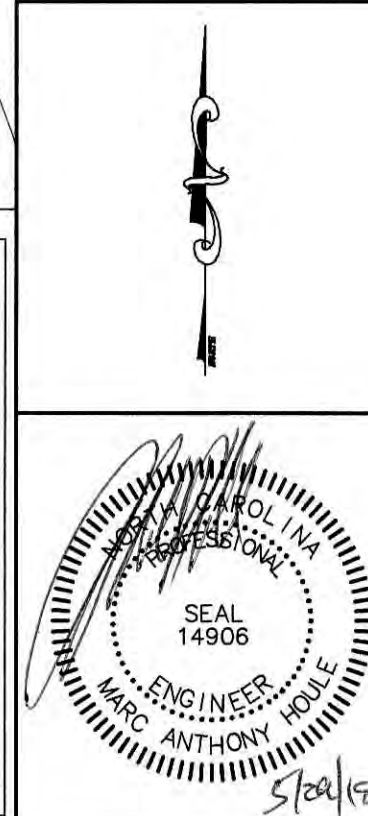
- TREE SAVE AREA AND UNDISTURBED NATURAL AREAS SHALL BE FLAGGED IN THE FIELD FOR URBAN FORESTRY VERIFICATION

**MOUNTAIN ISLAND LAKE WATERSHED  
OVERLAY CRITICAL AREA IV  
IMPERVIOUS SUMMARY:**  
SITE AREA: 716,388 sf(GROSS AREA LESS NCDOT R/W)  
ROADWAY: 42,759 sf  
SIDEWALK: 15,280 sf  
LOTS:22 @ 5,170 sf = 113,740 sf  
171,779 sf(23.98%)



**THIS PLAN IS A FINAL DRAWING-NOT  
RELEASED FOR CONSTRUCTION  
UNLESS INITIALLED/DATED AS APPROVED:**  
APPROVED: 5/21/18  
INITIALS DATE

TAKEN FROM:			
MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD)			
(1)	STOP	TABLE 2B-1 REGULATORY SIGN SIZES SIGN MUTCD CODE STOP R1-1	SECTION 2B.04 CONVENTIONAL (30"x30")
(2)	SPEED LIMIT 25	SPEED LIMIT R2-1	2B.13 (24"x30")
*NOTE: ALL SIGNS TO UTILIZE HIGH INTENSITY PRISMATIC SHEETING OR EQUIVALENT. NO ENGINEERING GRADE SHEETING ALLOWED.			



SHEET TITLE			
SITE PLAN			
PROJECT	MOUNTAIN GLEN CITY OF CHARLOTTE, MECK. CO., N.C. FOR: LAND INVESTMENT RESOURCES, LLC		
SCALE	1"=60'		
DATE	4/25/17		
DRAWN BY	ZNH		
CHECKED BY	MAH		
DRAWING NO.	258-76		
SHEET	2 OF 18		