CIVIL ENGINEERING FEASIBILITY STUDY
FOR
PROPOSED AVANTI LEGACY VALOR HEIGHTS
MCALENN, TEXAS
CARNEY PROJECT NO. 1018-45

PREPARED FOR
AVANTI LEGACY VALOR HEIGHTS, LP
8500 SHOAL CREEK BLVD
BLDG #4, SUITE 208
AUSTIN, TX 78757

PREPARED BY
CARNEY ENGINEERING, PLLC
5700 GRANITE PARKWAY
SUITE 200
PLANO, TEXAS 75024

February 17, 2020

Any person signing this Report acknowledges that the Department may publish the full report on the Department’s website, release the report in response to a request for public information and make other use of the report as authorized by law."
February 17, 2020

Mr. Michael Tamez  
Avanti Legacy Valor Heights, LP  
8500 Shoal Creek Blvd  
Bldg #4, Suite 208  
Austin, TX 78757

RE: Feasibility Study  
Avanti Legacy Valor Heights  
SEC Beaumont Avenue & S. 1st Street (S. Col. Rowe Blvd)  
McAllen, TX, 78501  
CARNEY PROJECT NO. 1018-45

Dear Michael:

Submitted herewith is our Civil Engineering Feasibility Study for the subject site in McAllen, Texas. The site is approximately 3.93-acres located at the southeast corner of Beaumont Avenue and 1st Street in McAllen, Texas. There will be one 3-story building providing a total of 93 units. An attached clubhouse and other outdoor amenities will also be provided.

This information has been compiled after conversations and with the City of McAllen staff and the client (Developer).

EXECUTIVE SUMMARY

The site is currently platted and consists of 9 lots. It's zoned C-3 (General Business). The property will be rezoned to R-3A (multi-family).

Re-Platting of the property will be required. Owner has begun the re-platting process by submitting the application to the City of McAllen on 2/19/2020 (receipt #698691). Full movement ingress/egress will be provided from Beaumont Avenue and an exit only onto S. 1st street which is in the jurisdiction of City of McAllen.

Water (8-inch) is provided by the City of McAllen (McAllen Public Utility Board) on the west side of S. 1st Street and within the interior of the site. The City of McAllen provides sanitary sewer services. A 12-inch (12-inch) line extends in a public easement along the north side of the property. An eight (8-inch) line is in an easement within the interior of the site and on the east side of S. 1st Street.

Detention for storm water is required by the City. A combination of underground and above ground detention is planned.
Following is information from the local Tax Appraisal District concerning the property:

Property ID:

- 639013 – PHASE ONE OFFICE PARK LOT 1
- 639014 - PHASE ONE OFFICE PARK LOT 2
- 639015 - PHASE ONE OFFICE PARK LOT 3
- 639016 - PHASE ONE OFFICE PARK LOT 4
- 639017 - PHASE ONE OFFICE PARK LOT 5
- 639018 - PHASE ONE OFFICE PARK LOT 6
- 639019 - PHASE ONE OFFICE PARK LOT 7
- 639020 - PHASE ONE OFFICE PARK LOT 8
- 639021 - PHASE ONE OFFICE PARK LOT 9

**Tax Rates:**

- City of McAllen $ 0.495677
- Hidalgo County $ 0.575000
- Drainage District #1 $ 0105100
- McAllen ISD $ 1.152800
- South Texas School $ 0.049200
- South Texas College $ 0.173300

There are no inhibiting site development issues that will prevent construction of the proposed apartments at this site.

**EXISTING SITE CONDITIONS & SURVEY**

The site is approximately 3.93-acres located at the southeast corner of Beaumont Avenue and 1st Street in McAllen, Texas. The site enjoys existing water and sewer that traverses the property for a proposed office and retail project that was never developed. A dedicated hike and bike trail extend along the west side of the property. A legal description, boundary and topographic survey are attached.

Most of the site is open with native grasses covering the ground with a few scattered trees. The ground surface slopes gently to the southwest from approximately elevation 115-ft to 116-ft.
Surrounding land uses:

North: Beaumont Ave. vacant land, single-family and commercial uses
South: Single-family residential
East: S. 1st Street, vacant land and single-family residences
West: 2nd Street (Collector), park land, commercial and retail

ENTITLEMENT PERMITTING

ZONING

The site is currently platted and consists of 9 lots. It’s zoned C-3 (General Business). The property will be rezoned to R-3A (multi-family).

A site plan and survey shall be prepared and submitted at the time of application for rezoning. After the Zoning Application is submitted (15 days before P&Z meeting) it is heard by P&Z with one public hearing. After which the City’s Board of Commissioner’s considers the zoning with public hearings and reading of the ordinance. Only 1 reading is required at each meeting. The P&Z meets the 1st and 3rd Tuesday of each month. The Board of Commissioners meet every 2nd and 4th Monday. The zoning approval can be expected within 45 to 60 days after application is made. Zoning requirements for R-3A can be found in Chapter 138-Zoning, Article V, Division 5 of the Code of Ordinances for R-3 district. [https://library.municode.com/tmccallen/codes/code_of_ordinances](https://library.municode.com/tmccallen/codes/code_of_ordinances)

PLATTING

In order to qualify for Plat approval, the plat must conform to the following conditions:

(1) There will be no more than four lots in the subdivision.

(2) All lots must front on an existing street.

(3) The subdivision does not require the creation of any new street.

(4) All lots will be served by existing municipal facilities (water, sewer, drainage).
Platting the property will be required. Owner has begun the re-platting process by submitting the application to the City of McAllen on 2/19/2020 (receipt #698691). The P&Z meets every first and third Tuesday of the month. Deadline submittal is 2 weeks before the P&Z meeting. The Zoning and Platting process can run concurrently. The plat, if approved, can be recorded within a few days after the P&Z meeting. Board of Commissioners approval is not required of the plat. The Platting process will take approximately 30 to 45 days. Subdivision procedures can be found in Chapter 134, Article 11 of the Code of Ordinances:

https://library.municode.com/tx/mcallen/codes/code_of_ordinances?nodeId=SPBLAUSREREAC_CH134SU_ARTIIPL

SITE DEVELOPMENT PERMITTING

The subdivision process is the process of dividing and splitting a tract of land into separate parcels. The usual purpose of subdividing is to permit the transfer of the subdivided piece to someone other than the owner of the original parcel. Application forms may be obtained from the Planning Department. Contact the Planning and Zoning Department for site Development requirements at (956)681-1250

- Energy Compliance Reports (ComCheck & Heating and cooling calculations) will be required for the building envelop for new construction or additions, lighting alterations and mechanical system installations.
- Architectural Barrier Registration with the Texas Department of License and Registration will be required for projects over $50,000 of construction cost.
- Reference the restaurant guide for restaurant building permit information.
- Asbestos surveys will be required for material removed in a commercial or demolition project as required by the Texas Department of state health services.
- Reference the restaurant guide for restaurant building permit information.

Development standards can be found in the City’s Code of Ordinances, Subpart B, “Land Use Regulations and Related Activities”: https://library.municode.com/tx/mcallen/codes/code_of_ordinances?nodeId=SPBLAUSREREAC
SITE PLAN

A formal Site Plan review is a City requirement and is approved by the Development Review Committee (DRC). They meet every Wednesday. Site Plan submittal are due no later than the Wednesday before (i.e. one week before). Submittals to the DRC include Engineering Site Plan and Utility Plan.

Site Plan submittal shall be done in accordance with Chapter 138, Article V, Division 5, Section 138-210:

Parking reduction can be realized for a senior’s project (i.e. 1 parking space per unit.) Once the DRC approval is obtained Construction Drawings can be prepared. Note: Parking reduction City of McAllen Code Ref: Sec. 138-395 (17).

(17) Elderly housing or assisted living facility: One parking space per living unit.

DRAINAGE

The site has been located on the Flood Insurance Rate Map (FIRM) No. 4803430005C effective date November 2, 1982 and is not within the 100-year flood zone (Zone B). Detention for storm water is required by the City. Discharge into the existing storm system is allowed. It will be connected using a 24-inch pipe and a restrictor.

UTILITIES

Water (8-inch) is provided by the City of McAllen (McAllen Public Utility Board) on the west side of S. 1st Street and within the interior of the site. The City of McAllen provides sanitary sewer services. A 12-inch line extends in a public easement along the north side of the property. An eight (8-inch) line is in an easement withing the interior of the site and on the east side of S. 1st Street.

Overhead electrical (both single and 3-phase) is available around the perimeter of the site. Natural gas is available off site, but the Developer does not require gas for this project.


**FIRE DEPARTMENT REQUIREMENTS**

The fire department requires the following:


2. If working on a monitored existing system, the contractor shall notify the McAllen Fire Dept. Dispatch at (956-681-2525) and inform them of the work being performed and provide the Permit number.

3. Inform all entities/occupants affected by the work being performed and shall be placed on Fire Watch Notice for the duration of work.

4. False Alarms caused as a result of the work being performed may result in a fine to the responsible Fire Protection contractor.

5. Upon completing of work on an existing system, the Fire Alarm system will be placed back in-service and McAllen Fire Dispatch will be notified of such to include all entities / occupants affected by the temporary shut-down.

6. New Hood installations must be monitored if an existing fire alarm system is present.

7. The system shall be pre-tested before scheduling an acceptance test which requires a 24 hr. advance notification.

8. Fire Protection Contractor shall have the Fire Department Issued Permit, required documentation, and the approved plans on site at the time of inspection.

9. If changes from the approved fire protection plans have been made, “As Built” documentation must be submitted at the time of inspection.


11. Permit expiration will be in accordance with the conditions outlined under Section [A] 105.3.1 of the 2012 International Fire Code.
PROPOSED OFFSITE IMPROVEMENTS

No offsite improvements are expected

INGRESS & EGRESS

The site will be accessed from Beaumont Avenue. This street has a 50-ft ROW. The existing street is curb and gutter with a paved with of 42-ft bc-bc. There are no plans to widen the street. There are no reimbursement dollars associated with this street. An exit only is planned for S. 1st Street, which also has a 50-ft wide ROW.

LANDSCAPING

Landscaping shall conform to Chapter 110, Article II of the Code of Ordinances:

https://library.municode.com/tx/mcallen/codes/code_of_ordinances?nodeId=PTII COORSUGEOR_CH110VE_ARTIIILA

A minimum of ten percent of the area of any lot or parcel shall be devoted to landscape material and comply with the intent and purpose of this article and 50 percent of such landscaped area for nonresidential lots shall be visible from the street front in the developed property. Landscape areas located within the street and alley rights-of-way shall not be credited towards meeting the minimum landscape area requirement. However, right-of-way areas shall be landscaped. Landscape areas associated with drainage detention facilities located on the lot or parcel may be credited towards the landscape area requirement. A minimum of 50 percent of the area within the required front yard of any residential parcel shall be devoted to landscape material. The portion of the front yard for any residential parcel located between the property line and the extension of the side yard setback line shall be devoted to landscape material.

A landscape strip area with a minimum width of ten feet shall be provided along and within the property lines of all nonresidential and multifamily uses contiguous to a public street, excluding driveway entrances and exits. For properties having a lot depth of less than 200 feet, the landscaped strip may be reduced to a
minimum width of five feet with a landscape hedge not exceeding three feet in height

The City does have a tree ordinance. Tree credits can be obtained by preserving existing trees. Credit for trees can be found in Sec. 110-51. - Credit for trees of the referenced Code.

**SIGNAGE**

Signage for the project is anticipated to include ground supported Monument Signs. No obstacles are anticipated to obtain a Sign Permit.

A fully completed Sign permit application is required. The application can be found at the following link Sign Permit Application or obtained at the Building Permit and Inspections office. Along with the Sign permit application the following documents may be required if applicable.

- Sign Permit Application
- Sign Details (includes installation details)
- Sight Plan (applicable for freestanding signs)
- Engineered Plans (structural when applicable)

**BUILDING PERMIT & PLAN REVIEW**

A fully completed building permit application is required. The application can be found at the following link: (Building Permit Application) [https://library.municode.com/tx/mcallen/codes/code_of_ordinances?nodeId=SPBLAUSREREAC](https://library.municode.com/tx/mcallen/codes/code_of_ordinances?nodeId=SPBLAUSREREAC)

Or may be obtained at the Building Permits & Inspection office. Along with the building permit application the following documents may be required if applicable.

- Site Development
- Civil Plans
- Architectural Plans
- Engineered Plans (M.E.P. & Structural)
- Energy Compliance Reports
- Architectural Barrier Registration
- Asbestos Survey
Reference the commercial submittal checklist (which is included in the attachments) for additional information.

Review time will be approximately 10 to 15 days assuming the submittal is complete. The City will notify when the plan has been approved or disapproved.

The following codes are effective for McAllen:

- 2012 International Building Code
- 2012 International Energy Conservation Code
- 2011 National Electrical Code
- 2012 International Mechanical Code
- 2012 International Residential Code
- 2012 International Existing Building Code
- 2012 International Plumbing Code
- 2012 International Fuel Gas Code
- 2012 International Fire Code

CITY FEES

The City of McAllen has reimbursement fees and park/landscape fees. The summary of fees is estimated to be the following:

- Building Permit, Plan Review, & Plat Fees: $ 65,000
- Inspection Fees: $ 6,000
- Park/Landscape $700/unit: $ 65,100
- Impact/ Water Meters/Tap Fees: $125,000

PHASE I ENVIRONMENTAL ASSESSMENT

A Phase I ESA was performed by another Consultant. The results indicated there were no Recognized Environmental Conditions (REC). A copy of that report will be presented in the Developer’s Application.
ONSITE & OFFSITE COST ESTIMATES

The estimated onsite construction costs including earthwork, storm drainage, utilities, and paving is $1,154,735. No Offsite costs are expected.

SUMMARY

The developer and development team have completed a specified amount of due diligence as identified in the Texas Department of Housing and Community Affairs (TDCHA) Additional Evidence of Preparation to Proceed Chapter 10, Subchapter C, Section 5, “Site Design and Development Feasibility Report”. We have concluded that this site will accommodate the proposed project. This conclusion is based on the following:

- Conversations and meetings with the City staff along with the Developer
- Review of information made available by others
- Review of the ordinances, design requirements, and utility availability
- Preliminary Site Plan and contours of the site

This summary letter may be relied upon only by the Developer/Client; it is not intended for use by any other party. The Client may use this letter as part of its due diligence, but this report should not be used as the sole basis for the Client's decision making. We endeavored to research site development issues and constraints to the extent practical given the scope, budget, and schedule agreed to with the Client. New issues may arise during development because of changes in governmental rules and policy, changed circumstances, or unforeseen conditions.

We trust this provides you with the information needed at this time. If you have any questions or comments, please call.

Respectfully submitted,

CARNEY ENGINEERING, PLLC

T. Craig Carney, P.E.
ATTACHMENTS

Aerial
Survey
Recorded Plat
Civil Engineering Site Plan
FEMA Flood Map
City Flood Zone Map
TDHCA Onsite Cost Estimate
S. 1ST STREET
(50' R.O.W.)

LINE TABLE

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Approximate Site Location - Avanti Legacy Valor Heights

Flood Zone: X500
Community Panel No.: 4803430005C

Avanti Legacy Valor Heights - Flood Zone Map

1/2/2020, 10:40:27 AM

City Corporate Limits
Extra Territorial Jurisdiction

Major Roads - 12K
Major Roads 12K
FEMA Q3

A - 100 - Yr Flood Plain (A) High Risk 1% Chance annual flood event

McAllen GIS Division, ESRI, Inc., McAllen GIS Division, ESRI, Inc.
# Site Work Cost Breakdown

This form must be submitted with the Development Cost Schedule as justification of Site Work costs.

**Column A:** The Site Work activity reflected here must match the Site Work activity reflected in the Development Cost Schedule.

**Columns B and C:** In determining actual construction cost, two different methods may be used:

- The construction costs may be broken into labor (Column B) and materials (Column C) for the activity; **OR**
- The use of unit price (Column B) and the number of units (Column C) data for the activity.

**Column D:** To arrive at total construction costs in Column D:

- If based on labor and materials, add Column B and Column C together to arrive at total construction costs.
- If based on unit price measures, Column B is multiplied by Column C to arrive at total construction costs.

**Column E:** Any proposed activity involving the acquisition of real property, easements, rights-of-way, etc., must have the projected costs of this acquisition for the activity.

**Column F:** Engineering/architectural costs must be broken out by the Site Work activity.

**Column G:** Figures for Column G, Total Activity Cost, are obtained by adding together Columns D, E, and F to get the total costs.

**"This form must be completed by a Third-Party engineer licensed to practice in the State of Texas. His or her signature and registration seal must be on the form."**

For Site Work costs that exceed $15,000 per Unit and are included in Eligible Basis, a CPA letter allocating which portions of those site costs should be included in Eligible Basis and which ones may be ineligible must be submitted behind this tab.

<table>
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<th>A. Activity</th>
<th>B. Labor or Unit Price</th>
<th>C. Materials or # of Units</th>
<th>D. Total Construction Costs</th>
<th>E. Acquisition Costs</th>
<th>F. Engineering / Architectural Costs</th>
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Signature of Registered Engineer: 2-20-20

T. Craig Carney, P.E.

Date: If a revised form is submitted, date of submission: