

**WINNETT COUNTY
GRADING & DRAINAGE NOTES**

- A SEPARATE BUILDING PERMIT SHALL BE OBTAINED PRIOR TO CONSTRUCTION FOR EACH SITE RETAINING WALL WHICH EITHER EXCEEDS FOUR (4) FEET IN HEIGHT OR WHICH HAS A BACKFILL SLOPE GREATER THAN ONE (1) FOOT RISE IN THREE (3) FEET HORIZONTAL AND FOR EACH DETENTION POND WALL (DARY). A CERTIFICATE OF COMPLETION SHALL BE ISSUED BY WINNETT COUNTY BUILDING INSPECTIONS SECTION FOR SITE WALLS PRIOR TO ISSUANCE OF OCCUPANCY FOR ANY USABLE STRUCTURE ON THE SITE AND PRIOR TO AUTHORIZATION OF THE FINAL SUBDIVISION PLAT.
- ALL SHUT UTILITIES ARE TO BE INSPECTED BY THE DEPARTMENT OF WATER RESOURCES.
- THERE ARE NO STREAM BUFFERS ON THIS SITE.
- ALL RCP PIPE JOINTS SHALL BE BELL & SPIGOT TYPES WITH A RUBBER GASKET CONFORMING TO ASTM C-483. THE PIPES SHALL BE MANUFACTURED IN ACCORDANCE WITH AASHTO M-110 AND/OR ASTM C-76. CLASS OF PIPE AND WALL THICKNESS SHALL BE IN ACCORDANCE WITH 1030-D, GEORGIA DOT SPECIFICATIONS. TABLE NO. 1 INSTALLATION SHALL BE IN ACCORDANCE WITH SECTION 550 OF THE GEORGIA DOT STANDARD SPECIFICATIONS, CONSTRUCTION OF ROADS AND BRIDGES.
- ALL STORM SEWER PIPES AND CULVERTS SHALL BE INSTALLED PER THE WINNETT COUNTY "STORM WATER SYSTEMS AND FACILITIES INSTALLATION STANDARDS AND SPECIFICATIONS" JULY 20, 2006 EDITION (SSIFIS). ALL PIPES AND CULVERTS SHALL BE BEDDED AS REQUIRED BY THE SSIFIS.
- ALL INSTALLATIONS ARE SUBJECT TO INSPECTION BY WINNETT COUNTY DEPARTMENT OF WATER RESOURCES (COWR). THE DESIGN PROFESSIONAL WHOSE SEAL APPEARS HEREON, CERTIFIES THE FOLLOWING: 1) THE NATIONAL WETLAND INVENTORY MAPS HAVE BEEN CONSULTED; AND 2) THE APPROPRIATE PLAN SHEET DOES NOT INDICATE AREAS OF THE ARMY CORPS OF ENGINEERS JURISDICTIONAL WETLANDS AS SHOWN ON THE MAPS; AND 3) IF WETLANDS ARE INDICATED, THE LAND OWNER OR DEVELOPER HAS BEEN ADVISED THAT LAND DISTURBANCE OF PROTECTED WETLANDS SHALL NOT OCCUR UNLESS THE APPROPRIATE FEDERAL WETLANDS ALTERATION ("SECTION 404") PERMIT HAS BEEN OBTAINED.
- CORPORAL-WINNETT COUNTY ASSUMES NO RESPONSIBILITY FOR OVERFLOW OR EROSION OF NATURAL OR ARTIFICIAL DRAINS BEYOND THE EXTENT OF THE STREET RIGHT OF WAY, OR FOR THE EXTENSION OF CULVERTS BEYOND THE POINT SHOWN ON THE APPROVED AND RECORDED PLAN. WINNETT COUNTY DOES NOT ASSUME THE RESPONSIBILITY FOR THE MAINTENANCE OF PIPE DRAINAGE EASEMENTS BEYOND THE COUNTY RIGHT OF WAY. THE SOURCE OF TOPOGRAPHY IS NAD 83 AND REFERRED TO AS "NAD 83".
- MAXIMUM SLOPE FOR CUT & FILL IS 3:1 UNLESS OTHERWISE SPECIFIED. EMBANKMENTS SHALL BE 3:1.
- ALL MATERIALS, SPECIFICATIONS AND COMPACT TESTS LISTED IN THE SPECIFICATIONS SHALL BE USED TO CONFORM WITH THE SSIFIS.
- ALL TESTS AND OTHER TESTS SPECIFIED IN THE SPECIFICATIONS SHALL BE COMPLETED PRIOR TO PIPE OR CULVERT INSTALLATION.
- DEVELOPER TO CLEAN AND ACCUMULATE SILT IN DETENTION POND AT END OF CONSTRUCTION WHEN DRAINAGE SYSTEMS HAVE BEEN STABILIZED. DETENTION POND, DETENTION OUTLET STRUCTURES AND TEMPORARY SEDIMENT POND FEATURES ARE TO BE FULLY CONSTRUCTED AND FULLY OPERATIONAL PRIOR TO ANY OTHER CONSTRUCTION OR GRADING.
- A 5-FOOT UNDEVELOPED BUFFER AND A 75-FOOT IMPERVIOUS SETBACK IS TO BE MAINTAINED ADJACENT TO ALL STREAMS.
- IN ACCORDANCE WITH THE EC PLAN AS REQUIRED, HOWEVER THERE IS A CHANGE IN DESIGN, CONSTRUCTION, OPERATION, OR MAINTENANCE, THAT WILL HAVE A SIGNIFICANT EFFECT ON BMPs WITH A HYDRAULIC COMPONENT, OR IF THE PLAN PROVES TO BE INEFFECTIVE IN ELIMINATING POLLUTANT DISCHARGE, NON-EROSION POND DAM STRUCTURES SHALL BE MONOLITHIC WALLS SHALL EXTEND FROM THE TOE OF EARTHEN FILL SLOPE INTO THE POND'S EMBANKMENT A DISTANCE 4 TIMES THE DEPTH OF THE 100 YEAR PONDING LIMITS.

GRADING & DRAINAGE LEGEND

GRADING/DRAINAGE	LINE TYPE/SYMBOL	REFERENCE
GRADE	— 1000 —	SEE PLANS
SPOT ELEVATION	× (1000.00)	SEE PLANS
STORM DRAIN	— (1000.00) —	SEE PLANS
HEADWALL (HW) / FLARED END SECTION (FES)	— (1000.00) —	N/A
DROP INLET (GRATE)	— (1000.00) —	DETAIL 1, SHEET C04.6
DROP INLET (GRATE AND HOOD)	— (1000.00) —	DETAIL 1, SHEET C04.6
JUNCTION BOX (JB) / OCS	— (1000.00) —	DETAIL 2, SHEET C04.6
CATCH BASIN (SINGLE WING)	— (1000.00) —	DETAIL 2, SHEET C04.6
CATCH BASIN (DOUBLE WING)	— (1000.00) —	DETAIL 2, SHEET C04.6
PEDESTAL TOP	— (1000.00) —	N/A
STORM STRUCTURE NUMBER	(S)	SEE PLANS

GRADING & DRAINAGE NOTES

- SEE LANDSCAPE PLANS FOR REQUIRED TREES AND GROUND COVER.
- SLOPE OF SURFACE GRADING SHALL BE A MINIMUM OF 1% MINIMUM CUT & FILL SLOPES IS 3:1.
- CONTRACTOR SHALL PROVIDE CLEAN, SUITABLE MATERIAL FOR REQUIRED FILL. A SUFFICIENT QUANTITY OF SUITABLE MATERIAL NOT BE AVAILABLE FROM THE REQUIRED EXCAVATION ON THE SITE.
- ALL FILL SHOULD BE PLACED IN THIN, HORIZONTAL, LOOSE LIFTS (MAXIMUM 6-INCH) AND COMPACTED TO AT LEAST 98 PERCENT OF THE STANDARD PROCTOR MAXIMUM DRY DENSITY (ASTM D 1557). THE UPPER 8 INCHES OF SOIL BENEATH PAVEMENTS AND SLAB-ON-GRADE SHOULD BE COMPACTED TO AT LEAST 100 PERCENT. COMPACTOR MUST BE CERTIFIED BY A GEORGIA REGISTERED PROFESSIONAL SOILS ENGINEER PRIOR TO THE INSTALLATION OF PAVEMENTS, CURBS, SIDEWALKS OR FOOTINGS OF ANY TYPE.
- DETENTION POND, DETENTION OUTLET STRUCTURES AND TEMPORARY SEDIMENT POND FEATURES ARE TO BE FULLY CONSTRUCTED AND OPERATIONAL PRIOR TO ANY OTHER CONSTRUCTION OR GRADING ON THE SITE AND MAINTAINED UNTIL PERMANENT GROUND COVER IS ESTABLISHED.
- LENGTH OF RIP-RAP PADS AT PIPE OUTLET STRUCTURES TO BE A MINIMUM LENGTH OF (6) SIX TIMES THE DIAMETER OF THE PIPE.
- JURISDICTIONAL LAND DISTURBANCE PERMIT MUST BE DISPLAYED ON SITE AT ALL TIMES DURING CONSTRUCTION AND IN PLAIN VIEW FROM A PUBLIC ROAD OR STREET.
- SEE SHEET C01 FOR GENERAL NOTES.

BUILDING AREA NOTES

- MAINTAIN ACCESS FOR EMERGENCY VEHICLES AROUND AND TO ALL BUILDINGS UNDER CONSTRUCTION, I.E. IN TIMES OF RAIN OR MUD, ROADS SHALL BE PASSABLE TO EMERGENCY VEHICLES BY BEING PAVED OR HAVING A CRUSHED STONE BASE ETC., WITH A MINIMUM WIDTH OF 20 FEET. THE ACCESS TO BUILDINGS HAVING SPRINKLER OR STANDBY SYSTEMS SHALL BE TO WITHIN 40 FEET OF THE FIRE DEPARTMENT CONNECTION (NFPA 141.3-1).
- CONTRACTOR TO PROVIDE POSITIVE DRAINAGE AWAY FROM BUILDING IN ALL AREAS AROUND BUILDING. INSTALL FRENCH DRAIN IN LANDSCAPED AREAS ADJACENT TO BUILDING AND CONNECT TO DRAINAGE SYSTEM.
- SEE SHEET C01 FOR GENERAL NOTES.

HYDROLOGY STATEMENT

PER THE ARISTON DEVELOPMENT PLANS, THE PROPOSED HILTON GARDEN INN SITE PHASES UP THE COMPLETE PHASE 1 WITHIN THE PLANS IT STATES THAT 1.47 OF THE TOTAL 1.84 ACRES CAN BE IMPERVIOUS, BUT DUE TO THE DISTRICT OVERLAY REQUIREMENTS, 1% OF THE REQUIRED PARKING MUST BE PERVIOUS PAVERS AS PART OF THE PHASE 1 DEVELOPMENT. THEREFORE, THE HILTON GARDEN INN SITE HAS BEEN DESIGNED TO MEET THE 5% IMPERVIOUS LIMITATION AND IT SPACES WILL BE PERVIOUS PAVERS.

THE HILTON GARDEN INN'S ONSITE CONVEYANCE SYSTEM WILL TIE TO INSTALLED CONVEYANCE SYSTEM AS SHOWN ON ARISTON APARTMENT DEVELOPMENT PLANS BY HANCASTER ASSOCIATES, INC., DATED 05/04/2014. SPECIFICALLY, THE PIPES WILL TIE TO STRUCTURE A6. AS A STARTING HGL FOR THE HILTON GARDEN INN CONVEYANCE SYSTEM, THE HGL ELEVATION OF 1056.30' AS SHOWN AT STRUCTURE A6 ON THE AFOREFORMED PLANS. PIPES HAVE BEEN SIZED TO ADEQUATELY HANDLE THE 25 YEAR STORM EVENT. FURTHERMORE, INLET CAPACITIES HAVE BEEN ANALYZED FOR THE 100 YEAR EVENT.

STORM STRUCTURE TABLE

STRUCTURE NAME	STRUCTURE TYPE	RIM ELEVATION	INVERT IN	INVERT OUT
A0	CONTRACTOR SHALL REPLACE EXISTING MANHOLE TOP WITH MANHOLE	1067.10	1054.29 (PA1)	1054.09 (PE1)
A1	6" JUNCTION BOX CATCH BASIN DETAIL 2, SHEET C04.6	1067.37	1054.64 (PA2) 1054.84 (PA1) 1054.84 (PE1)	1054.64 (PA1)
A1.1	GRATE INLET TYPE E WITH HOOD DETAIL 1, SHEET C04.6	1066.50	1055.76 (PA1.2)	1055.56 (PA1.1)
A1.2	TRENCH DRAIN DETAIL 3, SHEET C04.6	1064.90	1056.88 (PA1.3)	1056.68 (PA1.2)
A1.3	JUNCTION BOX CATCH BASIN DETAIL 2, SHEET C04.6	1067.00	1058.82 (PA1.4)	1058.46 (PA1.3)
A1.4	JUNCTION BOX CATCH BASIN DETAIL 2, SHEET C04.6	1063.80	1054.73 (PA1.5)	1054.78 (PA1.4)
A1.5	GRATE INLET CATCH BASIN DETAIL 1, SHEET C04.6	1064.90	1060.53 (PA1.5)	1060.53 (PA1.5)
A2	SINGLE WING CATCH BASIN DETAIL 4, SHEET C04.6	1068.00	1055.59 (PA3)	1055.39 (PA2)
A3	GRATE INLET CATCH BASIN DETAIL 1, SHEET C04.6	1070.00	1057.00 (PA3)	1057.10 (PA3)
B1	GRATE INLET TYPE E WITH HOOD DETAIL 1, SHEET C04.6	1068.20	1056.29 (PE2)	1056.09 (PB1)
B2	GRATE INLET TYPE E WITH HOOD DETAIL 1, SHEET C04.6	1070.00	1058.92 (PE3)	1058.72 (PE2)
B3	GRATE INLET CATCH BASIN DETAIL 1, SHEET C04.6	1072.12	1061.82 (PE3)	1061.82 (PE3)

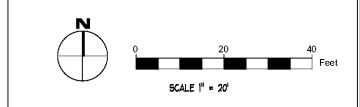
STORM PIPE TABLE

NAME	SIZE	LENGTH	SLOPE	MATERIAL
PA1	18"	18'	2.00%	RCP
PA1.1	18"	36'	2.00%	RCP
PA1.2	18"	46'	2.00%	RCP
PA1.3	18"	79'	2.00%	RCP
PA1.4	18"	44'	2.78%	RCP
PA1.5	18"	47'	2.00%	RCP
PA2	18"	37'	2.00%	RCP
PA3	18"	72'	2.00%	RCP
PB1	18"	62'	2.00%	RCP
PE2	18"	122'	2.00%	RCP
PE3	18"	127'	2.29%	RCP
PE1	18"	91'	1.50%	RCP

CONTRACTOR SHALL PROTECT ALL ITEMS OUTSIDE LIMITS OF CONSTRUCTION UNLESS OTHERWISE NOTED IN THE CONSTRUCTION PLANS OR SPECIFICATIONS.

CONTRACTOR SHALL FIELD VERIFY ALL EXISTING UTILITIES (LOCATIONS AND ELEVATIONS) PRIOR TO STARTING CONSTRUCTION AND ALERT ENGINEER TO ANY DISCREPANCIES IMMEDIATELY.

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REVISION HISTORY

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GRADING & DRAINAGE PLAN
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