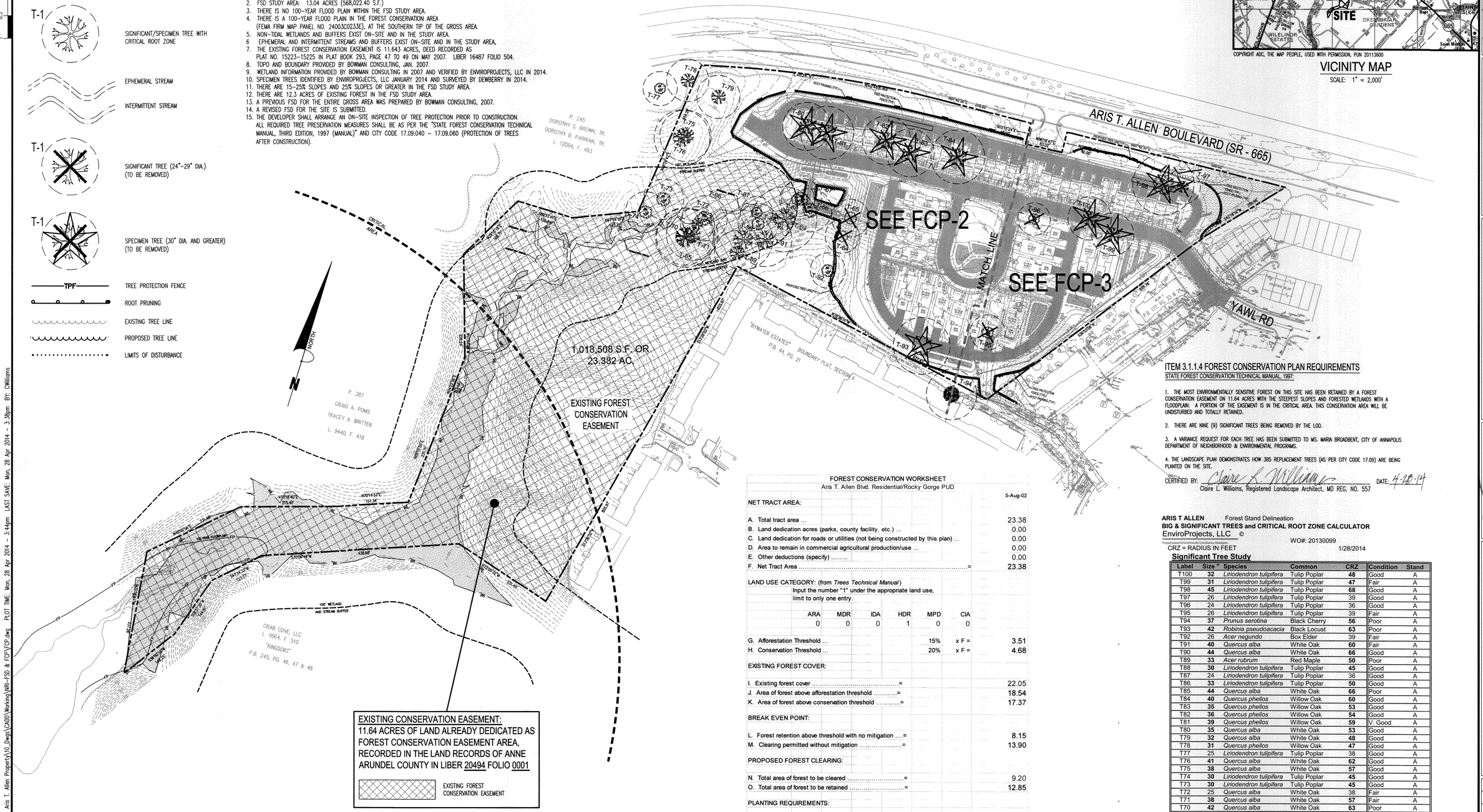
FOREST CONSERVATION PLAN

LEGEND

- FORESTED WETLANDS
- EXISTING FOREST CONSERVATION EASEMENT
- WL — WETLAND DELINEATION LINE
- 100' WETLAND/STREAM BUFFER
- FP — 100-YEAR FLOODPLAIN
- T-1 — SIGNIFICANT/SPECIMEN TREE WITH CRITICAL ROOT ZONE
- EPHEMERAL STREAM
- INTERMITTENT STREAM
- T-1 — SIGNIFICANT TREE (24"-29" DIA.) (TO BE REMOVED)
- T-1 — SPECIMEN TREE (30" DIA. AND GREATER) (TO BE REMOVED)
- TPF — TREE PROTECTION FENCE
- ROOT PRUNING
- EXISTING TREE LINE
- PROPOSED TREE LINE
- LIMITS OF DISTURBANCE

SITE NOTES:

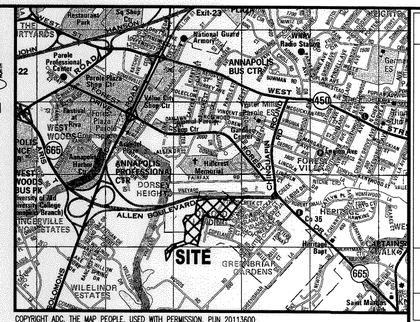
1. GROSS TRACT AREA: 23.382 ACRES (1,018,508 S.F.)
2. FSD STUDY AREA: 13.04 ACRES (568,022.40 S.F.)
3. THERE IS NO 100-YEAR FLOOD PLAIN WITHIN THE FSD STUDY AREA.
4. THERE IS A 100-YEAR FLOOD PLAIN IN THE FOREST CONSERVATION AREA (FEMA FIRM MAP PANEL NO. 24003C0233E), AT THE SOUTHERN TIP OF THE GROSS AREA.
5. NON-TIDAL WETLANDS AND BUFFERS EXIST ON-SITE AND IN THE STUDY AREA.
6. EPHEMERAL AND INTERMITTENT STREAMS AND BUFFERS EXIST ON-SITE AND IN THE STUDY AREA,
7. THE EXISTING FOREST CONSERVATION EASEMENT IS 11.643 ACRES, DEED RECORDED AS PLAT NO. 15223-15225 IN PLAT BOOK 293, PAGE 47 TO 49 ON MAY 2007. LIBER 16487 FOLIO 504.
8. TOPO AND BOUNDARY PROVIDED BY BOWMAN CONSULTING, JAN. 2007.
9. WETLAND INFORMATION PROVIDED BY BOWMAN CONSULTING IN 2007 AND VERIFIED BY ENVIROPROJECTS, LLC IN 2014.
10. SPECIMEN TREES IDENTIFIED BY ENVIROPROJECTS, LLC JANUARY 2014 AND SURVEYED BY DEWBERRY IN 2014.
11. THERE ARE 15-25% SLOPES AND 25% SLOPES OR GREATER IN THE FSD STUDY AREA.
12. THERE ARE 12.3 ACRES OF EXISTING FOREST IN THE FSD STUDY AREA.
13. A PREVIOUS FSD FOR THE ENTIRE GROSS AREA WAS PREPARED BY BOWMAN CONSULTING, 2007.
14. A REVISED FSD FOR THE SITE IS SUBMITTED.
15. THE DEVELOPER SHALL ARRANGE AN ON-SITE INSPECTION OF TREE PROTECTION PRIOR TO CONSTRUCTION. ALL REQUIRED TREE PRESERVATION MEASURES SHALL BE AS PER THE "STATE FOREST CONSERVATION TECHNICAL MANUAL, THIRD EDITION, 1997 (MANUAL)" AND CITY CODE 17.09.040 - 17.09.060 (PROTECTION OF TREES AFTER CONSTRUCTION).



100' 0 100' 200' FEET

SCALE: 1" = 100'

THESE PLANS ARE BASED UPON PLANS TITLED 'ARIS ALLEN BOULEVARD, LLC MIXED RESIDENTIAL' CREATED BY BOWMAN CONSULTING, PORTIONS OF WHICH ARE USED HEREIN.



COPYRIGHT ADC, THE MAP PEOPLE, USED WITH PERMISSION, PUN 20113600

VICINITY MAP

SCALE: 1" = 2,000'

ITEM 3.1.1.4 FOREST CONSERVATION PLAN REQUIREMENTS

STATE FOREST CONSERVATION TECHNICAL MANUAL, 1997:

1. THE MOST ENVIRONMENTALLY SENSITIVE FOREST ON THIS SITE HAS BEEN RETAINED BY A FOREST CONSERVATION EASEMENT ON 11.64 ACRES WITH THE STEEPEST SLOPES AND FORESTED WETLANDS WITH A FLOODPLAIN. A PORTION OF THE EASEMENT IS IN THE CRITICAL AREA. THIS CONSERVATION AREA WILL BE UNDISTURBED AND TOTALLY RETAINED.
2. THERE ARE NINE (9) SIGNIFICANT TREES BEING REMOVED BY THE LOD.
3. A VARIANCE REQUEST FOR EACH TREE HAS BEEN SUBMITTED TO MS. MARIA BROADBENT, CITY OF ANNAPOLIS DEPARTMENT OF NEIGHBORHOOD & ENVIRONMENTAL PROGRAMS.
4. THE LANDSCAPE PLAN DEMONSTRATES HOW 385 REPLACEMENT TREES (AS PER CITY CODE 17.09) ARE BEING PLANTED ON THE SITE.

CERTIFIED BY: Claire L. Williams DATE: 4-28-14

Claire L. Williams, Registered Landscape Architect, MD REG. NO. 557

FOREST CONSERVATION WORKSHEET

Aris T. Allen Blvd. Residential/Rocky Gorge PUD

5-Aug-02

NET TRACT AREA:	
A. Total tract area ...	23.38
B. Land dedication acres (parks, county facility, etc.) ...	0.00
C. Land dedication for roads or utilities (not being constructed by this plan) ...	0.00
D. Area to remain in commercial agricultural production/use ...	0.00
E. Other deductions (specify)	0.00
F. Net Tract Area .....=	23.38

LAND USE CATEGORY: (from *Trees Technical Manual*)
Input the number "1" under the appropriate land use, limit to only one entry.

ARA	MDR	IDA	HDR	MPD	CIA
0	0	0	1	0	0

G. Afforestation Threshold ...	15%	x F =	3.51
H. Conservation Threshold ...	20%	x F =	4.68
EXISTING FOREST COVER:			
I. Existing forest cover .....=			22.05
J. Area of forest above afforestation threshold .....=			18.54
K. Area of forest above conservation threshold .....=			17.37
BREAK EVEN POINT:			
L. Forest retention above threshold with no mitigation ....=			8.15
M. Clearing permitted without mitigation .....=			13.90
PROPOSED FOREST CLEARING:			
N. Total area of forest to be cleared .....=			9.20
O. Total area of forest to be retained .....=			12.85
PLANTING REQUIREMENTS:			
P. Reforestation for clearing above conservation threshold ....=			2.30
Q. Reforestation for clearing below conservation threshold ....=			0.00
R. Credit for retention above conservation threshold .....=			8.17
S. Total reforestation required .....=			0.00
T. Total afforestation required .....=			0.00
U. Credit for landscaping (may not exceed 20% of "S") .....=			0.00
V. Total reforestation and afforestation required .....=			0.00

ARIS T ALLEN Forest Stand Delineation
BIG & SIGNIFICANT TREES and CRITICAL ROOT ZONE CALCULATOR
EnviroProjects, LLC ©
Project Name WO#: 20130099
CRZ = RADIUS IN FEET 1/28/2014

Significant Tree Study

Label	Size "	Species	Common	CRZ	Condition	Stand
T100	32	*Liriodendron tulipifera*	Tulip Poplar	48	Good	A
T99	31	*Liriodendron tulipifera*	Tulip Poplar	47	Fair	A
T98	45	*Liriodendron tulipifera*	Tulip Poplar	68	Good	A
T97	26	*Liriodendron tulipifera*	Tulip Poplar	39	Good	A
T96	24	*Liriodendron tulipifera*	Tulip Poplar	36	Good	A
T95	26	*Liriodendron tulipifera*	Tulip Poplar	39	Fair	A
T94	37	*Prunus serotina*	Black Cherry	56	Poor	A
T93	42	*Robinia pseudoacacia*	Black Locust	63	Poor	A
T92	26	*Acer negundo*	Box Elder	39	Fair	A
T91	40	*Quercus alba*	White Oak	60	Fair	A
T90	44	*Quercus alba*	White Oak	66	Good	A
T89	33	*Acer rubrum*	Red Maple	50	Poor	A
T88	30	*Liriodendron tulipifera*	Tulip Poplar	45	Good	A
T87	24	*Liriodendron tulipifera*	Tulip Poplar	36	Good	A
T86	33	*Liriodendron tulipifera*	Tulip Poplar	50	Good	A
T85	44	*Quercus alba*	White Oak	66	Poor	A
T84	40	*Quercus phellos*	Willow Oak	60	Good	A
T83	35	*Quercus phellos*	Willow Oak	53	Good	A
T82	36	*Quercus phellos*	Willow Oak	54	Good	A
T81	39	*Quercus phellos*	Willow Oak	59	V. Good	A
T80	35	*Quercus alba*	White Oak	53	Good	A
T79	32	*Quercus alba*	White Oak	48	Good	A
T78	31	*Quercus phellos*	Willow Oak	47	Good	A
T77	25	*Liriodendron tulipifera*	Tulip Poplar	38	Good	A
T76	41	*Quercus alba*	White Oak	62	Good	A
T75	38	*Quercus alba*	White Oak	57	Good	A
T74	30	*Liriodendron tulipifera*	Tulip Poplar	45	Good	A
T73	30	*Liriodendron tulipifera*	Tulip Poplar	45	Good	A
T72	25	*Quercus alba*	White Oak	38	Fair	A
T71	38	*Quercus alba*	White Oak	57	Fair	A
T70	42	*Quercus alba*	White Oak	63	Poor	A
T69	48	*Quercus alba*	White Oak	72	Good	A
T68	26	*Prunus serotina*	Black Cherry	39	Fair	A
T67	30	*Liriodendron tulipifera*	Tulip Poplar	45	Good	A
T66	32	*Liriodendron tulipifera*	Tulip Poplar	48	Good	A
T65	28	*Prunus serotina*	Black Cherry	42	Fair	A
T64	25	*Prunus serotina*	Black Cherry	38	Poor	A

NOTE: #'s BEGIN AT 64. NO TREES PRIOR 64.

COPYRIGHT © 2014, McLAREN ENGINEERING GROUP

NO.	DATE	REVISION	BY

McLaren ENGINEERING GROUP
applied ingenuity
McLaren Technical Services, Inc.
601 East Pratt Street, Suite 302 Baltimore, Maryland 21202
T. (410) 243-8787 F. (410) 243-4965 www.mgmclaren.com

PROJECT
ARIS T. ALLEN BOULEVARD RESIDENTIAL PLANNED DEVELOPMENT (PART 1)
6TH ELECTION DISTRICT
TAX MAP/GRID: 51E/8 CITY OF ANNAPOLIS, MARYLAND

STATE OF MARYLAND — CLAIRE LEE WILLIAMS — REGISTERED LANDSCAPE ARCHITECT — NO. 557
4-28-14

SHEET TITLE
GRADING PERMIT NO.: GRD 14 - 0006
OVERALL FOREST CONSERVATION PLAN

PROJECT NO.	130003.01
SCALE	AS SHOWN
DATE	4/28/2014
DRAWN BY	JDS/CLW
CHECKED BY	PVM/TJC
DRAWING NO.	FCP-1

60 OF 63 SHTS

FILE NAME: P:\Proj130\130003.01 Aris T. Allen Property\10_Dwgs\CADD\Working\WR-FSD & FCP\FCP.dwg PLOT TIME: Mon, 28 Apr 2014 - 3:44pm LAST SAVE: Mon, 28 Apr 2014 - 3:38pm BY: CWilliams