

**GENERAL NOTES**

- ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH THE LATEST STANDARDS AND SPECIFICATIONS OF HOWARD COUNTY STANDARDS AND SPECIFICATIONS. ALL WORK AND MATERIALS SHALL COMPLY WITH O.S.H.A. STANDARDS.
- EXISTING UTILITIES LOCATED FROM ROAD CONSTRUCTION PLANS, FIELD SURVEYS, PUBLIC WATER AND SEWER EXTENSION PLANS AND AVAILABLE RECORD DRAWINGS, APPROXIMATE LOCATION OF EXISTING UTILITIES ARE SHOWN FOR THE CONTRACTOR'S INFORMATION. CONTRACTOR SHALL LOCATE EXISTING UTILITIES WELL IN ADVANCE OF CONSTRUCTION ACTIVITIES AND TAKE ALL NECESSARY PRECAUTIONS TO PROTECT THE EXISTING UTILITIES AND TO MAINTAIN UNINTERRUPTED SERVICE. ANY DAMAGE INCURRED DUE TO CONTRACTOR'S OPERATION SHALL BE REPAIRED IMMEDIATELY AT THE CONTRACTOR'S EXPENSE.
- THE EXISTING TOPOGRAPHIC INFORMATION FROM HOWARD COUNTY GIS, COUNTY RECORDS, AND A FIELD TOPOGRAPHICAL SURVEY WITH TWO FOOT CONTOUR INTERVALS PERFORMED BY ROBERT H. VOGEL ENGINEERING, INC. (DATED JANUARY 2014), EXISTING UTILITIES WERE LOCATED FROM PREVIOUSLY APPROVED ROAD CONSTRUCTION PLAN, FIELD SURVEYS, PUBLIC WATER AND SEWER EXTENSION PLANS AND AVAILABLE RECORD DRAWINGS. THE EXISTING TOPOGRAPHY COORDINATES AND ELEVATIONS ARE BASED ON MARYLAND COORDINATE SYSTEM - NAD83(1991) AS PROJECTED BY HOWARD COUNTY GEODETIC CONTROL STATIONS 301F AND 302F.
- THE PROPERTY LINES SHOWN HEREON IS BASED ON A FIELD RUN BOUNDARY SURVEY PERFORMED BY ROBERT H. VOGEL ENGINEERING, INC. DATED JANUARY 2014.
- ALL ELEVATIONS ARE TO FLOWING BOTTOM OF CURB UNLESS OTHERWISE NOTED.
- THE GEOTECHNICAL ENGINEER TO CONFIRM PAVING SECTION PRIOR TO CONSTRUCTION.
- ALL PAVING TO BE PER GEOTECHNICAL RECOMMENDATIONS.
- THE SUBJECT PROPERTY IS ZONED AT THE OCTOBER 6, 2013 COMPREHENSIVE ZONING PLAN.
- PUBLIC WATER AVAILABLE THROUGH CONTRACT #165-W&S PUBLIC SEWER AVAILABLE THROUGH CONTRACT #165-W&S AND 151-S.
- THERE ARE NO BURIAL GROUNDS, CEMETERIES, OR HISTORIC STRUCTURES LOCATED ON THIS PROPERTY.
- A FIELD INVESTIGATION BY MCCARTHY AND ASSOCIATES DETERMINED THAT THE PROPERTY DOES NOT CONTAIN ANY WETLANDS; HOWEVER THERE IS A PERENNIAL STREAM AND A PORTION OF THE 100 YEAR FLOODPLAIN EXTENDS ONTO THE SITE. THERE DOES APPEAR TO BE SOME FOREST ON SITE. HOWEVER FOREST CONSERVATION IS NOT REQUIRED IN THE NT ZONING DISTRICT. IT SHOULD ALSO BE NOTED (BASED ON HISTORICAL RECORDS) THERE WAS PREVIOUS UN-PERMITTED DISTURBANCE TO THE STREAM AND STREAM BUFFER FOR EXTENSION OF A 36" PIPE AND A NEW HEADWALL ENVIRONMENTAL FEATURES WILL BE PROTECTED TO THE EXTENT POSSIBLE. THE ONLY DISTURBANCES PROPOSED WITHIN THE ENVIRONMENTAL AREAS ARE NECESSARY DISTURBANCES FOR UTILITY CONNECTIONS. REMOVAL OF THE UNPERMITTED PIPE AND HEADWALL, AND RESTORATION OF THE STREAM CHANNEL. THE CONCEPT PLAN PROVIDES FOR THE SAFE DISCHARGE OF THE TREATED RUNOFF.
- ANY EXISTING STREET TREES DAMAGED OR DESTROYED DURING CONSTRUCTION WILL BE REPLACED BY THE CONTRACTOR.
- IN ACCORDANCE WITH SECTION 16-1202(b)(1)(v) OF THE SUBDIVISION REGULATIONS THERE IS NO FOREST CONSERVATION REQUIREMENT FOR THIS PROJECT (ZONED NT).
- THIS PROJECT IS SUBJECT TO COMPLIANCE WITH THE AMENDED FIFTH EDITION OF THE SUBDIVISION AND LAND DEVELOPMENT REGULATIONS. DEVELOPMENT OR CONSTRUCTION ON THIS PROPERTY MUST COMPLY WITH SETBACK AND BUFFER REGULATIONS IN EFFECT AT THE TIME OF SUBMISSION OF THE SITE DEVELOPMENT PLAN, WAIVER PETITION APPLICATION OR BUILDING GRADING PERMIT APPLICATIONS.
- A KNOX BOX IS REQUIRED TO BE PLACED ON THE FRONT OF THE BUILDING. IT SHALL BE PLACED TO THE RIGHT OF THE MAIN ENTRANCE AT A RANGE OF 4'-5" IN HEIGHT AND NO MORE THAN 6' LATERALLY FROM THE DOOR. ITS LOCATION IS SHOWN ON THESE PLANS. THE BOX SHALL BE ELECTRONICALLY SUPERVISED TO NOTIFY THE OWNER THAT IT IS BEING ACCESSSED (INTEGRATED WITH THE FIRE ALARM SYSTEM).
- LANDSCAPING NOT PERMITTED WITHIN 7'-1/2' OF EACH SIDE OF THE FIRE DEPARTMENT CONNECTION. PROVIDE A CLEAR UNOBSTRUCTED ACCESS PATH TO THE FIRE DEPARTMENT CONNECTION. WPA-1 1.3.1.4 FIRE LANES SHOULD BE PROVIDED IN THIS SITE TO ALLOW EMERGENCY VEHICLE ACCESS. EITHER FIRE LANE SIGNAGE SHOULD BE INSTALLED, OR THE CURBS SHOULD BE PAINTED IN RED AND STENCILED TO IDENTIFY THE ROAD AS A FIRE LANE.
- ALL SIGN POSTS USED FOR TRAFFIC CONTROL SIGNS INSTALLED IN THE COUNTY RIGHT-OF-WAY SHALL BE MOUNTED ON A 2" GALVANIZED STEEL PERFORATED SQUARE TUBE POST (14 GAUGE) INSERTED INTO A 2-1/2" GALVANIZED STEEL PERFORATED SQUARE U-BE SLEEVE (12 GAUGE) - 3' LONG. A GALVANIZED STEEL POLE CAP SHALL BE MOUNTED ON TOP OF EACH POST.
- ALL EXTERIOR LIGHTING TO COMPLY WITH THE REQUIREMENTS FOUND IN ZONING SECTION 134.0 OF THE HOWARD COUNTY ZONING REGULATIONS.
- STREET LIGHT FIXTURE AND THE TYPE OF FIXTURE AND POLE SHALL BE IN ACCORDANCE WITH THE HOWARD COUNTY DESIGN MANUAL VOLUME III (2006), SECTION 5.5.A. A MINIMUM OF 20' SHALL BE MAINTAINED BETWEEN ANY STREET LIGHT AND ANY TREE.
- STORMWATER MANAGEMENT FOR THIS PROJECT IS BEING PROVIDED BY ENVIRONMENTAL SITE DESIGN UTILIZING MICRO-BIORETENTION FACILITIES AND PERMEABLE PAVING (WITH ADDITIONAL STONE DEPTH) TO ACCOMMODATE THE TOTAL ESQ VOLUME REQUIRED. SW FACILITIES TO BE PRIVATELY OWNED AND MAINTAINED.
- ALL ROOF LEADERS TO DRAIN INTO STORM DRAIN SYSTEM.
- TRASH AND DEBRIS COLLECTION TO BE PRIVATE.
- THE PROPOSED BUILDING WILL HAVE AN AUTOMATIC FIRE PROTECTION SPRINKLER SYSTEM.
- SIGNAGE SHALL BE PROVIDED ON THE BUILDING IDENTIFYING THE BUILDING ADDRESS, AND EACH SUITE SEPARATED BY LETTER.
- A SITE EVALUATION FOR THE PRESENCE OF WETLANDS WAS PERFORMED ON 7/28/18 AND WELLS REPORT WAS GENERATED BY MCCARTHY AND ASSOCIATES, INC. IN AUGUST 2018. IT WAS DETERMINED THAT NO WETLANDS EXIST WITHIN THE BOUNDARIES OF THIS SITE.
- REFERENCE ALTERNATIVE COMPLIANCE WP-18-154, APPROVED MARCH 15, 2017. APPROVAL IS SUBJECT TO THE FOLLOWING CONDITIONS:
  - APPROVAL OF THIS ALTERNATIVE COMPLIANCE PETITION IS TO ESTABLISH THE USES FOR 9190 RED BRANCH ROAD, BE STOP THE EXISTING PARKING LOT, AND PROVIDE 150' BUFFER ON THE ALTERNATIVE COMPLIANCE PETITION. NO ADDITIONAL USES, NEW DEVELOPMENT, CONSTRUCTION, GRADING OR IMPROVEMENTS TO BE PERMITTED FOR THIS PROPERTY.
  - APPROVAL OF THIS ALTERNATIVE COMPLIANCE PETITION DOES NOT AFFECT THE STATUS OF THE ACTIVE ZONING VIOLATION CASE #18-128 FOR THIS PROPERTY.
  - COMPLIANCE WITH ALL APPLICABLE COUNTY AND STATE REGULATIONS AND OBTAIN ALL NECESSARY PERMITS FROM THE DEPARTMENT OF INSPECTIONS, LICENSES AND PERMITS.
  - COMPLIANCE WITH AND OBTAIN APPROVAL FROM OAKLAND RIDGE INDUSTRIAL CENTER ARCHITECTURAL REVIEWCOMMITTEE, IF APPLICABLE.
  - COMPLIANCE WITH ANY OTHER APPROVALS.
- REFERENCE ALTERNATIVE COMPLIANCE WP-14-037, DENIED DECEMBER 20, 2013. DENIAL WAS BASED ON THE FOLLOWING REASONS:
  - THE APPLICATION SUBMITTED DOES NOT CONAIN SUFFICIENT JUSTIFICATIONS TO SUBSTANTIATE AN UNUSUAL CIRCUMSTANCES OR PRACTICAL DIFFICULTIES WITH COMPLIANCE FOR PROVIDING A PROFESSIONALLY PREPARED SITE DEVELOPMENT PLAN.
  - THE APPLICATION AND JUSTIFICATION PROVIDED DOES NOT CONTAIN REASONING AS TO WHY THE WAIVER WOULD NOT BE DETRIMENTAL TO PUBLIC INTEREST.
  - THE WAIVER, IF APPROVED WOULD NULLIFY THE INTENT AND PURPOSE OF THE SUBDIVISION AND LAND DEVELOPMENT REGULATIONS AS STATED IN SECTION 16-101, WHICH IS TO ENSURE APPROPRIATE DEVELOPMENT WITH REGARD TO SITE'S NATURAL FEATURES, TO ASSIST IN THE ORDERLY AND EFFICIENT DEVELOPMENT OF LAND AND TO PROVIDE UNIFORM PROCEDURES AND STANDARDS FOR THE PROCESSING OF SITE DEVELOPMENT PLANS.
  - A REVISED WAIVER PETITION/EXHIBIT WAS NOT SUBMITTED PRIOR TO THE REQUESTED DEADLINE OF DECEMBER 12, 2013 PER DRZ LETTER DATED OCT. 28, 2013 - SEE ATTACHED.
  - THE LIMIT OF DISTURBANCE WAS NOT ACCURATELY SHOWN ON THE PLAN EXHIBIT.
  - JUSTIFICATION WAS NOT PROVIDED EXPLAINING WHY THE DISTURBANCE WAS NECESSARY AND ANY FUTURE PLANS FOR THE SITE INCLUDING STABILIZATION AND RE-VEGETATION.

**SITE DATA**

LOCATION : 9190 RED BRANCH ROAD, COLUMBIA, MD. ;  
 TAX MAP 30, BLOCK 17, PARCEL 239, LOT 2  
 2ND ELECTION DISTRICT  
 PRESENT ZONING : NT  
 PARCEL AREA : 7.00 AC.  
 DPZ REFERENCES: 1-207/F.376, WP-14-037, WP-16-154 FDP-03-A,  
 PB.12 / F. 24, CE-16-12B  
 USE OF STRUCTURES:  
 BUILDING A: TBD IN FUTURE PLAN STAGE  
 BUILDING B:  
 BUILDING C:  
 BUILDING D:  
 BUILDING COVERAGE:  
 BUILDING A: 18,900 SF (0.43 AC. OR 6.2%)  
 BUILDING B: 26,003 SF (0.60 AC. OR 8.53%)  
 BUILDING C: 9,190 SF (0.21 AC. OR 3.01%)  
 BUILDING D: 25,937 SF (0.60 AC. OR 8.51%)  
 TOTAL BUILDING: 80,030 SF (1.84 AC. OR 26.25% OF GROSS AREA)  
 PAVED PARKING LOT ON SITE: 141,245 SF (3.24 AC. OR 46.32% OF GROSS AREA)  
 AREA OF LANDSCAPE ISLAND: 9,846 SF (0.23 AC. OR 3.23% OF GROSS AREA)  
 LIMIT OF DISTURBED AREA: 310,632 SF / 7.13 AC.  
 WETLANDS ON SITE: 0.00 AC.  
 WETLAND BUFFERS ON SITE: 0.00 AC.  
 STREAMS AND THEIR BUFFERS ON SITE: 0.42 AC.  
 AREA OF ON-SITE 100 YEAR FLOODPLAIN: 0.03 AC.  
 AREA OF EXISTING FOREST ON SITE: 3.38 AC.  
 AREA OF MDE STEEP SLOPES (20% OR GREATER, NON-CONTIGUOUS): 0.08 AC.  
 AREA OF ERODIBLE SOILS: 0.00 AC.  
 AREA MANAGED BY ESDV (THIS PLAN): 7.13 AC.  
 IMPERVIOUS AREA : 5.49 AC.  
 \*GREEN AREA: 1.51 AC.

**ENVIRONMENTAL SITE DESIGN NARRATIVE**

- THE PROPERTY DOES NOT CONTAIN ANY WETLANDS, HOWEVER THERE IS A PERENNIAL STREAM AND A PORTION OF THE 100 YEAR FLOODPLAIN IMPACTING THE NORTH EDGE OF THE PROPERTY. THERE DOES APPEAR TO BE SOME FOREST ON SITE. HOWEVER FOREST CONSERVATION IS NOT REQUIRED IN THE NT ZONING DISTRICT. APPEARS FROM HISTORICAL DATA THAT A PREVIOUS STORM DRAIN PIPE AND HEADWALL WAS EXTENDED APPROXIMATELY 100' TO THE NORTH. THIS ALSO INCLUDED THE UNPERMITTED FILLING OF APPROXIMATELY 100' OF OPEN STREAM CHANNEL. THE OBJECTIVE OF THIS PROJECT INCLUDES THE RESTORATION OF THE CHANNEL AND REMOVAL OF PIPE, AND RELOCATION OF HEADWALL TO ITS ORIGINAL LOCATION. ALL APPLICABLE PERMITS WILL BE OBTAINED. WE ARE PROPOSING NO ADDITIONAL DISTURBANCE TO THE ENVIRONMENTAL FEATURES UNDER THIS CONCEPT PLAN. THE CONCEPT PLAN PROVIDES FOR THE SAFE DISCHARGE OF THE TREATED RUNOFF.
- THE SITE GENERALLY SLOPES FROM SOUTHWEST TO NORTHEAST. THE PROPOSED DEVELOPMENT WILL HAVE NO CHANGE IN THE EXISTING CHARACTER OF THE EXISTING NATURAL FLOW PATTERNS.
- THE CONCEPTUAL REDUCTION IN IMPERVIOUS AREA THROUGH BETTER SITE DESIGN IS ACHIEVED THROUGH THE ENVIRONMENTAL SITE DESIGN (ESD) FOR THE PROJECT TO THE MAXIMUM EXTENT PRACTICABLE (MEP). THE ESD CONCEPT PROPOSES THE USE OF 9 MICRO-BIORETENTION FACILITIES (M-6) AND NUMEROUS FILTERRA WATER QUALITY STRUCTURES. THE FILTERRAS AND MBRs (M-2) WILL DISCHARGE INTO THE EXISTING STORM DRAIN SYSTEM. THE PROPOSED ESD PRACTICES SHALL BE PRIVATELY OWNED AND MAINTAINED.
- SEDIMENT CONTROL FOR THIS SPECIFIC SITE PLAN WILL BE PROVIDED THROUGH THE USE OF TWO SEDIMENT TRAPS AND PERIMETER CONTROLS (SILT FENCE, SUPER SILT FENCE DIVERSION FENCE) AND INLET PROTECTION. SEDIMENT CONTROL SHALL BE IN ACCORDANCE WITH THE CURRENT REQUIREMENTS AND SHALL BE APPROVED BY THE HOWARD SOIL CONSERVATION DISTRICT.
- AS STATED IN #3 ABOVE, STORMWATER MANAGEMENT FOR THE PROJECT SHALL BE MET THROUGH THE USE OF 9 MICRO BIORETENTION FACILITIES (M-6) AND FILTERRA WATER QUALITY DEVICES.
- WAIVERS ARE ANTICIPATED TO FULFILL THIS CONCEPT. SEE WP-16-154 AND WP-14-037.

APPROVED: HOWARD COUNTY DEPARTMENT OF PLANNING AND ZONING

*[Signature]*  
 CHIEF, DEVELOPMENT ENGINEERING DIVISION 4 DATE 11-2-18  
*[Signature]*  
 CHIEF, DIVISION OF LAND DEVELOPMENT 5 DATE 11-01-18

**NOTE:**

1. APPROVAL OF THIS ENVIRONMENTAL CONCEPT PLAN DOES NOT CONSTITUTE ANY APPROVALS OF ANY SUBSEQUENT SUBDIVISION PLANS, SITE DEVELOPMENT PLANS OR RED-LINE REVISIONS TO PREVIOUSLY APPROVED SDP PLANS, AND GRADING OR BUILDING PERMITS. THE APPLICANT AND CONSULTANT SHOULD EXPECT ADDITIONAL AND MORE DETAILED COMMENTS THAT MAY ALTER THE SITE DESIGN, HOUSE OR STRUCTURE LOCATION, GRADING, TREE CLEARING OR OTHER REQUIREMENTS AS THE DEVELOPMENT PROGRESSES THROUGH THE PLAN REVIEW AND/OR PERMIT APPLICATION PROCESS IN ACCORDANCE WITH THE SUBDIVISION, AND DEVELOPMENT AND ZONING REGULATIONS.

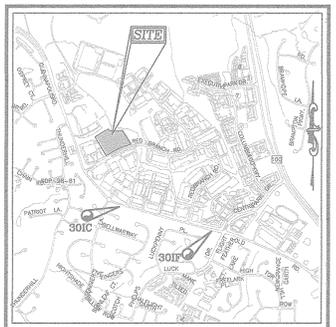
# ENVIRONMENTAL CONCEPT PLAN

## OAKLAND RIDGE INDUSTRIAL PARK

### SECTION 1, LOT 2

**BENCHMARKS**

HOWARD COUNTY GEODETIC SURVEY CONTROL 301F	N 568,033.070	E 1,363,934.332	ELEV. 473.359
HOWARD COUNTY GEODETIC SURVEY CONTROL 302C	N 568,598.518	E 1,361,633.753	ELEV. 441.456



**VICINITY MAP**  
 SCALE = 1"=200'  
 AD-C MAP COORDINATE: 4935/143

**LEGEND**

[Symbol]	EXISTING CONTOUR
[Symbol]	PROPOSED CONTOUR
[Symbol]	EXISTING CURB AND GUTTER
[Symbol]	PROPOSED CURB AND GUTTER
[Symbol]	EXISTING UTILITY POLE
[Symbol]	EXISTING LIGHT POLE
[Symbol]	EXISTING MAILBOX
[Symbol]	EXISTING SIGN
[Symbol]	EXISTING SANITARY MANHOLE
[Symbol]	EXISTING SANITARY LINE
[Symbol]	EXISTING CLEANOUT
[Symbol]	EXISTING FIRE HYDRANT
[Symbol]	EXISTING WATER LINE
[Symbol]	EXISTING FENCE
[Symbol]	EXISTING STREAM BANK
[Symbol]	PROPERTY LINE
[Symbol]	RIGHT-OF-WAY LINE
[Symbol]	SOILS BOUNDARY
[Symbol]	PROPOSED SIDEWALK
[Symbol]	EXISTING TREELINE
[Symbol]	PROPOSED TREELINE
[Symbol]	PROPOSED STORM DRAIN
[Symbol]	PROPOSED STORM DRAIN
[Symbol]	DRAIN INLETS
[Symbol]	PROPOSED FILTERRA WQ DEVICE
[Symbol]	PRE-2014 CL STREAM CHANNEL
[Symbol]	PRE-2014 STREAM CHANNEL
[Symbol]	PRE-2014 STREAM BANK BUFFER
[Symbol]	EX. PIPE AND HEADWALL (INSTALLED WITHOUT PERMIT) TO BE REMOVED
[Symbol]	PRE-2014 PIPE AND HEADWALL (HEADWALL REMOVED WITHOUT PERMIT)
[Symbol]	100 YEAR FLOODPLAIN
[Symbol]	MICRO-BIORETENTION
[Symbol]	VARIABLE WIDTH PUBLIC WATER, DRAINAGE AND UTILITY EASEMENT
[Symbol]	20' PUBLIC WATER AND UTILITY EASEMENT
[Symbol]	20' PUBLIC DRAINAGE AND UTILITY EASEMENT

**OWNER / DEVELOPER**  
 F & S ASSOCIATES LIMITED PARTNERSHIP  
 8600 SNOWDEN RIVER PARKWAY, SUITE 207  
 COLUMBIA, MD 21045  
 (410) 953-0222

**ENVIRONMENTAL CONCEPT PLAN**  
**COVER SHEET AND LAYOUT**  
**OAKLAND RIDGE INDUSTRIAL PARK**  
**SECTION 1, LOT 2**

TAX MAP 30 GRID 17, 2ND ELECTION DISTRICT  
 ZONED: NT  
 LOT 2/PARCEL 239  
 HOWARD COUNTY, MARYLAND

**ROBERT H. VOGEL ENGINEERING, INC.**  
 ENGINEERS • SURVEYORS • PLANNERS  
 840 MAIN STREET #21043 TEL: 410-461-7666  
 ELLICOTT CITY, MD 21104 FAX: 410-461-1896

DESIGN BY:	RHV/GAH	PROFESSIONAL CERTIFICATE I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MARYLAND. EXPIRES 09-27-2014.
DRAWN BY:	GAH	
CHECKED BY:	RHV	
DATE:	OCTOBER 2018	
SCALE:	AS SHOWN	
W.O. NO.:	13-07	1 SHEET OF 3



**SHEET INDEX**

DESCRIPTION	SHEET NO.
COVER SHEET AND LAYOUT	1 OF 3
GRADING, SWM DRAINAGE AREA MAP, NOTES AND DETAILS	2 OF 3
SEDIMENT CONTROL PLAN AND ECP NOTES AND DETAILS	3 OF 3



