ARCHITECTURAL REVIEW BOARD STAFF REPORT

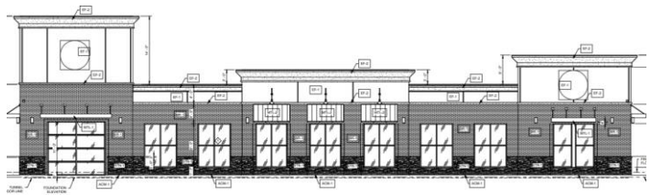
Project #/Name	**ARB-2020-35: W4 Development Car Wash**
Review Type	Review of a Final Site Plan and architectural design
Parcel Identification	045000000093C0
Location	2100 Rio Hill Center, at the southwest corner of Route 29 and Woodbrook Drive, (see Figure 1) south of Chick-fil-A and across Route 29 from Kohr Brothers.
Zoned	Planned Development Shopping Center (PDSC), Entrance Corridor (EC)
Owner/Applicant	Allen & Allen Properties - Charlottesville LLC/WCWV, LLC (Greg DeBacker)
Magisterial District	Rio
Proposal	To construct a 3,739 sf car wash building and associated site improvements on approximately 1.05 acres.
Context	This portion of Route 29 is commercial in nature, with strip shopping centers, big box stores, the Rio Hill Shopping Center, and stand-alone fast food restaurants nearby. Most of the commercial buildings in the vicinity are one story tall.
Visibility	Three sides of the building and site will be clearly visible from the EC (Route 29). The proposed building is 25' from the right-of-way and approximately 43' from the Route 29 edge of pavement.
ARB Meeting Date	November 2, 2020
Staff Contact	Margaret Maliszewski

PROJECT HISTORY

DATE	APPLICATION/REVIEW TYPE	RESULT
9/3/2019	ARB-2019-85: W4 Development Car Wash, Advisory Review	The ARB reviewed the conceptual plan and building elevations.
10/21/2019	ARB-2019-102: W4 Development Car Wash Initial Site Plan Review	The ARB reviewed the initial site plan.
9/16/2020	ARB-2020-35: W4 Car Wash Final Site Plan	The submittal originally received on March 9, 2020 was made complete on September 16, 2020 and was then scheduled for ARB review on November 2, 2020.

ANALYSIS

REF	GUIDELINE	RECOMMENDATIONS FROM 10/21/19 ARB MEETING	CURRENT ISSUE	CURRENT RECOMMENDATION
	GENERAL GUIDELINES			
	Purpose			
1	The goal of the regulation of the design of development within the designated Entrance Corridors is to insure that new development within the corridors reflects the traditional architecture of the area. Therefore, it is the purpose of ARB review and of these Guidelines, that proposed development within the designated Entrance Corridors reflect elements of design characteristic of the significant historical landmarks, buildings, and structures of the Charlottesville and Albemarle area, and to promote orderly and attractive development within these corridors. Applicants should note that replication of historic structures is neither required nor desired.	Ensure that the site plan building footprint, renderings, and building elevations show the same design and details, including the depth of the bays. Provide material and color samples for all materials. Include material and color information for all materials and building components on the architectural elevation sheets (01-A1 and 01-A2). Indicate on the drawings the material and color for the overhead door on the north side (exit) of the tunnel. Provide material and color samples for the canopies, vacuum equipment, and auto sentry and gate equipment. Clearly specify if the large window area on the south end of the front of the building is an overhead door or a window. If it	The architectural elevations are to scale. The interior layout of the car wash is shown on the site plan and site plan canopy detail, which are to scale. The floor plan, site plan and elevations appear to be coordinated. A complete exterior finish legend is provided on the elevation sheets. Material samples have been submitted. Wall facing materials are white EIFS (Sherwin-Williams “Marshmallow”) above a white “frosted” brick (Belden Brick Co. thin brick) above a gray cast stone veneer (“Smokey Mountain” Horizon Stone). Awnings and the overhead door on the south elevation are black. The elevation sheet identifies the overhead door on the north elevation as gray tinted glass with a dark bronze aluminum frame, but the physical sample appears to have a green tint. A similar door is located at the south end of the EC elevation. The sample meets the guidelines for transmittance and reflectance. The tint is obvious, but does not appear to be excessive. The east elevation is divided into a series of five bays, with the end and middle bays taller than the others, and the northernmost bay taller than the rest. This tallest northern bay is 28’ tall, 4’ less than the previous design (see image below). The taller tower element is appropriate to mark the entrance and establish hierarchy. The upper half of the	Revise the design of the upper half of the north tower to break up the wall area between the stringcourses, and to relieve the top-heavy appearance (without increasing the size of the wall sign).
2	Visitors to the significant historical sites in the Charlottesville and Albemarle area experience these sites as ensembles of buildings, land, and vegetation. In order to accomplish the integration of buildings, land, and vegetation characteristic of these sites, the Guidelines require attention to four primary factors: compatibility with significant historic sites in the area; the character of the Entrance Corridor; site development and layout; and landscaping.			
3	New structures and substantial additions to existing structures should respect the traditions of the architecture of historically significant buildings in the Charlottesville and Albemarle area. Photographs of historic buildings in the area, as well as drawings of architectural features, which provide important examples of this tradition are contained in Appendix A.			

4	The examples contained in Appendix A should be used as a guide for building design: the standard of compatibility with the area's historic structures is not intended to impose a rigid design solution for new development. Replication of the design of the important historic sites in the area is neither intended nor desired. The Guideline's standard of compatibility can be met through building scale, materials, and forms which may be embodied in architecture which is contemporary as well as traditional. The Guidelines allow individuality in design to accommodate varying tastes as well as special functional requirements.	is an overhead door, it is preferred that it be glazed.	north tower has no detail to break up the wall area between the stringcourses, and this results in a top-heavy appearance.  Current Proposal  Previous Proposal	
9	Building forms and features, including roofs, windows, doors, materials, colors and textures should be compatible with the forms and features of the significant historic buildings in the area, exemplified by (but not limited to) the buildings described in Appendix A [of the design guidelines]. The standard of compatibility can be met through scale, materials, and forms which may be embodied in architecture which is contemporary as well as traditional. The replication of important historic sites in Albemarle County is not the objective of these guidelines.			
5	It is also an important objective of the Guidelines to establish a pattern of compatible architectural characteristics throughout the Entrance Corridor in order to achieve unity and coherence. Building designs should demonstrate sensitivity to other nearby structures within the Entrance Corridor. Where a designated corridor is substantially developed, these Guidelines require striking a careful balance between harmonizing new development with the existing character of the corridor and achieving compatibility with the significant historic sites in the area.	None.		
10	Buildings should relate to their site and the surrounding context of buildings.			
11	The overall design of buildings should have human scale. Scale should be integral to the building and site design.	Consider balancing the heights of the towers.	The overall height of the taller tower has been reduced from 32' to 28' and the other two towers are now equal in height at 22'. Although a taller tower is appropriate to mark the entrance and establish hierarchy, the upper	

			portion of the tower lacks detail that it had previously, and now appears somewhat overscaled, even with the sign. Enlarging the sign to fill the space would not be appropriate.	
12	Architecture proposed within the Entrance Corridor should use forms, shapes, scale, and materials to create a cohesive whole.	Show all structures and equipment in the site plan and renderings. Include vacuum canopies in all graphics to allow for a complete review. Provide material and color samples for the canopies, vacuum equipment, and auto sentry and gate equipment. Ensure that all structures are designed to appear fully integrated into the overall site.	Equipment and canopy details have been provided. Three vacuum (Vac-boom) canopies of varying lengths and widths are proposed in the parking area behind the car wash building. Some drawings show a 4th canopy directly behind the building. The canopies have metal support columns and a 3'-tall black metal fascia. Overall height is 13'. Vac producers are located at each canopy. Vacuums have a 10' 10" tall post, two hoses that connect to the post in two locations and extend out from the post more than 9', and trash/garbage receptacles and mat holders attached to the post. The vacuum equipment is black. Landscaping will be needed to screen and mitigate views.	See landscape recommendations. Clarify the relative heights of the vacuums and the vac canopies.
14	Arcades, colonnades, or other architectural connecting devices should be used to unify groups of buildings within a development.	None.	A single building is proposed.	None.
13	Any appearance of "blankness" resulting from building design should be relieved using design detail or vegetation, or both.	See #36.	Blankness is not a characteristic of the overall building design.	None.
15	Trademark buildings and related features should be modified to meet the requirements of the Guidelines.	Ensure that the material and color of the overhead door on the north side of the building is integrated into the design of the building and the character of the EC. If it is an overhead door, it is preferred that it be glazed. See #17-19, and See #22-31.	The overhead door is specified as bronze aluminum with gray tinted glass. Clear, non-tinted glass is the preference in the ECs; tinted glass is not consistent with the historic architecture of the area. The label on the glass says "optigray" but the physical sample appears to have a green tint. The tint is obvious, but not excessive. The vacuum canopy, pay station, and related equipment are part of the company standard, but they do not meet Guidelines requirements related to equipment, integration of the site, lighting and screening. See #17-19, below.	See the other recommendations in this report.
16	Window glass in the Entrance Corridors should not be highly tinted or highly reflective. Window glass in the Entrance Corridors should meet the following criteria: *Visible light*	Submit a window glass sample and specs with the next submission.	The glass sample has been submitted. The window glass note does not appear on the drawings.	Add the standard window glass note to the drawings.

	transmittance (VLT) shall not drop below 40%. Visible light reflectance (VLR) shall not exceed 30%. Specifications on the proposed window glass should be submitted with the application for final review.	Add the standard window glass note to the drawings with the next submission.		
	Accessory structures and equipment			
17	Accessory structures and equipment should be integrated into the overall plan of development and shall, to the extent possible, be compatible with the building designs used on the site.	Provide detail drawings and color samples for the vacuum and auto sentry equipment. Provide in the plan all pay station and vacuum station-related elements (canopies, trash cans, lighting, pay stations, etc.) Eliminate the under-mounted LED lights contained in the vacuum equipment. Provide drawings that confirm the lack of illumination. Provide a dumpster screen detail in the site plan. Ensure the dumpster is shown in the same location throughout all drawing sets. Provide preliminary information on vacuum and pay station-related signage for review. Revise the drawings to show where building- and car wash-related equipment is located. If the location is inside the building, note this on the plans. If located on the rooftop, provide a roof plan showing equipment	Equipment is a significant part of this proposal. Multiple vacuum canopies are proposed. The illustrations suggest that some equipment is attached to the ceiling of the canopies, and some equipment is ground mounted. The detail for the vacuum post/hose shows maximum height of 11’ 3”; the canopy ceiling height is identified as 10’. The canopy fascia is 3’ tall, which is consistent with the guidelines for fuel pump canopies, but the fascia height looks over-scaled on the shorter posts. Reducing the fascia height would be appropriate. Alternatively, eliminating the canopies altogether would reduce visual impacts. The drawings don’t indicate if equipment is present above the canopy ceiling. The canopies will not be completely screened from the EC, but trees along the north and south perimeters of the site would help soften their appearance and integrate them into the surroundings. The equipment details show no lighting contained in the vacuum posts, hoses or related items. Photos of the auto entry menu board and gate have been provided. The colors appear to be consistent with those of the vac canopies. The location of the auto entry gates, midway back on the parcel, should help minimize visibility. Four vac producers are identified at the canopies. The equipment, which reaches 6’ 4” tall, is installed on 4’ x 12’ concrete pads. Two producers could be visible from the EC. Densa holly, dwarf Yaupon holly and various roses are provided nearby. These plants will not completely eliminate visibility of the producers.	Eliminate the vac canopies to reduce visual impacts. Alternatively, reduce the vac canopy fascia height to appear more proportional with the 10’ posts. Confirm that there is no equipment visible above the vac canopy fascias.
18	The following should be located to eliminate visibility from the Entrance Corridor street. If, after appropriate siting, these features will still have a negative visual impact on the Entrance Corridor street, screening should be provided to eliminate visibility. a. Loading areas, b. Service areas, c. Refuse areas, d. Storage areas, e. Mechanical equipment, f. Above-ground utilities, and g. Chain link fence, barbed wire, razor wire, and similar security fencing devices.			
19	Screening devices should be compatible with the design of the buildings and surrounding natural vegetation and may consist of: a. Walls, b. Plantings, and c. Fencing.			

		locations, and show the equipment locations and heights on the elevation drawings.	A dumpster screen detail has been provided. The materials are coordinated with the building materials. The dumpster location appears coordinated throughout the drawings. The submittal clarifies that all car wash building-related equipment is contained in the building. As illustrated in the "Equipment Sales" photos, the signage associated with the pay stations is not expected to have a significant impact on the EC street. No signs are illustrated with the vac stations.	
21	The following note should be added to the site plan and the architectural plan: "Visibility of all mechanical equipment from the Entrance Corridor shall be eliminated."	Add the standard mechanical equipment visibility note to the drawings with the next submission.	The mechanical equipment note has been added to the site and architectural drawings.	None.
	Lighting			
22	Light should be contained on the site and not spill over onto adjacent properties or streets;	Provide a complete lighting plan for review. Include all building- and ground-mounted lights in the lighting plan. Include specifications and manufacturer's cut-sheets for all proposed light fixtures. Remove the light fixtures shown above the three awnings in the middle bay of the EC elevation.	A photometric plan has been provided for the site pole lights. It shows no excessive spillover.	Revise the photometric plan to include the wall fixtures.
23	Light should be shielded, recessed or flush-mounted to eliminate glare. All fixtures with lamps emitting 3000 lumens or more must be full cutoff fixtures.		Cut sheets have been submitted separate from the lighting plan. Cut sheets must be included in the site plan set. The lighting plan does not include the wall fixtures or canopy fixtures, so the photometrics are not complete. The color rendering shows the warehouse shade fixture above awnings on the EC side of the building. Illumination of this type has typically been considered inappropriate for the ECs. The ARB has typically limited building-mounted lights to those needed for safety and security. The lighting plan indicates the light loss factor is 1.0.	Limit wall-mounted lighting to that which is needed for safety/security. Eliminate the fixtures above the awnings on the east elevation. Revise the photometric plan to include the locations of all wall-mounted fixtures and all canopy fixtures, and the illumination from those fixtures. Limit illumination at the ground to 20 fc maximum. Include the cut sheets in
24	Light levels exceeding 30 footcandles are not appropriate for display lots in the Entrance Corridors. Lower light levels will apply to most other uses in the Entrance Corridors.			

				the site plan set.
25	Light should have the appearance of white light with a warm soft glow; however, a consistent appearance throughout a site or development is required. Consequently, if existing lamps that emit non-white light are to remain, new lamps may be required to match them.		The color temperature of the site pole lights is identified as 4000k, which is a bright white. 3000k produces a warm white. The color temperature of the wall-mounted lights is not identified.	Revise the lighting plan to show that the color temperature of all proposed light fixtures is the same level between 200K0 and 3000K.
26	Dark brown, dark bronze, or black are appropriate colors for free-standing pole mounted light fixtures in the Entrance Corridors.		The wall-mounted fixtures are specified with a bronze finish. Site pole light finish is not identified.	Revise the lighting plan to show that site light poles and fixtures have a bronze finish.
27	The height and scale of freestanding, pole-mounted light fixtures should be compatible with the height and scale of the buildings and the sites they are illuminating, and with the use of the site. Typically, the height of freestanding pole-mounted light fixtures in the Entrance Corridors should not exceed 20 feet, including the base. Fixtures that exceed 20 feet in height will typically require additional screening to achieve an appropriate appearance from the Entrance Corridor.		Notes in the lighting schedule indicate: “20 ft. pole height w/ 3 ft. estimated concrete base”. The lighting plan notes a 23’ height.	Revise the lighting plan to clearly state that site pole light height will not exceed 20’, including any bases. Revise the photometrics to account for this change.
28	In determining the appropriateness of lighting fixtures for the Entrance Corridors, the individual context of the site will be taken into consideration on a case by case basis.	Eliminate the under-mounted LED lights contained in the vacuum equipment. Provide drawings that confirm the lack of illumination.	The equipment details that have been provided show no under-mounted LED lights in the vacuum equipment.	None.
29	The following note should be included on the lighting plan: “Each outdoor luminaire equipped with a lamp that emits 3,000 or more initial lumens shall be a full cutoff luminaire and shall be arranged or shielded to reflect light away from adjoining residential districts and away from adjacent roads. The spillover of lighting from luminaires onto public roads and property in residential or rural areas zoning districts shall not exceed one half footcandle.”	Include the standard lighting note on the lighting plan.	The note has been added to the lighting plan.	None.
30-31	*Guidelines for the Use of Decorative Landscape Lighting*	None.	No decorative landscape lighting is proposed.	None.
	Landscaping			

7	The requirements of the Guidelines regarding landscaping are intended to reflect the landscaping characteristic of many of the area's significant historic sites which is characterized by large shade trees and lawns. Landscaping should promote visual order within the Entrance Corridor and help to integrate buildings into the existing environment of the corridor.	Provide the required large shade trees along the EC. Locate these to be outside of the power easement. Revise the plant schedule so that the shade trees along the EC are 3½" caliper at time of planting. Provide flowering ornamental trees interspersed among the required large shade trees.	Small trees (Aeryn Trident Maple), instead of large trees, are still proposed along the EC frontage. Ornamentals (Crape Myrtle) have been added. Most of the trees are directly under the overhead lines. (No easement is shown along the overhead lines.) Planting area has not been increased to eliminate utility conflicts. Some trees are very close to an underground gas line. The power lines have a low clearance (see Figure 4) and are approximately 13 feet from the EC. There may be opportunities to shift some of the trees away from some of the lines, but additional utilities exist in the area. The trees that are proposed along the EC frontage are spaced closer together than 35', but no trees are proposed at the northeast corner of the parcel. There are easements and utilities in this area, but there may be room for one or two carefully located trees.	Shift trees to avoid utility conflicts. Provide a complete landscape schedule on the landscape plan. Add trees to the northeast corner of the site where utility conflicts don't exist. Remove the note from the landscape plan that reads, "Small to medium trees can be substituted for large trees if overhead utilities are present. See VDOT road design manual appendix B(1)-47." Provide a copy of ACSA's approval of the landscape plan. Provide trees 2 ½" caliper at planting, 40' on center along Woodbrook Drive, clear of utilities and easements.
8	Continuity within the Entrance Corridor should be obtained by planting different types of plant materials that share similar characteristics. Such common elements allow for more flexibility in the design of structures because common landscape features will help to harmonize the appearance of development as seen from the street upon which the Corridor is centered.			
32	Landscaping along the frontage of Entrance Corridor streets should include the following: a. Large shade trees should be planted parallel to the Entrance Corridor Street. Such trees should be at least 3½ inches caliper (measured 6 inches above the ground) and should be of a plant species common to the area. Such trees should be located at least every 35 feet on center. b. Flowering ornamental trees of a species common to the area should be interspersed among the trees required by the preceding paragraph. The ornamental trees need not alternate one for one with the large shade trees. They may be planted among the large shade trees in a less regular spacing pattern. c. In situations where appropriate, a three or four board fence or low stone wall, typical of the area, should align the frontage of the Entrance Corridor street. d. An area of sufficient width to accommodate the foregoing plantings and fencing should be reserved parallel to the Entrance Corridor street, and exclusive of road right-of-way and utility easements.			
33	Landscaping along interior roads: a. Large trees should be planted parallel to all interior roads. Such trees should be at least 2½ inches caliper (measured	Revise the plant schedule so that the street trees proposed for Woodbrook Drive are 2 ½"	Four trees are proposed along Woodbrook Drive. They are spaced 35' apart, but the row begins approximately 120' from the EC street, and the trees range from approximately	

	six inches above the ground) and should be of a plant species common to the area. Such trees should be located at least every 40 feet on center.	caliper at time of planting. Provide one more large tree parallel to Woodbrook Drive.	1’ to 6’ from a water line.	
34	Landscaping along interior pedestrian ways: a. Medium trees should be planted parallel to all interior pedestrian ways. Such trees should be at least 2½ inches caliper (measured six inches above the ground) and should be of a species common to the area. Such trees should be located at least every 25 feet on center.	Add one more medium or large shade tree 2 ½ caliper at planting to the planting area adjacent to the sidewalk on the west side of the building, near the southern entrance. Add two more medium or large shade tree 2 ½ caliper at planting to the planting areas adjacent to the sidewalk perpendicular to the building that connects the parking lot, entry aisles and building.	The layout of islands on the west side of the building has changed since the last review. The perpendicular sidewalk has been eliminated. A sidewalk runs along the west side of the building, away from the EC. Three trees are provided in the island at the southwest corner of the building. Note that two versions of the landscape plan with the same revision date of 6/22/20 show different planting along the carwash exit travelway. The version with significant planting in this area should move forward with future reviews.	Ensure that the landscape plan includes the shrub planting along the carwash exit travelway.
35	Landscaping of parking areas: a. Large trees should align the perimeter of parking areas, located 40 feet on center. Trees should be planted in the interior of parking areas at the rate of one tree for every 10 parking spaces provided and should be evenly distributed throughout the interior of the parking area. b. Trees required by the preceding paragraph should measure 2½ inches caliper (measured six inches above the ground); should be evenly spaced; and should be of a species common to the area. Such trees should be planted in planters or medians sufficiently large to maintain the health of the tree and shall be protected by curbing. c. Shrubs should be provided as necessary to minimize the parking area’s impact on Entrance Corridor streets. Shrubs should measure 24 inches in height.	Provide at least four large trees along the west, and one more large tree along the north, perimeters of the parking area. These trees must be at least 2 ½” caliper at time of planting. Provide screening for the vacuum stations, the auto sentry and gate, and all associated equipment. Provide screening shrubs along the southern and northern borders of the property and along portions of the EC frontage that are not screened by the building. The screening shrubs must be of a species, spacing, and height that will provide the screening of all mechanical equipment at the time of planting. (See #17-19)	Planting area has not been increased to provide for required landscaping. Trees have not been provided along the western perimeter; retaining walls are proposed along a portion of that side. Trees are provided at the southeast corner of the site, but not along the southern perimeter; a sanitary easement presents a conflict. Trees have not been provided consistently along the northern perimeter, and those that are provided are very close to a water line. Trees along the northern and southern perimeters would help minimize the visibility of the canopies, but they won’t eliminate visibility. The holly shrubs proposed along the northern and southern perimeters will help mitigate the view of parked and stacked vehicles. The parking space and island configuration have changed. Two trees have been added to the island adjacent to the dumpster.	Increase planting area to meet landscape requirements along the north, south and western perimeters.

		Consider shifting the travel lane to the south to create additional planting area for screening in the planting island. Provide large shade trees, 2½" caliper at planting, in the planting island between the entrance drive aisle and the parking spaces to help screen the vacuum equipment. Revise the planting height for the Inkberry and Yaupon Hollies to be at least a minimum of 24". If screening of mechanical equipment is provided elsewhere then provide screening shrubs to the south, along the stormwater management basin, at a minimum planting height of 24" to minimize the impact of the stacking area.		
36	Landscaping of buildings and other structures: a. Trees or other vegetation should be planted along the front of long buildings as necessary to soften the appearance of exterior walls. The spacing, size, and type of such trees or vegetation should be determined by the length, height, and blankness of such walls. b. Shrubs should be used to integrate the site, buildings, and other structures; dumpsters, accessory buildings and structures; "drive thru" windows; service areas; and signs. Shrubs should measure at least 24 inches in height.	Provide shrubs or other vegetation along the front of the building. See #35.	A variety of shrubs has been provided along the EC front of the building. The shrubs extend to meet those proposed along the north and south perimeters of the site.	None.
37	Plant species: a. Plant species required should be as approved by the Staff based upon but not limited to the *Generic Landscape Plan Recommended Species List* and *Native Plants for Virginia Landscapes (Appendix D)*.	See #35.	The plants are on the various lists.	None.

38	Plant health: The following note should be added to the landscape plan: "All site plantings of trees and shrubs shall be allowed to reach, and be maintained at, mature height; the topping of trees is prohibited. Shrubs and trees shall be pruned minimally and only to support the overall health of the plant."	Add the standard plant health note to the landscape plan.	The note is on the landscape plan.	None.
	Development pattern			
6	Site development should be sensitive to the existing natural landscape and should contribute to the creation of an organized development plan. This may be accomplished, to the extent practical, by preserving the trees and rolling terrain typical of the area; planting new trees along streets and pedestrian ways and choosing species that reflect native forest elements; insuring that any grading will blend into the surrounding topography thereby creating a continuous landscape; preserving, to the extent practical, existing significant river and stream valleys which may be located on the site and integrating these features into the design of surrounding development; and limiting the building mass and height to a scale that does not overpower the natural settings of the site, or the Entrance Corridor.	Consider moving the building further away from the EC, while maintaining parking and equipment behind the building (as viewed from EC). Provide a pedestrian connection between the internal sidewalk and the sidewalk along the edge of the EC. See #19.	The site has already been developed. The building location has not changed. A crosswalk is shown connecting the sidewalk at the building to the sidewalk on Woodbrook.	None.
39	The relationship of buildings and other structures to the Entrance Corridor street and to other development within the corridor should be as follows: a. An organized pattern of roads, service lanes, bike paths, and pedestrian walks should guide the layout of the site. b. In general, buildings fronting the Entrance Corridor street should be parallel to the street. Building groupings should be arranged to parallel the Entrance Corridor street. c. Provisions should be made for connections to adjacent pedestrian and vehicular circulation systems. d. Open spaces should be tied into surrounding areas to provide continuity within the Entrance Corridor. e. If significant natural features exist on the site (including creek valleys, steep slopes, significant trees or rock outcroppings), to the extent practical, then such natural features should be reflected in the site layout. If the provisions of Section 32.5.2.n of the *Albemarle County*			

	Zoning Ordinance apply, then improvements required by that section should be located so as to maximize the use of existing features in screening such improvements from Entrance Corridor streets. f. The placement of structures on the site should respect existing views and vistas on and around the site.			
	Site Grading			
40	Site grading should maintain the basic relationship of the site to surrounding conditions by limiting the use of retaining walls and by shaping the terrain through the use of smooth, rounded land forms that blend with the existing terrain. Steep cut or fill sections are generally unacceptable. Proposed contours on the grading plan shall be rounded with a ten foot minimum radius where they meet the adjacent condition. Final grading should achieve a natural, rather than engineered, appearance. Retaining walls 6 feet in height and taller, when necessary, shall be terraced and planted to blend with the landscape.	Provide a label specifying the maximum height of the proposed retaining wall. Revise the proposed contours such that they appear natural, rounded and do not have less than a ten-foot radius throughout the site and where they blend with the existing topography.	Wall heights do not exceed 3'. The grading along the western half of the northern side of the site is generally not rounded.	Round proposed contours with a ten-foot minimum radius where they meet the adjacent condition.
41	No grading, trenching, or tunneling should occur within the drip line of any trees or other existing features designated for preservation in the final Certificate of Appropriateness. Adequate tree protection fencing should be shown on, and coordinated throughout, the grading, landscaping and erosion and sediment control plans.	Provide the conservation checklist in the site plan. Provide a tree protection fencing detail in the site plan. Show the tree protection fencing in the Grading and Draining Plan sheet.	No existing trees are proposed to remain.	None.
42	Areas designated for preservation in the final Certificate of Appropriateness should be clearly delineated and protected on the site prior to any grading activity on the site. This protection should remain in place until completion of the development of the site.			
43	Preservation areas should be protected from storage or movement of heavy equipment within this area.			
20	Surface runoff structures and detention ponds should be designed to fit into the natural topography to avoid the need for screening. When visible from the Entrance Corridor street, these features must be fully integrated into the landscape. They should not have the appearance of engineered features.	None.	The site was previously developed. No new above-ground stormwater facilities are proposed.	None.
44	Natural drainage patterns (or to the extent required, new drainage patterns) should be incorporated into the finished site to the extent possible.			

	Signs			
		Sign applications are required for all proposed signs. Eliminate cabinet style signs or limit them to secondary signs. All cabinet type signs must have opaque backgrounds. Reduce the number of colors used in the sign to be no more than three (including white). Eliminate overly intense colors from the sign proposal.	Signage is reviewed and approved by separate submission. However, the following preliminary comments are provided. Wall sign design has changed since the last review. Wall sign type is still illustrated as cabinet signs, but colors have been changed to black and white. Cabinet signs are not the preferred sign type in the ECs. If illuminated, the background portion of cabinet style signs must be opaque.	Signage is reviewed and approved by separate submission. However, the following preliminary comments are provided: Wall sign design has changed since the last review. Walls sign type is still illustrated as cabinet signs, but colors have been changed to black and white. Cabinet signs are not the preferred sign type in the ECs. If illuminated, the background portion of cabinet style signs must be opaque.

ATTACHMENTS

A - W4 Car Wash site and architectural plans (See below)

SUMMARY OF RECOMMENDATIONS

Staff recommends the following as the primary points of discussion:

1. The building materials and colors; the tinted glass; the proportions of the northernmost building bay.
2. The vacuum and pay station equipment: visibility, character, appropriate treatment, screening.
3. The character of the proposed canopies and whether they will be integrated into the overall plan of development.
4. The landscaping proposed along the EC.
5. The lack of perimeter trees.

Regarding the site plan and architectural design, Staff recommends approval with the following revisions:

1. Revise the design of the upper half of the north tower to break up the wall area between the stringcourses, and to relieve the top-heavy appearance (without increasing the size of the wall sign).
2. Clarify the relative heights of the vacuums and the vac canopies.
3. Add the standard window glass note to the drawings: : *Visible light transmittance (VLT) will not drop below 40%. Visible light reflectance (VLR) will not exceed 30%.*
4. Eliminate the vac canopies to reduce visual impacts. Alternatively, reduce the vac canopy fascia height to appear more proportional with the 10' posts.
5. Confirm that there is no equipment visible above the vac canopy fascias.
6. Revise the photometric plan to include the wall fixtures.
7. Limit wall-mounted lighting to that which is needed for safety/security. Eliminate the fixtures above the awnings on the east elevation.
8. Revise the photometric plan to include the locations of all wall-mounted fixtures and all canopy fixtures, and the illumination from those fixtures. Limit illumination at the ground to 20 fc maximum.
9. Include the cut sheets in the site plan set.
10. Revise the lighting plan to show that the color temperature of all proposed light fixtures is the same level between 2000 and 3000K.
11. Revise the lighting plan to show that site light poles and fixtures have a bronze finish.
12. Revise the lighting plan to clearly state that site pole light height will not exceed 20', including any bases. Revise the photometrics to account for this change.
13. Shift trees to avoid utility conflicts.
14. Provide a complete landscape schedule on the landscape plan.
15. Add trees to the northeast corner of the site where utility conflicts don't exist.
16. Remove the note from the landscape plan that reads, "Small to medium trees can be substituted for large trees if overhead utilities are present. See VDOT road design manual appendix B(1)-47."
17. Provide a copy of ACSA's approval of the landscape plan.
18. Provide trees 2 ½" caliper at planting, 40' on center along Woodbrook Drive, clear of utilities and easements.
19. Ensure that the landscape plan includes the shrub planting along the carwash exit travelway.
20. Increase planting area to meet landscape requirements along the north, south and western perimeters.
21. Round proposed contours with a ten-foot minimum radius where they meet the adjacent condition.
22. Signage is reviewed and approved by separate submission. However, the following preliminary comments are provided: Wall sign design has changed since the last review. Walls sign type is still illustrated as cabinet signs, but colors have been changed to black and white. Cabinet signs are not the preferred sign type in the ECs. If illuminated, the background portion of cabinet style signs must be opaque.

TABLE A This report is based on the following submittal items:

Sheet #	Drawing Name	Revision Date		Sheet #	Drawing Name	Revision Date
Site Development Plans				**Architectural Plans**		
1	Cover Sheet	6/22/20		-	Elevations – North and West	8/18/20
2	Existing Conditions & Demo Plan	6/22/20		-	Elevations – South and East	8/18/20
3	Site Plan	6/22/20		-	Dumpster details	-
3.1	Site Plan Canopy Detail	6/22/20		-	Perspective Rendering	-
4	Utility Plan	6/22/20		-	Floor Plan	-
5	Grading Plan	6/22/20			Material Samples: EIFS to match SW 7001 Marshmallow (top of building); Belden Brick Co., Frosted Whites with natural grout (base of building); Horizon Stone: Smokey Mountain Handcrafted (bottom of building); Vacuum Booms: Sonny's RAL 9005; Base Trim: ACM Reynobond Black; Grout: Natural; Shade Awnings: Sherwin Williams: Tricorn Black 6258; Glass: Solarban 70 (2) Optigray VLT 47%, VLR 8%	-
6	Phase 1 Erosion Control Plan	6/22/20		-	Photo of canopy	-
6.1	Phase 2 Erosion Control Plan	6/22/20		**Car Wash Plans**		
7	Erosion Control Details	6/22/20		10.6	Vacuum Foundation Layout; GC	11/13/19
8	Stormwater Calculations and Profiles	6/22/20		10.7	Vac. Post Assembly Detail; GC	
9	Standard Details	6/22/20		10.8	Vac. Producer Assembly Detail; GC	
10	ADA Access Plan	6/22/20		11.3	POS Island Conduit Layout; GC	
11	ADA Details	6/22/20				
12	Landscape Plan	6/22/20				
13	Landscape Details	6/22/20				
14	Outdoor Lighting Plan	6/22/20				
-	Wall Light cut sheets	-				
14	Equipment Sales	6/22/20				
14.1	Equipment Sales	6/22/20				

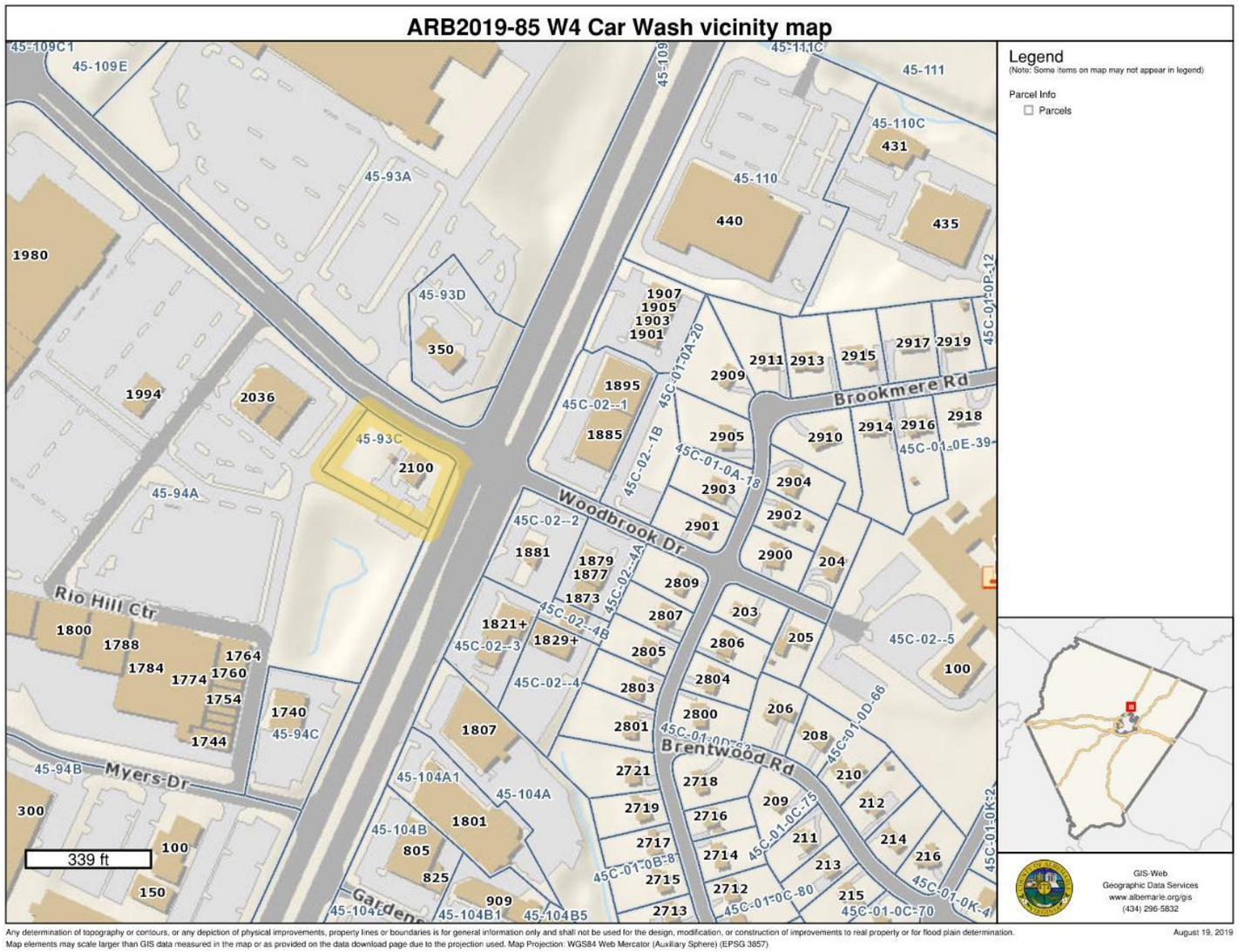


Figure 1: Vicinity Map.



Figure 2: View of site from across Route 29.



Figure 3: View of area between EC and building.



Figure 4: View of overhead utilities.

SITE DEVELOPMENT PLANS

FOR

W4 DEVELOPMENT

CAR WASH

SITE PLAN NUMBER: SDP202000021

CLIENT

W4 DEVELOPMENT

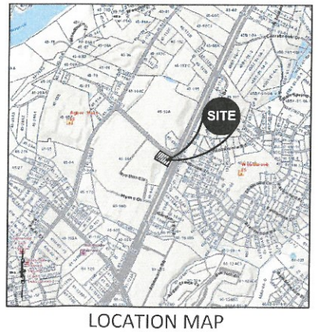
PROJECT LOCATION

2100 RIO HILL CENTER
CHARLOTTESVILLE, ALBEMARLE COUNTY
VIRGINIA 22901

-

TAX MAP AND PARCEL NUMBER: 04500-00-00-093C0
INITIAL SITE PLAN NUMBER: SDP201900052
VSMP PLAN # WPO201900067
RIO MAGISTERIAL DISTRICT

JANUARY 30, 2020



LOCATION MAP
SCALE: N.T.S.

PROJECT NOTES:

DEVELOPER:
W4 Development
2500 Daniell's Bridge Road
Building 200, Suite 3A
Athens, Georgia 30606
Contact: Greg DeBacker
Tel. (706) 548-1151

OWNER:
W4 Properties Charlottesville, LLC
P.O. Box 42
Bogart, Georgia 30622
Contact: Justin Hendley
Tel. (404) 219-8331

ENGINEER:
Carter Engineering Consultants, Inc.
3651 Mars Hill Road - Suite 2000
Watkinsville, GA 30677
Contact: Jeff Carter, P.E.
jeff@carterengineering.net
Tel. 770-725-1200

CONSTRUCTION NOTES:

1. THE DRAWINGS AND SPECIFICATIONS ARE INTENDED TO COVER A COMPLETE PROJECT, READY TO USE, AND ALL ITEMS NECESSARY FOR A COMPLETE AND WORKABLE JOB SHALL BE FURNISHED AND INSTALLED. ANY DISCREPANCY SHALL BE IMMEDIATELY REPORTED TO THE OWNER OR HIS REPRESENTATIVE.
2. NOTIFY THE INSPECTOR OF THE LOCAL GOVERNING AUTHORITY 24 HOURS BEFORE EVERY PHASE OF CONSTRUCTION.
3. ALL WORK SHALL COMPLY WITH ALL APPLICABLE LOCAL, STATE, AND FEDERAL CODES. ALL NECESSARY LICENSES AND PERMITS SHALL BE OBTAINED BY THE CONTRACTOR, AT HIS EXPENSE, UNLESS ALREADY OBTAINED BY THE OWNER.
4. THE CONTRACTOR SHALL COORDINATE LOCATION AND INSTALLATION OF ALL UNDERGROUND UTILITIES AND APPURTENANCES TO MINIMIZE DISTURBING CURBING, PAVING, AND ALL OTHER UTILITIES.
5. THE EXISTING UTILITIES SHOWN ARE FOR THE CONTRACTOR'S CONVENIENCE ONLY. THERE MAY BE OTHER UTILITIES NOT SHOWN ON THESE DRAWINGS. THE UTILITIES SHOWN ARE THOSE LOCATED BY THE SURVEYOR OF RECORD. THE ENGINEER ASSUMES NO RESPONSIBILITY FOR THE LOCATION OF THE UTILITIES SHOWN. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO VERIFY THE LOCATIONS OF ALL UTILITIES WITHIN THE LIMITS OF WORK. ALL DAMAGE MADE TO EXISTING UTILITIES BY THE CONTRACTOR SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR.
6. DEVIATIONS FROM THESE PLANS AND SPECIFICATIONS WITHOUT PRIOR CONSENT OF THE ENGINEER AND THE MUNICIPALITY MAY CAUSE FOR THE WORK TO BE UNACCEPTABLE.
7. ALL MATERIALS SHALL BE NEW UNLESS USED OR SALVAGED MATERIALS ARE AUTHORIZED BY THE OWNER.
8. THE CONTRACTOR SHALL FURNISH AND MAINTAIN ALL NECESSARY BARRICADES AROUND THE WORK AND SHALL PROVIDE PROTECTION AGAINST WATER DAMAGE AND SOIL EROSION.
9. ALL WORK SHALL BE PERFORMED IN A FINISHED AND WORKMANLIKE MANNER TO THE ENTIRE SATISFACTION OF THE OWNER, AND IN ACCORDANCE WITH THE BEST RECOGNIZED TRADE PRACTICES.
10. THE CONTRACTOR SHALL PROVIDE SHEETING AND SHORING FOR ALL TRENCH CONSTRUCTION IN ACCORDANCE WITH OSHA GUIDELINES.
11. ALL PIPE LENGTHS SHOWN ARE TO THE CENTERLINE OF THE STRUCTURES UNLESS SPECIFICALLY NOTED.
12. PIPES (STORM AND SANITARY SEWER) SHALL BE LAID ON SMOOTH, CONTINUOUS GRADES WITH NO VISIBLE BENDS AT THE JOINTS.
13. BEDDING REQUIREMENTS SPECIFIED HEREIN ARE TO BE CONSIDERED AS MINIMUM REQUIRED FOR RELATIVELY DRY STABLE EARTH CONDITIONS. ADDITIONAL BEDDING SHALL BE REQUIRED FOR ROCK TRENCHES TO PROVIDE SUCH ADDITIONAL BEDDING AS REQUIRED TO PROPERLY CONSTRUCT WORK.
14. ALL STORM DRAINAGE INLET STRUCTURES SHALL HAVE METAL RING AND COVER FOR ACCESS.
15. ALL ANGLES SHOWN ARE 90 DEGREES UNLESS SHOWN OTHERWISE.
16. ALL GRADES SHOWN ARE FINISHED GRADES. CONTRACTOR SHALL VERIFY DIMENSIONS, GRADES, AND EXISTING ELEVATIONS PRIOR TO CONSTRUCTION.
17. CONCRETE CURBS SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE DETAILS SHOWN ON PLANS. MATERIALS, EQUIPMENT, METHODS OF CONSTRUCTION AND WORKMANSHIP SHALL CONFORM TO STATE D.O.T. STANDARD SPECIFICATIONS.
18. ALL CONCRETE SHALL HAVE 3000 PSI COMPRESSIVE STRENGTH AFTER 28 DAYS, WITH A MAXIMUM SLUMP OF FOUR (4) INCHES, UNLESS SPECIFIED OTHERWISE.
19. ALL EXPOSED CONCRETE SHALL HAVE A FINE HAIR BROOMED FINISH.
20. PARKING AND DRIVEWAY BASE COURSE AND ASPHALTIC CONCRETE SURFACE AND PRIME MATERIALS, EQUIPMENT, METHODS FOR CONSTRUCTION AND WORKMANSHIP SHALL CONFORM TO STATE D.O.T. STANDARD SPECIFICATIONS.
21. CONTRACTOR TO FIELD VERIFY ALL STORM, SANITARY, WATER AND OTHER UTILITIES LOCATIONS AND INVERTS PRIOR TO INSTALLATION OF ANY UTILITIES. NOTIFY ENGINEER PRIOR TO PROCEEDING WITH ANY WORK IF DISCREPANCIES FOUND.
22. THE USE OF CONCRETE THRUST BLOCKS FOR THE INSTALLATION OF WATER MAINS IS STRICTLY PROHIBITED. PRESSURE PIPE FITTINGS AND OTHER ITEMS REQUIRING RESTRAINT SHALL BE RESTRAINED USING METHODS SPECIFIED IN SECTION 3.8 OF THE CITY'S TECHNICAL STANDARD SPECIFICATIONS. THE PREFERRED METHOD OF RESTRAINT IS THROUGH THE USE OF "MEGA-LUGS" OR "MJR" DEVICES.
23. ALL DIMENSIONS ARE MEASURED TO THE BACK OF CURB UNLESS OTHERWISE NOTED.

WATERSHED NOTE:

THE PROPERTY IS LOCATED IN THE IN THE SOUTH FORK RIVANNA WATERSHED WHICH IS NOT A WATER SUPPLY WATERSHED, HOWEVER THIS INFORMATION MUST BE NOTED ON THE PLAN.

EARTHWORK SPECIFICATIONS:

CLEARING AND GRUBBING

- CLEARING AND GRUBBING SHALL CONSIST OF CLEARING THE SURFACE OF THE GROUND OF THE DESIGNATED AREAS OF ALL TREES, LOGS, SNAGS, BRUSH, UNDERGROWTH, HEAVY GROWTH OF GRASS, WEEDS, FENCE STRUCTURES, DEBRIS AND RUBBISH OF ANY NATURE, NATURAL OBSTRUCTIONS SUCH AS OBJECTIONABLE SOIL MATERIAL UNSATISFACTORY FOR FOUNDATIONS. IT SHALL ALSO CONSIST OF GRUBBING OF STUMPS, ROOTS FOUNDATIONS AND DISPOSAL OF ALL SUCH MATERIAL. ALL HOLES REMAINING AFTER THE GRUBBING OPERATION IN EMBANKMENT AREAS AND IN EXCAVATION AREAS LESS THAN TWO (2) FEET IN DEPTH, SHALL HAVE SIDES BROKEN DOWN AND LEVELED IF NECESSARY TO FLATTEN OUT SLOPES, REFILLED WITH ACCEPTABLE MATERIAL THAT IS PROPERLY COMPACTED IN LAYERS BY TAMPERS, ROLLERS OR CONSTRUCTION EQUIPMENT.
- BURNING ON SITE IS NOT PERMITTED WITHOUT WRITTEN APPROVAL OF THE LOCAL GOVERNING AUTHORITIES HAVING JURISDICTION.

EXISTING TREES OUTSIDE OF GRADING LIMITS LINE:

- TREES AND VEGETATION TO BE SAVED SHALL BE PROTECTED FROM DAMAGE BY A FENCE BARRICADE PRIOR TO, OR DURING, CLEARING OPERATIONS. TREES TO BE REMOVED FROM THE AREA OUTSIDE THE LIMITS OF GRADING OR FROM SPECIFICALLY DESIGNATED AREAS WITHIN THE CONSTRUCTION AREAS. IF, IN THE OPINION OF THE ENGINEER, A CONTRACTOR DAMAGES A TREE NOT TO BE REMOVED, THE CONTRACTOR WILL BE FINED A PREDETERMINED AMOUNT FOR EACH DAMAGED TREE. THE CONTRACT SHALL ALSO BE RESPONSIBLE FOR ALL COSTS ASSOCIATED IN REMOVING THE DAMAGED TREE FROM THE SITE.

FILL:

- ALL VEGETATION SUCH AS ROOTS, BRUSH, HEAVY GROWTH OF GRASS, TOPSOIL, ALL DECAYED VEGETABLE MATTER, RUBBISH, AND OTHER UNSUITABLE MATERIAL WITHIN THE AREA UPON WHICH FILL IS TO BE PLACED SHALL BE STRIPPED OR BE OTHERWISE REMOVED BEFORE THE FILL OPERATION IS STARTED. IN NO CASE SHALL UNSUITABLE MATERIAL REMAIN IN OR UNDER THE FILL AREA. SLOPED GROUND SURFACE STEEPER THAN ON VERTICAL TO FOUR HORIZONTAL ON WHICH FILL IS TO BE PLACED, SHALL BE PLACED, STEPPED OR BENCHED IN SUCH A MANNER THAT THE FILL TO BE PLACED SHALL BE 97 PERCENT OF THE MAXIMUM LABORATORY DRY DENSITY ACCORDING TO STANDARD PROCTOR (AASHTO T99, ASTM D-698). MOISTURE CONTENT SHALL BE WITHIN 3 PERCENT OF THE OPTIMUM MOISTURE CONTENT. PROOF ROLL THE AREAS TO BE FILLED OR ON WHICH STRUCTURES ARE TO BE PLACED. A LOADED DUMP TRUCK OR OTHER RUBBER TIRED EQUIPMENT SHALL BE USED FOR PROOF ROLLING. OVERLAPPING PASSES OF A VEHICLES SHOULD BE MADE ACROSS THE SITE IN ONE DIRECTION AND THEN PERPENDICULAR TO THE ORIGINAL DIRECTION OF ROLLING.
- ANY YIELDING, PUMPING OR SOFT AREAS SHOULD BE CUT OUT AND REPLACED WITH FILL COMPACTED AS DESCRIBED HEREIN.
- THE PROPOSED FILL SHOULD BE LIMITED TO SOILS CLASSIFIED IN ACCORDANCE WITH ASTM D-2487 AS GM, GC, SW, SM, SC, ML AND CL. SOIL CLASSIFIED AS PT, OH, OL, CH AND MH ARE NOT SATISFACTORY AS COMPACTED FILL.
- FILLS AND EMBANKMENTS SHALL BE CONSTRUCTED AT THE LACTATIONS AND TO THE LINES AND GRADES INDICATED ON CONSTRUCTION PLANS. THE SLOPE SHALL NOT EXCEED 2 FOOT HORIZONTAL TO 1 FOOT VERTICAL (3 FOOT HORIZONTAL TO 1 FOOT VERTICAL IN THE PUBLIC RIGHT OF WAY). THE COMPLETED FILL SHALL CORRESPOND TO THE SHAPE OF THE TYPICAL SECTIONS INDICATED ON THE CONSTRUCTION PLANS. MATERIAL REMOVED FROM THE EXCAVATION SHALL BE USED IN FORMING THE FILL. FILL MATERIAL SHALL BE REASONABLY FREE FROM ROOTS, OTHER ORGANIC MATERIAL, TRASH AND STONES HAVING MAXIMUM DIMENSIONS GREATER THAN 6 INCHES (4 INCHES IN TRENCHES FOR UTILITIES). NO FROZEN MATERIAL WILL BE PERMITTED IN THE FILL. STONES HAVING A MAXIMUM DIMENSION OF 4 INCHES WILL NOT BE PERMITTED IN THE UPPER SIX INCHES OF FILL OR EMBANKMENT OR UTILITY TRENCH. THE MATERIAL SHALL BE PLACED IN SUCCESSIVE HORIZONTAL LAYERS NOT MORE THAN 8 INCHES THICK, UNLESS OTHERWISE NOTED, IN LOOSE DEPTH FOR THE WIDTH OF THE CROSS-SECTION AND SHALL BE COMPACTED TO AT LEAST 97 PERCENT OF THE MAXIMUM LABORATORY DRY DENSITY ACCORDING TO STANDARD PROCTOR (ASTM D-698, AASHTO T-99). MOISTURE SHALL BE WITHIN 3 PERCENT OF THE OPTIMUM MOISTURE CONTENT. THE TOP 12 INCHES OF THE PAVING, PARKING AND/OR ROADWAY SUB-GRADE SHALL BE COMPACTED TO 97 PERCENT OF THE MAXIMUM DRY DENSITY (STANDARD PROCTOR). EACH LIFT SHALL BE ROLLED WITH A VIBRATORY ROLLER, A SHEEPSFOOT ROLLER, OR A LOADED RUBBER TIRED DUMP TRUCK, SCRAPER OR LOADER. IF THE SOIL IS TOO DRY, A WATER TRUCK WITH SPREADER BAR OR SPRAY HOSE SHALL BE USED TO BRING THE SOIL TO THE PROPER MOISTURE RANGE. THE WATER SHALL BE THOROUGHLY AND PROPERLY MIXED WITH THE SOIL PRIOR TO COMPACTION.
- STORM DRAIN PIPES SHALL BE PLACED ON FIRM BOTTOM AND HAND TAMPED TO SAFE UP THE PIPE. A CUSHION OF SOIL SHALL BE TAMPED ABOVE THE CROWN OF THE PIPE IN ACCORDANCE WITH THE PIPE MANUFACTURER'S RECOMMENDATIONS SO THAT THE HEAVIER COMPACTION EQUIPMENT CAN THEN BE USED TO BRING THE SOIL TO A DENSITY AS DESCRIBED ABOVE FOR FILL AREAS.
- IF SOILS INVESTIGATION REPORT IS PROVIDED, THEN FOLLOW THE RECOMMENDATIONS OF THE REPORT IF THEY EXCEED THE RECOMMENDATIONS OF THESE SPECIFICATIONS.

TOPSOIL:

- UNLESS OTHERWISE SPECIFIED, AREAS DESIGNATED FOR GRADING OPERATIONS THAT CONTAIN A BLANKET OF TOPSOIL SHALL BE STRIPPED AND PLACED IN CONVENIENT STOCKPILES FOR LATER USE AS A TOPSOIL BLANKET ON THE NEW GRADED AREAS SPECIFIED HEREIN, OR AS DESIGNATED. TOPSOIL SHALL BE STRIPPED FROM ALL AREAS DESIGNATED TO RECEIVE FILL. THE STRIPPING OF MATERIAL FOR TOPSOIL SHALL BE CAREFULLY DETERMINED AND ONLY THE QUANTITY REQUIRED SHALL BE STOCKPILED MATERIAL STOCKPILED SHALL BE STORED IN A SATISFACTORY MANNER TO AFFORD PROPER DRAINAGE. WHEN GRADING OPERATIONS PERMIT, INSTEAD OF STOCKPILING, THE TOPSOIL SHALL BE HAULED AND SPREAD DIRECTLY ON THE AREAS DESIGNATED TO RECEIVE TOPSOIL.

ROCK EXCAVATION:

- IF ROCK IS ENCOUNTERED, CLEAR AWAY EARTH TO EXPOSE MATERIAL. NOTIFY OWNER AND RECEIVE WRITTEN INSTRUCTIONS PRIOR TO EXCAVATION. REMOVE ROCK TO A DEPTH OF 6 INCHES BELOW AND 8 INCHES ON EACH SIDE OF PIPES IN TRENCHES. A MEASUREMENT OF EXTENT OF ROCK TO BE REMOVED SHALL BE MADE. ROCK EXCAVATION SHALL BE PAID FOR IN ACCORDANCE WITH AGREEMENT WITH THE OWNER.

SIGNATURE PANEL: DATE:

DEPARTMENT OF COMMUNITY DEVELOPMENT:

PLANNING/ZONING _____

ENGINEER _____

INSPECTIONS _____

ARB _____

DEPARTMENT OF FIRE RESCUE _____

ALBEMARLE COUNTY SERVICE AUTHORITY _____

VIRGINIA DEPARTMENT OF TRANSPORTATION _____

SHEET INDEX

SHEET NO.	DESCRIPTION
1	COVER SHEET
2	EXISTING CONDITIONS & DEMO PLAN
3	SITE PLAN
4	UTILITY PLAN
5	GRADING PLAN
6	PHASE 1 EROSION CONTROL PLAN
6.1	PHASE 2 EROSION CONTROL PLAN
7	EROSION CONTROL DETAILS
8	STORMWATER CALCULATIONS AND PROFILES
9	STANDARD DETAILS
10	ADA ACCESS PLAN
11	ADA DETAILS
12	LANDSCAPE PLAN
13	LANDSCAPE DETAILS
14	OUTDOOR LIGHTING PLAN

REVISION BLOCK

REV. NO.	DATE	DESCRIPTION
1	07/05/19	ARCHITECTURAL REVIEW BOARD SUBMITTAL
2	08/21/19	SITE DEVELOPMENT PLAN REVIEW
3	11/11/19	VSMP/WPO COMMENTS
4	12/16/19	ADDRESS COMMENTS
5	01/21/20	VSMP ADDRESS COMMENTS
6	01/30/20	ARCHITECTURAL ADDRESS COMMENTS
7	06/22/20	ADDRESS COMMENTS

Carter Engineering Consultants, Inc.
3651 Mars Hill Road
Suite 2000
Watkinsville, GA 30677
P: 770-725-1200
F: 770-725-1204
www.carterengineering.net

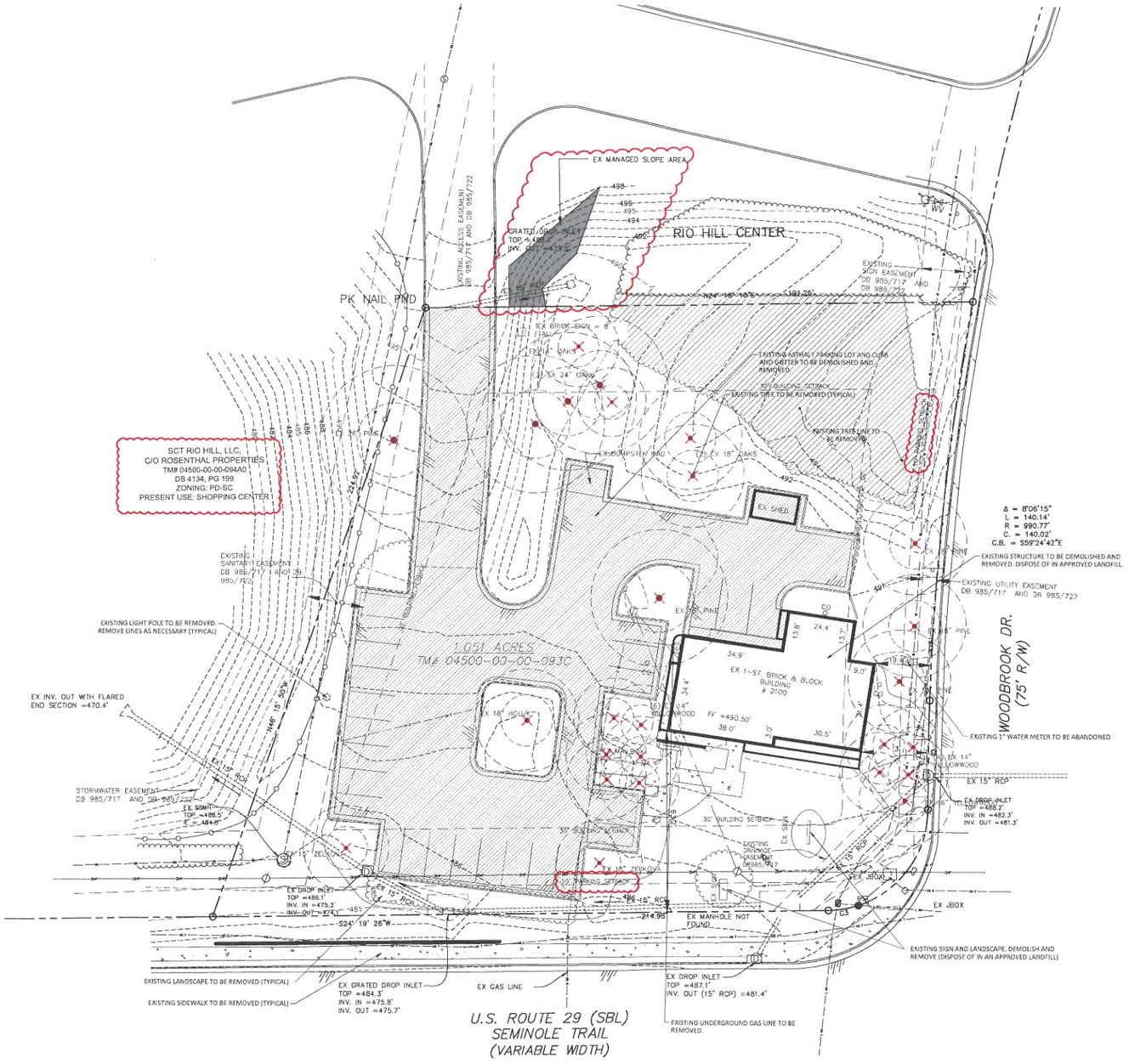
COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
Jeff Carter
PROFESSIONAL ENGINEER
DATE: 1.30.20

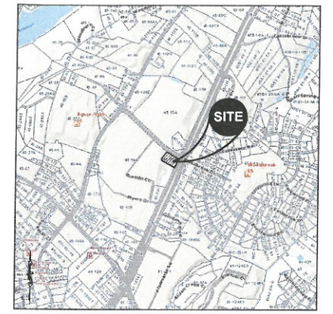
24-HOUR CONTACT:
Greg DeBacker (706) 548-1151

Project Tract = 1.05 acres
Disturbed area = 0.99 acres
Total Impervious Area = 0.66 acres
Project Site Location: Lat 38.087836° Long -78.471183°

DEMOLITION NOTES:

1. THE LOCATIONS OF ALL EXISTING FACILITIES SHOWN ON THIS PLAN HAVE BEEN DETERMINED FROM THE BEST INFORMATION AVAILABLE AND ARE GIVEN FOR THE CONVENIENCE OF THE CONTRACTOR. THE ENGINEER ASSUMES NO RESPONSIBILITY FOR THEIR ACCURACY. PRIOR TO THE START OF ANY DEMOLITION ACTIVITY, THE CONTRACTOR SHALL NOTIFY THE UTILITY COMPANIES FOR ON SITE LOCATIONS OF EXISTING UTILITIES.
2. THE CONTRACTOR SHALL FURNISH ALL MATERIALS, LABOR, SUPERVISION AND EQUIPMENT REQUIRED FOR THE ORDERLY DEMOLITION AND REMOVAL OF EXISTING CURB AND SIGNS AS SHOWN ON THE DRAWINGS AND DESCRIBED HEREIN.
   A. DEMOLITION AND REMOVAL OF EXISTING ON SITE ASPHALT, CONCRETE PAVING, AND CURBING TO DEMOLITION LINE SHOWN.
3. ALL EXISTING CURB AND SIGNS INDICATED ON THE DRAWINGS TO BE REMOVED SHALL BE DEMOLISHED AND REMOVED BY THE CONTRACTOR. REMOVE NO STRUCTURE SUBSTANTIALLY AS A WHOLE. DEMOLISH COMPLETELY ON THE PREMISES.
4. ALL EXISTING SEWERS, PIPING, UTILITIES SHOWN ARE NOT TO BE INTERPRETED AS THE EXACT LOCATION, OR AS THE ONLY OBSTACLES THAT MAY OCCUR ON THE SITE. VERIFY EXISTING CONDITIONS AND PROCEED WITH CAUTION AROUND ANY ANTICIPATED FEATURES. GIVE NOTICE TO ALL UTILITY COMPANIES REGARDING DESTRUCTION AND REMOVAL OF ALL SERVICE LINES AND CAP ALL LINES BEFORE PROCEEDING WITH THE WORK.
5. PROVIDE ADEQUATE PROTECTION FOR PERSONS AND PROPERTY AT ALL TIMES. EXECUTE THE WORK IN A MANNER TO AVOID HAZARDS TO PERSONS AND PROPERTY AND PREVENT INTERFERENCE WITH THE USE OF AND ACCESS TO ADJACENT BUILDINGS. STREETS AND SIDEWALKS SHALL NOT BE BLOCKED BY DEBRIS AND EQUIPMENT.
6. CONTRACTOR MUST STOP OPERATION AND NOTIFY THE OWNER FOR PROPER DIRECTION IF ANY ENVIRONMENTAL OR HEALTH RELATED CONTAMINATE IS ENCOUNTERED DURING THE DEMOLITION/EXCAVATION PROCESS.
7. DISPOSAL
   A. REMOVE AND LEGALLY DISPOSE OF ALL OTHER RUBBISH, RUBBLE, AND DEBRIS. COMPLY WITH ALL APPLICABLE LAWS AND REGULATIONS GOVERNING DISPOSAL OF WASTE AND DEBRIS. THE LOCATION OF THE APPROVED SITE MUST BE INCLUDED IN THE SWPPP BOOK.
8. PAVEMENT REMOVAL
   A. WHERE EXISTING PAVEMENT IS TO BE REMOVED, SAW-CUT THE SURFACING LEAVING A UNIFORM AND STRAIGHT EDGE WITH A MINIMUM OF DISTURBANCE TO THE REMAINING ADJACENT SURFACING. IF CONSTRUCTION RESULTS IN RAVELING OF THE SAW-CUT SURFACE, RECUT BACK FROM THE RAVELED EDGE PRIOR TO RESTORATION.
   B. WHERE EXISTING PAVEMENT, CURB, CURB AND GUTTER, SIDEWALK, DRIVEWAY OR VALLEY GUTTER IS REMOVED FOR THE PURPOSE OF CONSTRUCTING OR REMOVING BOX CULVERTS, PIPE, INLETS, MANHOLES, APPURTENANCES, FACILITIES OR STRUCTURES, SAID PAVEMENT, ETC., SHALL BE REPLACED AND RESTORED IN EQUAL OR BETTER CONDITION THAN THE ORIGINAL. CONTRACTOR SHALL PROVIDE ALL NECESSARY LABOR, MATERIALS, EQUIPMENT, TOOLS, SUPPLIES, AND OTHER EQUIPMENT AS REQUIRED.
9. CONTINUOUS ACCESS SHALL BE MAINTAINED FOR THE SURROUNDING PROPERTIES AT ALL TIMES DURING DEMOLITION OF THE EXISTING FACILITIES.
10. PERMITTING: IT IS THE CONTRACTOR'S RESPONSIBILITY TO OBTAIN ANY REQUIRED PERMITTING FOR DEMOLITION FROM RESPONSIBLE REGULATIONS AND FULLY ACKNOWLEDGE AND COMPLY WITH ALL REQUIREMENTS PRIOR TO COMMENCING DEMOLITION WORK.
11. IT IS THE CONTRACTOR'S SOLE RESPONSIBILITY TO DETERMINE THE EXTENT OF DEMOLITION REQUIRED IN ORDER TO PERFORM THE CONTRACT WORK FOR THIS PROJECT. THE CONTRACTOR SHALL CONDUCT SITE VISITS AND SHALL EXAMINE ALL OF THE INFORMATION WITHIN THESE DOCUMENTS. ALL DISCREPANCIES AND/OR OMISSIONS SHALL BE BROUGHT TO THE ATTENTION OF THE ENGINEER PRIOR TO BID SUBMITTAL.
12. CONTRACTOR SHALL LIMIT ALL DEMOLITION ACTIVITY TO THAT AREA DELINEATED IN THE DRAWING, ALL OTHER EXIST. UTILITIES INCLUDING: STORM DRAINAGE, GAS, ELECTRIC, TELEPHONE, AND WATER & SEWER SHALL BE PRESERVED & PROTECTED.
13. CARE SHOULD BE TAKEN WHEN REMOVING TREES WITHIN THE ACSA EASEMENT TO PREVENT DAMAGE TO THE WATER MAIN.





LOCATION MAP
SCALE: N.T.S.

PROJECT NOTES:

DEVELOPER:
W4 Development
2500 Daniel's Bridge Road
Building 200, Suite 3A
Athens, GA 30606
Contact: Greg DeBacker
Phone: (706) 548-1151

OWNER:
W4 Properties Charlottesville, LLC
P.O. Box 42
Bogart, Ga 30622
Contact: Justin Hendley
Tel. (404) 219-8331

ENGINEER:
Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677
Contact: Jeff Carter, P.E.
Tel. (770) 725-1200
jeff@carterengineering.net

Property Location: 2100 Rio Hill Center, Charlottesville, Albermarle County, Virginia 22901

Tax Map and Parcel No.: 04500-00-00-093C0
Conditional Approval: SDP201900052 , ZMA 1987 - 00007 and SDP 1988-00001
Zoning: PD-SC (Planned Development Shopping Center)
(Note: This parcel is subject to the following overlay districts: Airport Impact Area, Entrance Corridor, and Managed Steep Slopes.)

Setbacks: Building: 30-feet min Parking: 10-feet min
Proposed use: Shopping and associated services and parking
Proposed Building Height 20 Feet
Maximum Building Height 65 Feet

Project Tract 1.05 acres
Disturbed Area 0.99 acres

Boundary and topographical information obtained from field run survey by Hurt & Proffitt dated April 30, 2019. Phone (434) 847-7796

Contour interval is 1 Feet (NAVD 88)

F.E.M.A. Flood Insurance Rate Map No. 51003C 0278D, dated February 02, 2006 indicates that this property is located in "Zone X".

The underground utilities shown hereon have been located from field information and existing drawings. The surveyor nor engineer warrants that the underground utilities shown comprise all such utilities in the area, either in service or abandoned. The surveyor nor engineer warrants that the underground utilities shown are in the exact location indicated. The surveyor nor engineer has physically located all the underground utilities.

It is the responsibility of the contractor to field locate all utilities prior to commencing work and notify engineer if a discrepancy is found.

The contractor shall verify the invert elevations of all existing storm and sanitary sewer structures prior to commencement of storm and sanitary sewer construction.

UNDERGROUND UTILITIES DISCLAIMER

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TRUE NORTH

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GRAPHIC SCALE
SCALE 1" = 20'

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2	08/21/19	SITE DEVELOPMENT PLAN REVIEW
3	11/15/19	ADDRESS COMMENTS
4	12/16/19	ADDRESS COMMENTS
5	01/21/20	VSMP ADDRESS COMMENTS
6	01/30/20	ARCHITECTURAL ADDRESS COMMENTS
7	06/22/20	ADDRESS COMMENTS

COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
PROFESSIONAL ENGINEER
DATE: 1.30.20

CARTER ENGINEERING CONSULTANTS

Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677

P: 770.725.1200
F: 770.725.1204
www.carterengineering.net

SITE DEVELOPMENT PLANS for W4 DEVELOPMENT

2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
EXISTING CONDITIONS & DEMO PLAN

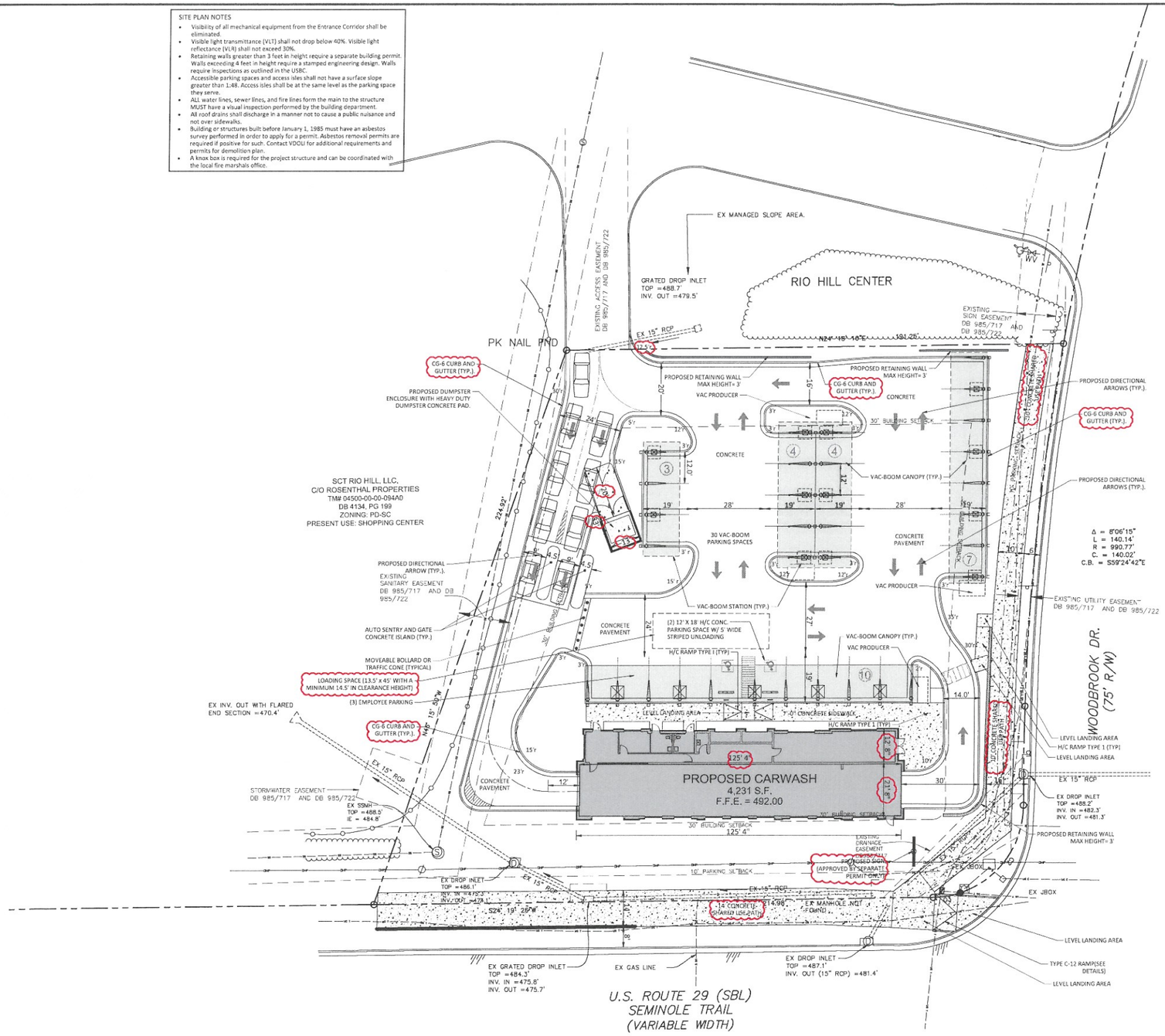
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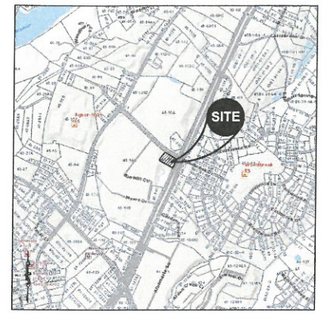
PROJECT NUMBER:
19016W4D

DATE:
06/22/20

SITE PLAN NOTES

- Visibility of all mechanical equipment from the Entrance Corridor shall be eliminated.
- Visible light transmittance (VLT) shall not drop below 40%. Visible light reflectance (VLR) shall not exceed 30%.
- Retaining walls greater than 3 feet in height require a separate building permit. Walls exceeding 4 feet in height require a stamped engineering design. Walls require inspections as outlined in the USBC.
- Accessible parking spaces and access isles shall not have a surface slope greater than 1:48. Access isles shall be at the same level as the parking space they serve.
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- All roof drains shall discharge in a manner not to cause a public nuisance and not over sidewalks.
- Building or structures built before January 1, 1985 must have an asbestos survey performed in order to apply for a permit. Asbestos removal permits are required if positive for such. Contact VDOLI for additional requirements and permits for demolition plan.
- A knox box is required for the project structure and can be coordinated with the local fire marshals office.





LOCATION MAP
SCALE: N.T.S.

PROJECT NOTES:

DEVELOPER:
W4 Development
2500 Daniel's Bridge Road
Building 200, Suite 3A
Athens, GA 30606
Contact: Greg DeBacker
Phone: (706) 548-1151

OWNER:
W4 Properties Charlottesville, LLC
P.O. Box 42
Bogart, Ga 30622
Contact: Justin Hendley
Tel. (404) 219-8331

ENGINEER:
Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677
Contact: Jeff Carter, P.E.
Tel. (770) 725-1200
jeff@carterengineering.net

Property Location:	2100 Rio Hill Center, Charlottesville, Albermarle County, Virginia 22901
Tax Map and Parcel No.:	04500-00-00-093C0
Conditional Approval:	SDP201900052 , ZMA 1987 - 00007 and SDP 1988- 00001
Zoning:	PD-SC (Planned Development Shopping Center) (Note: This parcel is subject to the following overlay districts: Airport Impact Area, Entrance Corridor, and Managed Steep Slopes.)
Setbacks:	Building: 30-feet min Parking: 10-feet min
Proposed use:	Carwash with associated utilities and parking
Proposed Building Height	20 Feet
Maximum Building Height	65 Feet
Project Tract	1.05 acres
Disturbed Area	0.99 acres

Boundary and topographical information obtained from field run survey by Hurt & Proffitt dated April 30, 2019. Phone (434) 847-7796

Contour Interval is 1 Feet (NAVD 88)

F.E.M.A. Flood Insurance Rate Map No. 51003C 0278D, dated February 02, 2006 indicates that this property is located in "Zone X".

The underground utilities shown hereon have been located from field information and existing drawings. The surveyor nor engineer warrants that the underground utilities shown comprise all such utilities in the area, either in service or abandoned. The surveyor nor engineer warrants that the underground utilities shown are in the exact location indicated. The surveyor nor engineer has physically located all the underground utilities.

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PARKING DATA

Parking Required:

Requirement: One (1) space per each one hundred (100) square feet of retail sales area for the first five thousand (5,000) square feet and one (1) space per each two hundred (200) square feet of retail sales area above five thousand (5,000) square feet. For purposes of this paragraph, 'retail sales area' shall be deemed to be (1) eighty (80) percent of the gross floor area; or (2) at the request of the applicant, the actual retail sales floor area as shown on floor plans submitted by the applicant delineating the actual retail sales area, which plans shall be binding as to the maximum retail sales area used.

Retail Sales Area	=	2,715 Square Feet (21' 8" x 125' 4")
Required Parking	=	27 Parking Spaces Required (2,715 / 100)
Provided Parking	=	29 Parking Spaces Provided
Handicap Parking	=	2 Provided (2 Required)

SITE DATA

Site Information:

Total Tract Area	=	45,787 sf	1.05 ac	(100.00%)
Existing Impervious Area	=	19,002 sf	0.44 ac	(43.62%)
Existing Landscape Area	=	26,785 sf	0.61 ac	(56.38%)
Total Impervious Coverage	=	28,611 sf	0.66 ac	(62.49%)
Structure Coverage	=	3,739 sf	0.09 ac	(08.17%)
Vehicular Coverage	=	22,291 sf	0.51 ac	(48.68%)
Pedestrian Coverage	=	2,500 sf	0.06 ac	(05.46%)
Proposed Landscape Area	=	17,176 sf	0.39 ac	(37.51%)
Total Coverage Area	=	28,611 sf	0.66 ac	(62.49%)

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GRAPHIC SCALE
SCALE 1" = 20'

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COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
No. 039[illegible]
PROFESSIONAL ENGINEER
DATE: 1.30.20

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SITE DEVELOPMENT PLANS for W4 DEVELOPMENT

2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

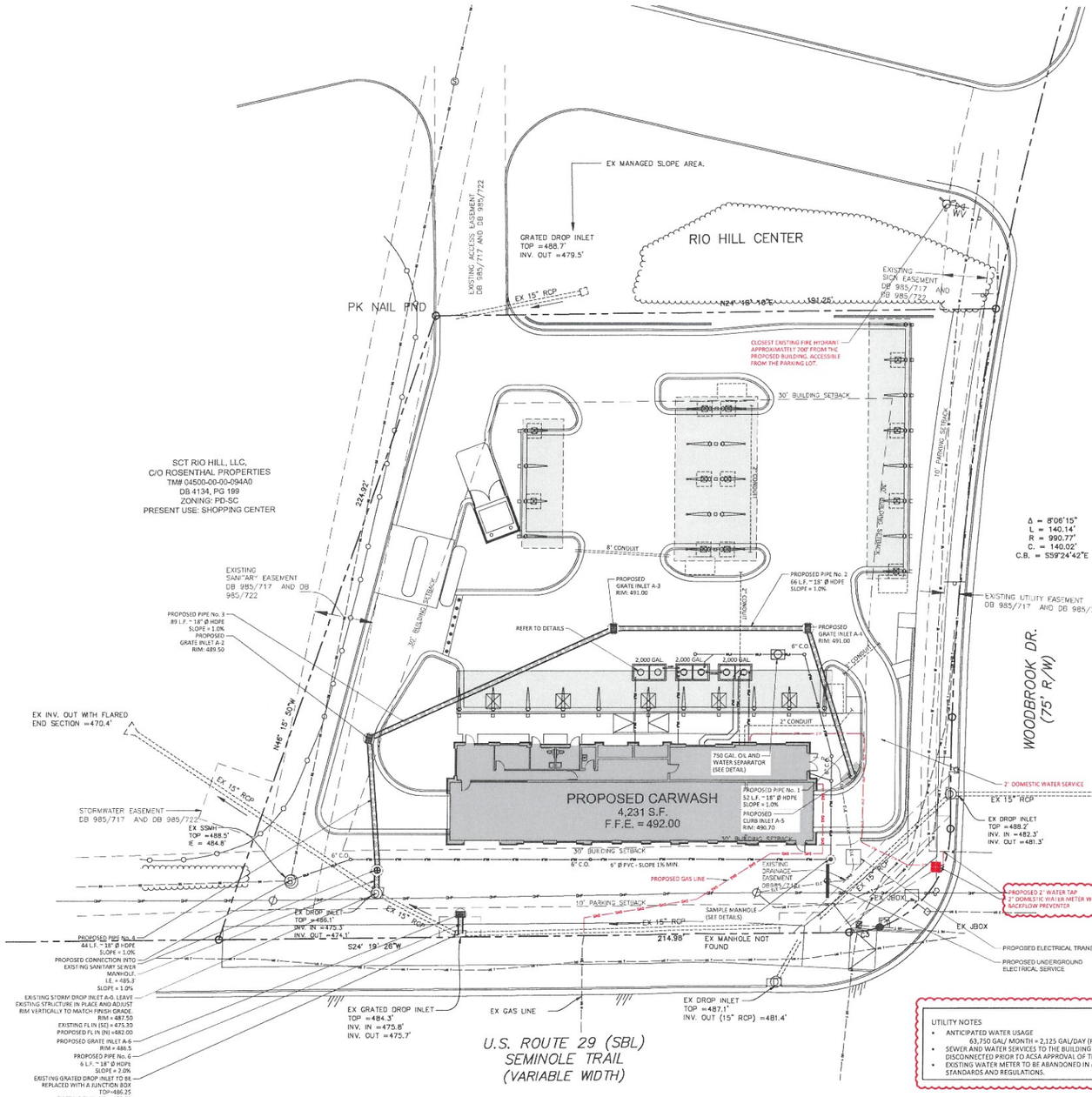
PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
SITE PLAN

SHEET NUMBER:
3

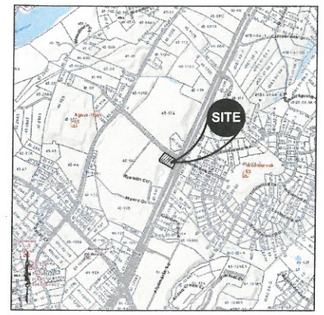
PROJECT NUMBER:
19016W4D

DATE:
06/22/20



UTILITY NOTES

- ANTICIPATED WATER USAGE
  63,750 GAL/ MONTH = 2,125 GAL/DAY (PEAK DEMAND 82 GPM)
- SEWER AND WATER SERVICES TO THE BUILDING WILL NEED TO BE DISCONNECTED PRIOR TO ACSA APPROVAL OF THE DEMOLITION PERMIT.
- EXISTING WATER METER TO BE ABANDONED IN ACCORDANCE WITH LOCAL STANDARDS AND REGULATIONS.



LOCATION MAP
SCALE: N.T.S.

PROJECT NOTES:

DEVELOPER:
W4 Development
2500 Daniel's Bridge Road
Building 200, Suite 3A
Athens, GA 30606
Contact: Greg DeBacker
Phone: (706) 548-1151

OWNER:
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Contact: Jeff Carter, P.E.
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jeff@carterengineering.net

Property Location:	2100 Rio Hill Center, Charlottesville, Albermarle County, Virginia 22901
Tax Map and Parcel No.:	04500-00-00-093C0
Conditional Approval:	SDP201900052 , ZMA 1987 - 00007 and SDP 1988- 00001
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COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
LICENSED
PROFESSIONAL ENGINEER
DATE: 1.30.20

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SITE DEVELOPMENT PLANS for W4 DEVELOPMENT

2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
UTILITY PLAN

SHEET NUMBER:
4

PROJECT NUMBER:
19016W4D

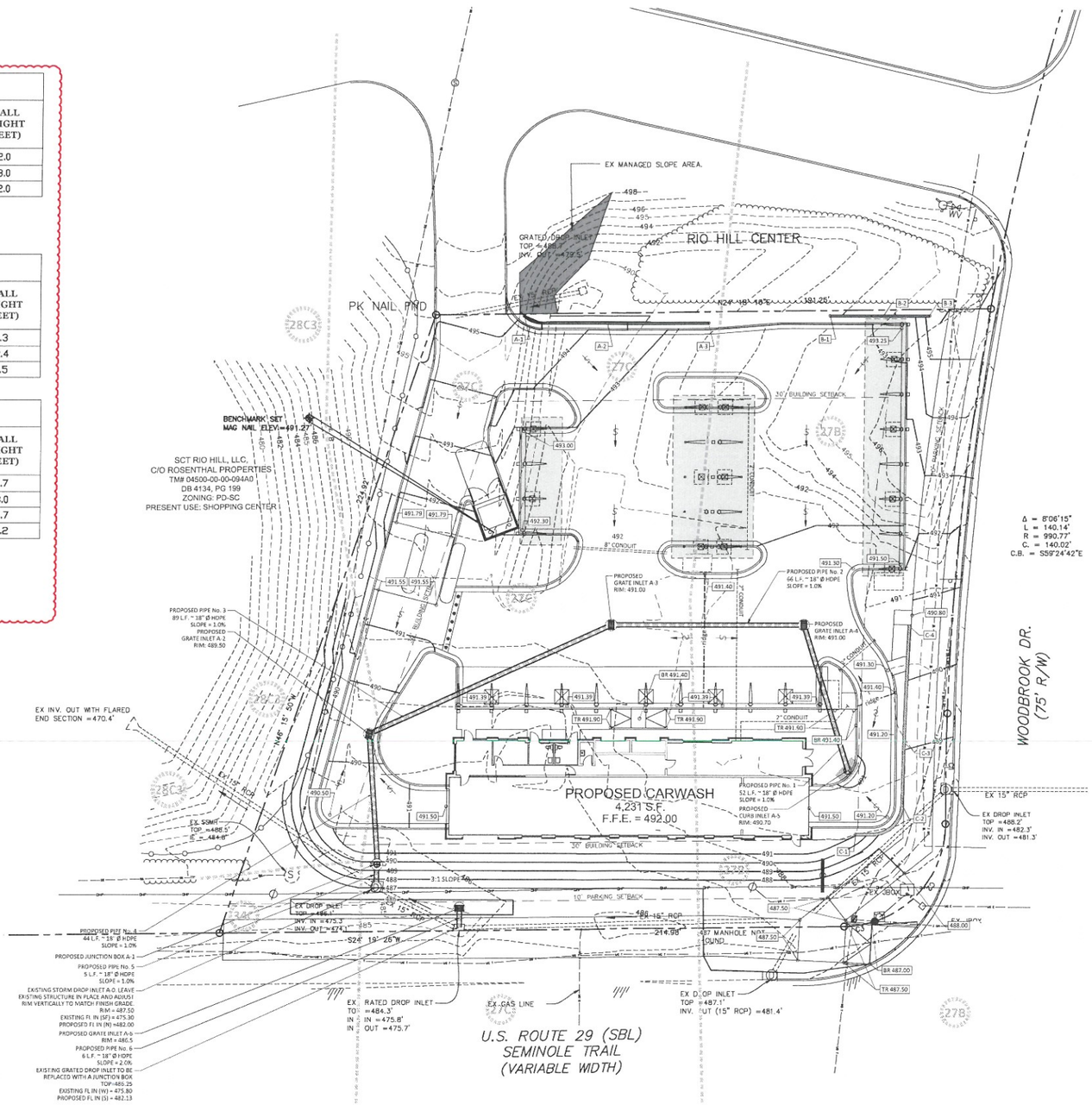
DATE:
06/22/20

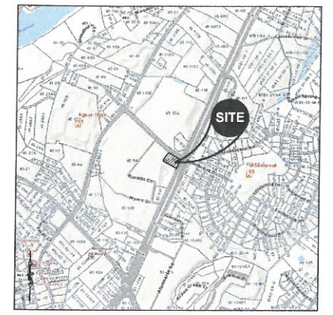
RETAINING WALL "A"				
LOCATION	STATION	TOP OF WALL	BOTTOM OF WALL	WALL HEIGHT (FEET)
A-1	0+00	495.50	493.50	2.0
A-2	0+29	494.00	491.00	3.0
A-3	0+99	493.50	491.50	2.0

RETAINING WALL "B"				
LOCATION	STATION	TOP OF WALL	BOTTOM OF WALL	WALL HEIGHT (FEET)
B-1	0+00	493.75	492.50	1.3
B-2	0+18	494.90	492.50	2.4
B-3	0+34	495.50	494.00	1.5

RETAINING WALL "C"				
LOCATION	STATION	TOP OF WALL	BOTTOM OF WALL	WALL HEIGHT (FEET)
C-1	0+00	491.70	491.00	0.7
C-2	0+20	491.70	488.70	3.0
C-3	0+45	491.70	489.00	2.7
C-4	0+84	491.00	490.80	0.2

BOTTOM OF WALL EQUALS
FINISHED GRADE





LOCATION MAP
SCALE: N.T.S.

PROJECT NOTES:

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Contact: Greg DeBacker
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Contact: Jeff Carter, P.E.
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jeff@carterengineering.net

Property Location: 2100 Rio Hill Center, Charlottesville, Albermarle County, Virginia 22901

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COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
No. 028
PROFESSIONAL ENGINEER
DATE: 1.30.20

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SITE DEVELOPMENT PLANS for W4 DEVELOPMENT

2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

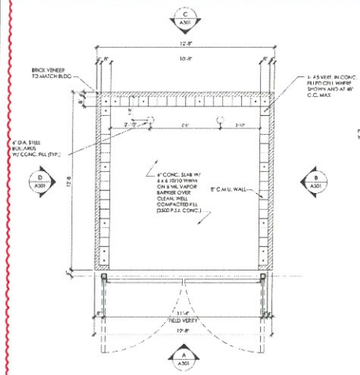
PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
GRADING AND DRAINING PLAN

SHEET NUMBER:
5

PROJECT NUMBER:
19016W4D

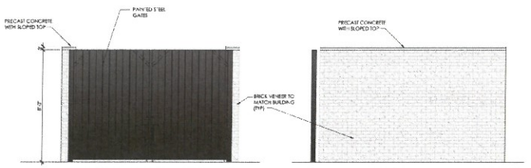
DATE:
06/22/20



1 A301 mls **DUMPSTER ENCLOSURE PLAN**

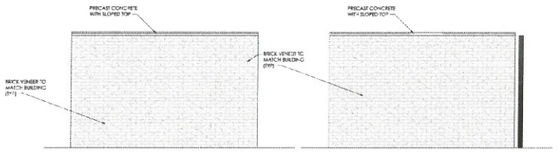
Reinforce with a minimum grid of wire reinforcing or #4 bars at 12" on center.

MRP DESIGN GROUP
3450 Acworth Due West Road
Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
www.mrpdesign.com



A A301 mls **DUMPSTER ENCLOSURE ELEVATION**

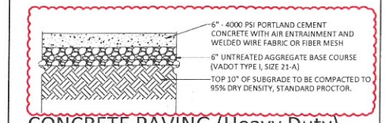
B A301 mls **DUMPSTER ENCLOSURE ELEVATION**



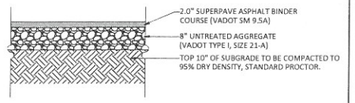
C A301 mls **DUMPSTER ENCLOSURE ELEVATION**

D A301 mls **DUMPSTER ENCLOSURE ELEVATION**

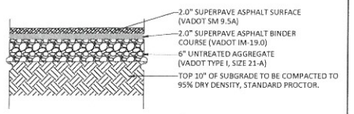
EXPRESS W4 CAR WASH



CONCRETE PAVING (Heavy Duty)



ASPHALT PAVING (Light Duty)

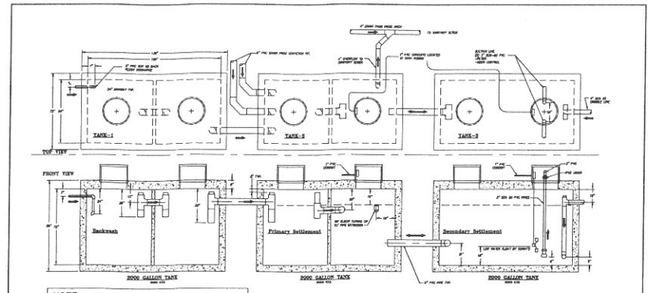


ASPHALT PAVING (Heavy Duty)

NOTES:

1. REFER TO THE PAVEMENT RECOMMENDATIONS WITHIN THE GEOTECHNICAL REPORT PREPARED BY ECS MID-ATLANTIC, LLC, DATED FEBRUARY 26, 2019 (ECS PROJECT NO. 03:13004) - SHOWN ABOVE. SEE FULL GEOTECHNICAL REPORT FOR MORE DETAILS.
2. IT IS THE CONCTRACTOR'S RESPONSIBILITY TO OBTAIN A COPY OF THE GEOTECHNICAL REPORT FROM THE OWNER PRIOR TO CONSTRUCTION AND REVIEW THE RECOMMENDATIONS THOROUGHLY.
3. ALL SUBBASE, CRUSHED STONE, AND ASPHALTIC LAYERS TO BE COMPACTED AND INSTALLED PER VADOT STANDARDS.

PAVEMENT DETAILS

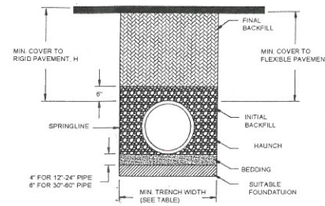


NOTE:
1. Pressure Test All Suction Lines Upon Installation @ 15-16 PSI max
2. Keep pressure on Suction Lines for the entire DURATION of construction.
3. Pressure should NOT drop more than 2 PSI
4. Watch for problems when excavating driveways
5. If reclaim tanks are located more than 60 feet away from reclaim unit, then increase suction line to 3" ash 80 PVC
6. Placement of suction lines is critical
7. DoNOT put screens on the suction lines
8. ANY QUESTIONS CONTACT BONNYS

CAR WASH RECLAIM SYSTEM
STANDARD RECLAIM 3 TANK

(SEE RECLAIM SHEET FOR DETAIL)

NOTE:
1. ALL CONCRETE TANKS AND PIPING BY CONTRACTOR
2. ALL JOINTS TO BE SEALED WITH NON-SHRINK GROUT
3. ALL INTERNAL TANK PLUMBING TO BE 4" SCH 40 PVC UNLESS NOTED OTHERWISE
4. ALL TANK BOTTOMS SHOULD BE LEVEL
5. THIS DRAWING IS TO SHOW TANK HOLDING CAPACITY AND PIPING RELATIONSHIPS ONLY. THEY ARE NOT INTENDED TO ADDRESS TANK STRUCTURE (ENGINEERING)



*NOTES:

1. ALL PIPE SYSTEMS SHALL BE INSTALLED IN ACCORDANCE WITH ASTM D2321, "STANDARD PRACTICE FOR UNDERGROUND INSTALLATION OF THERMOPLASTIC PIPE FOR SEWERS AND OTHER GRAVITY FLOW APPLICATIONS", LATEST EDITION

2. MEASURES SHOULD BE TAKEN TO PREVENT MIGRATION OF NATIVE FINES INTO BACKFILL MATERIAL, WHEN REQUIRED

3. FOUNDATION: WHERE THE TRENCH BOTTOM IS UNSUITABLE, THE CONTRACTOR SHALL EXCAVATE TO A DEPTH REQUIRED BY THE ENGINEER AND REPLACE WITH SUITABLE MATERIAL AS SPECIFIED BY THE ENGINEER, AS AN ALTERNATIVE AND AT THE DISCRETION OF THE DESIGN ENGINEER, THE TRENCH BOTTOM MAY BE STABILIZED USING A GEOTEXTILE MATERIAL

4. BEDDING: SUITABLE MATERIAL SHALL BE CLASS I, II OR III. THE CONTRACTOR SHALL PROVIDE DOCUMENTATION FOR THE MATERIAL SPECIFICATION TO THE ENGINEER, UNLESS OTHERWISED NOTED BY THE ENGINEER, MINIMUM BEDDING THICKNESS SHALL BE 4" (100mm) FOR 4"-24" (100mm-600mm); 6" (150mm) FOR 30"-60" (750mm-900mm).

5. INITIAL BACKFILL: SUITABLE MATERIAL SHALL BE CLASS I, II OR III IN THE PIPE ZONE EXTENDING NOT LESS THAN 6" ABOVE CROWN OF PIPE. THE CONTRACTOR SHALL PROVIDE DOCUMENTATION FOR MATERIAL SPECIFICATION TO ENGINEER. MATERIAL SHALL BE INSTALLED AS REQUIRED IN ASTM D2321, LATEST EDITION.

6. MINIMUM COVER: MINIMUM COVER, H, IN NON-TRAFFIC APPLICATIONS (GRASS OR LANDSCAPE AREAS) IS 12" FROM THE TOP OF THE PIPE TO GROUND SURFACE. ADDITIONAL COVER MAY BE REQUIRED TO PREVENT FLOTATION. FOR TRAFFIC APPLICATIONS, MINIMUM COVER, H, IS 12" UP TO 48" DIAMETER PIPE AND 24" OF COVER FOR 54"-60" DIAMETER PIPE, MEASURED FROM TOP OF PIPE TO BOTTOM OF FLEXIBLE PAVEMENT OR TO TOP OF RIGID PAVEMENT.

RECOMENDED MINIMUM TRENCH WIDTHS

PIPE DIAM.	MIN. TRENCH WIDTH
4"	21"
6"	23"
8"	26"
10"	28"
24"	48"
15"	34"
18"	39"
24"	48"
30"	58"
36"	64"
42"	72"
48"	80"
54"	88"
60"	96"

MINIMUM RECOMENDED COVER BASED ON VEHICLE LOADING CONDITIONS

	SURFACE LIVE LOADING CONDITION	
PIPE DIAM	H-25	HEAVY CONSTRUCTION (75T AXLE LOAD)*
12" - 48"	12"	48"
54" - 60"	24"	60"

* VEHICLES IN EXCESS OF 75T MAY REQIRE ADDITIONAL COVER

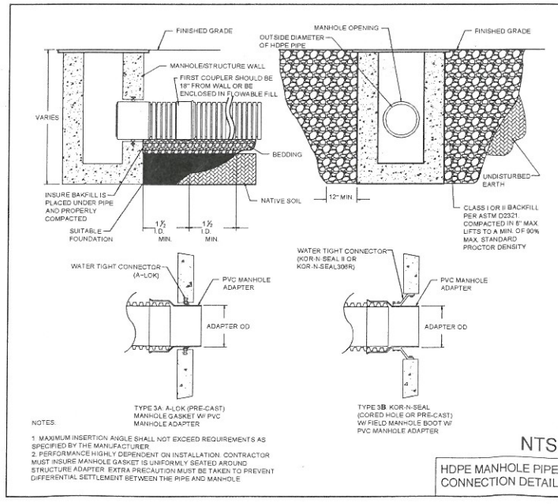
MINIMUM RECOMENDED COVER BASED ON RAILWAY LOADING CONDITIONS

PIPE DIAM	COOPER E-80**
UP TO 24"	24"
30"-36"	24"
42"-60"	24"

** COVER IS MEASURED FROM TOP OF PIPE TO BOTTOM OF RAILWAY TIE
** E-80 COVER REQUIREMENTS, ARE ONLY APPLICABLE TO ASTM F 2306 PIPE

NTS

Typical HDPE Bedding Detail



NOTES:

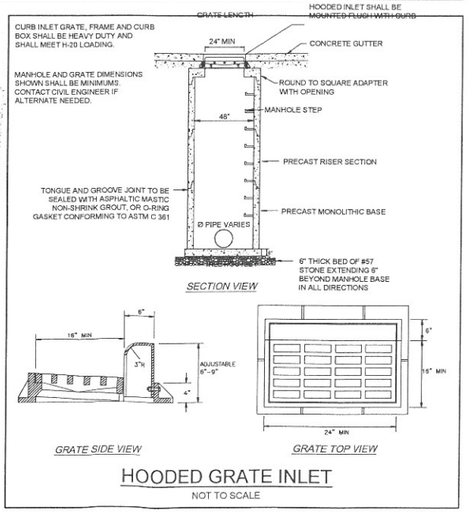
1. MAXIMUM INSERTION ANGLE SHALL NOT EXCEED REQUIREMENTS AS SPECIFIED BY THE MANUFACTURER.
2. PERFORMANCE HIGHLY DEPENDENT ON INSTALLATION. CONTRACTOR MUST INSURE MANHOLE GASKET IS UNIFORMLY SEATED AROUND STRUCTURE ADAPTER. EXTRA PRECAUTION MUST BE TAKEN TO PREVENT DIFFERENTIAL SETTLEMENT BETWEEN THE PIPE AND MANHOLE.

NTS

HDPE MANHOLE PIPE CONNECTION DETAIL

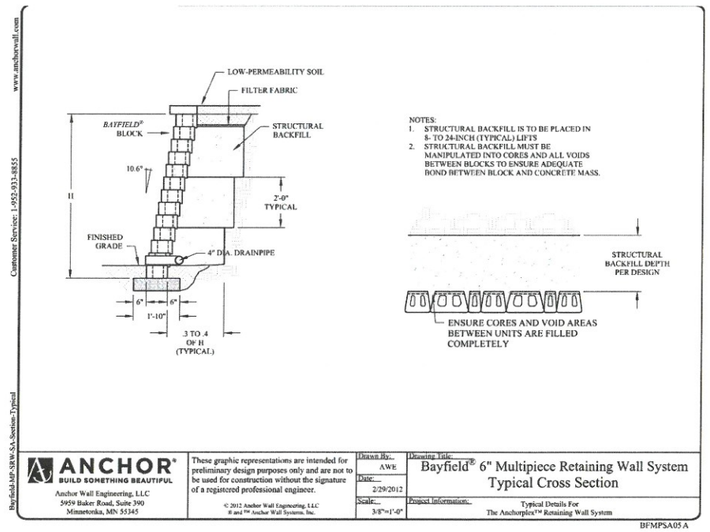
CURB INLET GRATE, FRAME AND CURB BOX SHALL BE HEAVY DUTY AND SHALL MEET H-20 LOADING.

MANHOLE AND GRATE DIMENSIONS SHOWN SHALL BE MINIMUMS. CONTACT CIVIL ENGINEER IF ALTERNATE NEEDED.



HOODED GRATE INLET

NOT TO SCALE



NOTES:
1. STRUCTURAL BACKFILL IS TO BE PLACED IN 8- TO 24-INCH (TYPICAL) LIFTS
2. STRUCTURAL BACKFILL MUST BE MANIPULATED INTO CORES AND ALL VOIDS BETWEEN BLOCKS TO ENSURE ADEQUATE BOND BETWEEN BLOCK AND CONCRETE MASS.

www.anchorwall.com
Customer Service: 1-952-933-8855
Bayfield-MP-SRW-SA-Section-Typical

ANCHOR® BUILD SOMETHING BEAUTIFUL
Anchor Wall Engineering, LLC
5959 Baker Road, Suite 390
Minnetonka, MN 55345

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Drawn By: AWE
Date: 2/29/2012
Scale: 3/8"=1'-0"

Drawing Title: Bayfield® 6" Multipiece Retaining Wall System Typical Cross Section

Project Information: Typical Details For The Anchorplex™ Retaining Wall System

BFMPSA05 A

REVISION BLOCK:

#	DATE	DESCRIPTION
1	07/05/19	ARCHITECTURAL REVIEW BOARD SUBMITTAL
2	08/21/19	SITE DEVELOPMENT PLAN REVIEW
3	11/15/19	ADDRESS COMMENTS
4	12/16/19	ADDRESS COMMENTS
5	01/21/20	VDMP ADDRESS COMMENTS
6	01/30/20	ARCHITECTURAL ADDRESS COMMENTS
7	06/22/20	ADDRESS COMMENTS

COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
PROFESSIONAL ENGINEER
DATE: 1.30.20

CARTER ENGINEERING CONSULTANTS
Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677
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www.carterengineering.net

SITE DEVELOPMENT PLANS for W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

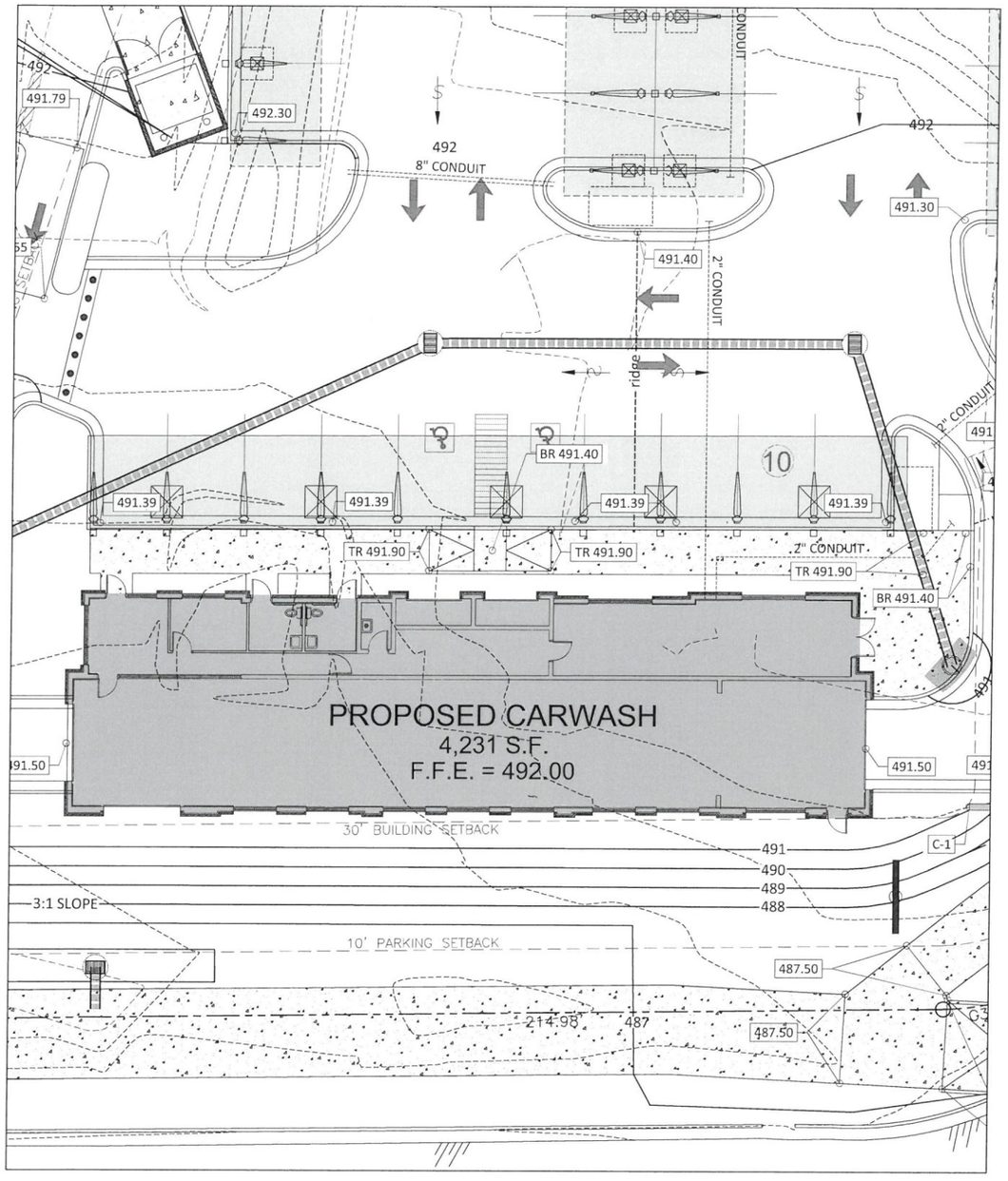
PROJECT NAME: W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE: STANDARD DETAILS

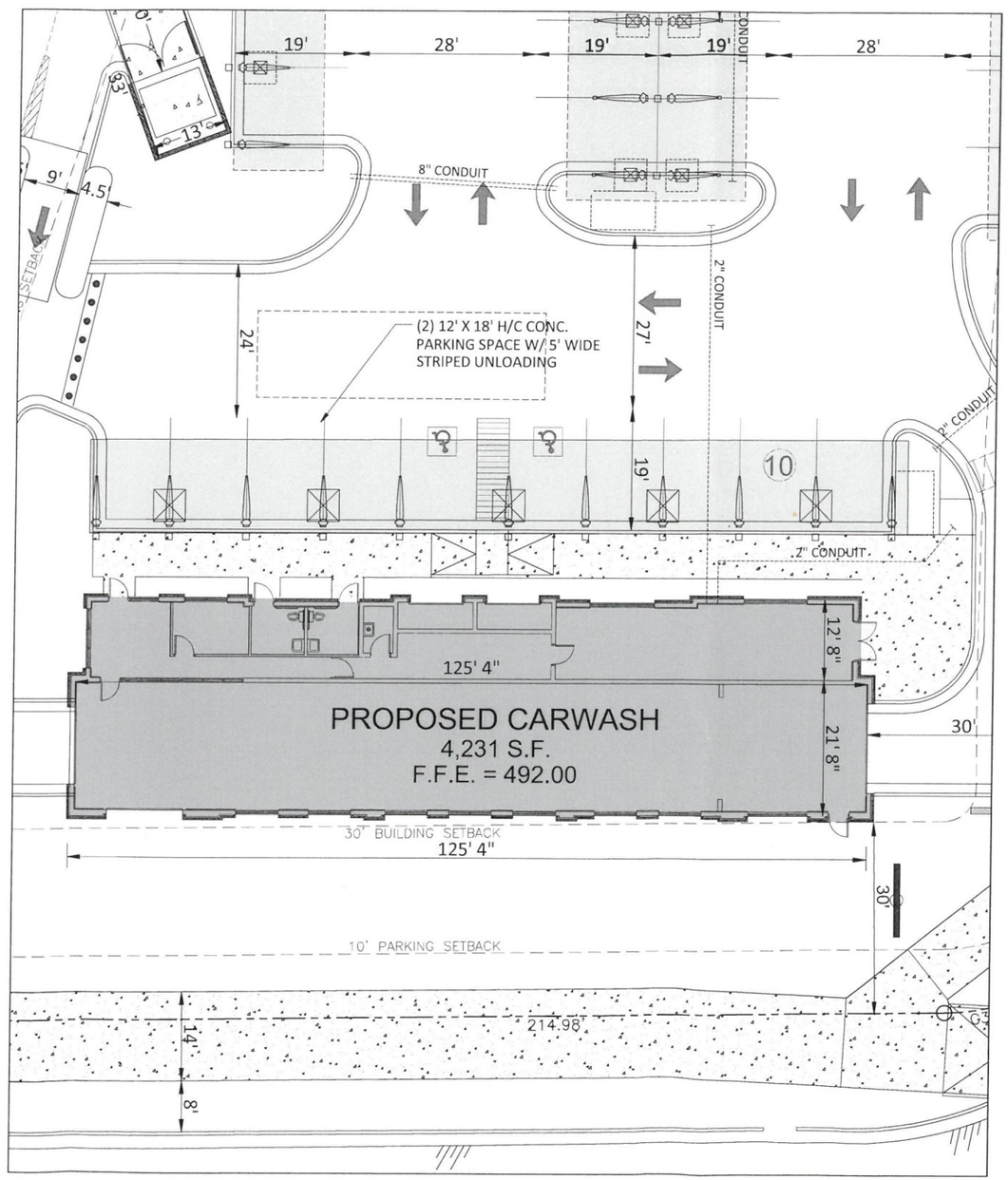
SHEET NUMBER: 9

PROJECT NUMBER: 19016W4D

DATE: 06/22/20



GRADING PLAN
SCALE: 1" = 20'



SITE PLAN
SCALE: 1" = 20'

ACCESSIBLE PARKING SPACES, ACCESS AISLES AND PASSENGER LOADING ZONES SHALL HAVE SURFACE SLOPES NOT STEEPER THAN 1:67 (1.5%) IN ANY DIRECTION.

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SITE DEVELOPMENT PLANS
for
W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

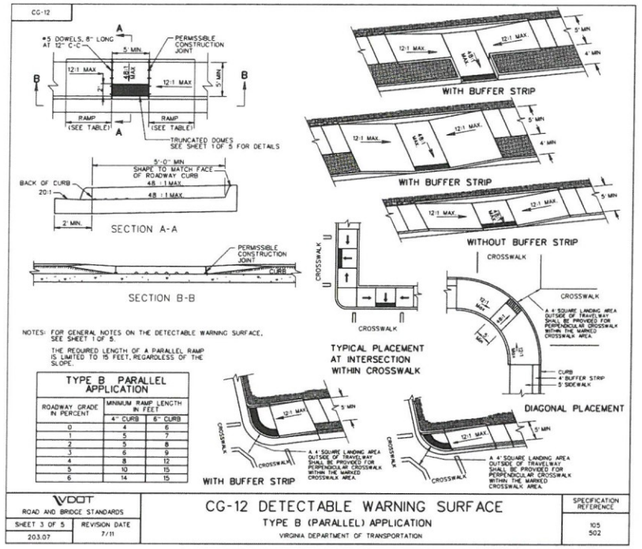
PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

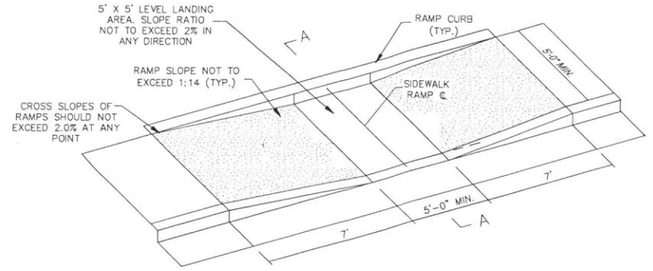
SHEET TITLE:
ADA ACCESS PLAN

SHEET NUMBER:
10

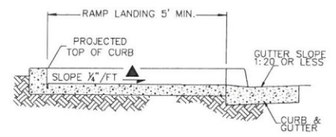
PROJECT NUMBER:
19016W4D

DATE:
06/22/20





ISOMETRIC VIEW OF RAMP

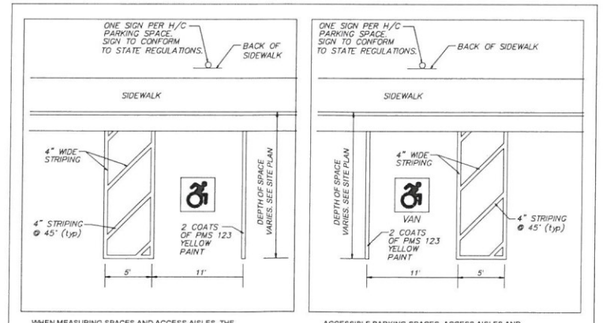


SECTION A-A

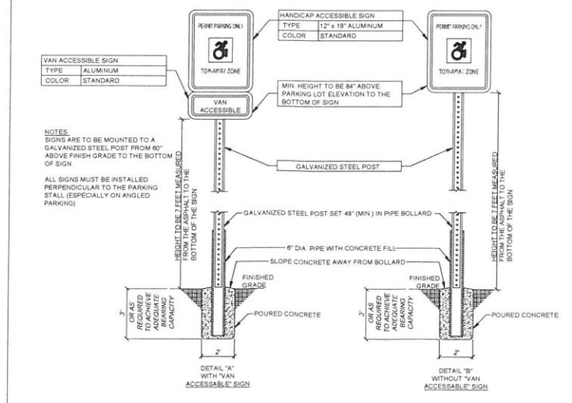
NOTES:

1. HANDICAP RAMP CONSTRUCTION SHALL CONFORM TO ALL FEDERAL, STATE AND CITY CODES AND SPECIFICATIONS.
2. SURFACES SHALL MEET THE REQUIREMENTS OF 2010 ADA AND THE 2004 ADAAG
3. THE SLOPE OF THE GUTTER MUST NOT EXCEED 1:20 ADJACENT TO THE RAMP.

STANDARD CONSTRUCTION DETAIL
HANDICAP RAMP TYPE I



PAINTED HANDICAPPED PARKING SPACE & SYMBOL
NOT TO SCALE



"HANDICAP PARKING ONLY" SIGNS
NOT TO SCALE

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COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
LIC. NO. 0402
PROFESSIONAL ENGINEER
DATE: 1.30.20

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SITE DEVELOPMENT PLANS
for
W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
ADA DETAILS

SHEET NUMBER:
11

PROJECT NUMBER:
19016W4D

DATE:
06/22/20

TREE MANAGEMENT CALCULATIONS:

GENERAL LANDSCAPE REQUIREMENTS:

Street Trees Requirement

Street trees shall be planted with even spacing in a row within the public street right-of-way or adjacent to the public street right-of-way if not permitted therein by the Virginia Department of Transportation, and with the private street right-of-way. One (1) large street tree shall be required for every fifty (50) feet of street frontage, or portion thereof, if twenty-five (25) feet or more. Where permitted, one (1) medium tree shall be required for every forty (40) feet or road frontage, or portion thereof, if twenty (20) feet or more. If required street trees cannot be planted within the parking setback or within ten (10) feet of the street right-of-way due to sight distance, utility easements, or other conflicting requirements, then the planting strip shall be enlarged to accommodate the trees. If this requirement creates a hardship by causing the relocation of required parking spaces, then the additional planting area may be counted toward the interior landscaping requirement.

Seminole Trail: (power lines present) — 249.75 Linear Feet
Large Trees Required: — 6 Small Trees Required (249.75 / 40)
Large Trees Provided: — **6 Small Trees Provided**
Additional Ornamental Trees Provided

Woodbrook Drive: — 213.63 Linear Feet
Large Trees Required: — 4 Large Trees Required (213.63 / 50)
Large Trees Provided: — **4 Large Trees Provided**

Shrubs along public streets: When a parking area is located so that the parked cars will be visible from an off-site street, the agent may required additional planting of low street shrubs between the street and the parking area, subject to the following:

1. *Shrubs shall be a minimum of twelve (12) inches in height when planted*
2. *Shrubs shall be in a single row planted five (5) feet on center.*
3. *The agent may authorize different landscaping designed to minimize the visual impact of the parking area.*

A hedge of evergreen shrubs planted no greater than five (5) feet on-center and being a minimum of 12" in height at time of planting has been proposed along Seminole Trail and Woodbrook Drive.

Parking Area Landscape Requirement

An area of at least five (5) percent of the paved parking and vehicular circulation area shall be landscaped with trees or shrubs. Neither the areas of street trees and shrubs required by sections 32.7.9.5(C) and (e) nor shrubs planted between a parking area and a building on the site shall be counted toward the minimum area landscaped areas for a parking area.

Vehicular Area:	21,982 Square Feet
Landscape Area Required:	1,099.1 Square Feet (5%)
Landscape Area Provided in Parking:	1,937 Square Feet (9%)
Landscape Area Provided (Parking & Circulation):	**17,186 Square Feet (80%)**

The plant material/s may be a mixture of shade trees and shrubs and shall include one (1) large or medium shade tree per ten (10) parking spaces or portion thereof.

Parking Spaces Provided:	30 Parking Spaces
Trees Required:	3 Trees Required (30 / 10)
Trees Provided:	**4 Trees Provided**

Tree Canopy Requirements

Each commercial or industrial use site shall have a tree canopy covering a minimum of ten (10) percent of the property (45,787 SF).

Tree Canopy Required:	4,578.7 Square Feet (10.00%)
Tree Canopy Provided:	**5,695 Square Feet (12.44%)**
Existing to Remain	0 Square Feet Canopy Area
(6) 329 Shumard Oak	1,974 Square Feet Canopy Area
(4) 366 Lacebark Elm	1,464 Square Feet Canopy Area
(7) 125 Trident Maple	875 Square Feet Canopy Area
(5) 184 Chinese Pistache	920 Square Feet Canopy Area
(6) 77 Crape Myrtle	462 Square Feet Canopy Area

PLANTING NOTES:

1. The contractor shall locate and verify all existing and new utility line locations prior to planting, and shall report any conflicts to the landscape architect. The contractor will be responsible for the protection of all underground utilities during the life of the project.
2. The contractor is responsible for repair of any damage incurred during the execution of work.
3. The contractor shall stake all tree locations in the field and the staked locations shall be reviewed and approved by Carter Engineering. Carter Engineering may make minor adjustments to the layout without incurring additional costs to the project.
4. Mulch all plant areas with 3" layer of double ground shredded hardwood mulch.
5. Any proposed substitutions of plant species will be with plants with equivalent overall form, height, branching habit, flower color, leaf color, fruit color, and time of bloom, as approved by Carter Engineering.
6. Substitutions shall not be made unless drawings and/or written requests are submitted to Carter Engineering for approval. Carter Engineering shall determine equality based upon complete information submitted by the contractor.
7. Trees: provide specimen balled and burlapped, or as specified, trees of height, size, caliper, genus, species, cultivar and branching configuration indicated. The root system of each shall be well provided with flonous roots. All parts of plant shall be moist and show active gmon cambium when cut, they shall be free of disease, insect pests, eggs or larvae. All plants to be moved balled and burlapped, must be moved with the root systems as solid units with balls of earth firmly wrapped with untreated burlap, firmly held in place by a stout cord or wire. drum boxed, boxed, or in containers.
8. Pruning and shaping: prune, thin out, and shape plants in compliance with American Hort's 'American Standard for Nursery Stock' to preserve the natural character and only as approved by Carter Engineering design team. Retain required height and spread. Do not alter shape and do not cut leaders. Remove all dead wood, suckers, broken or bruised branches, and crossing branches.
9. Stakes and Guys: to be round cedar posts.
10. The Carter Engineering representative reserves the right to reject plant material at the nursery or at the site.
11. The trunk flare (at the base of the tree) shall be properly exposed for all plantings.
12. Keep root balls moist prior to and during planting operations. Plants with broken or damaged root balls shall be rejected and immediately removed from the site. Keep root balls damp and protected from damage due to sun and wind. Do not shave root balls.
13. Plant soil mixture will be used to backfill the planting area. Install plants simultaneously with installation of planting soil mixes.
14. Tree planting: see tree planting detail and notes herein for additional information related to planting pit dimensions, planting operations, backfilling, and tree staking.
15. Container stock planting: plant container grown stock the same as spoorfeo for balled and burlapped stock. but remove containers completely.
16. Soil shall be free of all debris, construction material, and slurry. Landscape areas shall be backfilled with planting soil mixture per details and specifications.
17. Obstructions: if obstructions or other conditions detrimental to healthy plant growth are encountered, notify Carter Engineering immediately and request additional instructions.
18. Watering and drainage: fill excavations with water and allow water to percolate out before planting. If planting pits do not percolate or drain properly, notify the Carter Engineering and request additional instructions prior to planting. Do not plant into poorly draining planting pits; poorly draining planting pits may hold water and drown plants.
19. Flood all plants with water twice within the first 24 hours after planting.
20. All plant material shall be mulched after planting. Backfill to allow room for mulch after settling, and place mulch in dish after first watering and within one week of planting. See planting details for mulch thickness.
21. All plants shall be plumb vertically after settling or as directed by Carter Engineering.
22. Planting restrictions: plant during one of the following periods,
    - Spring planting (shrubs, groundcover, perennials) - March through May
    - Fall planting shrubs (shrubs, groundcover, perennials) - Sept. through November
    - Tree planting - September through April
23. Installer agrees to repair or replace plantings and accessories that fail in materials, workmanship or growth within 18-months of substantial completion. Failures include, but are not limited to:
    - Death and unsatisfactory growth, except for defects resulting from the lack of adequate maintenance by owner,
    - Structural failures including plantings falling or blowing over.
24. The contractor shall verify the quantities listed in the plant legend. Contractor is responsible for installing all plants shown on planting plans. In case of discrepancies Carter Engineering should be contacted.
25. All groundcover quantities shall be determined using the information provided in the groundcover quantity and spacing chart within the Landscape Drawing Set.

GENERAL LANDSCAPE NOTES:

1. Landscaping shown on this plan shall be maintained in compliance with county and/or city landscape ordinance.
2. All disturbed ground shall have ground cover or mulch and/or grassing.
3. Trees selected for planting must be free from injury, pests, disease, nutritional disorders or root defects, and must be of good vigor, so as to assure a reasonable expectation of survivability.
4. Plants that are diseased, unsurvivably damaged or are dead shall be removed and replaced with a plant of the same species, variety, and cultivar, as acceptable to the code enforcement director.
5. Other landscape materials shall be maintained in proper repair and shall be kept clear of refuse and debris.
6. Arbor Tie or similar nylon tree strapping/guying material shall not be used in a way that will girdle tree trunks if left in place.

GROUNDCOVER SPACING & QUANTITY	
PLANT SPACING	PLANT SPACING MULTIPLIER (PLANTS PER SF)
12"	1.15
15"	.74
18"	.51
24"	.29

PLANT SCHEDULE

TOTAL QTY	BOTANICAL NAME	COMMON NAME	CAL/GAL.	SPACING	TYPE	HT./SPR. MINIMUM	REMARKS
CANOPY TREES							
5	*Pistachia chinesis*	Chinese Pistache	3.5" Cal.	As Shown	B & B	12' / 6'	Straight Central Leader to Min. 6' Ht., Well Spaced Branches, Symmetrical Crown
6	*Quercus shumardii*	Shumard Oak	3.5" Cal.	As Shown	B & B	12' / 6'	Straight Central Leader to Min. 6' Ht., Well Spaced Branches, Symmetrical Crown
4	*Ulmus parvifolia 'Emer II' Allee*	Emer II' Lacebark Elm	3.5" Cal.	As Shown	B & B	12' / 6'	Straight Central Leader to Min. 6' Ht., Well Spaced Branches, Symmetrical Crown
UNDERSTORY/FLOWERING TREES							
6	*Acer buergerianum 'Aeryn'*	Aeryn' Trident Maple	3.5" Cal.	As Shown	B & B	12' / 6'	Straight Central Leader to Min. 6' Ht., Well Spaced Branches, Symmetrical Crown
6	*Lagerstroemia indica 'Tuskegee'*	Tuskegee' Crape Myrtle	3.5" (Multi)	As Shown	B & B	10' / 5'	Multi-stem (3 min.) Clear to 5', Well Spaced Branches, Symmetrical Crown
EVERGREEN SHRUBS							
12	*Camellia sasanqua 'Kanjiro'*	Kanjiro' Camillia	7 Gal.	As Shown	Container	36" / 30"	Full Pot, Well Shaped
37	*Cephalotaxus harringtonia 'Prostrata'*	Spreading Japanese Plum Yew	3 Gal.	As Shown	Container	18" / 18"	Full Pot, Well Shaped
12	*Ilex crenata 'Sky Pencil'*	Sky Pencil' Holly	7 Gal.	As Shown	Container	36" / 18"	Full Pot, Well Shaped
117	*Ilex glabra 'Densa'*	Densa' Inkberry Holly	5 Gal.	As Shown	Container	24" / 24"	Full Pot, Well Shaped
80	*Ilex vomitoria 'Stokes Dwarf'*	Stokes Dwarf' Yaupon Holly	5 Gal.	As Shown	Container	24" / 24"	Full Pot, Well Shaped
DECIDUOUS SHRUBS							
0	*Hemerocallis 'Stella de Oro'*	Stella de Oro' Daylily	1 Gal.	As Shown	Container	18" / 18"	Full Pot, Well Shaped
22	*Deutzia gracilis 'Nikko'*	Nikko' Deutzia	3 Gal.	As Shown	Container	18" / 18"	Full Pot, Well Shaped
74	*Rosa 'Meigga'*	Peach Drift Rose	3 Gal.	As Shown	Container	18" / 18"	Full Pot, Well Shaped
82	*Rosa 'Radtko'*	Double Knockout Rose	3 Gal.	As Shown	Container	18" / 18"	Full Pot, Well Shaped
GROUNDCOVERS (in square feet)							
1300	*Liriope muscari 'Big Blue'*	Big Blue' Lilyturf	1 Gal.	18" O.C.	Container	12" /12"	Full Pot, Well Shaped
TURF GRASS (in square feet)							
5,915	*Sod - as directed by owner*	Sod - as directed by owner	---	---	SOD	---	

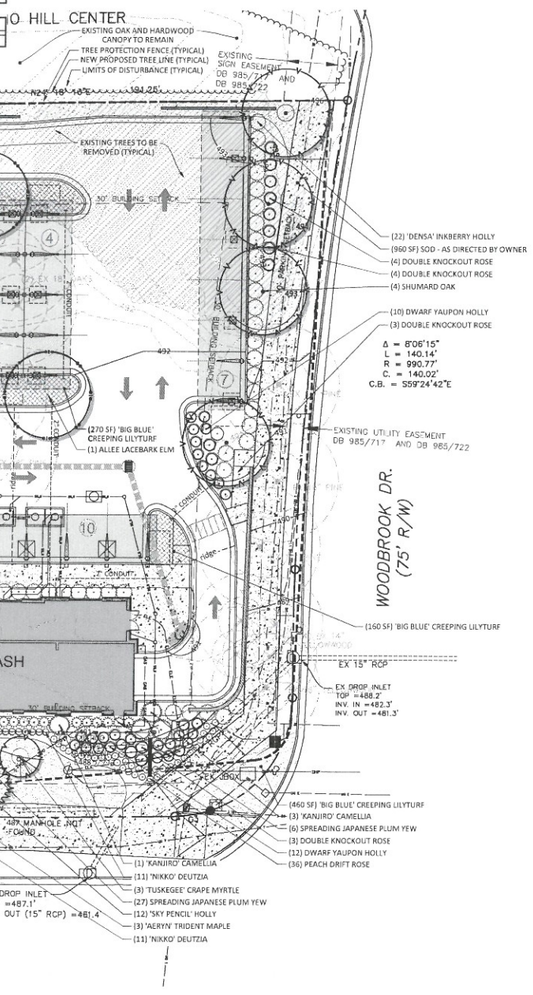
PLANT HEALTH NOTE:

ALL SITE PLANTINGS OF TREES AND SHRUBS SHALL BE ALLOWED TO REACH, AND BE MAINTAINED AT, MATURE HEIGHT; THE TOPPING OF TREES IS PROHIBITED. SHRUBS AND TREES SHALL BE PRUNED MINIMALLY AND ONLY TO SUPPORT THE OVERALL HEALTH OF THE PLANT.

Double Knockout Rose — *Rosa radtko*
'Densa' Inkberry Holly — *Ilex glabra 'Densa'*
'Kanjiro' Camellia — *Camellia sasanqua 'Kanjiro'*
Spreading Japanese Plum Yew — *Cephalotaxus harringtonia 'Prostrata'*
Dwarf Yaupon Holly — *Ilex vomitoria 'Stoke's Dwarf'*
Peach Drift Rose — *Rosa 'Meiggi'*
'Sky Pencil' Holly — *Ilex crenata 'Sky Pencil'*
'Nikko' Deutzia — *Deutzia gracilis 'Nikko'*
Sod - As Directed by Owner
'Big Blue' Creeping Lilyturf — *Liriope muscari 'Big Blue'*

'PANACHE' SHUMARD OAK — *Quercus shumardii 'Panache'* — Street Tree
ALLEE LACEBARK ELM — *Ulmus parvifolia 'Emer II'* — Parking Lot Tree
CHINESE PISTACHE — *Pistachea chinesis* — Medium Interior Tree
'AERYN' TRIDENT MAPLE — *Acer buergerianum 'Aeryn'* — Street Tree (Power Lines)
'TUSKEGEE' CRAPE MYRTLE — *Lagerstroemia indica 'Tuskegee'* — Ornamental Tree (Power Lines)

LANDSCAPE SYMBOLS



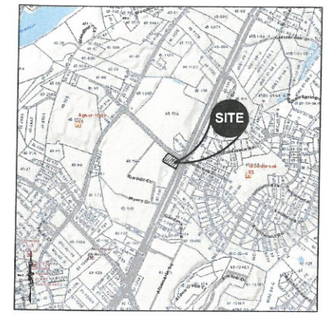
ENTRANCE CORRIDOR NOTE:

SMALL TO MEDIUM TREES CAN BE SUBSTITUTED FOR LARGE TREES IF OVERHEAD UTILITIES ARE PRESENT, SEE VDOT ROAD DESIGN MANUAL APPENDIX(B)(1)-47

811 Know what's below Call before you dig dial 811

TRUE NORTH

20' 10' 0 20' 40' 60'
GRAPHIC SCALE
SCALE 1" = 20'



LOCATION MAP
SCALE: N.T.S.

PROJECT NOTES:

DEVELOPER:
W4 Development
2500 Daniel's Bridge Road
Building 200, Suite 3A
Athens, GA 30606
Contact: Greg DeBacker
Phone: (706) 548-1151

OWNER:
W4 Properties Charlottesville, LLC
P.O. Box 42
Bogart, Ga 30622
Contact: Justin Hendley
Tel: (404) 219-8331

ENGINEER:
Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677
Contact: Jeff Carter, P.E.
Tel. (770) 725-1200
jeff@carterengineering.net

Property Location:	2100 Rio Hill Center, Charlottesville, Albermarle County, Virginia 22901
Tax Map and Parcel No.:	04500-00-00-093C0
Conditional Approval:	SDP2019000052 , ZMA 1987 - 00007 and SDP 1988- 00001
Zoning:	PD-SC (Planned Development Shopping Center)

(Note: This parcel is subject to the following overlay districts: Airport Impact Area, Entrance Corridor, and Managed Steep Slopes.)

Setbacks:	Building: 30-feet min Parking: 10-feet min
Proposed use:	Carwash with associated utilities and parking
Proposed Building Height	20 Feet
Maximum Building Height:	65 Feet
Project Tract	1.05 acres
Disturbed Area	0.99 acres

Boundary and topographical information obtained from field run survey by Hurt & Proffitt dated April 30, 2019. Phone (434) 847-7796

Contour interval is 1 Feet (NAVD 88)

F.E.M.A. Flood Insurance Rate Map No. 51003C 0278D, dated February 02, 2006 indicates that this property is located in "Zone X".

The underground utilities shown hereon have been located from field information and existing drawings. The surveyor nor engineer warrants that the underground utilities shown comprise all such utilities in the area, either in service or abandoned. The surveyor nor engineer warrants that the underground utilities shown are in the exact location indicated. The surveyor nor engineer has physically located all the underground utilities.

It is the responsibility of the contractor to field locate all utilities prior to commencing work and notify engineer if a discrepancy is found.

The contractor shall verify the invert elevations of all existing storm and sanitary sewer structures prior to commencement of storm and sanitary sewer construction.

UNDERGROUND UTILITIES DISCLAIMER

Information regarding the reputed presence, size, character and location of existing underground utilities and structures related to underground utilities is shown heron. There is no certainty of the accuracy of this information and it shall be considered in that light by those using this drawing. The location and arrangement of underground utilities and structures related to underground utilities shown hereon may be inaccurate and utilities and structures related to underground utilities not shown may be encountered. The owner, his employees, his consultants and his contractors shall hereby distinctly understand that the surveyor is not responsible for the correctness or sufficiency of this information regarding the underground utilities and structures related to underground utilities shown hereon.

PARKING DATA

Parking Required:

Requirement: One (1) space per each one hundred (100) square feet of retail sales area for the first five thousand (5,000) square feet and one (1) space per each two hundred (200) square feet of retail sales area above five thousand (5,000) square feet. For purposes of this paragraph, 'retail sales area' shall be deemed to be (1) eighty (80) percent of the gross floor area; or (2) at the request of the applicant, the actual retail sales floor area as shown on floor plans submitted by the applicant delineating the actual retail sales area, which plans shall be binding as to the maximum retail sales area used.

Retail Sales Area	=	2,715 Square Feet (21' 8" x 125' 4")
Required Parking	=	27 Parking Spaces Required (2,715 / 100)
Provided Parking	=	29 Parking Spaces Provided
Handicap Parking	=	2 Provided (2 Required)

SITE DATA

Site Information:

Total Tract Area	=	45,787 sf	1.05 ac	(100.00%)
Existing Impervious Area	=	19,002 sf	0.44 ac	(43.62%)
Existing Landscape Area	=	26,785 sf	0.61 ac	(56.38%)
Total Impervious Coverage	=	28,611 sf	0.66 ac	(62.49%)
Structure Coverage	=	3,739 sf	0.09 ac	(08.17%)
Vehicular Coverage	=	22,291 sf	0.51 ac	(48.68%)
Pedestrian Coverage	=	2,500 sf	0.06 ac	(05.46%)
Proposed Landscape Area	=	17,176 sf	0.39 ac	(37.51%)
Total Coverage Area	=	28,611 sf	0.66 ac	(62.49%)

REVISION BLOCK:

#	DATE	DESCRIPTION
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2	08/21/19	SITE DEVELOPMENT PLAN REVIEW
3	11/15/19	ADDRESS COMMENTS
4	12/16/19	ADDRESS COMMENTS
5	01/17/20	VSMP ADDRESS COMMENTS
6	01/30/20	ARCHITECTURAL ADDRESS COMMENTS
7	06/22/20	ADDRESS COMMENTS

COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
LICENSED PROFESSIONAL ENGINEER
DATE: 1.30.20

CARTER ENGINEERING CONSULTANTS

Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677

P: 770.725.1200
F: 770.725.1204
www.carterengineering.net

SITE DEVELOPMENT PLANS
for
W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

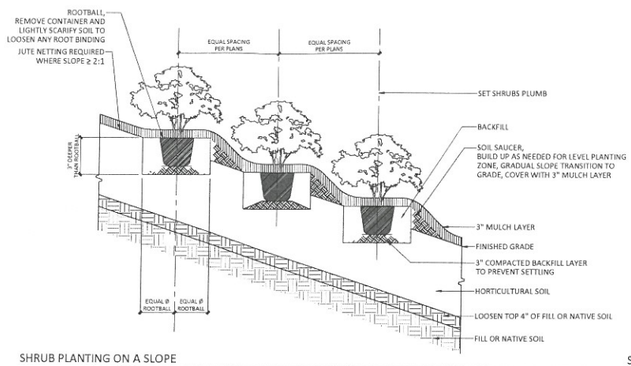
PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
LANDSCAPE PLAN

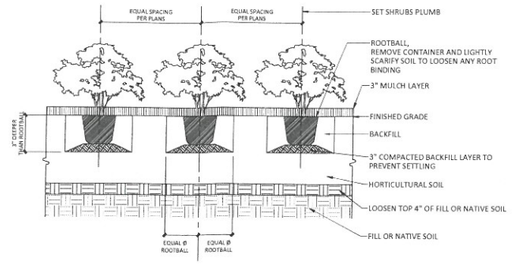
SHEET NUMBER:
12

PROJECT NUMBER:
19016W4D

DATE:
06/22/20



SHRUB PLANTING ON A SLOPE



SHRUB PLANTING AT LANDSCAPE

1 SHRUB PLANTING DETAILS
1/2" = 1'-0"

PLANTING NOTES:

1. The contractor shall locate and verify all existing and new utility line locations prior to planting, and shall report any conflicts to the landscape architect. The contractor will be responsible for the protection of all underground utilities during the life of the project.
2. The contractor is responsible for repair of any damage incurred during the execution of work.
3. The contractor shall stake all tree locations in the field and the staked locations shall be reviewed and approved by Carter Engineering. Carter Engineering may make minor adjustments to the layout without incurring additional costs to the project.
4. Mulch all plant areas with 3" layer of double ground shredded hardwood mulch.
5. Any proposed substitutions of plant species will be with plants with equivalent overall form, height, branching habit, flower color, leaf color, fruit color, and time of bloom, as approved by Carter Engineering.
6. Substitutions shall not be made unless drawings and/or written requests are submitted to Carter Engineering for approval. Carter Engineering shall determine equality based upon complete information submitted by the contractor.
7. Trees: provide specimen balled and burlapped, or as specified, trees of height, size, caliper, genus, species, cultivar and branching configuration indicated. The root system of each shall be well provided with fibrous roots. All parts of plant shall be moist and show active green cambium when cut, they shall be free of disease, insect pests, eggs or larvae. All plants to be moved balled and burlapped, must be moved with the root systems as solid units with balls of earth firmly wrapped with untreated burlap, firmly held in place by a stout cord or wire, drum laced, boxed, or in containers.
8. Pruning and shaping: prune, thin out, and shape plants in compliance with American Hort's 'American Standard for Nursery Stock' to preserve the natural character and only as approved by Carter Engineering design team. Retain required height and spread. Do not alter shape and do not cut leaders. Remove all dead wood, suckers, broken or bruised branches, and crossing branches.
9. Stakes and Guys: to be round cedar posts.
10. The Carter Engineering representative reserves the right to reject plant material at the nursery or at the site.
11. The trunk flare (at the base of the tree) shall be properly exposed for all plantings.
12. Keep root balls intact prior to and during planting operations. Plants with broken or damaged root balls shall be rejected and immediately removed from the site. Keep root balls damp and protected from damage due to sun and wind. Do not shave root balls.
13. Plant soil mixture will be used to backfill the planting area. Install plants simultaneously with installation of planting soil mixes.
14. Tree planting: see tree planting detail and notes herein for additional information related to planting pit dimensions, planting operations, backfilling, and tree staking.
15. Container stock planting: plant container grown stock the same as specified for balled and burlapped stock, but remove containers completely.
16. Soil shall be free of all debris, construction material, and slurry. Landscape areas shall be backfilled with planting soil mixture per details and specifications.
17. Obstructions: if obstructions or other conditions detrimental to healthy plant growth are encountered, notify Carter Engineering immediately and request additional instructions.
18. Watering and drainage: fill excavations with water and allow water to percolate out before planting. If planting pits do not percolate or drain properly, notify the Carter Engineering and request additional instructions prior to planting. Do not plant into poorly draining planting pits: poorly draining planting pits may hold water and drown plants.
19. Flood all plants with water twice within the first 24 hours after planting.
20. All plant material shall be mulched after planting. Backfill to allow room for mulch after settling, and place mulch in dish after first watering and within one week of planting. See planting details for mulch thickness.
21. All plants shall be plumb vertically after settling or as directed by Carter Engineering.
22. Planting restrictions: plant during one of the following periods.
    - Spring planting (shrubs, groundcover, perennials) - March through May
    - Fall planting shrubs (shrubs, groundcover, perennials) - Sept. through November
    - Tree planting - September through April
23. Installer agrees to repair or replace plantings and accessories that fail in materials, workmanship or growth within 18-months of substantial completion. Failures include, but are not limited to:
    - Death and unsatisfactory growth, except for defects resulting from the lack of adequate maintenance by owner.
    - Structural failures including plantings falling or blowing over.
24. The contractor shall verify the quantities listed in the plant legend. Contractor is responsible for installing all plants shown on planting plans. In case of discrepancies Carter Engineering should be contacted.
25. All groundcover quantities shall be determined using the information provided in the groundcover quantity and spacing chart within the Landscape Drawing Set.

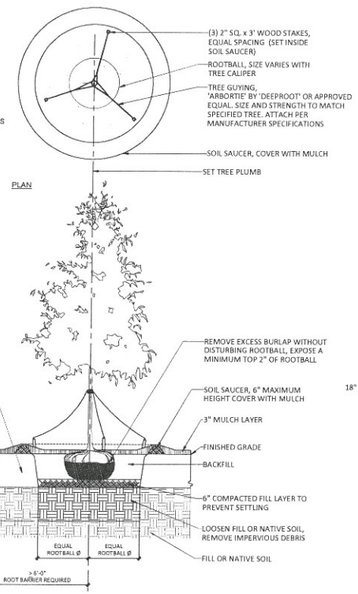
GENERAL LANDSCAPE NOTES:

1. Landscaping shown on this plan shall be maintained in compliance with county and/or city landscape ordinance.
2. All disturbed ground shall have ground cover or mulch and/or grassing.
3. Trees selected for planting must be free from injury, pests, disease, nutritional disorders or root defects, and must be of good vigor, so as to assure a reasonable expectation of survivability.
4. Plants that are diseased, unsurvivably damaged or are dead shall be removed and replaced with a plant of the same species, variety, and cultivar, as acceptable to the code enforcement director.
5. Other landscape materials shall be maintained in proper repair and shall be kept clear of refuse and debris.
6. Arbor Tie or similar nylon tree strapping/guying material shall not be used in a way that will girdle tree trunks if left in place.

GROUNDCOVER SPACING & QUANTITY

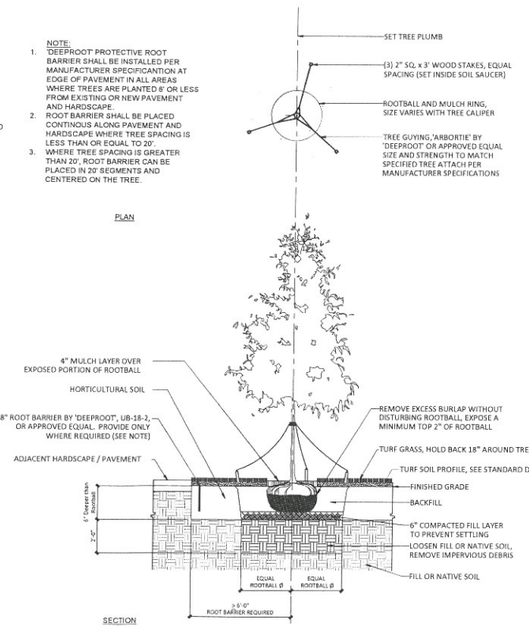
PLANT SPACING	PLANT SPACING MULTIPLIER (PLANTS PER SF)
12"	1.15
15"	.74
18"	.51
24"	.29

NOTE:
1. 'DEEPROOT' PROTECTIVE ROOT BARRIER SHALL BE INSTALLED PER MANUFACTURER SPECIFICATION AT EDGE OF PAVEMENT IN ALL AREAS WHERE TREES ARE PLANTED 6' OR LESS FROM EXISTING OR NEW PAVEMENT AND HARDSCAPE.
2. ROOT BARRIER SHALL BE PLACED CONTINUOUS ALONG PAVEMENT AND HARDSCAPE WHERE TREE SPACING IS LESS THAN OR EQUAL TO 20'.
3. WHERE TREE SPACING IS GREATER THAN 20', ROOT BARRIER CAN BE PLACED IN 20' SEGMENTS AND CENTERED ON THE TREE.

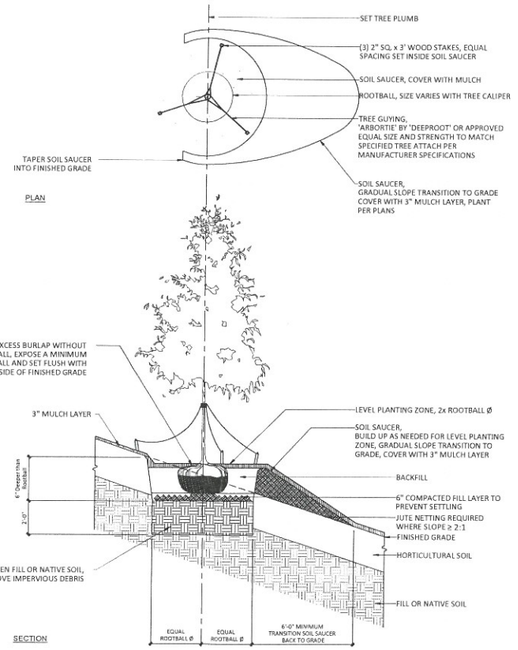


TREE PLANTING AT LANDSCAPE

NOTE:
1. 'DEEPROOT' PROTECTIVE ROOT BARRIER SHALL BE INSTALLED PER MANUFACTURER SPECIFICANTION AT EDGE OF PAVEMENT IN ALL AREAS WHERE TREES ARE PLANTED 6' OR LESS FROM EXISTING OR NEW PAVEMENT AND HARDSCAPE.
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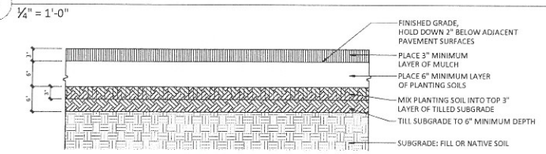


TREE PLANTING AT LAWN

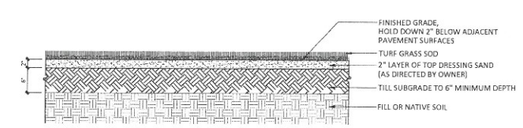


TREE PLANTING ON A SLOPE

2 TREE PLANTING DETAILS
1/4" = 1'-0"

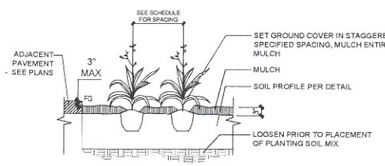


SOIL PREPARATION - PLANTING BEDS

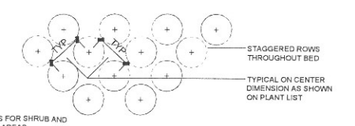


SOIL PREPARATION - TURF GRASS

3 SOIL PREPARATION DETAILS
1/4" = 1'-0"



GROUNDCOVER, GRASS, AND PERENNIAL PLANTING



NOTES:
1. SEE PLANTING PLANS FOR SHRUB AND GROUNDCOVER BED AREAS.
2. ROWS SHALL BE STRAIGHT AND PARALLEL.
3. SEE PLANTING SCHEDULE FOR GROUNDCOVER SPACING AND QUANTITIES.

SHRUB & GROUNDCOVER SPACING

3 GROUNDCOVER DETAILS
3/4" = 1'-0"

REVISION BLOCK:

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6	01/30/20	ARCHITECTURAL ADDRESS COMMENTS
7	06/22/20	ADDRESS COMMENTS

COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
PROFESSIONAL ENGINEER
DATE: 1.30.20

CARTER ENGINEERING CONSULTANTS

Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677

P: 770.725.1200
F: 770.725.1204
www.carterengineering.net

SITE DEVELOPMENT PLANS for W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
LANDSCAPE DETAILS

SHEET NUMBER:
13

PROJECT NUMBER:
19016W4D

DATE:
06/22/20

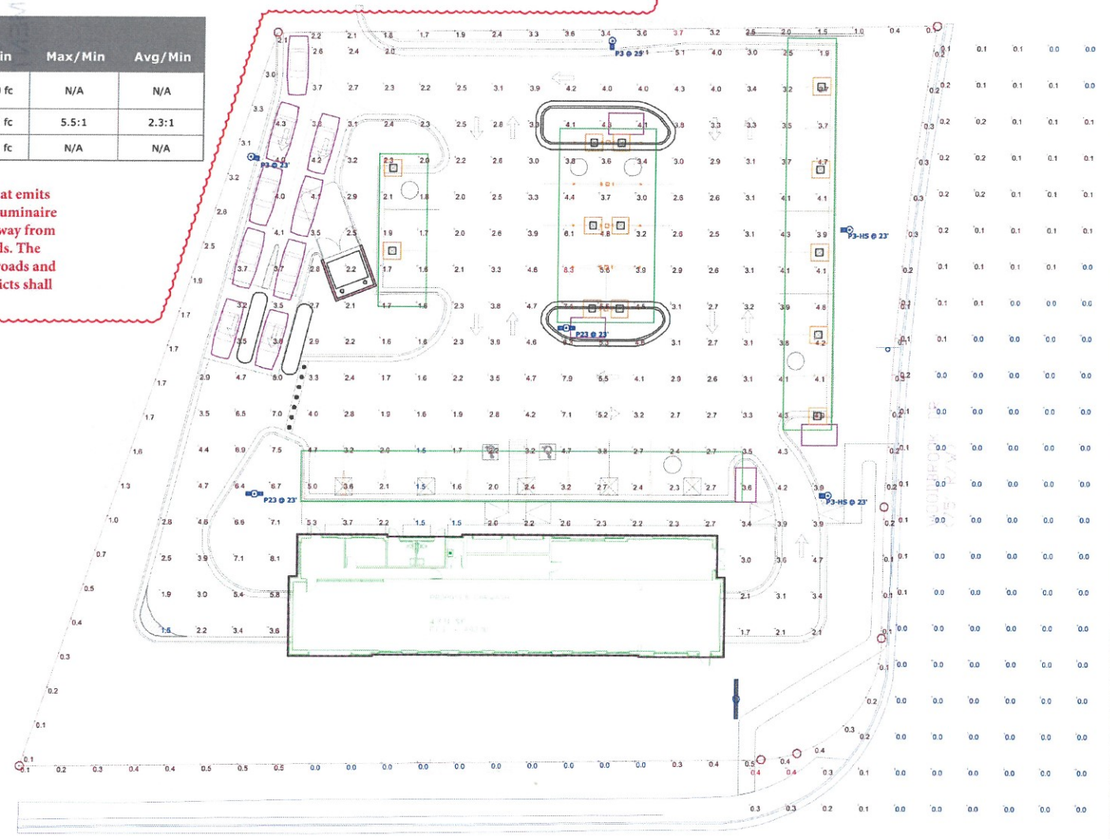
Schedule

Symbol	Label	Qty	Catalog Number	Description	Lamp	Number Lamps	Lumens Per Lamp	LLF	Wattage
	P3	2	PRV-C40-D-UNV-T3-BZ	Single Head Eaton Lumark Prevail PRV Series LED Area Unit w/Type T3 Distribution (20ft. Pole Height w/3ft. ESTIMATED Concrete Base)	LED/4000K (B3-U0-G4) FULL CUTOFF DESIGN	2	8575	1	131
	P3-HS	2	PRV-C40-D-UNV-T3-BZ-HSS	Single Head Eaton Lumark Prevail PRV Series LED Area Unit w/Type T3 Distribution (20ft. Pole Height w/3ft. ESTIMATED Concrete Base) HOUSE SIDE SHIELDING	LED/4000K (B3-U0-G4) FULL CUTOFF DESIGN	2	7789	1	131
	P23	2	PRV-C40-D-UNV-T3-BZ	Double Head D180 Eaton Lumark Prevail PRV Series LED Area Unit w/Type T3 Distribution (20ft. Pole Height w/3ft. ESTIMATED Concrete Base)	LED/4000K (B3-U0-G4) FULL CUTOFF DESIGN	2	8575	1	262

Statistics

Description	Symbol	Avg	Max	Min	Max/Min	Avg/Min
Light Spill Woodbrook Drive	+	0.1 fc	0.4 fc	0.0 fc	N/A	N/A
Parking Lot Light Levels	+	3.5 fc	8.3 fc	1.5 fc	5.5:1	2.3:1
Property Line Light Levels	+	1.0 fc	3.7 fc	0.0 fc	N/A	N/A

Each outdoor luminaire equipped with a lamp that emits 3,000 or more initial lumens shall be a full cutoff luminaire and shall be arranged or shielded to reflect light away from adjoining residential districts and adjacent roads. The spillover of lighting from luminaires onto public roads and property in residential or rural areas zoning districts shall not exceed one-half footcandle.



Plan View
Scale - 1" = 20'

LIGHTING PLAN NOTES
EACH OUTDOOR LUMINAIRE EQUIPPED WITH A LAMP THAT EMITS 3,000 OR MORE INITIAL LUMENS SHALL BE A FULL CUTOFF LUMINAIRE AND SHALL BE ARRANGED OR SHIELDED TO REFLECT LIGHT AWAY FROM ADJOINING RESIDENTIAL DISTRICTS AND AWAY FROM ADJACENT ROADS. THE SPILLOVER OF LIGHTING FROM LUMINARIES ONTO PUBLIC ROADS AND PROPERTY IN RESIDENTIAL OR RURAL AREAS ZONING DISTRICTS SHALL NOT EXCEED ON HALF FOOTCANDLE.

villa LIGHTING

Carwash - Chesterfield County, VA - Site Lighting Photometric

Designer
Adam Carrier
Date
5/12/2019
Scale
Not to Scale
Drawing No.

Summary

1 of 1

REVISION BLOCK:

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COMMONWEALTH OF VIRGINIA
JAMES J. CARTER
No. 029...
PROFESSIONAL ENGINEER
DATE: 1.30.20

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SITE DEVELOPMENT PLANS
for
W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
OUTDOOR LIGHTING PLAN

SHEET NUMBER:
14

PROJECT NUMBER:
19016W4D

DATE:
06/22/20

SCP-R

Recessed Mount LED Performance Canopy

DESCRIPTION

The SCP-R recessed canopy is a low-profile 16” square canopy with a variety of precision engineered optics for application flexibility. This canopy optimizes optical performance and long-life with superior thermal management in an attractive and durable die-formed aluminum enclosure with premium PMMA optical lenses that do not yellow over time. This product can be easily recess mounted to ceilings or overhead canopies with only 1.2” thickness below the ceiling plane. The SCP-R is the ideal energy-saving solution for applications including, but not limited to, parking garages, schools, office complexes, light commercial development, apartments, walkways, entryways and stairwells.

CONSTRUCTION

- Precision die-formed aluminum enclosure with stainless steel hardware
- White powder coat finish, custom colors available upon request
- IP65 rated light engine compartment

OPTICS/LEDS

- UV-stabilized polymethyl methacrylate (PMMA) optics that will not yellow over time
- Garage optics provides a type V short symmetric square distribution with light focused in the 60° to 80° zones to optimize spacing with even light distribution
- Performance optic provides a type VS (square) very short distribution and offers more light in the 30° to 60° zones, ideal for higher mounting heights over 12’
- Low glare optic provides excellent Type VS (square) short distribution with exceptional glare control
- From 20W to 67W with up to 9016 lumens for maximum project flexibility
- Efficacies up to 134 LPW maximize energy savings and utility rebates
- 4000K CCT and 5000K CCT
- L70 of 190,000 hours
- CRI ≥71

ELECTRICAL

- 120-277VAC, 50/60Hz
- 0-10V Dimming driver

INSTALLATION

- Fixture attaches to canopy surface and can cover up to 15” holes
- A safety cable and a wireway cover are provided for ease of wiring

TESTING & COMPLIANCE

- cETLus Listed to UL1598 for Wet Locations for covered canopy applications
- DesignLights Consortium® (DLC) PREMIUM Qualified
- Operating temperatures: -40°C to 40°C (-40°F to 104°F)

WARRANTY

- Five year warranty (terms and conditions apply)

Model: _____ Date: _____

Accessories: _____

Job Name: _____ Type: _____



Specs At A Glance*				
Wattage (W)	20	36	50	67
Lumens (lm)	2670	4815	6586	8940
Efficacy (LPW)	130	133	131	133
Equivalency (HID)	70W	100W	150W	250W
Distribution	Garage (G) - Type VS Square Short Low Glare (LG) - Type VS Square Short Performance (P) - Type VS Square Very Short			
CCT	4000K, 5000K			
CRI	≥71			
Input Voltage	120-277VAC, 50/60Hz, 0-10V Dimmable			
Operating Temp	-40°C to 40°C (-40°F to 104°F)			
Certifications	cETLus Listed, Wet Locations Covered Canopy, DLC PREMIUM			
Warranty	5 Years			
Weight	7.0 lbs			

*Nominal Wattage (4000K CCT)

Note: Environment and application will affect actual performance. Typical values and 25°C used for testing. Specificaions subject to change without notice.

ORDERING INFORMATION

Example: SCP-R-20-P-VS-4K-WH

Series	Wattage	Optics	Input Voltage	CCT	Finish
SCP-R	20 = 20 Watts	G[1] = Garage	VS = 120-277V	4K = 4000K	WH = White
	36 = 36 Watts	LG = Low Glare		5K[1] = 5000K	CC[2] = Custom Color
	50[1] = 50 Watts	P = Performance			
	67[1] = 67 Watts				

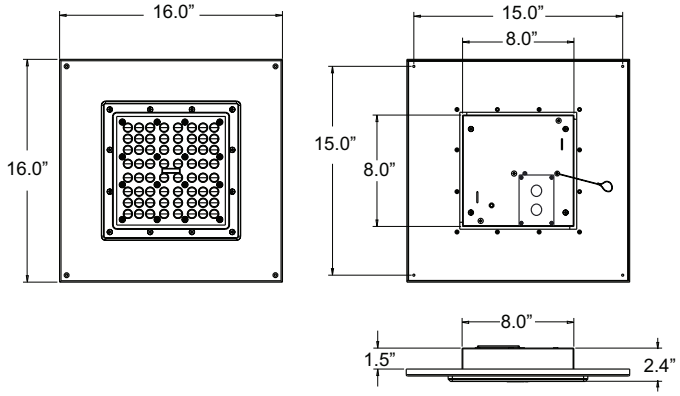
Notes
[1] Non-stocked item, longer lead times apply, consult factory for details
[2] Consult factory for details

PERFORMANCE DATA

MODEL	STOCK/MTO*	WATTAGE (W)	CCT	LUMENS	EFFICACY	CRI
SCP-R-20-LG-VS-4K	STOCK	20	4000K	2352	115	72
SCP-R-20-G-VS-4K	MTO	20	4000K	2543	124	72
SCP-R-20-P-VS-4K	STOCK	20	4000K	2670	130	72
SCP-R-20-LG-VS-5K	MTO	20	5000K	2350	114	73
SCP-R-20-G-VS-5K	MTO	20	5000K	2533	123	72
SCP-R-20-P-VS-5K	MTO	20	5000K	2670	129	72
SCP-R-36-LG-VS-4K	STOCK	36	4000K	4227	117	72
SCP-R-36-G-VS-4K	MTO	36	4000K	4582	126	72
SCP-R-36-P-VS-4K	STOCK	36	4000K	4815	133	72
SCP-R-36-LG-VS-5K	MTO	36	5000K	4282	118	73
SCP-R-36-G-VS-5K	MTO	36	5000K	4601	126	73
SCP-R-36-P-VS-5K	MTO	36	5000K	4839	133	73
SCP-R-50-LG-VS-4K	MTO	50	4000K	5702	114	72
SCP-R-50-G-VS-4K	MTO	50	4000K	6306	125	72
SCP-R-50-P-VS-4K	MTO	50	4000K	6586	131	72
SCP-R-50-LG-VS-5K	MTO	50	5000K	5590	112	72
SCP-R-50-G-VS-5K	MTO	50	5000K	6168	123	72
SCP-R-50-P-VS-5K	MTO	50	5000K	6472	130	72
SCP-R-67-LG-VS-4K	MTO	67	4000K	7829	117	72
SCP-R-67-G-VS-4K	MTO	67	4000K	8466	126	72
SCP-R-67-P-VS-4K	MTO	67	4000K	8940	133	72
SCP-R-67-LG-VS-5K	MTO	67	5000K	7887	118	72
SCP-R-67-G-VS-5K	MTO	67	5000K	8589	128	71
SCP-R-67-P-VS-5K	MTO	67	5000K	9016	134	72

*MTO = Made to order (subject to change, consult factory for lead times)

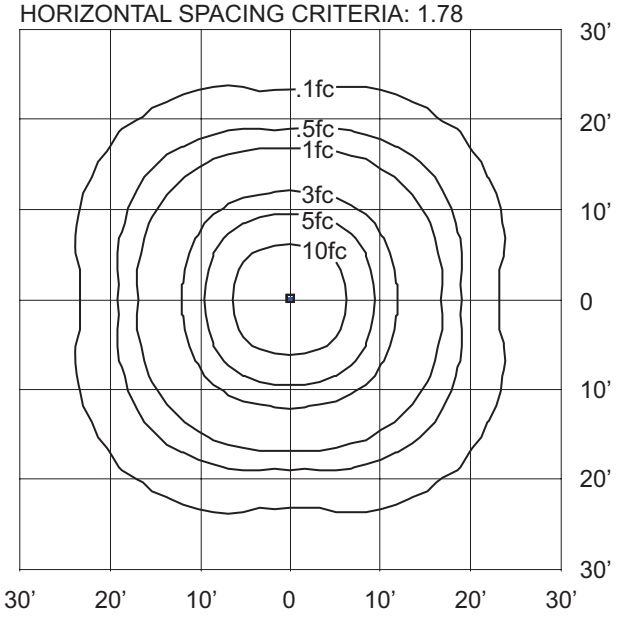
DIMENSIONS



SAMPLE PHOTOMETRICS

SCP-R-36-P-VS-4K

IES: Type VS Square Very Short
MOUNTING HEIGHT: 10’
HORIZONTAL SPACING CRITERIA: 1.78



Specifications are subject to change without notice.
Installation must be performed in accordance with
Barron Lighting Group installation instructions.

10810375 Rev 2 10/18

BARRON lighting group
800.533.3948 • www.barronltg.com

Project		**Catalog #**	PRV-C40-D-UNV-T3-SA-BZ	**Type**	P3
Prepared by	Villa Lighting	**Notes**		**Date**	



Lumark

PRV / PRV-XL Prevail LED

Area / Site Luminaire

Typical Applications

Outdoor • Parking Lots • Walkways • Roadways • Building Areas

Interactive Menu

- Ordering Information page 2
- Mounting Details page 3
- Optical Configurations page 3
- Product Specifications page 3
- Energy and Performance Data page 4
- Control Options page 5

Product Certifications

Product Features

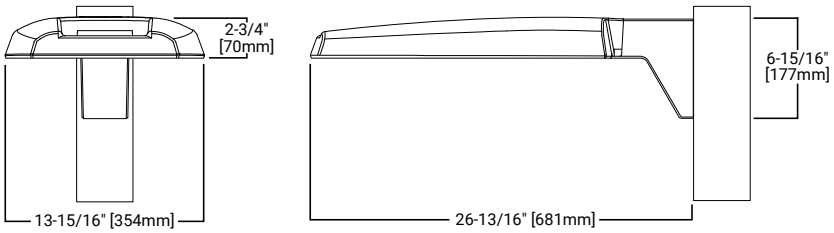
LumenSafe Technology · LumaWatt Pro · WaveLinx

Quick Facts

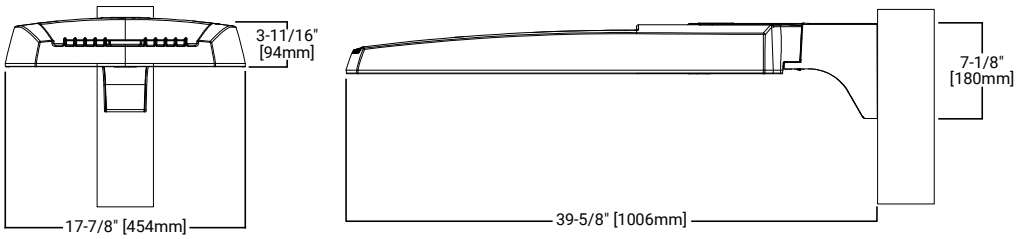
- Lumen packages range from 7,100 - 48,600 lumens (50W - 350W)
- Replaces 70W up to 1,000W HID equivalents
- Efficacies up to 148 lumens per watt
- Energy and maintenance savings up to 85% versus HID solutions
- Standard universal quick mount arm with universal drill pattern

Dimensional Details

Prevail



Prevail XL



Ordering Information

SAMPLE NUMBER: **PRV-XL-C75-D-UNV-T4-SA-BZ**

Product Family [1, 2]	Light Engine [3]	Driver	Voltage	Distribution	Mounting (Included)	Color
PRV=Prevail	**C15**=(1 LED) 7,100 Nominal Lumens **C25**=(2 LEDs) 13,100 Nominal Lumens **C40**=(2 LEDs) 17,100 Nominal Lumens **C60**=(2 LEDs) 20,000 Nominal Lumens	**D**=Dimming (0-10V)	**UNV**=Universal (120-277V) **347**=347V **480**=480V [4]	**T2**=Type II **T3**=Type III **T4**=Type IV **T5**=Type V	**SA**=Standard Versatile Arm **MA**=Mast Arm **WM**=Wall Mount Arm	**AP**=Grey **BZ**=Bronze **BK**=Black **DP**=Dark Platinum **GM**=Graphite Metallic **WH**=White
PRV-XL=Prevail XL	**C75**=(4 LED) 26,100 Nominal Lumens **C100**=(4 LED) 31,000 Nominal Lumens **C125**=(4 LED) 36,000 Nominal Lumens **C150**=(6 LED) 41,100 Nominal Lumens **C175**=(6 LED) 48,600 Nominal Lumens					

Options (Add as Suffix)	**Accessories** (Order Separately) [17]
7030=70 CRI / 3000K CCT [5] **7050**=70 CRI / 5000K CCT [5] **HSS**=House Side Shield [6] **L90**=Optics Rotated 90° Left **R90**=Optics Rotated 90° Right **10K**=10kV/10kA UL 1449 Fused Surge Protective Device **HA**=50°C High Ambient Temperature [7] **PER**=NEMA 3-PIN Twistlock Photocontrol Receptacle **PER7**=NEMA 7-PIN Twistlock Photocontrol Receptacle **MSP/DIM-L12**=Integrated Sensor for Dimming Operation, 8' – 12' Mounting Height [8, 9] **MSP/DIM-L30**=Integrated Sensor for Dimming Operation, 12' – 30' Mounting Height [8, 9] **MSP-L12**=Integrated Sensor ON/OFF Operation, 8' – 12' Mounting Height [8, 9] **MSP-L30**=Integrated Sensor ON/OFF Dimming Operation, 12' – 30' Mounting Height [8, 9] **MS/DIM-L20**=Motion Sensor for Dimming Operation, 9' – 20' Mounting Height [9, 10] **MS/DIM-L40W**=Motion Sensor for Dimming Operation, 21' – 40' Mounting Height [9, 10] **MS-L20**=Motion Sensor for ON/OFF Operation, 9' – 20' Mounting Height [9, 10] **MS-L40W**=Motion Sensor for ON/OFF Operation, 21' – 40' Mounting Height [9, 10] **ZW**=Wavelinx-enabled 4-PIN Twistlock Receptacle [9, 11, 12] **ZW-SWPD4XX**=Wavelinx Wireless Sensor, 7' – 15' Mounting Height [9, 11, 12, 13] **ZW-SWPD5XX**=Wavelinx Wireless Sensor, 15' – 40' Mounting Height [9, 11, 12, 13] **LWR-LW**=LumaWatt Pro Wireless Sensor, Wide Lens for 8' – 16' Mounting Height [9, 14] **LWR-LN**=LumaWatt Pro Wireless Sensor, Narrow Lens for 16' – 40' Mounting Height [9, 14] **(See Table Below)**=LumenSafe Integrated Network Security Camera [15, 16]	**PRVWM-XX**=Wall Mount Kit [8] **PRVMA-XX**=Mast Arm Mounting Kit [8] **PRVSA-XX**=Standard Arm Mounting Kit [8] **PRVXLSA-XX**=Standard Arm Mounting Kit (for Prevail XL) [15] **PRVXLWM-XX**=Wall Mount Kit (for Prevail XL) [15] **PRVXLMA-XL**=Mast Arm Mounting Kit (for Prevail XL) [15] **MA1010-XX**=Single Tenon Adapter for 3-1/2" O.D. Tenon **MA1011-XX**=2@180° Tenon Adapter for 3-1/2" O.D. Tenon **MA1017-XX**=Single Tenon Adapter for 2-3/8" O.D. Tenon **MA1018-XX**=2@180° Tenon Adapter for 2-3/8" O.D. Tenon **HS/VERD**=House Side Shield [6, 18] **VGS-F/B**=Vertical Glare Shield, Front/Back [18] **VGS-SIDE**=Vertical Glare Shield, Side [18] **OA/RA1013**=Photocontrol Shorting Cap **OA/RA1014**=NEMA Photocontrol – 120V **OA/RA1016**=NEMA Photocontrol – Multi-Tap 105-285V **OA/RA1201**=NEMA Photocontrol – 347V **OA/RA1027**=NEMA Photocontrol – 480V **ISHH-01**=Integrated Sensor Programming Remote [19] **FSIR-100**=Wireless Configuration Tool for Occupancy Sensor [20] **SWPD4-XX**=WaveLinx Wireless Sensor, 7' – 15' Mounting Height [12, 13, 21] **SWPD5-XX**=WaveLinx Wireless Sensor, 15' – 40' Mounting Height [12, 13, 21] **WOLC-7P-10A**=WaveLinx Outdoor Control Module (7-PIN) [22]

NOTES:

1. DesignLights Consortium® Qualified. Refer to www.designlights.org Qualified Products List under Family Models for details.
2. Customer is responsible for engineering analysis to confirm pole and fixture compatibility for applications. Refer to installation instructions and pole white paper WP513001EN for additional support information.
3. Standard 4000K CCT and 70CRI.
4. Only for use with 480V Wye systems. Per NEC, not for use with ungrounded systems, impedance grounded systems or corner grounded systems (commonly known as Three Phase Three Wire Delta, Three Phase High Leg Delta and Three Phase Corner Grounded Delta systems).
5. Use dedicated IES files on product website for non-standard CCTs.
6. Option will come factory-installed. House Side Shield not suitable with T5 distribution or C60 lumen package.
7. Not available with C60 lumen package.
8. Only available in PRV configurations C15, C25, C40 or C60.
9. Controls system is not available with photocontrol receptacle (PER or PER7) or other controls systems (MS, MSP, ZW or LWR).
10. Utilizes the Watttstopper sensor FSP-211.
11. Sensor passive infrared (PIR) may be overly sensitive when operating below -20°C (-4°F).
12. In order for the device to be field-configurable, requires WAC Gateway components WAC-PoE and WPOE-120 in appropriate quantities. Only compatible with WaveLinx system and software and requires system components to be installed for operation. See website for more Wavelinx application information.
13. Replace XX with sensor color (WH, BZ, or BK).
14. LumaWatt Pro wireless sensors are factory installed and require network components LWP-EM-1, LWP-GW-1, and LWP-PoE8 in appropriate quantities. See website for LumaWatt Pro application information.
15. Only available in PRV-XL configurations C75, C100, C125, C150, or C175.
16. Not available with 347V, 480V, or HA options. Consult LumenSafe system product pages for additional details and compatability information.
17. Replace XX with paint color.
18. Must order one per optic/LED when ordering as a field-installable accessory (1, 2, 4, or 6).
19. This tool enables adjustment to Integrated Sensor (MSP) parameters including high and low modes, sensitivity, time delay, cutoff and more. Consult your lighting representative at Eaton for more information.
20. This tool enables adjustment to Motion Sensor (MS) parameters including high and low modes, sensitivity, time delay, cutoff and more. Consult your lighting representative at Eaton for more information.
21. Requires Wavelinx-enabled 4-PIN twistlock receptacle (ZW) option.
22. Requires 7-PIN NEMA twistlock photocontrol receptacle (PER7) option. The WOLC-7 cannot be used in conjunction with other controls systems (MS, MSP, ZW or LWR).

LumenSafe Integrated Network Security Camera Technology Options (Add as Suffix)

Product Family	Camera Type	Data Backhaul
L=LumenSafe Technology	**D**=Dome Camera	**C**=Cellular, Customer Installed SIM Card **A**=Cellular, Factory Installed AT&T SIM Card **V**=Cellular, Factory Installed Verizon SIM Card **S**=Cellular, Factory Installed Sprint SIM Card **E**=Ethernet Networking

Stock Ordering Information

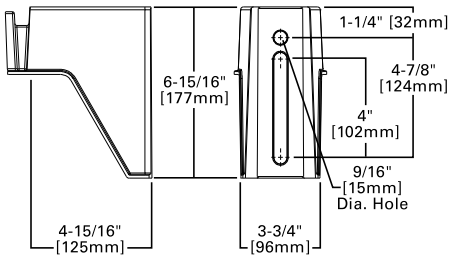
Product Family [1]	Light Engine	Voltage	Distribution	Options (Add as Suffix)
PRVS=Prevail	**C15**=(1 LED) 7,100 Nominal Lumens **C25**=(2 LEDs) 13,100 Nominal Lumens **C40**=(2 LEDs) 17,100 Nominal Lumens **C60**=(2 LEDs) 20,000 Nominal Lumens	**UNV**=Universal (120-277V) **347**=347V [2]	**T3**=Type III **T4**=Type IV	**MSP/DIM-L30**=Integrated Sensor for Dimming Operation, Maximum 30' Mounting Height [2]
PRVS-XL=Prevail XL	**C75**=(4 LED) 26,100 Nominal Lumens **C100**=(4 LED) 31,000 Nominal Lumens **C125**=(4 LED) 36,000 Nominal Lumens **C150**=(6 LED) 41,100 Nominal Lumens **C175**=(6 LED) 48,600 Nominal Lumens			

NOTES:

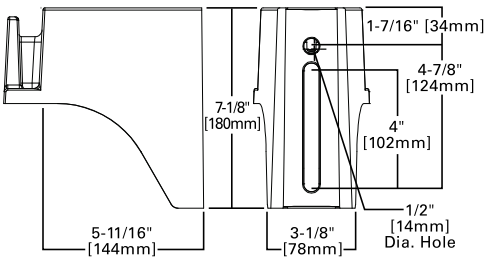
1. All stock configurations are standard 4000K/70CRI, bronze finish, and include the standard versatile mounting arm.
2. Only available in PRVS configurations C15, C25, C40 or C60.

Mounting Details

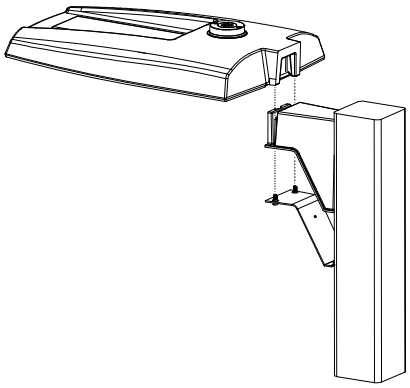
Pole Mount Arm (PRV)



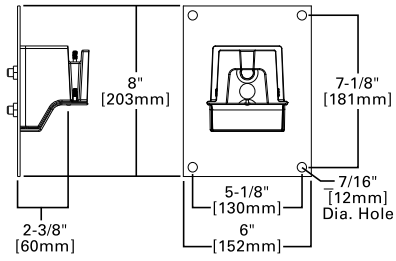
Pole Mount Arm (PRV-XL)



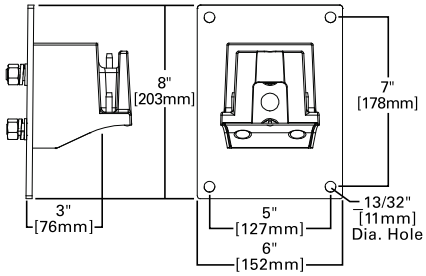
Versatile Mount System



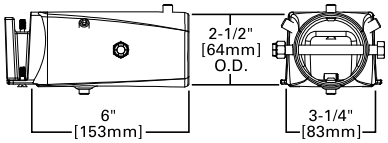
Wall Mount (PRV)



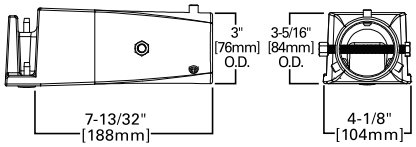
Wall Mount (PRV-XL)



Mast Arm Mount (PRV)



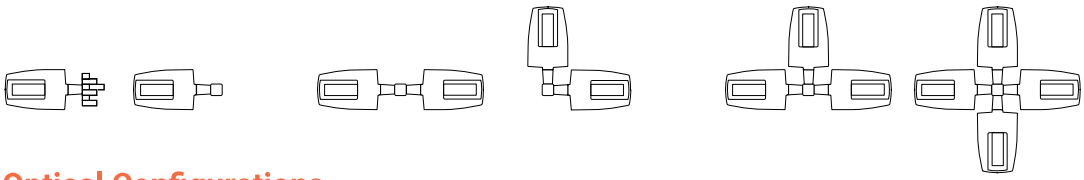
Mast Arm Mount (PRV-XL)



Mounting Configurations and EPAs

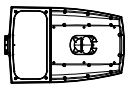
NOTE: For 2 PRV's mounted at 90°, requires minimum 3" square or 4" round pole for fixture clearance. For 2 PRV-XL's mounted at 90°, requires minimum 4" square or round pole for fixture clearance. Customer is responsible for engineering analysis to confirm pole and fixture compatibility for applications.

Wall Mount	Arm Mount Single	Arm Mount 2 @ 180°	Arm Mount 2 @ 90°	Arm Mount 3 @ 90°	Arm Mount 4 @ 90°
	EPA 0.92 (PRV) EPA 1.12 (PRV-XL)	EPA 1.35 (PRV) EPA 2.25 (PRV-XL)	EPA 1.42 (PRV) EPA 2.13 (PRV-XL)	EPA 1.63 (PRV) EPA 2.52 (PRV-XL)	EPA 1.63 (PRV) EPA 2.52 (PRV-XL)

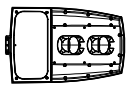


Optical Configurations

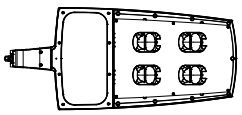
PRV-C15
(7,100 Nominal Lumens)



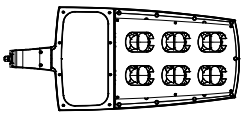
PRV-C25/C40/C60
(13,100/17,100/20,000 Nominal Lumens)



PRV-XL-C75/C100/C125
(26,100/31,000/36,300 Nominal Lumens)



PRV-XL-C150/C175
(41,100/48,600 Nominal Lumens)



Product Specifications

Construction
- Single-piece die-cast aluminum housing
- Tethered die-cast aluminum door

Optics
- Dark Sky Approved (3000K CCT and warmer only)
- Precision molded polycarbonate optics

Electrical
- -40°C minimum operating temperature
- 40°C maximum operating temperature
- >.9 power factor
- <20% total harmonic distortion
- Class 1 electronic drivers have expected life of 100,000 hours with <1% failure rate
- 0-10V dimming driver is standard with leads external to the fixture

Mounting
- Versatile, patented, standard mount arm accommodates multiple drill patterns ranging from 1-1/2" to 4-7/8"
- A knock-out on the standard mounting arm enables round pole mounting
- Prevail: 3G vibration rated
- Prevail XL Mast Arm: 3G vibration rated
- Prevail XL Standard Arm: 1.5G vibration rated

Finish
- Five-stage super TGIC polyester powder coat paint, 2.5 mil nominal thickness

Shipping Data
- Prevail: 20 lbs. (9.09 kgs.)
- Prevail XL: 45 lbs. (20.41 kgs.)

Energy and Performance Data

View PRV IES files

Power and Lumens (PRV)

Light Engine		C15	C25	C40	C60
Power (Watts)		52	96	131	153
Input Current @ 120V (A)		0.43	0.80	1.09	1.32
Input Current @ 277V (A)		0.19	0.35	0.48	0.57
Input Current @ 347V (A)		0.17	0.30	0.41	0.48
Input Current @ 480V (A)		0.12	0.22	0.30	0.35
Distribution					
Type II	4000K Lumens	7,123	13,205	17,172	20,083
	BUG Rating	B2-U0-G2	B2-U0-G2	B3-U0-G3	B3-U0-G3
	3000K Lumens	6,994	12,965	16,860	19,718
Type III	4000K Lumens	7,111	13,183	17,144	20,050
	BUG Rating	B1-U0-G2	B2-U0-G3	B3-U0-G4	B3-U0-G4
	3000K Lumens	6,982	12,944	16,832	19,686
Type IV	4000K Lumens	7,088	13,140	17,087	19,984
	BUG Rating	B1-U0-G3	B2-U0-G4	B2-U0-G4	B3-U0-G5
	3000K Lumens	6,959	12,901	16,777	19,621
Type V	4000K Lumens	7,576	14,045	18,264	21,360
	BUG Rating	B3-U0-G3	B4-U0-G3	B4-U0-G4	B5-U0-G4
	3000K Lumens	7,438	13,790	17,932	20,972

Lumen Maintenance

Configuration	TM-21 Lumen Maintenance (50,000 Hours)	Theoretical L70 (Hours)
Up to PRV-C60 at 25°C	91.30%	194,000
Up to PRV-C60 at 40°C	87.59%	134,000
Up to PRV-XL-C175 at 25°C	91.40%	204,000
Up to PRV-XL-C175 at 40°C	89.41%	158,000

Lumen Multiplier

Ambient Temperature	Lumen Multiplier
10°C	1.02
15°C	1.01
25°C	1.00
40°C	0.99

View PRV-XL IES files

Power and Lumens (PRV-XL)

Light Engine		C75	C100	C125	C150	C175
Power (Watts)		176	217	264	285	346
Input Current @ 120V (A)		1.50	1.84	2.21	2.38	2.92
Input Current @ 277V (A)		0.66	0.82	0.97	1.04	1.25
Input Current @ 347V (A)		0.54	0.66	0.79	0.84	1.02
Input Current @ 480V (A)		0.40	0.48	0.57	0.62	0.74
Distribution						
Type II	4000K Lumens	26,263	31,231	36,503	41,349	48,876
	BUG Rating	B3-U0-G3	B3-U0-G4	B4-U0-G4	B4-U0-G4	B4-U0-G5
	3000K Lumens	25,786	30,664	35,840	40,598	47,989
Type III	4000K Lumens	26,120	31,061	36,304	41,124	48,610
	BUG Rating	B3-U0-G5	B3-U0-G5	B3-U0-G5	B4-U0-G5	B4-U0-G5
	3000K Lumens	25,646	30,497	35,645	40,377	47,727
Type IV	4000K Lumens	26,098	31,035	36,274	41,089	48,569
	BUG Rating	B3-U0-G5	B3-U0-G5	B3-U0-G5	B3-U0-G5	B4-U0-G5
	3000K Lumens	25,624	30,471	35,615	40,343	47,687
Type V	4000K Lumens	28,129	33,450	39,097	44,287	52,349
	BUG Rating	B5-U0-G5	B5-U0-G5	B5-U0-G5	B5-U0-G5	B5-U0-G5
	3000K Lumens	27,618	32,843	38,387	43,483	51,398

Control Options

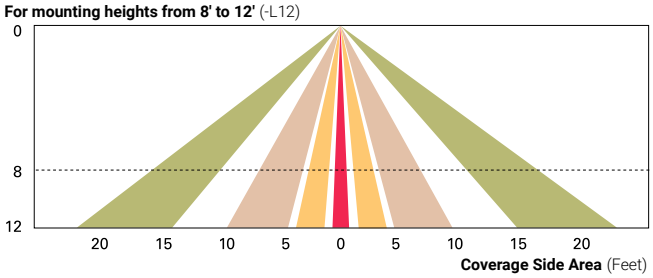
0-10V (D) The dimming option provides 0-10V dimming wire leads for use with a lighting control panel or other control method.

Photocontrol (PER and PER7) Photocontrol receptacles provide a flexible solution to enable "dusk-to-dawn" lighting by sensing light levels. Advanced control systems compatible with NEMA 7-pin standards can be utilized with the PER7 receptacle.

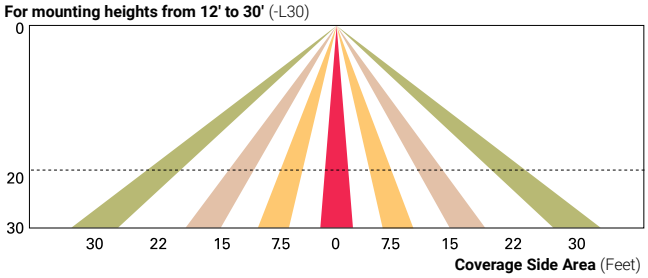
Dimming Occupancy Sensor (MSP and MS) These sensors are factory installed in the luminaire housing. When a sensor for dimming operation (/DIM) option is selected, the luminaire will dim down to approximately 50 percent power after five minutes of no activity detected. When activity is detected, the luminaire returns to full light output. When a sensor for ON/OFF operation is selected, the luminaire will turn off after five minutes of no activity.

These occupancy sensors include an integral photocell that can be activated or inactivated with the programming remote / configuration tool for "dusk-to-dawn" control or "daylight harvesting". **Note:** For MSP sensors, the factory preset is ON (Enabled), and for MS sensors, the factory preset is OFF (Disabled). The programming remote / tool is a wireless tool that can be utilized to change the dimming level, time delay, sensitivity and other parameters. A variety of sensor lenses are available to optimize the coverage pattern for mounting heights from 8'-40'.

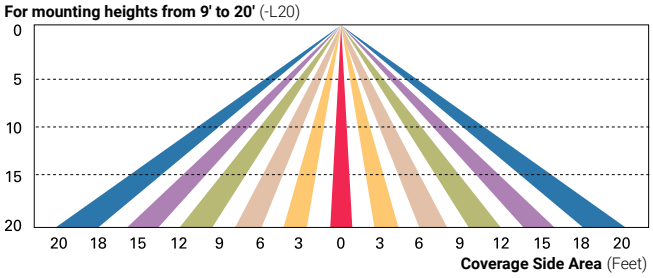
For mounting heights from 8' to 12' (-L12)



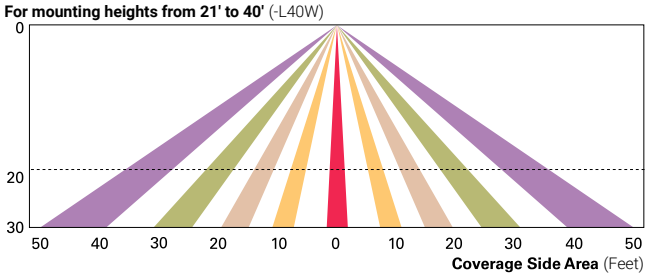
For mounting heights from 12' to 30' (-L30)



For mounting heights from 9' to 20' (-L20)



For mounting heights from 21' to 40' (-L40W)

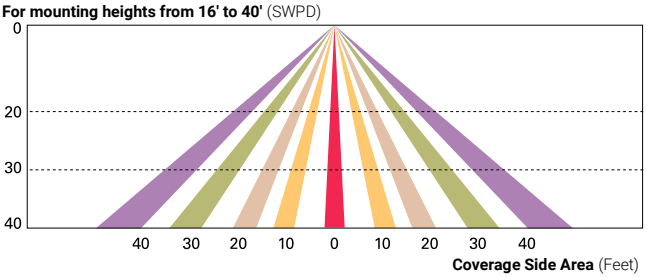


WaveLinx Wireless Control and Monitoring System Available in 7-PIN or 4-PIN configurations, the WaveLinx Outdoor control platform operates on a wireless mesh network based on IEEE 802.15.4 standards enabling wireless control of outdoor lighting. Use the WaveLinx Mobile application for set-up and configuration. At least one Wireless Area Controller (WAC) is required for full functionality and remote communication (including adjustment of any factory pre-sets).

WaveLinx Outdoor Control Module (WOLC-7P-10A) A photocontrol that enables astronomic or time-based schedules to provide ON, OFF and dimming control of fixtures utilizing a 7-PIN receptacle. The out-of-box functionality is ON at dusk and OFF at dawn.

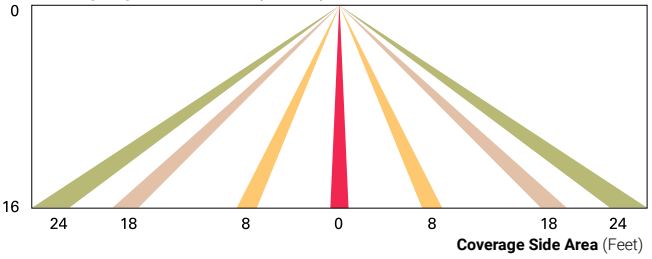
WaveLinx Wireless Sensor (SWPD4 and SWPD5) These outdoor sensors offer passive infrared (PIR) occupancy and a photocell for closed loop daylight sensing. These sensors can be factory installed or field-installed via simple, tool-less integration into luminaires equipped with the Zhaga Book 18 compliant 4-PIN receptacle (ZW). These sensors are factory preset to dim down to approximately 50 percent power after 15 minutes of no activity detected. These occupancy sensors include an integral photocell for "dusk-to-dawn" control or daylight harvesting that is factory-enabled. A variety of sensor lenses are available to optimize the coverage pattern for mounting heights from 7'-40'.

For mounting heights from 16' to 40' (SWPD)

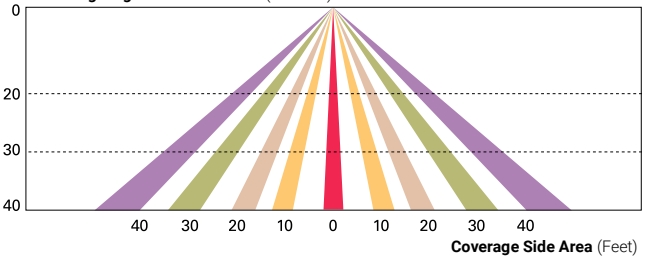


LumaWatt Pro Wireless Control and Monitoring System (LWR-LW and LWR-LN) The Eaton's LumaWatt Pro powered by Enlighted is a connected lighting solution that combines LED luminaires with an integrated wireless sensor system. The sensor controls the lighting system in compliance with the latest energy codes and collects valuable data about building performance and use. Software applications turn the granular data into information through energy dashboards and specialized apps that make it simple and help optimize the use of other resources beyond lighting.

For mounting heights from 8' to 16' (LWR-LW)



For mounting heights from 16' to 40' (LWR-LN)



LumenSafe (LD) The LumenSafe integrated network camera is a streamlined, outdoor-ready camera that provides high definition video surveillance. This IP camera solution is optimally designed to integrate into virtually any video management system or security software platform of choice. No additional wiring is needed beyond providing line power to the luminaire. LumenSafe features factory-installed power and networking gear in a variety of networking options allowing security integrators to design the optimal solution for active surveillance.

Cooper Lighting Solutions
1121 Highway 74 South
Peachtree City, GA 30269
P: 770-486-4800
www.cooperlighting.com

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Specifications and dimensions subject to change without notice.

Cylinder 7.75" 1 Light Wall Light Architectural Bronze

9236AZ (Architectural Bronze)

Location:
Type:
Qty:
Comments:



Certifications/Qualifications

Dark Sky Compliant	Yes
Location Rating	Wet
	www.kichler.com/warranty

Dimensions

Base Backplate	5.00 X 4.75
Extension	8.50"
Weight	1.25 LBS
Height from center of Wall opening (Spec Sheet)	4.00"
Height	7.75"
Width	6.00"

Mounting/Installation

Interior/Exterior	Exterior
Mounting Style	Wall Mount

Primary Lamping

Lamp Included	Not Included
Lamp Type	BR40
Light Source	Incadescent
Max or Nominal Watt	120W
# of Bulbs/LED Modules	1
Socket Type	Medium
Socket Wire	150

Product/Ordering Information

SKU	9236AZ
Finish	Bronze
Style	Contemporary
UPC	783927923644

Specifications

Material	ALUMINUM

Additional Finishes

Architectural Bronze

Kichler
7711 East Pleasant Valley Road Cleveland, Ohio 44131-8010
Toll free: 866.558.5706 or kichler.com

Notes:
1) Information provided is subject to change without notice. All values are design or typical values when measured under laboratory conditions.
2) Incandescent Equivalent: The incandescent equivalent as presented is an approximate number and is for reference only.

KICHLER.

MILLENNIUM LIGHTING

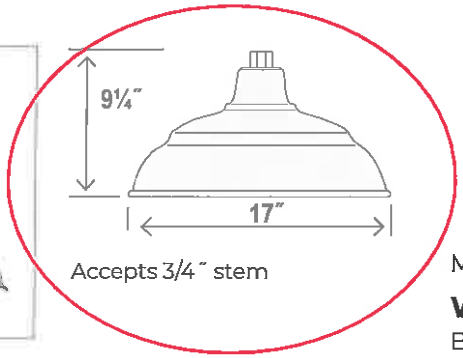
Millennium Lighting
www.millenniumlighting.com

RWHS17 - R SERIES 17″ WAREHOUSE SHADE

This item can be converted to a pendant or wall sconce with purchase of separate compatible downrod or goose neck. Please see compatible downrods and arms below:

- Compatible downrods: RS1, RS2, and RS3
- Compatible with arms: RGN10, RGN12, RGN13, RGN15, RGN22, RGN23, RGN24, RGN30, and RGN41
- Compatible with wire guard: RWG17





Accepts 3/4″ stem

Dimensions

Width	9¼″
Height	17″
Wire	100″

Finish & Material

Finishes	**ABR** - Architectural Bronze **BP** - Black Porcelain **GA** - Galvanized **GY** - Gray **NB** - Navy Blue **NC** - Natural Copper **SB** - Satin Black **SFP** - Sea Foam Porcelain **SG** - Satin Green **SR** - Satin Red **WH** - White **WP** - White Porcelain
Material	Metal

Wattage

Bulbs	1-Medium A21
Watts per Bulb	200W
Voltage	120V
Bulbs Included	No

Certification

UL Listed	Wet Location

Item Number

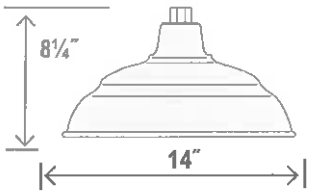
SKU	RWHS17

RWHS14 - R SERIES 14″ WAREHOUSE SHADE

This item can be converted to a pendant or wall sconce with purchase of separate compatible downrod or goose neck. Please see compatible downrods and goose neck below:

- Compatible downrods: RS1, RS2, and RS3
- Compatible with arms: RGN10, RGN12, RGN13, RGN15, RGN22, RGN23, RGN24, RGN30, and RGN41
- Compatible with wire guard: RWG14





Accepts 3/4″ stem

Dimensions

Width	8¼″
Height	14″
Wire	100″

Finish & Material

Finishes	**ABR** - Architectural Bronze **BP** - Black Porcelain **GA** - Galvanized **GY** - Gray **NB** - Navy Blue **NC** - Natural Copper **SB** - Satin Black **SFP** - Sea Foam Porcelain **SG** - Satin Green **SR** - Satin Red **WH** - White **WP** - White Porcelain
Material	Metal

Wattage

Bulbs	1-Medium A21
Watts per Bulb	200W
Voltage	120V
Bulbs Included	No

Certification

UL Listed	Wet Location

Item Number

SKU	RWHS14

Note: All finishes on outdoor lighting must be properly maintained and treated. Therefore, we suggest cleaning with a regular application of finish preserving & renewing products such as Rejuvenate.

R SERIES

"Making the Desirable Affordable"

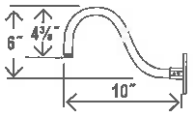
MILLENNIUM LIGHTING

Millennium Lighting
www.millenniumlighting.com

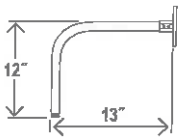
R SERIES OPTIONS

GOOSE NECKS - (WALL MOUNT)

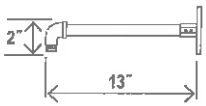
RGN10



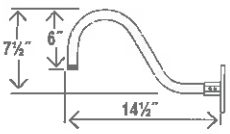
RGN12



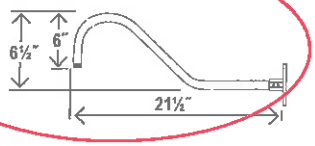
RGN13



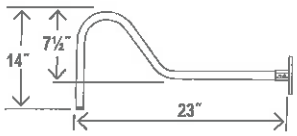
RGN15



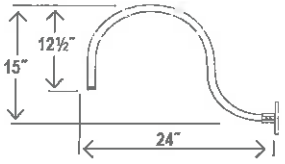
RGN22



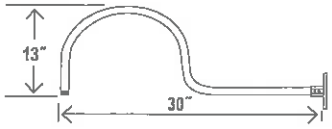
RGN23



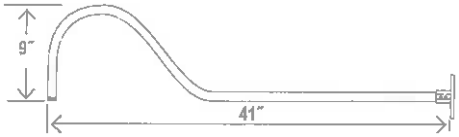
RGN24



RGN30



RGN41



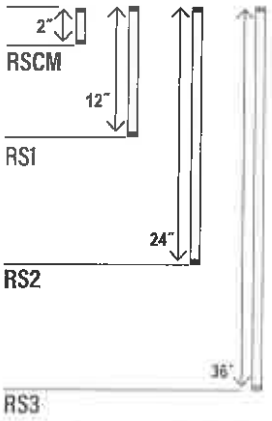


Back Plate Included

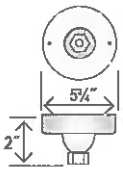
ID: 3/4"

FINISHES
ABR - Architectural Bronze
AL - Aluminum
ASB - Aluminum Painted Satin Black
BP - Black Porcelain
GA - Galvanized
GY - Gray
NB - Navy Blue
NC - Natural Copper
SB - Satin Black
SFP - Sea Foam Porcelain
SG - Satin Green
SR - Satin Red
WH - White
WP - White Porcelain

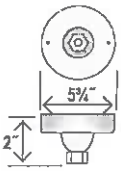
STEMS AND CANOPY KITS - (CEILING MOUNT)



RSCK (25° Angle)



RSCKSS (45° Angle)

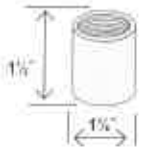


ID: 3/4"

FINISHES
ABR - Architectural Bronze
CP - Copper
GA - Galvanized
GY - Gray
NB - Navy Blue
SB - Satin Black
SG - Satin Green
SR - Satin Red
WH - White

STEM CONNECTORS

RC

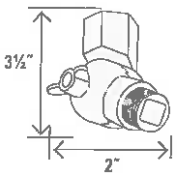


Accepts 3/4" stem

FINISHES
ABR - Architectural Bronze
AL - Aluminum
CP - Copper
GA - Galvanized
GY - Gray
NB - Navy Blue
SB - Satin Black
SG - Satin Green
SR - Satin Red
WH - White

WALL MOUNT SWIVELS

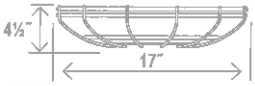
RSW



FINISHES
ABR - Architectural Bronze
CP - Copper
GA - Galvanized
SB - Satin Black
SG - Satin Green
SR - Satin Red
WH - White

WIRE GUARDS

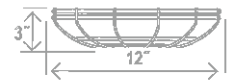
RWG17



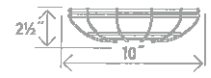
RWG14



RWG12



RWG10



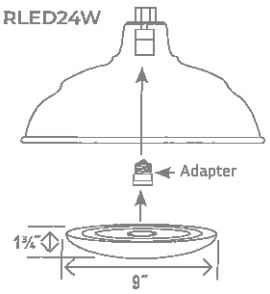
FINISHES
ABR - Architectural Bronze
GA - Galvanized
GY - Gray
NB - Navy Blue
SB - Satin Black
SG - Satin Green
SR - Satin Red
WH - White

LED MODULE

RLED24W

This accessory is only compatible for the Warehouse Shade (i.e. RWHS14 & RWHS17).

RLED24W

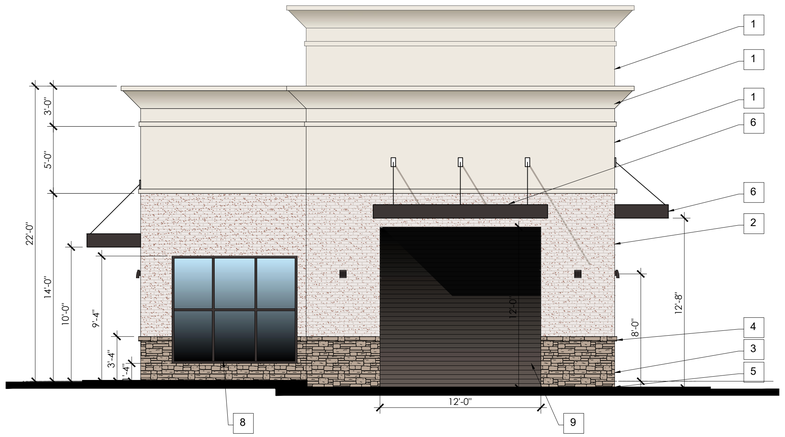


W: 9" x H: 1¾"

1920 Lumens
3000K
CRI 90
Dimmable

R SERIES

"Making the Desirable Affordable"



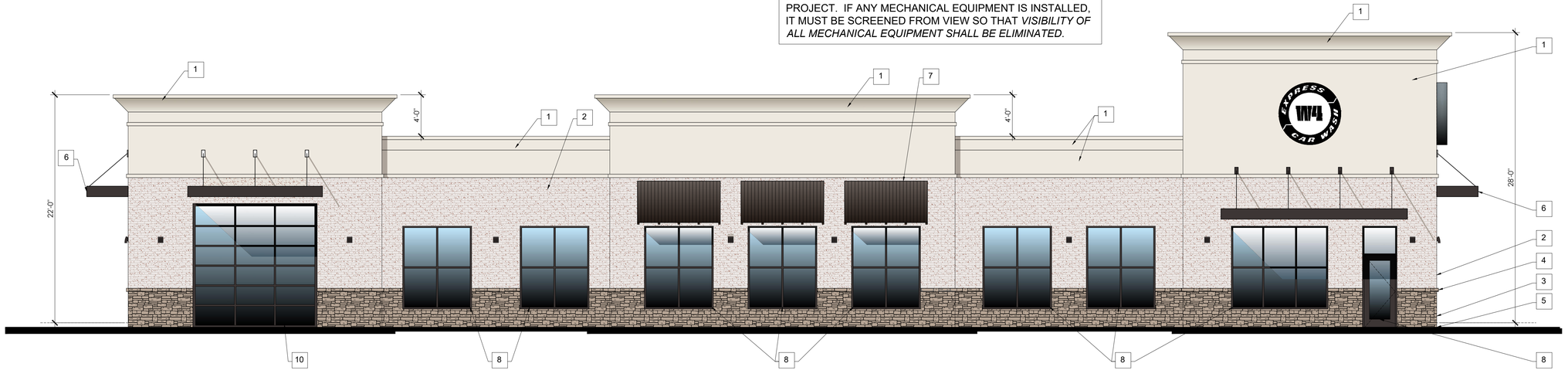
C ENTRANCE END - SOUTH ELEVATION

SCALE 3/16" = 1'-0"

EXTERIOR FINISH LEGEND

1	EF-1: EIFS SYSTEM, FINISH: SANDPEBBLE COLOR: SHERWIN WILLIAMS SW7001 MARSHMALLOW
2	BR-1: BELDEN BRICK COMPANY, 5/8" THICK MODULAR THIN BRICK COLOR: FROSTED WHITE
3	STN-1: HORIZON STONE COLOR: SMOKY MOUNTAIN - HANDCRAFTED
4	STN-2: HORIZON STONE LEDGE CAP COLOR: MATCH "SMOKY MOUNTAIN"
5	ACM-1: REYNOBOND (OR EQUAL) COLOR: BLACK
6	MTL-1: METAL SHADE AWNING COLOR: SHERWIN WILLIAMS SW6258 TRICORN BLACK
7	MTL-2: MBCI LOCKSEAM DECK, 12" X 22 GA. COLOR: STRIATED BURNISHED SLATE
8	ALUM/GLASS-1: ALUMINUM AND GLASS ALUM COLOR: DARK BRONZE; GLASS COLOR: GRAY
9	HOLLOW MTL: METAL DOOR AND FRAME COLOR: SHERWIN WILLIAMS SW6006 BLACK BEAN
10	CLOPAY METAL OVERHEAD DOOR SERIES, MODEL 902/903 ALUM COLOR: DARK BRONZE; GLASS COLOR: GRAY

NOTE: NO ROOFTOP EQUIPMENT IS PLANNED FOR THIS PROJECT. IF ANY MECHANICAL EQUIPMENT IS INSTALLED, IT MUST BE SCREENED FROM VIEW SO THAT *VISIBILITY OF ALL MECHANICAL EQUIPMENT SHALL BE ELIMINATED.*



D TUNNEL SIDE - EAST ELEVATION

SCALE 3/16" = 1'-0"

MRP DESIGN GROUP
3450 Acworth Due West Road
Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
www.mrpdesign.com

ARCHITECT OF RECORD:

THOMAS E. MORGAN, JR.
ARCHITECT

423 FISCHER TRAIL
ELLIJAY, GEORGIA 30540

MRP DESIGN GROUP
3450 Acworth Due West Road
Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
F. 770-917-9470
www.mrpdesign.com

ISSUES/REVISIONS

DATE	DESCRIPTION
08.18.20	COLORED ELEVATIONS SUBMITTAL

DRAWN BY:

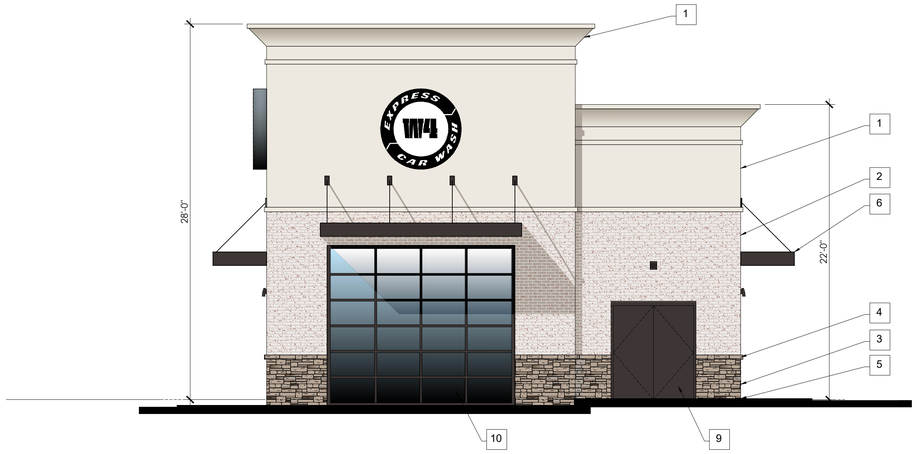
CHK'D BY:

PROJECT TITLE:

W4 EXPRESS CAR WASH
CHARLOTTESVILLE, VA

SHEET TITLE:

PROJECT NO: 19066



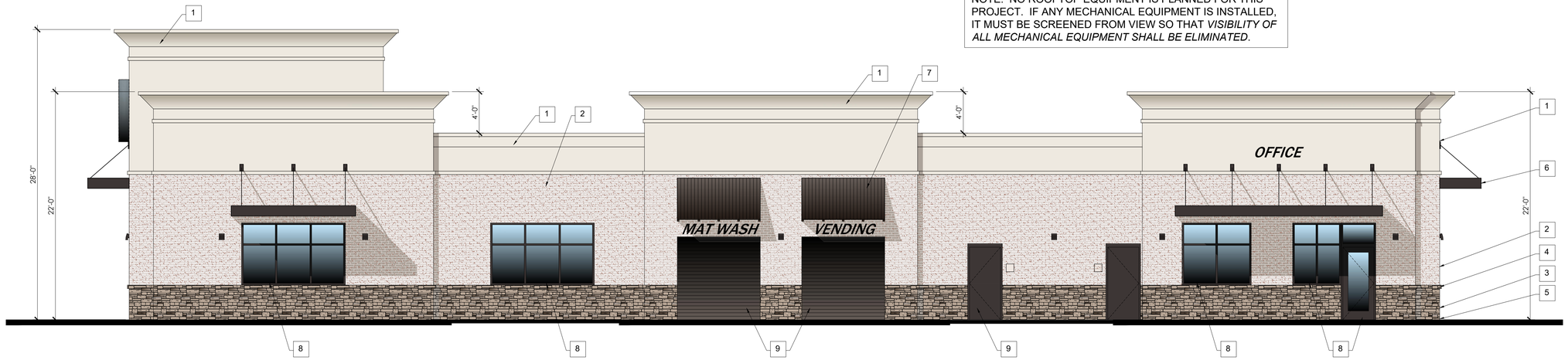
A EXIT END - NORTH ELEVATION

SCALE 3/16" = 1'-0"

EXTERIOR FINISH LEGEND

1	EF-1: EIFS SYSTEM, FINISH: SANDPEBBLE COLOR: SHERWIN WILLIAMS SW7001 MARSHMALLOW
2	BR-1: BELDEN BRICK COMPANY, 5/8" THICK MODULAR THIN BRICK COLOR: FROSTED WHITE
3	STN-1: HORIZON STONE COLOR: SMOKY MOUNTAIN - HANDCRAFTED
4	STN-2: HORIZON STONE LEDGE CAP COLOR: MATCH "SMOKY MOUNTAIN"
5	ACM-1: REYNOBOND (OR EQUAL) COLOR: BLACK
6	MTL-1: METAL SHADE AWNING COLOR: SHERWIN WILLIAMS SW6258 TRICORN BLACK
7	MTL-2: MBCI LOCKSEAM DECK, 12" X 22 GA. COLOR: STRIATED BURNISHED SLATE
8	ALUM/GLASS-1: ALUMINUM AND GLASS ALUM COLOR: DARK BRONZE; GLASS COLOR: GRAY
9	HOLLOW MTL: METAL DOOR AND FRAME COLOR: SHERWIN WILLIAMS SW6006 BLACK BEAN
10	CLOPAY METAL OVERHEAD DOOR SERIES, MODEL 902/903 ALUM COLOR: DARK BRONZE; GLASS COLOR: GRAY

NOTE: NO ROOFTOP EQUIPMENT IS PLANNED FOR THIS PROJECT. IF ANY MECHANICAL EQUIPMENT IS INSTALLED, IT MUST BE SCREENED FROM VIEW SO THAT *VISIBILITY OF ALL MECHANICAL EQUIPMENT SHALL BE ELIMINATED.*



B EQUIPMENT ROOM SIDE - WEST ELEVATION

SCALE 3/16" = 1'-0"

MRP DESIGN GROUP
3450 Acworth Due West Road
Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
www.mrpdesign.com

ARCHITECT OF RECORD:

THOMAS E. MORGAN, JR.
ARCHITECT

423 FISCHER TRAIL
ELLIJAY, GEORGIA 30540

MRP DESIGN GROUP
3450 Acworth Due West Road
Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
F. 770-917-9470
www.mrpdesign.com

ISSUES/REVISIONS

DATE	DESCRIPTION
06.18.20	COLORED ELEVATIONS SUBMITTAL

DRAWN BY:

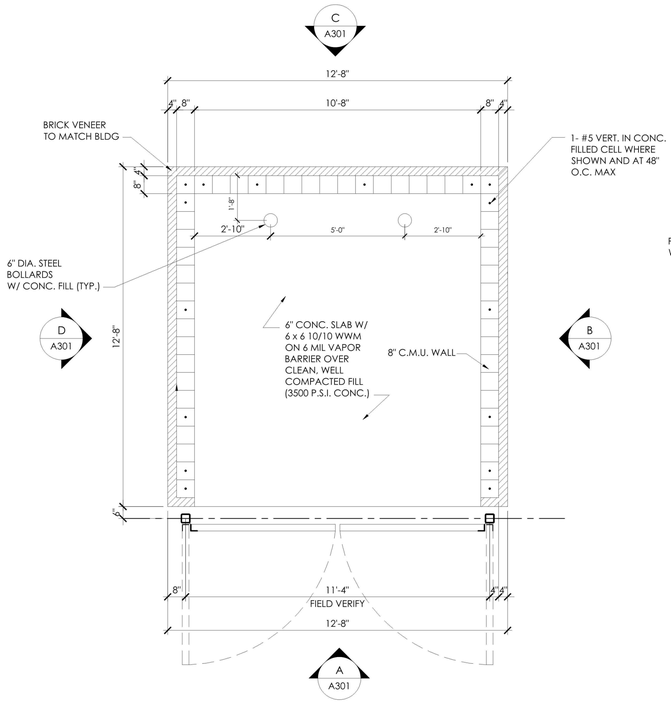
CHK'D BY:

PROJECT TITLE:

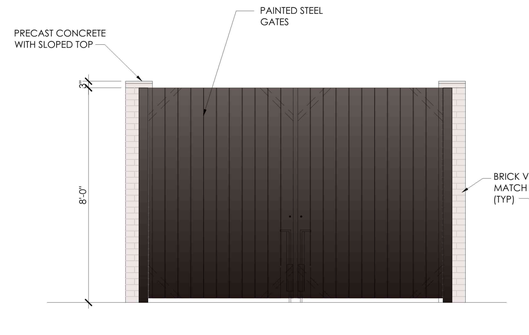
W4 EXPRESS CAR WASH
CHARLOTTESVILLE, VA

SHEET TITLE:

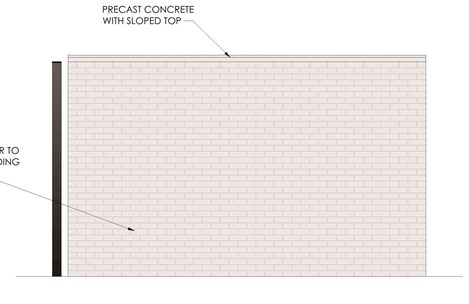
PROJECT NO: 19066



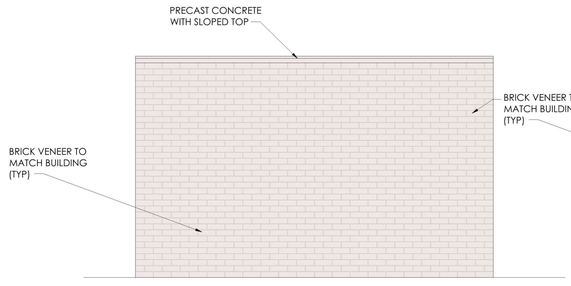
1 A301 DUMPSTER ENCLOSURE PLAN
nts



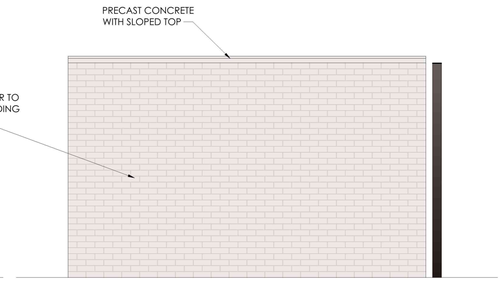
A A301 DUMPSTER ENCLOSURE ELEVATION
nts



B A301 DUMPSTER ENCLOSURE ELEVATION
nts



C A301 DUMPSTER ENCLOSURE ELEVATION
nts

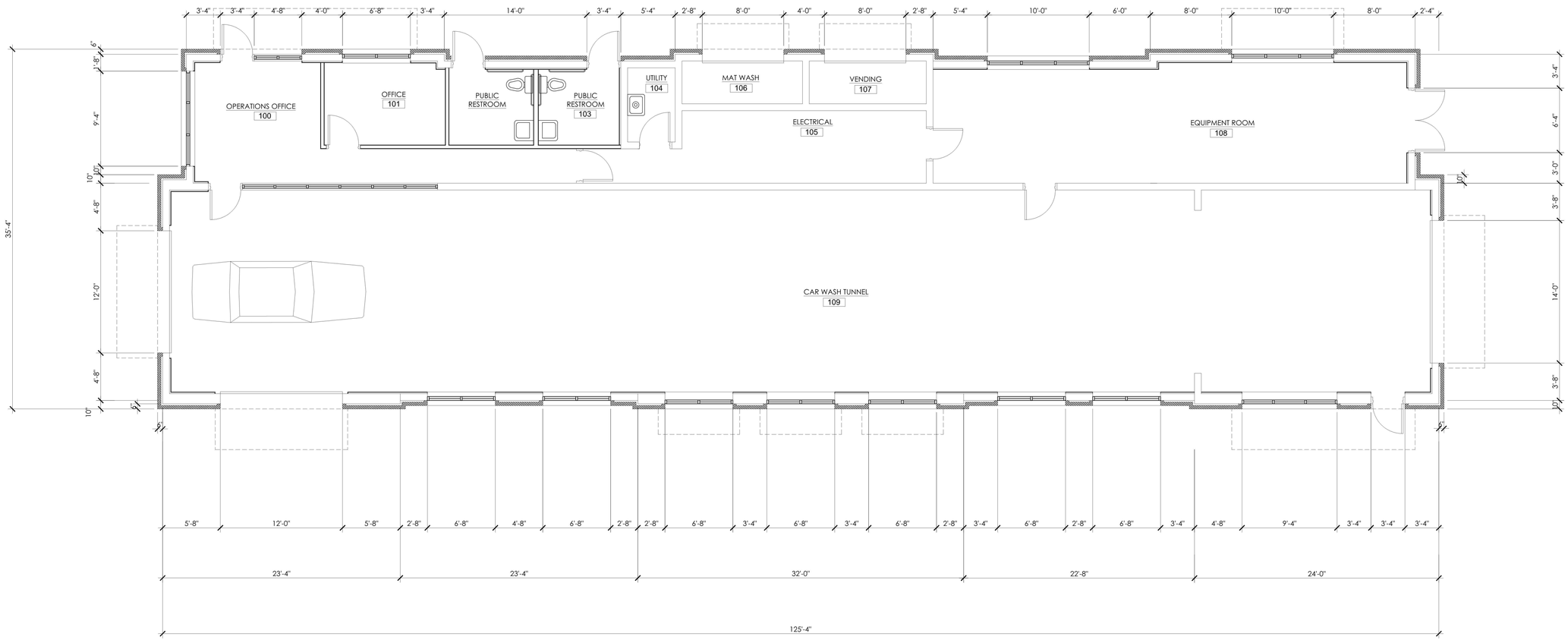


D A301 DUMPSTER ENCLOSURE ELEVATION
nts

MRP DESIGN GROUP
3450 Acworth Due West Road
Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
www.mrpdesign.com

EXPRESS 1W4 CAR WASH





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Building 100, Suite 120
Kennesaw, Georgia 30144
P. 770-917-9172
www.mrpdesign.com

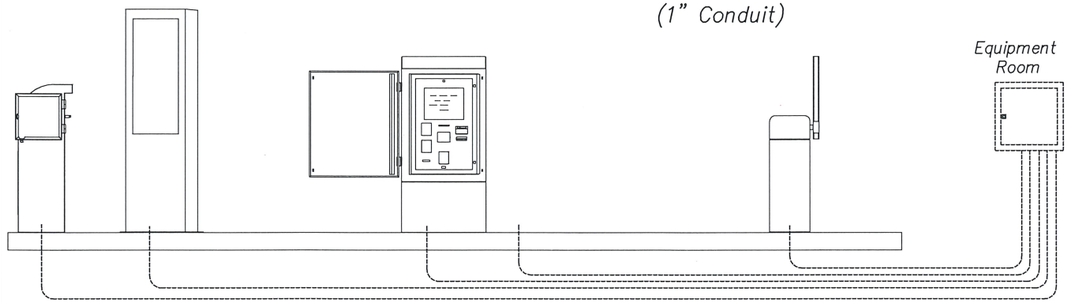
1 / A101 FLOOR PLAN
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EXPRESS CAR WASH


CVS

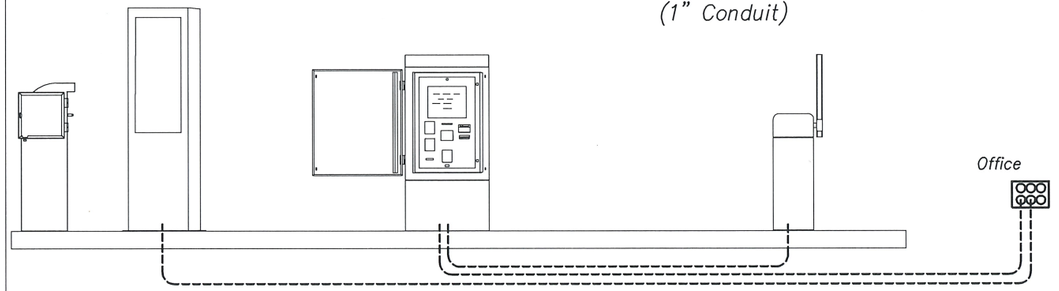
Power Line

(1" Conduit)



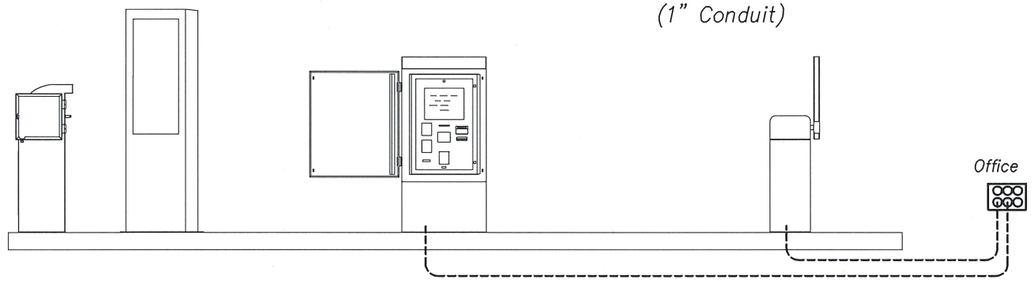
Control Line

(1" Conduit)



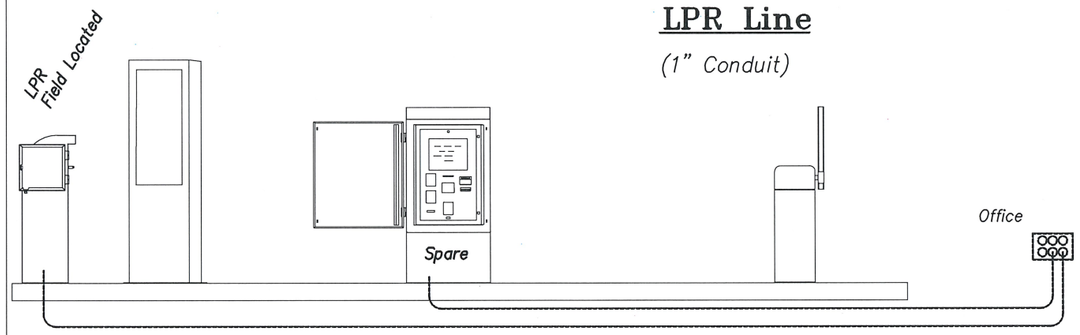
Gate Line

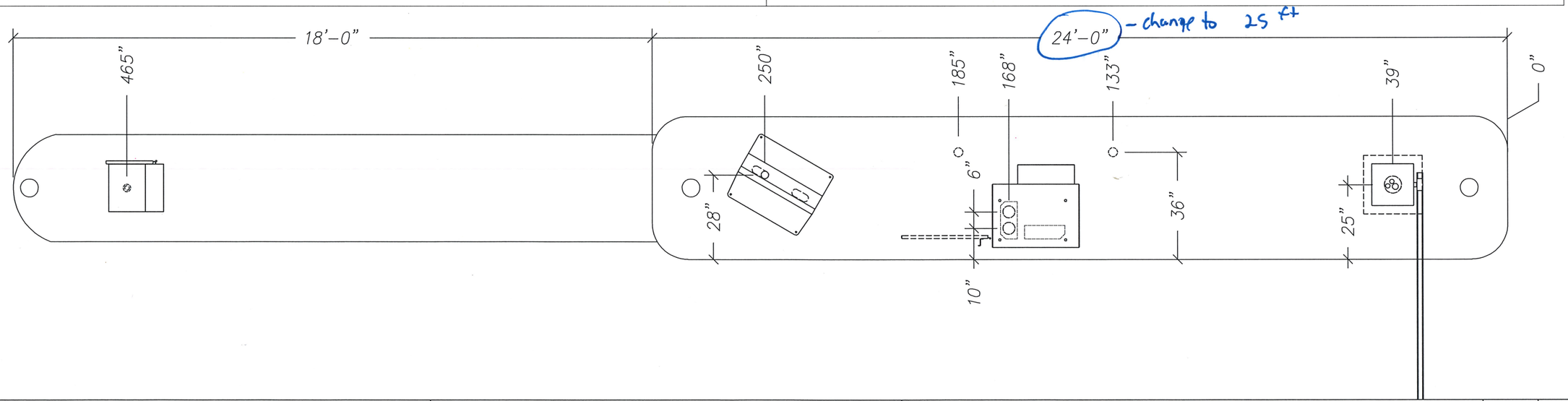
(1" Conduit)



LPR Line

(1" Conduit)





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REVISION DATE:	11.13.19
CREATED BY:	LV
REVISED BY:	FAO
CHECKED BY:	Luis V.

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http://www.SonnysDirect.com

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POS ISLAND CONDUIT LAYOUT; GC SCHEMATIC

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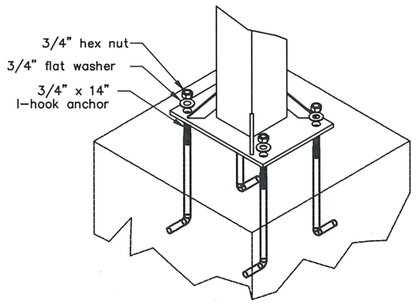
19410-D6-WCWV ALEXANDRIA KY

SCALE: N.T.S.

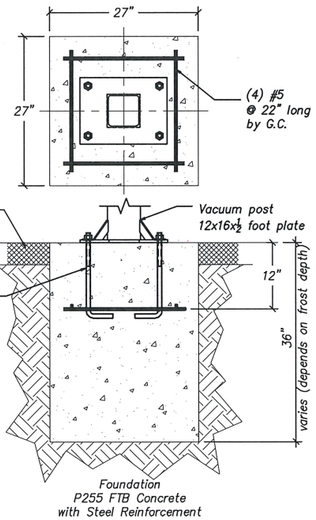
LOCATION: -KY-

Sheet	Rev.
11.3	-+-

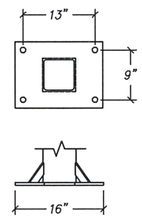
Hardware Installation Detail



Vacuum Boom Foundation

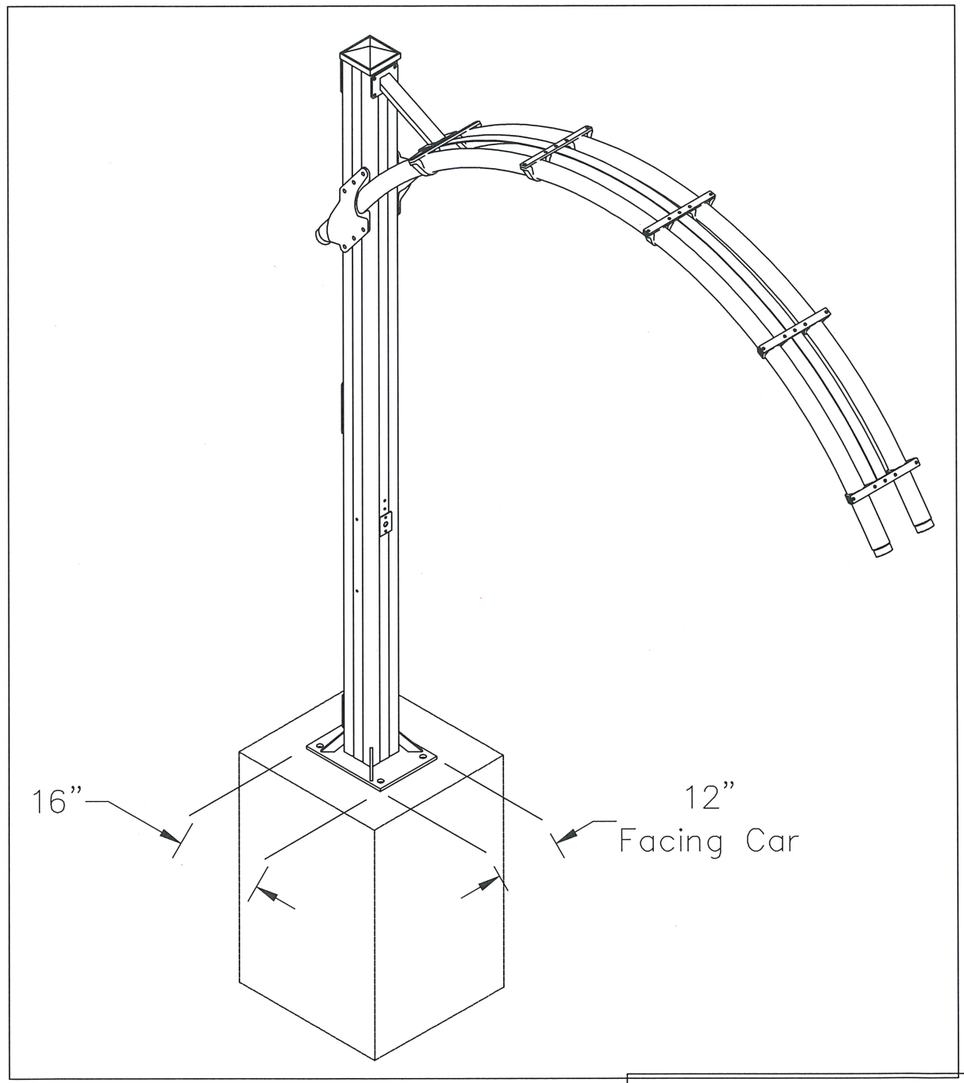


Vacuum Boom Foot Plate Dim



Notes:

* 16" foot plate dim to run parallel to vehicle travel



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REVISED BY:	FAO
CHECKED BY:	Luis V.

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VACUUM FOUNDATION LAYOUT; GC

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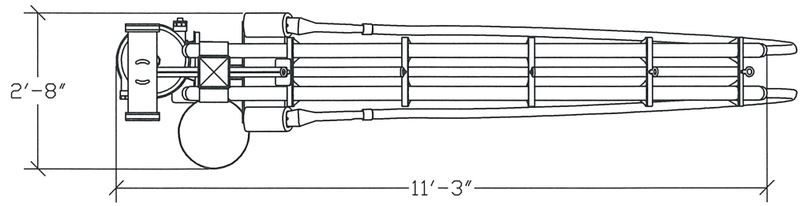
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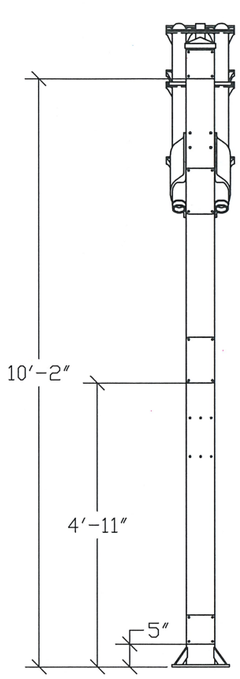
19410-D6-WCWV ALEXANDRIA KY

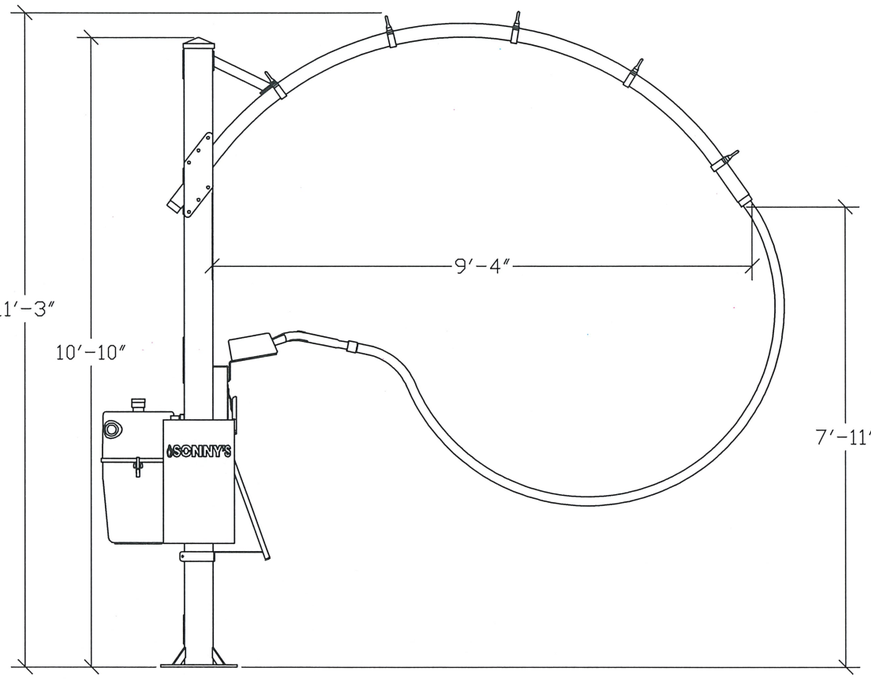
SCALE: N.T.S. LOCATION: -KY-

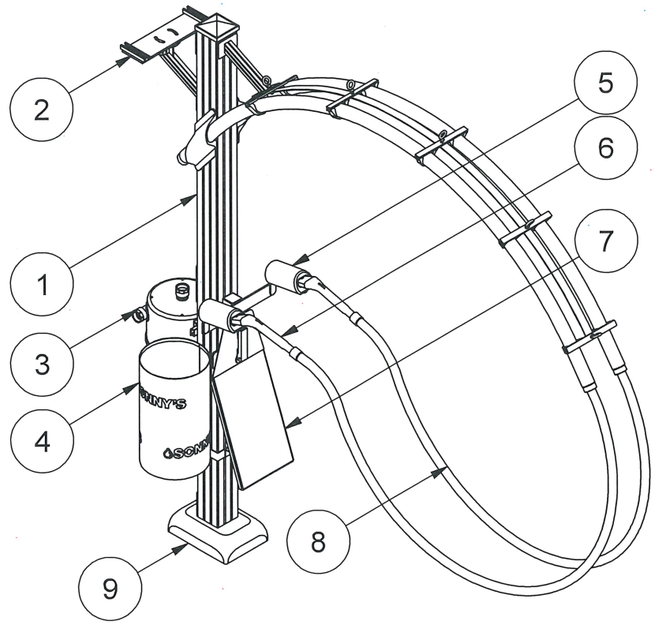
Sheet	Rev.
10.6	-+-



PARTS LIST	
ITEM	DESCRIPTION
1	Dual Boom 6" x 6" Leg Post
2	Vacuum Boom Pipe Mount
3	Cyclone Trash Collector
4	Garbage Recepticle
5	Express Holster with Bracket
6	Express Claw Crevice Tool
7	Mat Holder
8	Vacuum Hose 1.5"
9	Base Plate Plastic Cover







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19410-D6-WCWV ALEXANDRIA KY

SCALE: N.T.S. LOCATION: -KY-

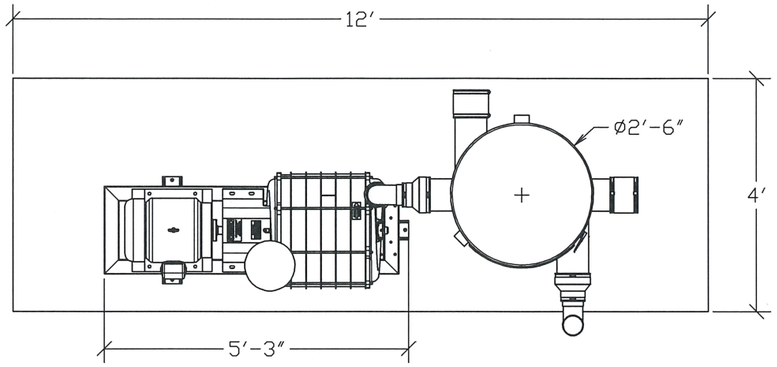
Sheet	Rev.
10.7	-+-

DATE:	06.28.19
REVISION DATE:	11.13.19
CREATED BY:	LV
REVISED BY:	FAO
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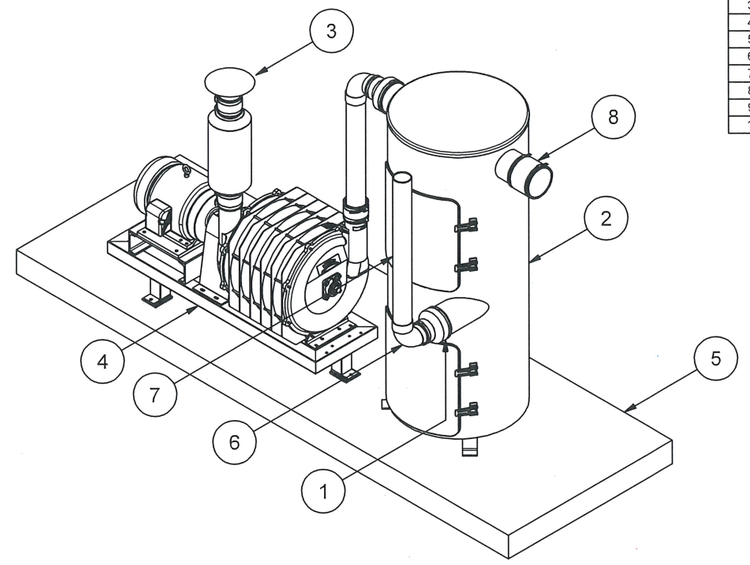
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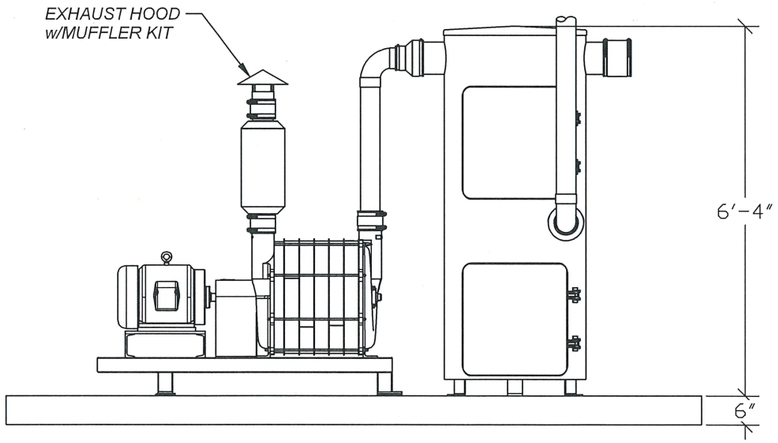
VAC. POST ASSEMBLY DETAIL; GC

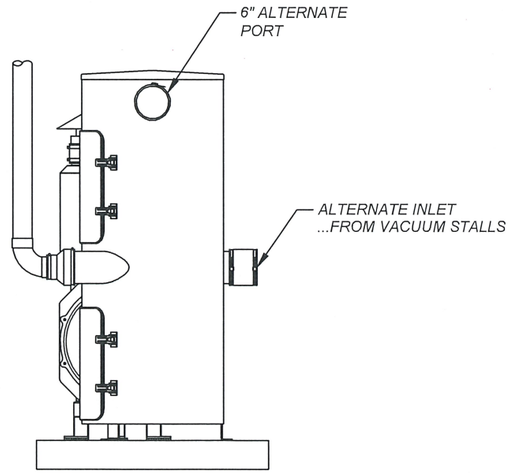
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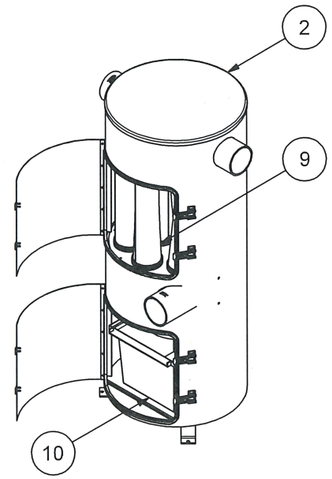


PARTS LIST	
ITEM	DESCRIPTION
1	6" x 4" Reducer Coupling
2	Vacuum Separator Universal w/10 Bags
3	Vacuum, Turbine 4" Kit
4	Vacuum, 25hp Producer w/Tank
5	Concrete Pad for Vacuum Producers
6	4" Schedule 40 PVC 90deg Elbow
7	4" Schedule 40 PVC Pipe
8	6" Coupler
9	Vacuum Separator Filter Bag 6inD x 32inL
10	Vacuum Separator Debris Cleanout Tank









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19410-D6-WCWV ALEXANDRIA KY

SCALE: N.T.S. LOCATION: -KY-

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10.8	-+-

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AIL FND

N24° 18' 10"E 191.25'

DB 985/722

26x56 SIX COLUMN

14x42 TWO COLUMN

30' BUILDING SETBACK

14x66 THREE COLUMN

10' PARKING SETBACK

30' BUILDING SETBACK

EXISTING UTILITY EASEMENT DB 985/717 AND DB 985/722

Δ = 8°06'15"
L = 140.14'
R = 990.77'
C. = 140.02'
C.B. = S59°24'42"E

WOODBROOK DR. (75' R/W)

PROPOSED CARWASH
4,231 S.F.
F.F.E. = 492.00

30' BUILDING SETBACK

EXISTING DRAINAGE EASEMENT DB985/717

EX 15" RCP

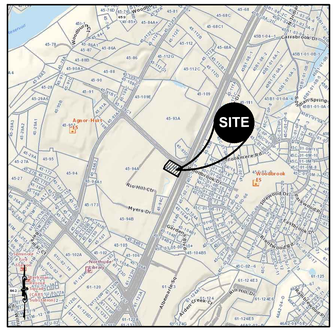
EX DROP INLET
TOP =488.2'
INV. IN =482.3
INV. OUT =481

EX 15" RCP

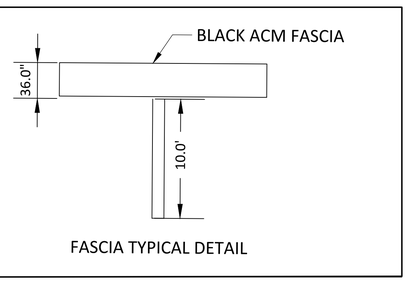
EX JBOX

10' PARKING SETBACK

EX 15"



LOCATION MAP
SCALE: N.T.S.



FASCIA TYPICAL DETAIL

Know what's below Call before you dig dial 811

TRUE NORTH

GRAPHIC SCALE
SCALE 1" = 10'

REVISION BLOCK:

#	DATE	DESCRIPTION
1	07/05/19	ARCHITECTURAL REVIEW BOARD SUBMITTAL
2	08/21/19	SITE DEVELOPMENT PLAN REVIEW
3	11/15/19	ADDRESS COMMENTS
4	12/16/19	ADDRESS COMMENTS
5	01/21/20	VSMP ADDRESS COMMENTS
6	01/30/20	ARCHITECTURAL ADDRESS COMMENTS
7	06/22/20	ADDRESS COMMENTS

COMMONWEALTH OF VIRGINIA
JAMES J. CARTER, JR.
Reg. No. 032[illegible]
PROFESSIONAL ENGINEER
DATE: 1.30.20

CARTER ENGINEERING CONSULTANTS

Carter Engineering Consultants, Inc.
3651 Mars Hill Road, Suite 2000
Watkinsville, GA 30677

P: 770.725.1200
F: 770.725.1204
www.carterengineering.net

SITE DEVELOPMENT PLANS
for
W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
SITE PLAN
CANOPY DETAIL

SHEET NUMBER:
3.1

PROJECT NUMBER:
19016W4D

DATE:
06/22/20



VAC EQUIPMENT



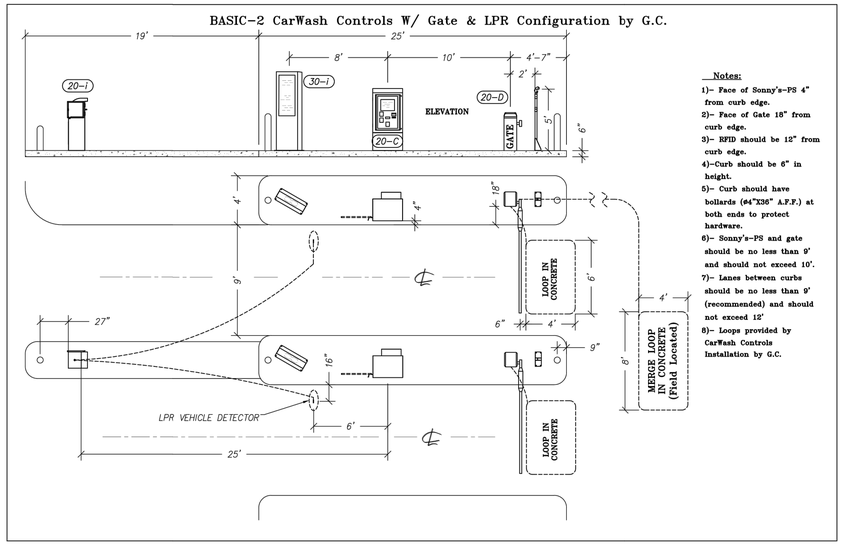
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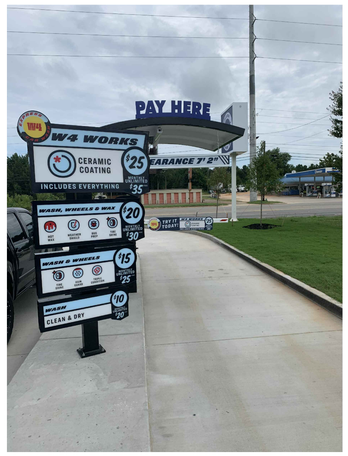
AUTO ENTRY AND GATE EXAMPLE



AUTO ENTRY AND GATE EXAMPLE



AUTO ENTRY AND GATE EXAMPLE



AUTO ENTRY AND GATE EXAMPLE



CANOPY EXAMPLE AND VAC EQUIPMENT

REVISION BLOCK:

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NO. 027[illegible]
PROFESSIONAL ENGINEER
DATE: 1.30.20

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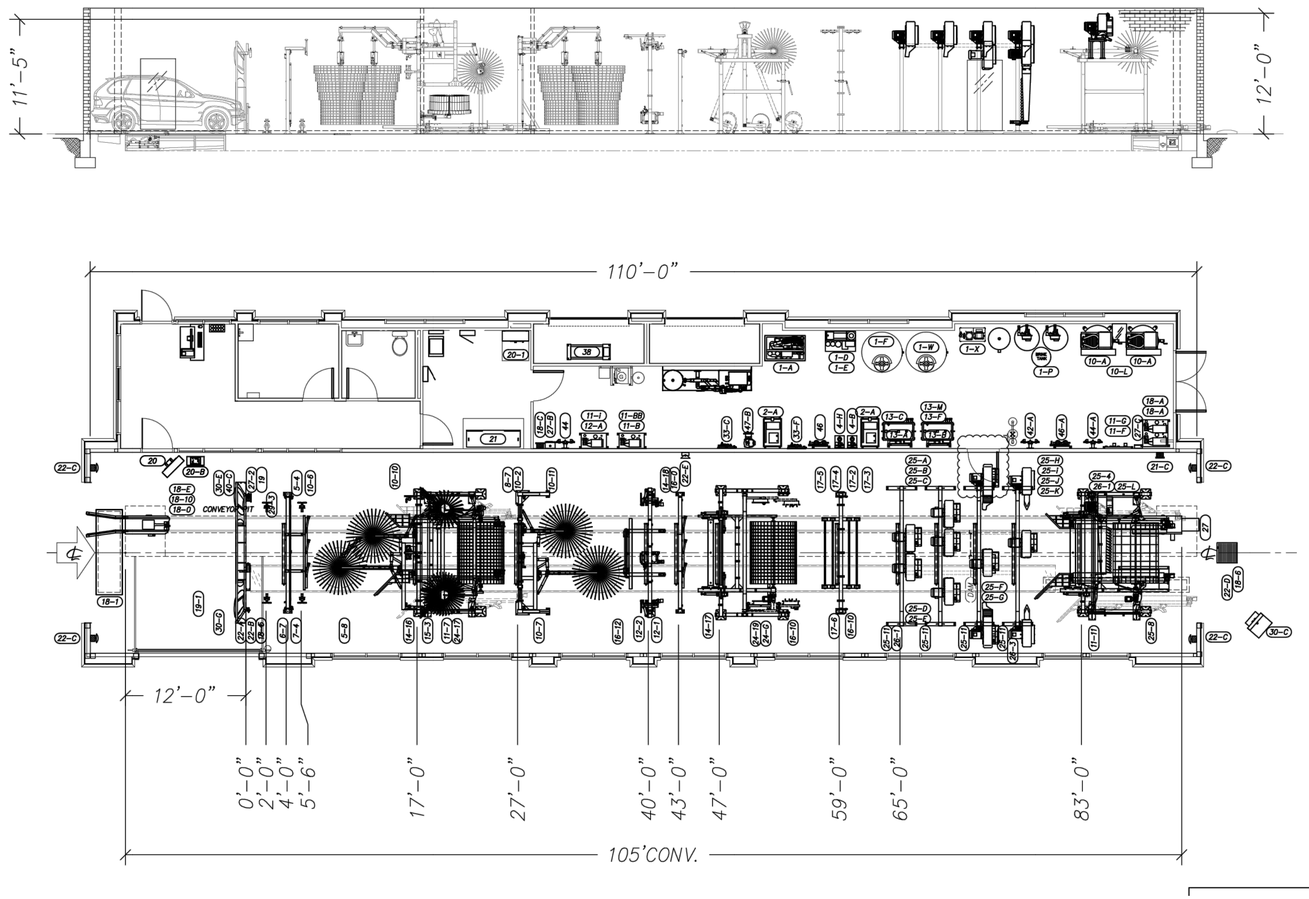
PROJECT NAME:
W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
EQUIPMENT SAMPLES

SHEET NUMBER:
14

PROJECT NUMBER:
19016W4D

DATE:
06/22/20



EQUIPMENT PLAN

NOTE: ALL EQUIPMENT LOCATED WITHIN THE BUILDING

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#	DATE	DESCRIPTION
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NO. 039
PROFESSIONAL ENGINEER
DATE: 1.30.20

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www.carterengineering.net

SITE DEVELOPMENT PLANS
for
W4 DEVELOPMENT
2100 RIO HILL CENTER, CHARLOTTESVILLE, VIRGINIA

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W4 DEVELOPMENT
CHARLOTTESVILLE, VIRGINIA

SHEET TITLE:
EQUIPMENT SAMPLES

SHEET NUMBER:
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PROJECT NUMBER:
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DATE:
06/22/20