



Town of Knightdale

Staff Report

Title: Lyndon Oaks Planned Unit Development (ZMA-2-23)

Staff: Gideon Smith, Senior Planner

Date: July 17, 2024

Director Signature: JB

Asst. Town Manger Signature:

Town Manager Signature:

I. REQUEST:

Parker Poe, on behalf of DR Horton, has submitted an application requesting a Zoning Map Amendment to rezone approximately ±171.88 acres consisting of seven tracts of land located at 940 Bethlehem Road and Wake County PINs 1743-95-3683, 1743-97-1085, 1753-07-1583, 1743-97-6575, 1753-15-2116, 1743-98-9384, and 1743-98-6356, from Rural Transition and GR3 to Residential Mixed-Use Planned Unit Development to allow for the construction of up to 500 residential lots and approximately 15,000 square feet of neighborhood serving commercial uses.

II. PROJECT PROFILE:

PROPERTY LOCATION:	0 & 940 Bethlehem Rd; 0, 4325, & 4313 Old Faison Rd; 106 Tart Farm Rd
WAKE COUNTY PIN:	1743-95-3683; 1743-97-1085; 1753-07-1583; 1743-97-6575; 1753-15-2116; 1743-98-9384; 1743-98-6356
CURRENT ZONING DISTRICT:	Rural Transition (RT); General Residential Low-Density (GR3)
PROPOSED ZONING DISTRICT:	Residential Mixed-Use Planned Unit Development (RMX-PUD)
DENSITY PERMITTED:	18 units/acre
NAME OF PROJECT:	Lyndon Oaks
APPLICANT:	Ashley Terrazas, Parker Poe
PROPERTY OWNERS:	Ferrell Family; Harper Family; Tart Family; Lee T. Alford
DEVELOPER:	DR Horton
PROPERTY SIZE:	171.88 acres
CURRENT LAND USE:	Vacant/Undeveloped; Agriculture; Forestry; Residential
PROPOSED LAND USE:	482 residential units proposed (500 maximum) and 15,000 square feet of neighborhood serving commercial uses
PROPOSED DENSITY:	2.80 units/acre proposed (2.91 units/acre maximum)
PROPOSED OPEN SPACE	21.40 acres

III. BACKGROUND INFORMATION:

Town Council, at their April 18, 2024 Joint Public Hearing, granted a continuance, at the request of the Applicant, so that the Master Plan could be refined based on staff recommendations. A Joint Public Hearing was then held on May 16, 2024, followed by LURB recommendation on June 10, 2024. The specific changes to the Master Plan since these meetings have been highlighted (in red) throughout the Staff Report for Council review.

The Planned Unit Development District (PUD) is a re-zoning process which is designed to encourage master planning of development and to coordinate such development to manage the impacts of the development on the provision of Town Services and infrastructure. The PUD encourages creativity and innovation in the design of developments, but in return for this flexibility the expectation is for communities to provide exceptional design, character, and quality; provide high quality community amenities; incorporate creative design in the layout of buildings; ensure compatibility with surrounding



Town of Knightdale

Staff Report

land uses and neighborhood character; encourage the creation of mixed density neighborhoods, neighborhood nodes, and mixed use centers; further the goals of the KnightdaleNext 2035 Comprehensive Plan including the Growth Framework and Growth & Conservation maps; and provide greater efficiency in the layout and provision of roads, utilities, and other infrastructure.

There are several provisions which are required to be addressed by the Applicant in the PUD, including, but not limited to design guidelines, proposed alternative means of compliance, dimensional standards, public facilities, recreational open space, and Comprehensive Plan consistency. The Applicant’s specific exceptions are detailed in **Section VII** of this Staff Report.

IV. PROJECT SETTING – SURROUNDING ZONING DISTRICTS AND LAND USES:

The proposed rezoning features seven parcels located on the southern and western sides of Old Faison Road and Bethlehem Road, respectively. These parcels are located within the Town’s Extra Territorial Jurisdiction and, if approved, would require annexation into Corporate Limits.

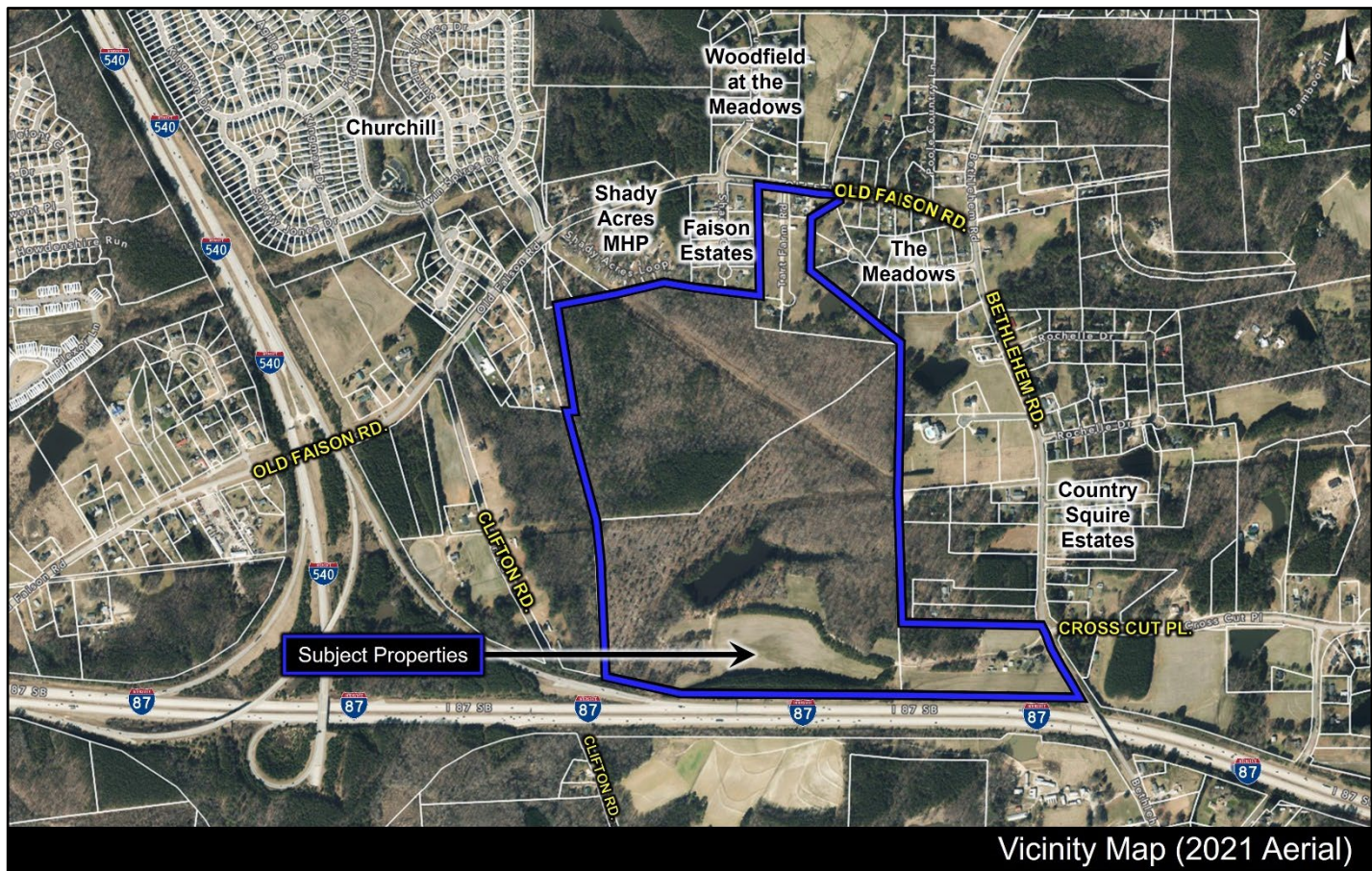
DIRECTION	LAND USE	ZONING
North	Residential	GR3; RT
South	I-87; Agriculture	RT; RR1
East	Vacant; Agriculture; Residential	RT; GR3
West	Agriculture; Residential	RT





Town of Knightdale

Staff Report



Vicinity Map (2021 Aerial)

V. PROPOSED MASTER PLAN:

The applicant has submitted a full Master Plan in accordance with Section 12.3.F of the UDO. The Applicant is proposing a residential development consisting of 100 front-loaded single-family homes (reduced from 105), 109 rear-loaded single-family homes (reduced from 131), 247 townhomes (increased from 242), and 26 duplexes (increased from 22), for a total of 482 units (reduced from 500). The reduction in total number of residential units was a result of staff recommendations that were published in the April 18, 2024 Town Council Agenda Packet. Even though the total number of units have been reduced on the revised Master Plan, the Applicant requests to reserve the right to construct up to a maximum of 500 residential units, provided that the design and layout remain largely consistent with the Master Plan, and all other regulations are met.

In addition to the proposed residential units, a future ± 1.77 -acre parcel (increased from ± 0.6 -acre) for an approximately 15,000 square foot neighborhood serving commercial development is reserved at the corner of Bethlehem Road/Cross Cut Place/Southern Site Access. Additional information regarding the permitted uses, dimensional standards, design standards, and revised zoning conditions is detailed in **Section VII** of this Staff Report. The developer and staff met multiple times early in and throughout the process as the plan evolved. Further analysis of the site plan is detailed below.



Town of Knightdale

Staff Report

Lyndon Oaks Proposed Master Plan (May 16, 2024)





Town of Knightdale

Staff Report

Lyndon Oaks Revised Master Plan (July 17, 2024)





Town of Knightdale

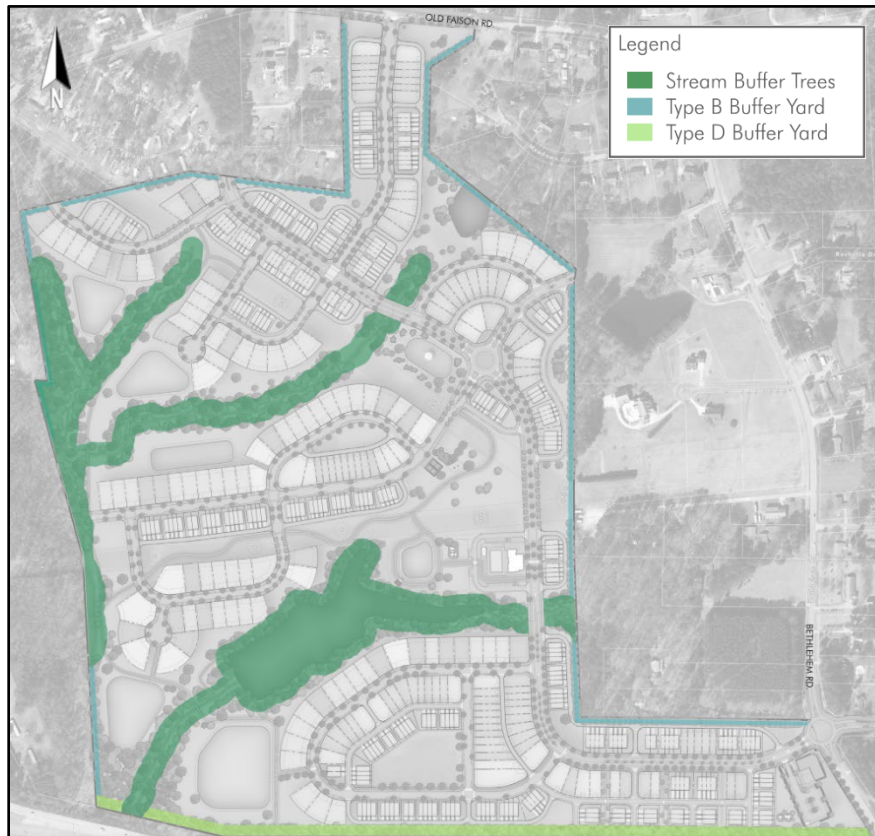
Staff Report

STAFF SITE PLAN ANALYSIS:

Staff has reviewed the plan for UDO consistency and found the site plan is generally compliant with the required provisions. Please note adjustments have been made to the Master Plan as a result of comments made at the May 16, 2024 Joint Public Hearing, which are noted in **red** in the subsequent sections of this Staff Report. Further modifications to the Master Plan are required as noted herein.

Landscaping & Tree Preservation (No changes since May 16, 2024 JPH)

The Applicant has demonstrated general compliance with the Buffer Yard and Screening requirements across the entire site. As proposed, a 20-foot Type B Buffer, made up of existing vegetation and supplemented with new plantings where necessary, will remain around the perimeter of the site, with the exception of the southern property boundary adjacent I-87, where a 50-foot Type D Buffer is required and proposed. The required 20-foot Type B Buffer will also serve as screening for any alleys along the perimeter of the subject properties.



Based on preliminary calculations of the perimeter of this site, a minimum of 3.7% (6.46 acres) tree cover is required. These areas of preserved tree cover are generally adjacent to the existing creeks, ponds, and wetlands, and within required landscape buffers found on the subject property. According to the revised Master Plan, approximately 11.3% (19.39 acres) of the site is proposed to remain protected as tree cover area. The amount of protected tree cover area has increased since the April 18, 2024 Master Plan (from 10.8%; 18.64 acres) as the required buffer areas were not previously factored into the tree cover calculation. These areas are highlighted in various shades of green on the graphic above.

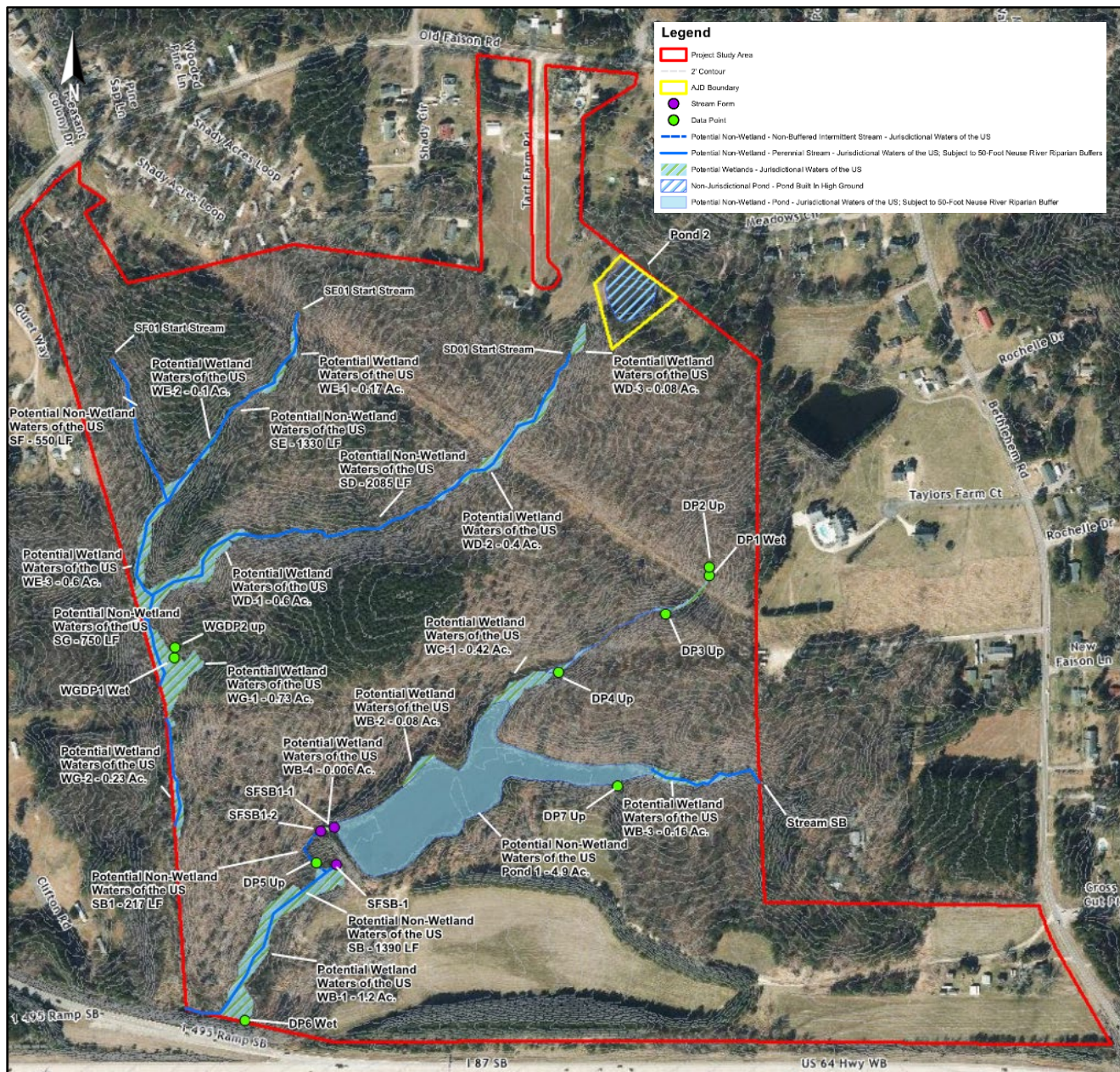


Town of Knightdale

Staff Report

Environmental Features (No changes since May 16, 2024 JPH)

The site features blueline streams and wetlands, where development activity is limited or outright prohibited, which will provide a natural buffer in areas. More than 18 acres of existing vegetation will be maintained through construction. Based upon the design of the project, pods of residential development have been created to avoid additional impacts to the site's streams and wetlands. The design places the SCMs and residential lots outside of these environmentally sensitive areas, but places certain roadways and greenways and associated improvements within these areas to provide connectivity throughout the site. The Applicant will be responsible for complying with all federal, state, and local regulations as they pertain to streams and wetlands.





Town of Knightdale

Staff Report

Architectural Standards & Elevations *(Changes since May 16, 2024 JPH)*

The Applicant submitted a detailed list of architectural standards for all residential buildings. Staff reviewed these proposed standards, provided examples of other successful projects in Knightdale, and provided suggestions on other elements that could be included to further align the proposed architecture with those successful projects. At the time of drafting this staff report, additional improvements to these standards may be recommended. Example elevations from DR Horton are provided in the attached PUD document and on Pages 10 and 11 of this Staff Report. Upon submission of building permits, should elevations be inconsistent with previous approvals, permits may not be issued.

In addition, the Applicant submitted revised zoning conditions to be applied to the commercial outparcel in lieu of architectural standards and elevations since a builder and/or tenant have not been identified. These conditions will be reviewed and applied when a development proposal is submitted for the commercial outparcel. A complete list of offered zoning conditions can be found in **Section VII** of this Staff Report.

Proposed Residential Architectural Standards

The Applicant revised the proposed Residential Architectural Standards that were included in the April 18, 2024 and May 16, 2024 Town Council Agenda Packets. Those revised standards are outlined below, with additions in **red**.

STANDARDS FOR ALL HOMES:

1. All homes will have a combination of two or more of the following materials on the front facade (not including foundation) unless the home is only stone or brick:
 - a. Stone
 - b. Brick
 - c. Lap Siding
 - d. Shakes
 - e. Board and Batten
 - f. Window Pediments
 - g. Recessed Windows
 - h. Side and/or Front Window Box Bays
 - i. Roof Gables
 - j. Roof Dormers
 - k. Roofline Cornices
 - l. Metal Roofing as Accent
 - m. Column
 - n. Shutters
 - o. Fiber Cement Siding
2. The exterior siding material on the side and rear facades will be fiber cement. When two materials are used, the materials shall be different but complimentary colors.
3. Vinyl is prohibited except for window trim, soffits, fascia, and/or corner boards.
4. Main roof pitches (excluding porches) will be at least 6:12.
5. For every 30 feet (or fraction) of continuous side elevation (calculated on a per floor basis), there shall be one window or door added to the side elevations. Any siding break on the side of the home such as a fireplace, side porch, wall offsets could be used as an alternative to windows.
6. Anti-monotony provisions: in order to promote variation in home appearances, no home located adjacent, across the street, or diagonal shall have the same elevation and color combination.
7. All front doors shall have glass inserts, transoms, or glazing.
8. There shall be a minimum 12" overhang on every gable end.
9. Each front entrance shall contain a covered stoop or porch.



Town of Knightdale

Staff Report

10. Foundation shall be raised to a minimum height of 18 inches above finished yard grade in the front and shall contain a minimum of 2 stair risers up to the front porch. Foundations will be wrapped in brick or stone on all sides. Areas under front porches may be enclosed with lattice or other decorative form of screening to match architectural style.

STANDARDS FOR SINGLE-FAMILY DETACHED FRONT-LOADED HOMES:

1. Single-family 2 story homes will have a minimum heated area of 1,900 square feet.
2. Single-family 1 or 1.5 story homes will have a minimum heated area of 1,600 square feet.
3. All homes will have a front porch with a minimum depth of 6 feet, which may encroach up to 6 feet in the front setback. Front porch posts will be at least 6"x6".
4. Garages will not protrude more than 6 feet from the front porch stoop, unless an alternative is approved by staff.
5. All garage doors shall contain window inserts and decorative hardware.
6. Garages will not exceed 50% of the front façade width or will be split into two bays.
7. All homes shall have a minimum 100 square foot patio, deck, terrace, or courtyard.
8. A minimum of 33% of homes shall include stone or brick as a front façade material.

STANDARDS FOR SINGLE-FAMILY DETACHED REAR-LOADED HOMES:

1. Homes will have a minimum heated area of 1,500 square feet, except up to 50% of rear-loaded single-family detached homes may have a minimum heated area of 800 square feet.
2. All homes will have a front porch with a minimum depth of 5 feet, which may encroach up to 6 feet in the front setback. Front porch posts will be at least 6"x6".

STANDARDS FOR TOWNHOMES AND DUPLEXES:

1. Townhomes shall be at least 2 stories with rear loaded garages with a minimum heated area of 1,100 square feet.
2. All townhouse units shall provide detailed design elements using at least one (1) of the features from each of the four categories below:
 - a. Entrance
 - i. Recessed entry with 6" minimum width door trim
 - ii. Covered porch with 6" minimum width pillars/posts/columns
 - b. Building Offset
 - i. Façade offset
 - ii. Roffline offset
 - c. Roof
 - i. Dormer
 - ii. Gable
 - iii. Cupola/Tower/Chimney
 - iv. Decorative cornice of roof line (flat roof only)
 - d. At least two (2) of the following façade elements:
 - i. Bay window
 - ii. Balcony
 - iii. Porch
 - iv. Shutters
 - v. Window trim with 4" minimum width
 - vi. Patterned finish (scales, shakes, wainscoting, brick, or stone)
3. Townhomes shall have a front porch with a minimum depth of 4 feet.



Town of Knightdale

Staff Report

*Example Elevations of Proposed Single-Family Detached Housing Product
(No changes since May 16, 2024 JPH)*





Town of Knightdale

Staff Report

*Example Elevations of Proposed Single-Family (Smaller) Detached Housing Product
(No changes since May 16, 2024 JPH)*



*Example Elevations of Proposed Single-Family Attached Housing Products (Townhomes)
(No changes since May 16, 2024 JPH)*



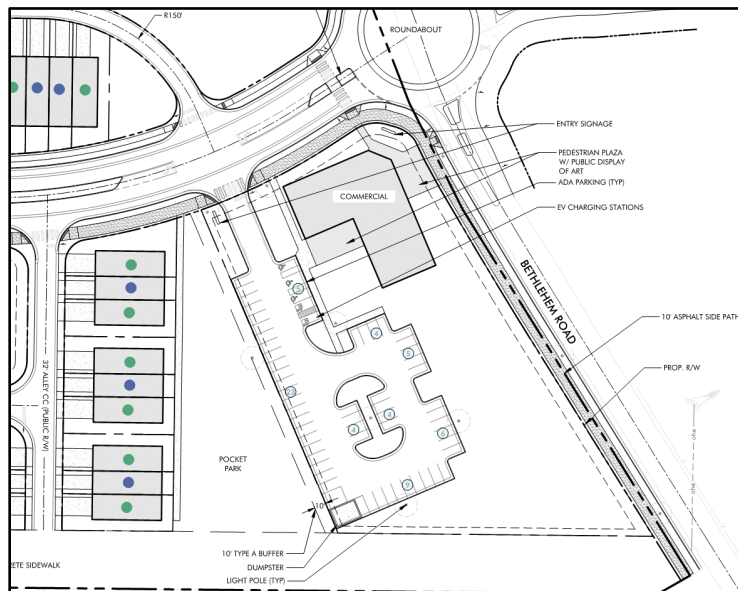
Commercial Outparcel (No changes since May 16, 2024 JPH)

An approximately ±1.77-acre parcel (increased from 0.6-acre) has been reserved for future commercial use at the southwest corner of Bethlehem/Cross Cut Place/Southern Site Access. The design of this building will be dependent upon potential uses, but shall conform to all UDO standards, including parking, landscaping, lighting, building orientation, and more. The uses permitted on the outparcel are outlined in **Section VII**, and will encourage small, locally owned businesses to support the needs of current and future residents.



Town of Knightdale

Staff Report



According to the revised zoning conditions offered by the Applicant that apply to the commercial outparcel, the commercial outparcel will be pad ready with utility connections made during Phase 1 of the residential development. Once a tenant or builder is identified for the commercial outparcel, a development plan will be submitted for review and approval by Town staff and other typical review agencies.

Phasing Plan (No changes since May 16, 2024 JPH)

The developer of Lyndon Oaks proposes to construct the neighborhood and commercial outparcel in a series of four phases, as shown on the Master Plan below.





Town of Knightdale

Staff Report

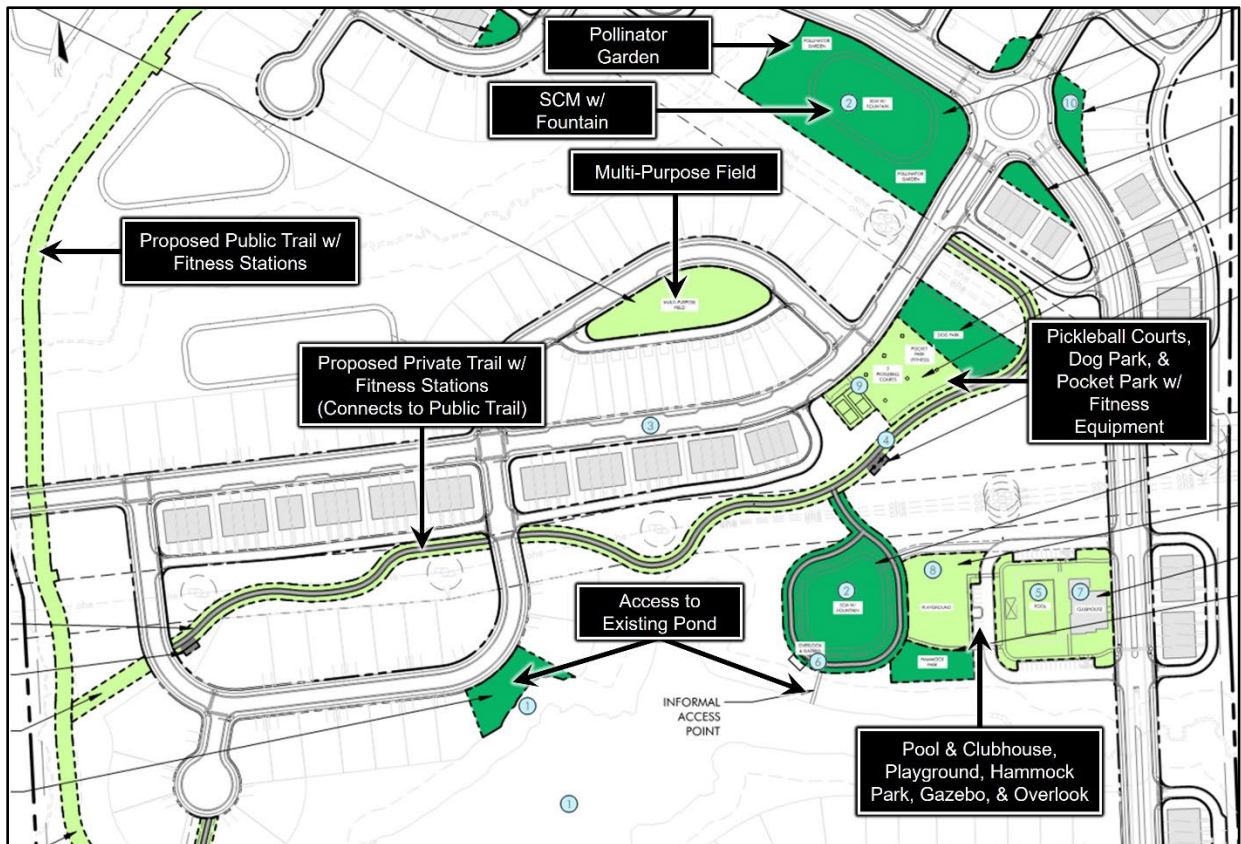
Open Spaces *(Changes since May 16, 2024 JPH)*

A variety of recreational open space amenities are provided throughout the development, including active open spaces such as public and private greenway trails with fitness stations, a clubhouse with a swimming pool, a playground area, pickleball courts, fitness areas, and a multi-purpose field. Additional passive open spaces include a dog park, a private walking trail with a gazebo and overlook, a pollinator garden, a bench swing park, a hammock park, several pocket parks, a village green, public art, and areas with seating.

In terms of the location of the clubhouse amenity center, Section 11.2.B.2 of the UDO states that recreational open space shall be planned and improved to provide focal points for a neighborhood and are centrally located so that they are accessible and usable by persons living within a half mile walking distance.

Staff Analysis (April 18, 2024 Master Plan): *One of the purposes of this requirement is to assist with providing more equitable access to neighborhood amenities regardless of the location of one's home. In order to comply with Section 11.2.B.2 of the UDO, the Applicant should continue to explore alternative options for a more centrally located amenity center or evaluate other locations for a second amenity center.*

Applicant Response: *The layout of the proposed development was revised to relocate the amenity center to a central location along the future Widewaters Parkway. (Graphic revised to reflect current proposal)*





Town of Knightdale

Staff Report

Staff Analysis: *The proposed location sites the amenity center in a central location that concentrates the majority of the neighborhood’s amenities towards the center of the development, satisfying the requirements of Section 11.2.B.2 of the UDO, and providing more equitable access to these neighborhood amenities.*

A total of 17.26 acres of active and passive open spaces are required for the development based on the reduction in proposed units incorporated into the revised Master Plan (500 units; 17.90 acres of open space reduced to 482 units; 17.26 acres of open space). Although the minimum requirement has been reduced, the Applicant proposes a total of 21.40 acres of open space (prev. 21.53 acres), which exceeds the total amount required for 482 residential units, as well as the amount required for 500 residential units.

The Applicant has illustrated the general location of all active and passive open spaces on the Master Plan and has demonstrated that there is sufficient land area to accommodate the required recreational areas; however, further definition of the proposed active recreation elements within each open space area may be necessary to comply with the Section 11.2.B.7 of the UDO. The (updated) graphic on the previous page of this Staff Report illustrates several of the proposed open space elements towards the center of the site (see the overall Master Plan for all open space locations and elements).

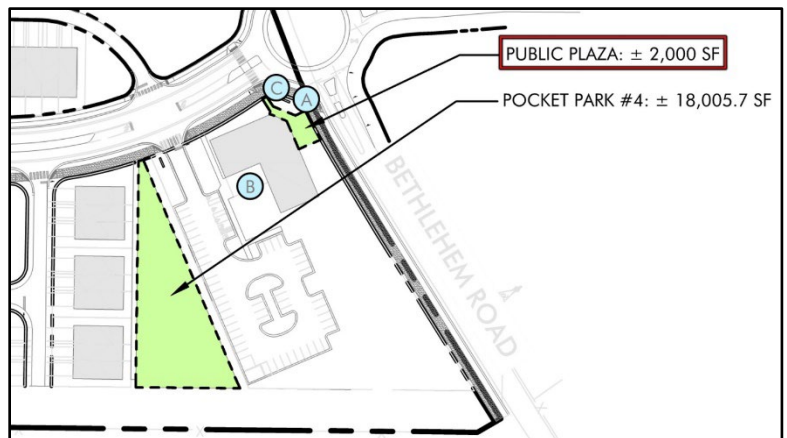
Public Gathering Spaces (Commercial Outparcel) (No changes since May 16, 2024 JPH)

Commercial and mixed-use developments must include an area of public gathering for employees, patrons, and other users. This is intended to further activate the public realm and encourage more outdoor activity. According to the UDO, public gathering spaces shall be integrated into the overall site design and be framed or defined by the building(s). The Applicant has revised the location of the proposed 2,000 square-foot public gathering area to situate the area between the commercial building and Bethlehem Road. This is approximately 4-times the amount of public gathering area required by the UDO.

Staff Analysis (April 18, 2024 Master Plan): *The UDO requires public gathering areas to be integrated into the overall site design and be framed by the buildings. Based on the proposed location shown on the [April 18, 2024] Master Plan, the Applicant should explore the feasibility shifting the public gathering area to the front side of the commercial building adjacent to Bethlehem Road or including an additional public gathering area to the front of the commercial building.*

Applicant Response: *The location of the proposed public gathering area has been relocated to the front of the commercial building adjacent to Bethlehem Road.*

Staff Analysis: *The proposed public gathering area location complies with the locational criteria for public gathering areas associated with Mixed-Use Building Type Standards. Once a builder/tenant is identified for the commercial outparcel, a*





Town of Knightdale

Staff Report

development plan will be submitted and reviewed for compliance with all public gathering area criteria prior to any approval, including the activation elements.

Parking (Changes since May 16, 2024 JPH)

The Applicant proposes to satisfy the parking requirements for the residential portion of the site through 20-foot-long driveways and private garages for rear-loaded housing types, 25-foot-long driveways and private garages for front-loaded housing types, and approximately 230 on-street parking spaces (prev. 220) distributed across many of the public street throughout the development. It is important to note that the Applicant requests a Site Development Allowance to reduce the driveway length from 35-feet for front- and rear-loaded housing types. This specific request is outlined in Site Development Allowance Request #2 on Page 18 of this Staff Report.

Applicant Response: The driveway lengths for front-loaded housing types have been increased from 20-foot- to 25-foot-wide driveways on the revised Master Plan. The 20-foot-wide driveways for rear-loaded housing types remain the same as originally proposed.

Staff Analysis: The proposed increase in driveway width for front-loaded housing types is consistent with recent development proposals approved by Town Council.

Although the UDO does not prescribe an on-street parking standard, staff recommend 0.5 dedicated parking spaces beyond what is provided on each lot by way of driveways and garages. Additional parking will be provided at the commercial outparcel when a design is finalized and will be required to meet all parking standards when developed.

Staff Recommendation (April 18, 2024): To increase on-street parking options for all residents throughout the development, staff recommend adding on-street parking to Road I.

Applicant Response: Five on-street parking spaces have been added to Road I.





Town of Knightdale

Staff Report

Staff Analysis: The available locations to add additional on-street parking spaces are limited based upon housing type design and layout (unable to provide on-street parking when front-loaded houses are present) and the presence of the Duke Energy powerline easement bisecting the road. The five additional on-street parking spaces bring this road into greater compliance with the UDO and provide additional parking options for residents along this road.

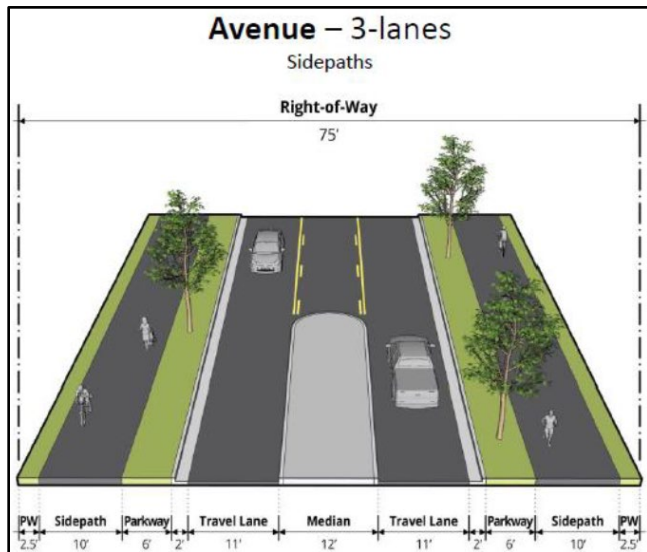
Pedestrian Connectivity *(Changes since May 16, 2024 JPH)*

In order for walking to be a viable transportation choice for local trips, circulation routes must be safe, convenient, and highly connected. Pedestrian circulation and connectivity should primarily take place adjacent to planned streets within the right-of-way; however, a considerable amount of pedestrian activity also takes place on-site, where vehicle speeds are lower but the numbers of potential conflict points are higher.

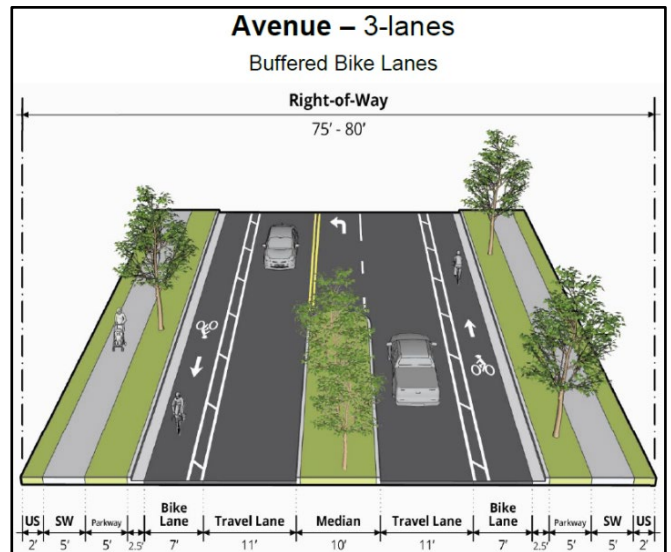
The Applicant proposes a residential neighborhood with 5- and 6-foot-wide sidewalks along all public roads, which is generally consistent with the UDO.

Staff Recommendation (April 18, 2024): Throughout the Master Plan review, staff informed the Applicant that the Comprehensive Transportation Plan (CTP) and UDO do not call for a sidepath along this portion of the Widewaters Parkway Extension, and therefore, the Avenue – Sidepaths Cross-Section should not be constructed. Instead, it is staff’s recommendation to construct the Avenue – Buffered Bike Lane Cross-Section and explore the option of expanding the right-of-way from 75 feet to 80 feet to account for a ten-foot-wide sidepath on one side of the street.

April 18, 2024 Proposed Cross-Section



May 16, 2024 Proposed Cross-Section



Applicant Response: The proposed roadway cross-section for Widewaters Parkway and site design has been modified to comply with the CTP, UDO, and staff recommendations.



Town of Knightdale

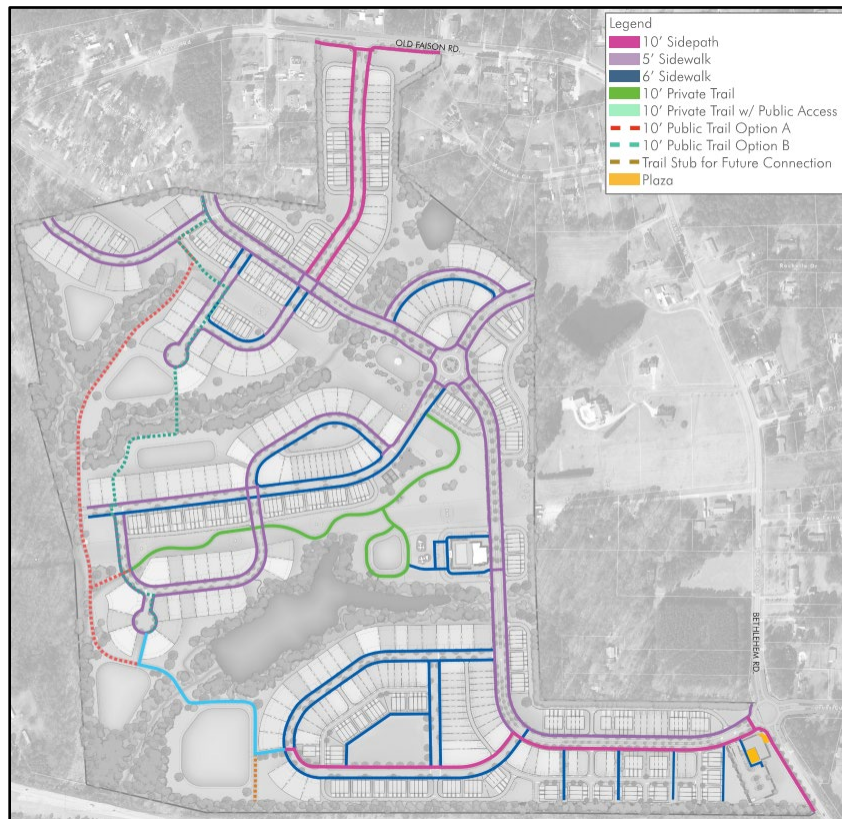
Staff Report

Staff Analysis: The Avenue – Buffered Bike Lane Cross-Section is the appropriate roadway cross-section to build based on previous analyses conducted through the Town’s Comprehensive Transportation Plan (CTP).

In addition to the sidewalks and multi-use paths within public rights-of-way, the Applicant proposes a ten-foot-wide north/south public trunk-line greenway along the western side of the site adjacent to the site’s streams and wetlands as required by the CTP and the UDO. Two routing options have been provided for this public trunk-line greenway – Option A, which meets the spirit and intent of the CTP and the UDO, and Option B, which is not consistent with the CTP and UDO. According to the Applicant, Option B has been provided for consideration in case the environmental permitting through the United States Army Corps of Engineers (USACE) is not achievable based upon the developer’s cumulative stream and wetland impacts across the entire site.

According to the CTP and UDO, the north/south public greenway will continue through the subject property, cross I-87, and continue southward as development occurs. To help facilitate and realize the vision of this public greenway corridor, the Applicant offers a condition that prior to approval of construction drawings for the first phase of the development, the Applicant will offer a minimum of 100 square feet of site area as a non-exclusive, permanent easement area to be dedicated to the Town for construction, maintenance, and repair of footings for a future pedestrian bridge over I-87.

The Applicant also proposes a network of private trails to connect residents to the public greenway, as well as a variety of recreational opportunities throughout the site. **Below graphic updated to reflect current proposal.**

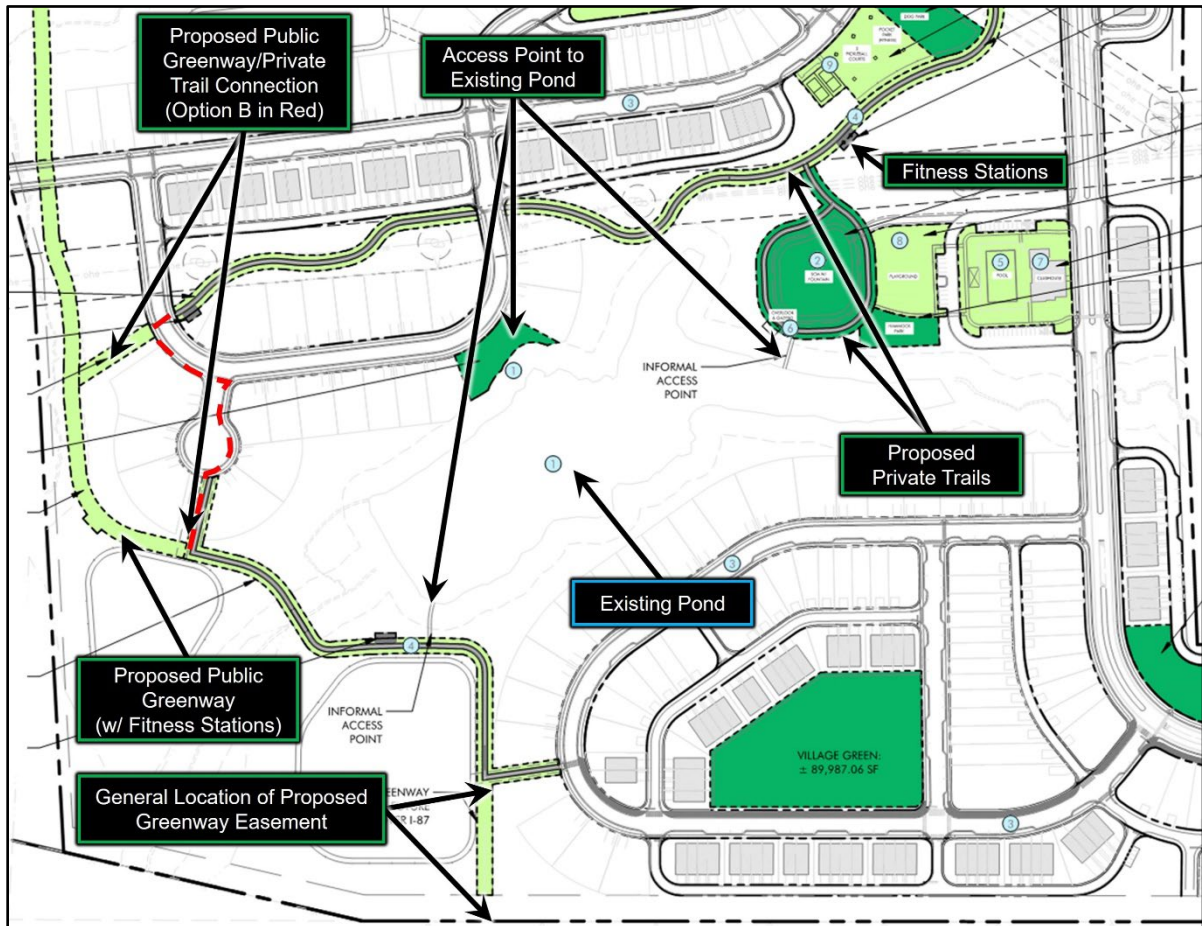




Town of Knightdale

Staff Report

Staff Analysis (April 18, 2024): To increase pedestrian connectivity throughout the site, staff encourages the Applicant to continue to explore the feasibility of connecting the private trail network to the public trail network through the powerline easement that runs east to west along the middle of the site. Staff also encourages the Applicant to continue to explore the feasibility of adding a trail around the existing pond towards the south-central portion of the site. Below graphic updated to reflect current proposal, which addresses staff comments.



Applicant Response: The private trail network has been revised to extend through the powerline easement and connect to the proposed public greenway trail in the general location shown on the above graphic. The revised Master Plan also provides an Option B route (similar to the requested optionality for the public greenway corridor described on Page 17 of this Staff Report) for this private/public trail connection for consideration in case the environmental permitting through the United States Army Corps of Engineers (USACE) is not achievable based upon the developer's cumulative stream and wetland impacts across the entire site. A formal paved trail around the existing pond presents challenges in terms of environmental impacts and potential negative effects to the existing pond's stability. In lieu of a formal paved trail, the Applicant revised the Master Plan to include a passive open space area near the northwest portion of the pond so residents can still access the pond and enjoy its natural beauty (see above graphic).



Town of Knightdale

Staff Report

Staff Analysis: The revised private trail network increases pedestrian connectivity through the site and allows residents to join the public greenway trail via a more natural setting rather than using a roadside sidewalk. Staff support this public/private trail connection as it has been proposed to implement the recently adopted Transportation related Zoning Text Amendment (ZTA-1-24). Staff also support the request for optionality but will continue to encourage the Applicant to prioritize the construction of Option A for both the public and private trail networks. In terms of the paved trail around the existing pond, the Applicant indicated that additional informal access points can be provided at select areas (in addition to the passive open space area to the northwest) so residents can still embrace the natural beauty of the pond in the absence of a formal, paved trail. Staff support these informal access points because it is an opportunity to balance environmental protection (selective clearing per USACE regulations) with amenitizing an existing natural feature for the benefit of the community. Staff recommend these informal access points are identified on the Master Plan. **These informal access points have been identified.**

VI. LEGISLATIVE CASE PROCEDURES: (No changes since May 16, 2024 JPH)

Staff met with the development team in December of 2022 to discuss the potential of a project at this location and worked with them through several preliminary sketch plan details. A Planned Unit Development rezoning is a legislative public hearing, which requires certain application procedures including having a pre-application meeting with staff and holding a neighborhood meeting with any property owners within 200 feet of the outer boundaries of the subject development. Below is a timeline of the required elements.

- Pre-application meeting: December 21, 2022
- Required Neighborhood Meeting: November 14, 2023
- Voluntary Neighborhood Meeting: April 4, 2024

The required neighborhood meeting was held on November 14, 2023 at 6:00 PM at the Hampton Inn & Suites Knightdale, located at 405 Hinton Oaks Boulevard, Knightdale. Approximately 40 members of the public attended this meeting. A copy of the mailed notice and the list of recipients are attached as part of the application packet, and a summary of the meeting has been provided as part of the Applicant's PUD Book.

The Applicant elected to hold a voluntary neighborhood meeting, which was held on April 4, 2024 at 7:00 PM at the Knightdale Recreation Center, located at 101 Lawson Ridge Road, Knightdale. The purpose of this voluntary neighborhood meeting was for the Development Team to provide nearby residents and property owners updates and information regarding the proposal, and to give those in attendance the opportunity to provide additional feedback based on the revised Master Plan. Approximately 12 members of the public attended this meeting. A copy of the mailed notice, the list of recipients, and a summary of the meeting are attached as part of the application packet.

Following the formal submittal and review of the proposed Master Plan and PUD document, the Applicant met with the Development Review Committee (DRC) on December 14, 2023 to discuss the technical comments and details associated with the proposed plan. Staff discussed with the Applicant concerns involving greenway alignment and maintenance responsibilities, open space requirements and amenities, driveway locations, roadway cross-sections and intersection design, cross-access requirements, and commercial outparcel building design and location. The DRC voted unanimously to **continue** the proposal pending the Applicant addressing the review comments and Town Council approving the Rezoning request.



Town of Knightdale

Staff Report

Additionally, the Town of Knightdale followed public hearing notice requirements as prescribed in the North Carolina State Statutes.

- First Class Letters Mailed: April 5, 2024
- Sign Posted on Property: April 5, 2024
- Legal Ad Published in the Raleigh News & Observer: April 5 & 12, 2024

VII. PROPOSED PLANNED UNIT DEVELOPMENT: *(Changes since May 16, 2024 JPH)*

In support of their Master Plan, the Applicant submitted a revised PUD document that includes a vision for their proposed development, statements of plan consistency, architectural design standards, proposed site development allowances, and open space information.

Staff has reviewed the submittal in accordance with UDO Sections 12.2.G.3.g and 12.3.F and found that all submittal requirements have been met. Staff also reviewed the plans for conformance with the Residential Mixed-Use (RMX) zoning district and other applicable UDO sections. The Applicant’s requested alternative standards are listed in the section below.

Public Utilities/Water Allocation Policy: The Applicant is proposing to connect to public water and sewer. In accordance with Section 12.3.F.16 of the UDO, the Applicant is proposing to exceed the required 50 points with the following features.

	Point Total
Major Subdivision Base Points	15
Bonus Point Item	
Conservation of Natural Habitat	7
Construct a Fountain within the BMP	4
On-street Parking	4
Residential Architectural Standards for Single-Family and Townhouse	15
3,000’ or more of a 6-foot-wide path	3
Resort Style Pool	2
Deck/Patio (2,000 SF min.)	2
Clubhouse (no meeting space; bathrooms & changing rooms only)	3
IPEMA Certified Playground Equipment	4
Pickleball Courts	5
Outdoor Display of Public Art	4
Total Water Allocation Policy Points	68 pts.

No further changes made since the May 16, 2024 JPH

In order to receive the seven points for the conservation of natural habitat, the Applicant must amenitize these areas in a way that embraces their natural beauty and importance. In lieu of a formal paved trail, the Applicant revised the Master Plan to include a passive open space area near the northwest portion of the pond, **and included additional informal access points** so residents can access the pond and enjoy its natural beauty (see graphic on Page 18 of this Staff Report). In addition, to receive the fifteen points for residential architectural standards for single-family and townhouses, modifications to the architectural standards presented in this Staff Report and in the Applicant’s PUD Book may be recommended.



Town of Knightdale

Staff Report

	Point Total
Single-Use Retail Base Points	41
Bonus Point Item	
Construction of Gateway Landscaping	5
Deck/Patio (2,000 SF min.)	2
Outdoor Display of Public Art	4
Total Water Allocation Policy Points	52

No further changes made since the May 16, 2024 JPH

The Applicant has demonstrated compliance with the Single-Use Retail component of the Water Allocation Policy. When a development plan is submitted for the commercial outparcel, staff will review those plans for consistency with these elements.

Zoning Conditions: The rezoning process provides the Applicant the opportunity to propose specific conditions to further define the scope of the development. **The Applicant revised the proposed zoning conditions since the Joint Public Hearing based on feedback received from Staff and Town Council. The final version of these conditions are listed below, which are all supported by Staff.**

The following uses shall be permitted by-right in the 15,000 square foot commercial outparcel building. All other uses listed in UDO Section 3.1.C shall be prohibited. The development of this outparcel will be subject to all UDO standards unless specified in the PUD Book.

- | | |
|---|---|
| <ol style="list-style-type: none"> 1. Child/Adult Day Care Center
(6 or more people) 2. Personal Services 3. Professional Services 4. Medical Services 5. Neighborhood Retail/Restaurant
(2,000 square feet or less) | <ol style="list-style-type: none"> 6. Accessory Uses Permitted in the RMX zoning district as listed in UDO Section 3.1.C.9 7. Bar/Tavern/Microbrewery 8. Studio (arts, dance, martial arts, music) |
|---|---|

Following approval of Construction Drawings, all future tenants must apply for a Zoning Compliance Permit, which staff will confirm the use is compliant with these conditions. The Applicant has also specified that Vape, Tobacco, and CBD stores are expressly prohibited. All other uses not listed are otherwise prohibited.

In addition, the Applicant has agreed to the following conditions as they apply to the commercial outparcel:

1. Businesses with operating hours of 24 hours per day are not permitted
2. Developer shall stub potable water, sanitary sewer, and storm drainage to commercial outparcel prior to plat recordation. ~~or provide a surety for completion thereof.~~
Staff Recommendation (April 18, 2024): To ensure that the commercial outparcel is pad ready for any future business/tenant, staff recommend removing the option to provide financial surety for these improvements.
3. Developer shall construct curb, gutter, and sidewalk improvements along commercial outparcel prior to plat recordation. ~~or provide a surety for completion thereof.~~



Town of Knightdale

Staff Report

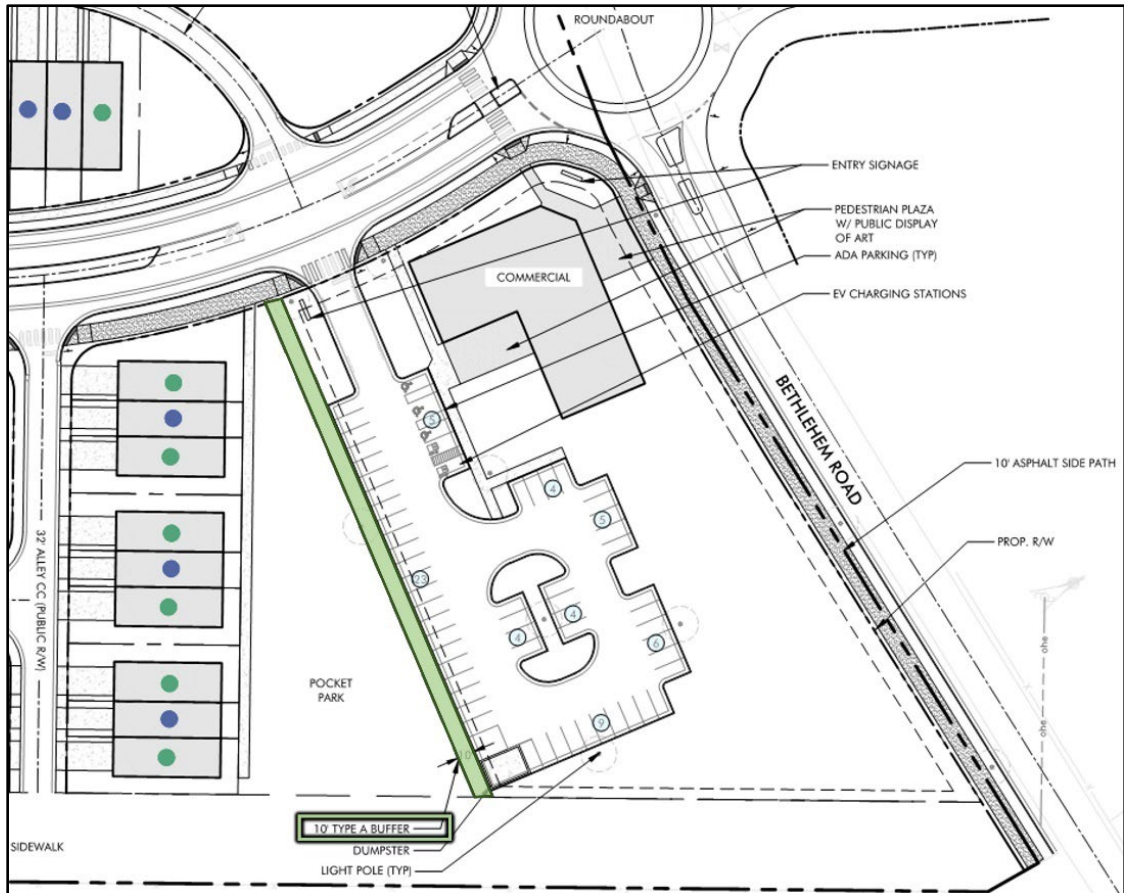
Staff Recommendation (April 18, 2024): To ensure that the commercial outparcel is pad ready for any future business/tenant, staff recommend removing the option to provide financial surety for these improvements.

4. The commercial outparcel shall not be owned by the Homeowners Association.
5. Developer is responsible for maintaining the commercial outparcel in a manner consistent with Lyndon Oaks Homeowners Association properties, until the commercial property is developed and/or sold by developer.
6. A 10-foot landscape buffer shall be planted adjacent to residential lots prior to plat recordation. ~~or provide a surety for completion thereof.~~

Staff Recommendation (April 18, 2024): The commercial outparcel will share its access point and parking lot with the proposed clubhouse, limiting the developer's ability to install this 10-foot-wide landscape buffer. Staff recommend revising this condition to apply to the area west of the clubhouse, pool, and playground, adjacent to the eight townhome units.

Applicant Response: The Applicant revised the Master Plan and offered Zoning Condition per staff recommendation.

Staff Analysis: The proposed location of the 10-foot landscape buffer will not only provide a visual screen between the commercial outparcel and pocket park/residential lots, but will provide a physical barrier between the pocket park and the commercial outparcels' parking lot.





Town of Knightdale

Staff Report

7. Parking lots shall contain vegetative screening in accordance with Knightdale's UDO.
8. Buildings shall be permitted up to two (2) stories.
Staff Analysis (April 18, 2024): To combat changes in market conditions, the developer of Lyndon Oaks should explore the feasibility of designing and constructing all site infrastructure to accommodate a two-story commercial building, including but not limited to stormwater infrastructure, retaining walls, water/sewer connections, etc.
Applicant Response: Condition 10 has been added.
9. Buildings shall meet the design standards for ~~commercial buildings in UDO Section 6.9, or~~ mixed-use buildings in UDO Section 6.8, ~~depending on the use(s).~~
Staff Analysis (April 18, 2024): According to Section 6.9 of the UDO, Commercial Building Types are not an appropriate building type for developments within the RMX zoning district. The Applicant should consider revising this condition to remove the option to construct the future commercial building based upon the Commercial Building Type Standards (UDO, Section 6.9).
Applicant Response: The Commercial Building Type Standards have been removed from consideration. Any future development of the commercial outparcel will be designed in accordance with Section 6.8 of the UDO.
Staff Analysis: The revised Zoning Condition establishes the appropriate building type for the proposed development.
10. Newly Added Condition (May 16, 2024): All infrastructure on the residential portion of the project shall be sized appropriately to accommodate a two-story commercial building.
Staff Analysis: Staff support the added condition as it will help facilitate the construction of the commercial building earlier in the construction timeline, which, in turn, provides neighborhood serving commercial services to residents sooner rather than later.

Staff Recommended Condition #11 (April 18, 2024 & May 16, 2024): To encourage the development of the commercial outparcel, staff recommend a condition be added that requires the commercial outparcel to be developed no later than the end of the term of the UAA/Development Agreement.
11. Newly Added Condition (June 10, 2024): Development of the proposed retail outparcel shall be completed within the term of the Development Agreement between the Developer and the Town of Knightdale.
12. Newly Added Condition (July 17, 2024): Food trucks shall be permitted if a Food Truck Permit has been issued by the Town of Knightdale.
13. Newly Added Condition (July 17, 2024): Temporary uses, such as seasonal sales, or other temporary uses and special events like farmers' markets, produce stands, or special social events, shall be permitted for up to forty-five (45) days with a zoning compliance permit approved by the Land Use Administrator.

Site Development Allowances: In accordance with UDO Section 12.2.F.3.g, a Planned Unit Development allows the Applicant to request exceptions to certain standards identified in the base zoning district (RMX). These requests should be fair and reasonable, and the proposed alternate means of compliance should meet the spirit and intent of the UDO. The Applicant's allowance requests are as follows:



Town of Knightdale

Staff Report

1. **Dimensional Standards (Section 3.4) (No changes since May 16, 2024 JPH)**

- **Required:** In accordance with UDO Section 3.4, all front-loaded lots shall be a minimum of 80-foot wide while rear-loaded lots cannot be less than 30-feet in width.
- **Requested:** The Applicant proposes a minimum 60-foot width for front-loaded lots and a minimum 20-foot width for townhome lots.

2. **Dimensional Standards (Section 3.4) (No changes since May 16, 2024 JPH)**

- **Required:** In accordance with UDO Section 3.4, all driveways shall be a minimum of 35-feet in length.

- **Requested:** The Applicant proposes a minimum driveway length of 20 feet for all lots.

Staff Analysis (April 18, 2024): Based on recent approvals, a minimum driveway length of 25 feet for all front-loaded units should be considered.

Applicant Response: The minimum driveway length for all front-loaded units will be 25-feet.

Staff Analysis: This revision brings the requested Site Development Allowance in line with recent Town Council approvals.

3. **Dimensional Standards (Section 3.4 & 6.5) (Added since May 16, 2024 JPH)**

- **Required:** In accordance with UDO Section 3.4, all setbacks in the NMX District are as detailed per building type in Chapter 6 of the UDO.
- **Requested:** As shown on the Master Plan, the Applicant proposes the following setbacks:

Proposed Minimum Setbacks				
	Front	Side	Corner	Rear
SF-D (RL)	10'	3'	10'	10'
SF-D (FL)	10'	5'	10'	20'
TH/DUP (RL)	0' (min.); 25' (max)	10'	--	15'
Clubhouse	10'	6'	--	0'
Commercial	10'	6'	--	0'

4. **Residential Clearing & Grading (Section 9.3.B) (No changes since May 16, 2024 JPH)**

- **Required:** In accordance with UDO Section 9.3.B, grading of individual lots (60-feet in width or greater) within the major subdivision shall not begin without having first obtained a building permit.
- **Requested:** The Applicant proposes to mass grade all 60- and 70-foot-wide front-loaded lots. All 80-foot-wide lots shall not be mass graded and shall remain undisturbed.

5. **Street Classification and Design (Section 10.4.A.1.b & STD No. 3.02): (Changes since May 16, 2024 JPH)**

- **Required:** In accordance with UDO Section 10.4.A.1.b, on-street parking is encouraged along both sides of two (2) way local streets. In addition, the UDO does not provide detail to clarify right-of-way widths and design.
- **Requested:** The Applicant proposes on-street parking along sections of the road where there are no residential driveways. On-street parking will provide guest parking near the units. The Applicant proposes to remove on-street parking in areas of the development where front-loaded units are present to avoid any potential sight triangle conflicts as residents exit their driveways. **According to the applicant, "No Parking" signs will be installed.**

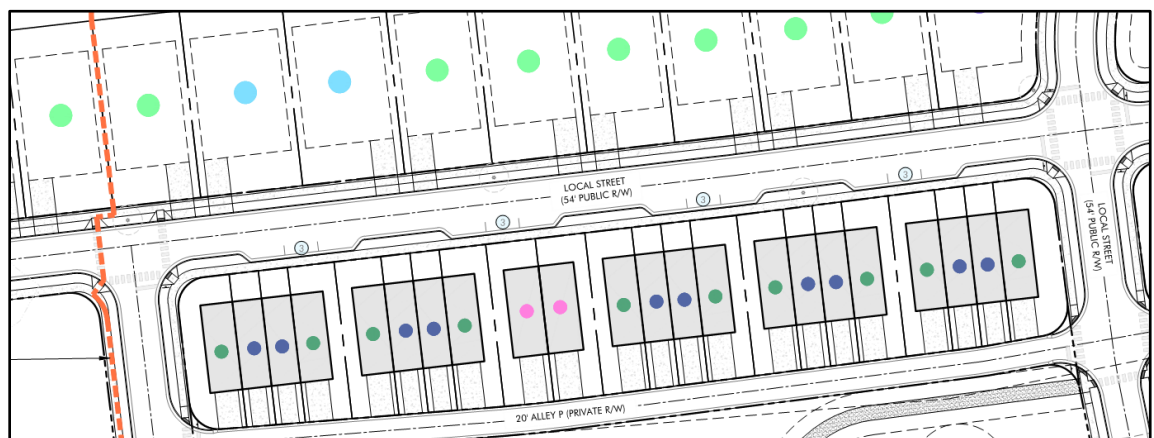


Town of Knightdale

Staff Report



Roads 1-4; 6-10 will feature on-street parallel parking. Since the UDO does not include a local street cross-section with parallel parking, staff requested that the Applicant create specific local street details to demonstrate the proposed design for all local streets throughout the development. According to the Applicant's provided details, the parkway section of the right-of-way, located between the back of curb and sidewalk, will be removed to accommodate parking without widening the right-of-way.



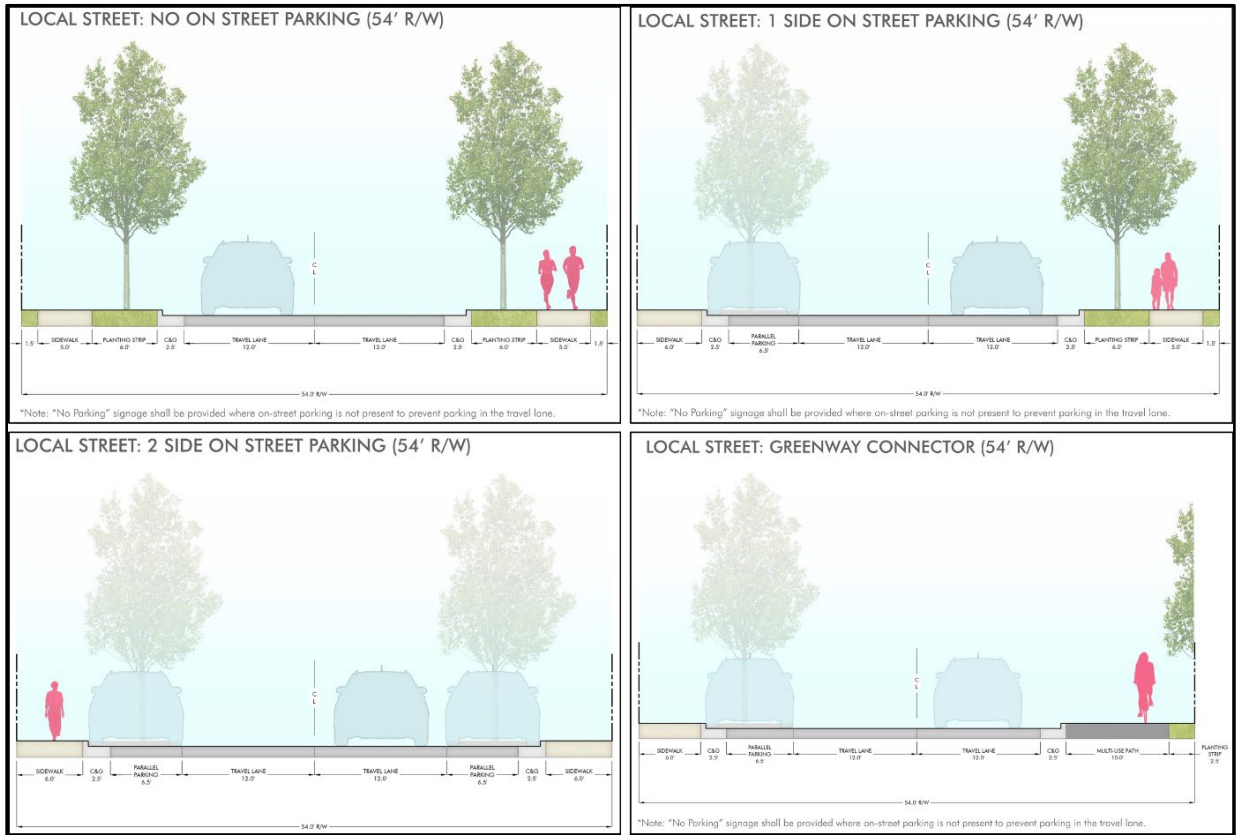
Staff recommend the Local Street Section – Greenway Connector cross-section is either expanded to a 60-foot-wide Public Right-of-Way so that all improvements are located within a single right-of-way (removing the need for a separate easement), or the multi-use path is shifted to be adjacent the curb & gutter, and the street trees are planted on private property (right-of-way width remains 54-foot-wide).



Town of Knightdale

Staff Report

Applicant Response: The Local Street Section – Greenway Connector cross-section was revised based upon Staff recommendation.



6. **Required Distribution of Uses (Section 11.1.B):** *(Changes since May 16, 2024 JPH)*

- Required:** In accordance with UDO 11.1.B, new subdivisions are required to provide a variety of uses as detailed in Table 11.1.B. This standard was adopted in the new UDO to encourage more mixed-density and mixed-use neighborhoods in accordance with the recommendations found in the Comprehensive Plan.

Use Type	Minimum Distribution	Maximum Distribution
Dwelling-Duplex/Townhouse	10%	40%
Dwelling-Multifamily	5%	40%
Dwelling-Single Family	15%	60%
Mixed Use*	10%	100%
Lodging/Office/Service/Retail/Restaurant/Entertainment/Recreation*	5%	20%
Civic/Institutional*	As determined by the Town Council	

*Minimum and maximum distribution requirements shall apply only to nonresidential subdivisions or subdivisions with both residential and non residential uses.

- Requested:** The Applicant proposes a residential neighborhood consisting of 9.5% duplexes/townhomes (decreased from 9.9%), 25.4% single-family homes (increased from 22.9%), and 1.4% (no change) commercial/retail.

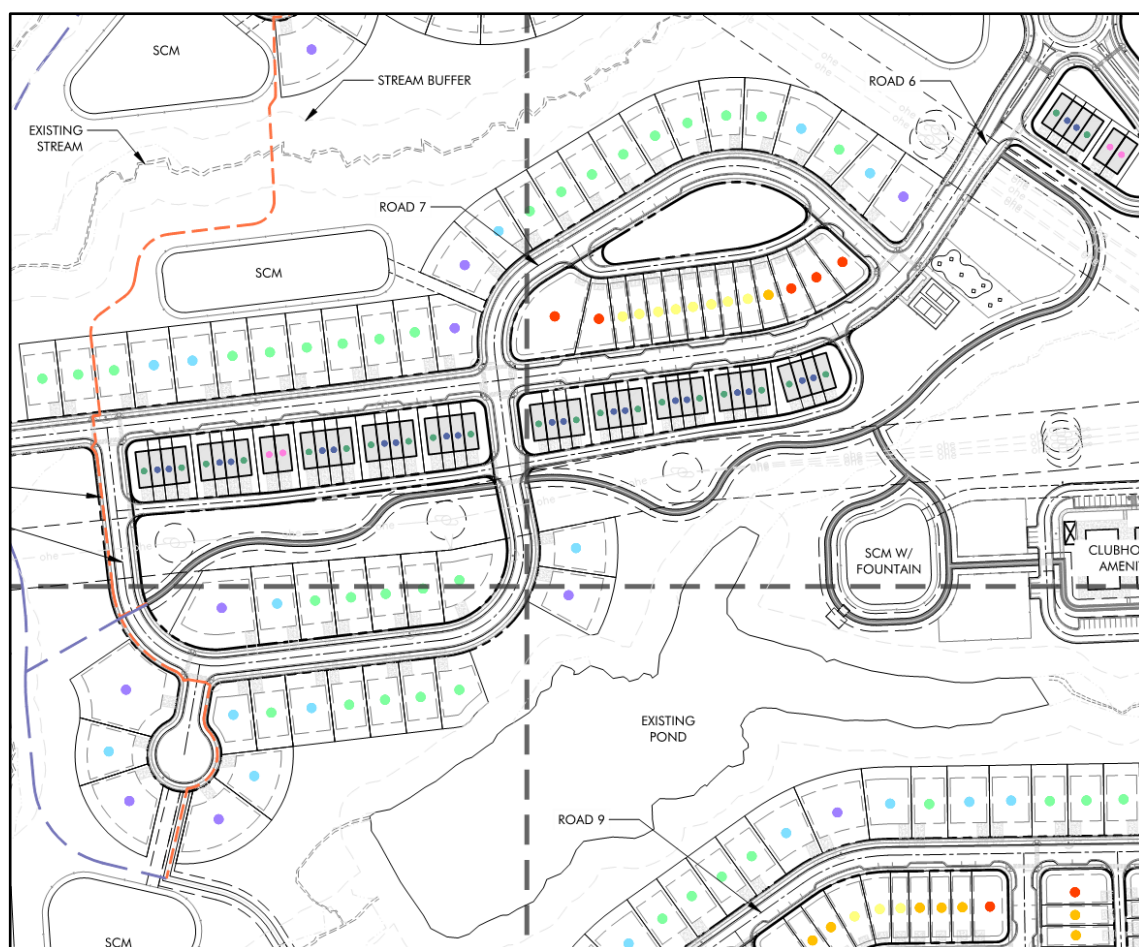


Town of Knightdale

Staff Report

7. Arterial and Collector Plans, Street Design (Section 11.3.B.3): *(No changes since May 16, 2024 JPH)*

- **Required:** In accordance with UDO Section 11.3.B.3, new developments that provide new streets that are not identified on the Town's Comprehensive Transportation Plan, but meet certain criteria outlined in the section, must be built to an appropriate collector street standard. Because Road 6 extends into an undeveloped area in such a manner as to serve a future collector function and serves as an access to a residential area of twenty or more acres, the UDO requires the road to be built to the Main Street Roadway Cross-Section.
- **Requested:** The Applicant proposes to construct a modified Local Street Section – Two Way (same Local Street Section – One-Side On-Street Parking design as highlighted in Site Development Allowance #5 above to avoid additional impacts to the site's streams and wetlands.



Staff Analysis (April 18, 2024): *To increase off-street pedestrian connectivity and provide additional active lifestyle opportunities, staff encourages the Applicant continue to evaluate the feasibility of extending the private trail network through the powerline easement south of this road to connect to the public trunk-line greenway to the west. Staff also encourages the Applicant to consider continuing the private trail system around the existing pond, which could then connect to the public greenway nearby.*



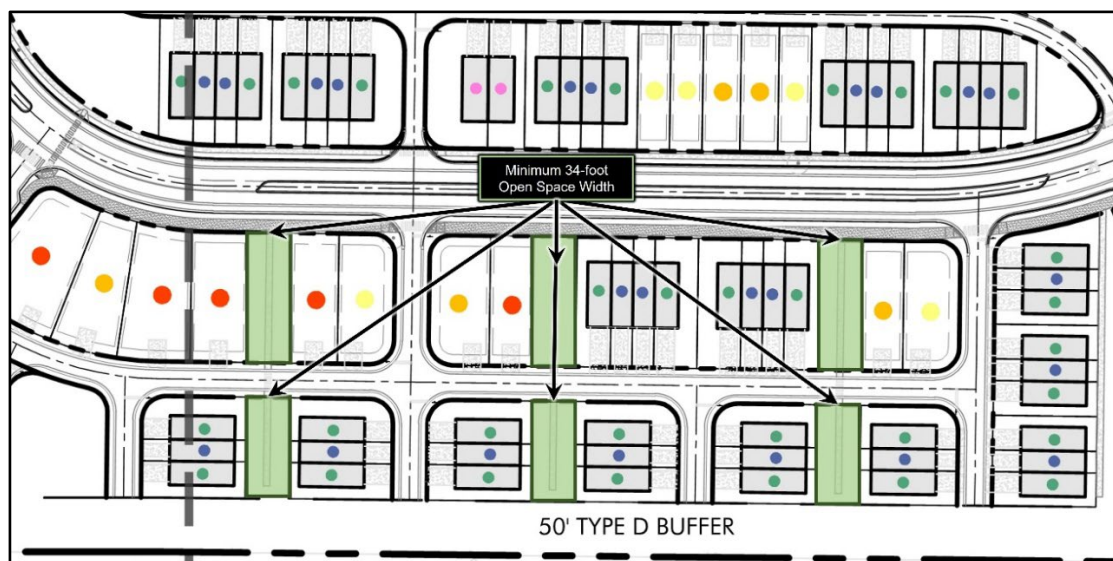
Town of Knightdale

Staff Report

Applicant Response: Please see Applicant's Response on Page 18 of this Staff Report, as it is applicable to this requested Site Development Allowance.

8. Lot Access Requirements (Section 11.2.C.11) *(No changes since May 16, 2024 JPH)*

- **Required:** All recreational open space shall have at least fifty (50) feet of frontage on at least one (1) public street within the subdivision.
- **Requested:** Approximately 18 (reduced from 19) single-family, 20- and 22-foot-wide rear loaded units towards the southeastern portion of the site will front passive open spaces with pedestrian facilities. To provide pedestrian connectivity to the proposed Widewaters Parkway Extension, three, 34-foot-wide passive open spaces between the rear-loaded single-family homes on the south side of Widewaters Parkway. In lieu of the required fifty feet of frontage on at least one public street, the Applicant proposes a minimum of 34-feet of frontage on either a public street or alley. Sidewalks, benches, and landscaping will be provided on the front of these units facing these areas, providing a direct connection to the open space.



9. Street Classification and Design, Alley Right-of-Way Width (Section 10.4.A.1.a.i):

(Changes since May 16, 2024 JPH)

- **Required:** In accordance with UDO Section 10.4.A.1.a.i, the right-of-way width of alleys shall be twenty (20) feet, unless otherwise approved by the Fire Code Official.
- **Requested:** The Applicant requests that Alleys G, I, J, K, O, R, V, W, and X be designated as 32-foot public rights-of-way to provide utilities to rear-loaded homes that either front public open space rather than a public right-of-way, or do not directly front a public right-of-way. According to the Applicant, alley access provides a more direct route to connect homes to public utilities, especially the lots adjacent to the Widewaters Parkway internal roundabout. **After further discussions with the City of Raleigh Water, a 32-foot public right-of-way may not be sufficient to accommodate future maintenance of the water, sewer, and stormwater infrastructure. As a result, staff recommended the Site Development Allowance request be modified to allow administrative flexibility in the event the alley right-of-way needs to be expanded based upon City of Raleigh Water requirements.**



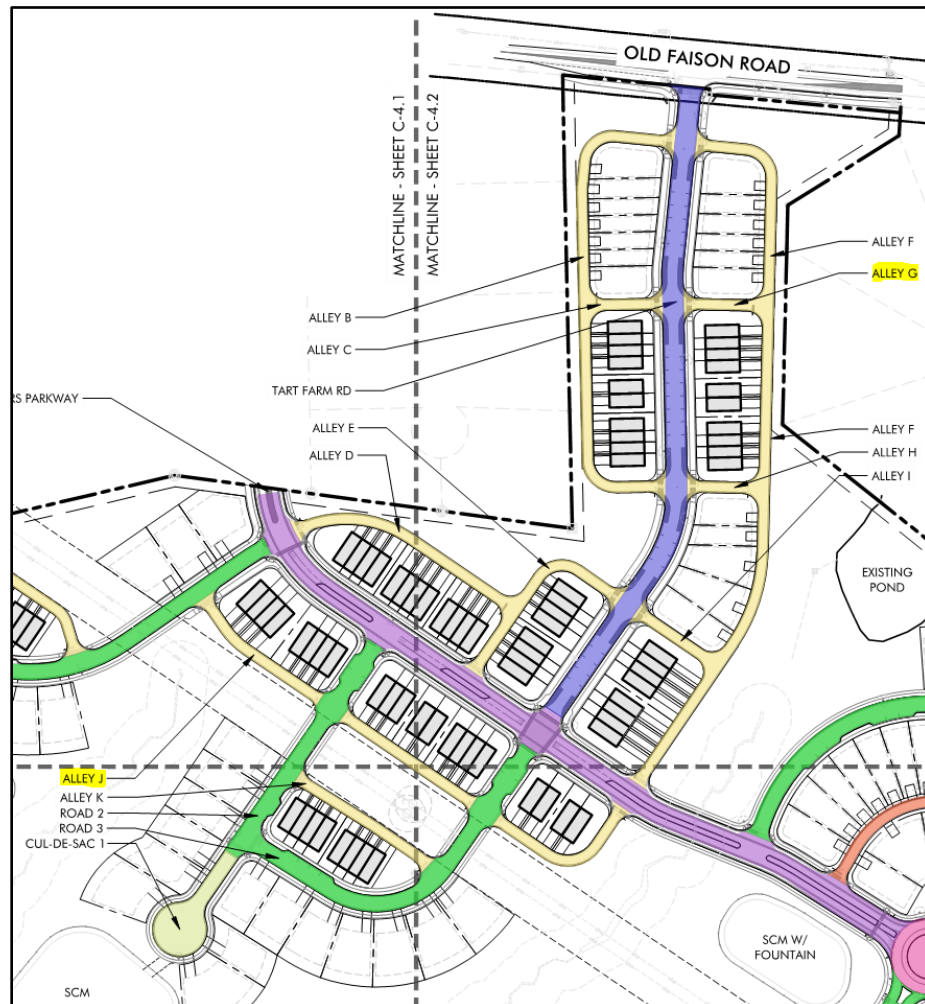
Town of Knightdale

Staff Report

Staff Analysis (April 18, 2024): When a rear-loaded residential lot is served by an alley but is not adjacent to a public right-of-way (i.e. when open spaces separate the lot and right-of-way), modifications to the dedication type (private vs. public) and width are necessary to accommodate the installation of water and sewer infrastructure. Staff concurs that Alleys I, J, K, O, R, V, W, and X warrant a public alley designation due to the presence of open spaces between the residential lot and right-of-way. However, the homes along Alley G front the future public Widewaters Parkway Extension, where water and sewer infrastructure could be installed.

Applicant Response: The dedication of Alley G has been revised to be a private alley. This alley has been renamed to Alley J on the revised Master Plan due to additional alleys being added along the main access road to Old Faison Road.

Staff Analysis: Staff support the proposed change from a public alley to a private alley because it still allows for water and sewer infrastructure to be installed within the Widewaters Parkway Extension, without the need for expanding the right-of-way to 32-feet.





Town of Knightdale

Staff Report

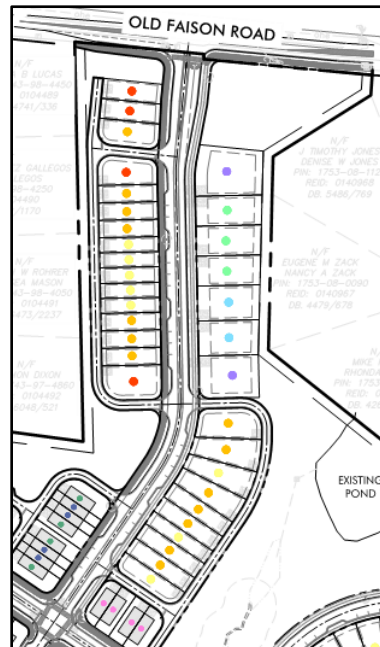
10. Driveways Along Arterials and Collections (Section 7.2.A.2): *(No changes since May 16, 2024 JPH)*

- **Required:** In accordance with UDO Section 7.2.A.2, developments should minimize or eliminate curb cuts along arterials and collectors. Single-family lots, attached or detached, shall not have access to a collector or arterial street, unless the collector is designed to the modified avenue section to include on-street parking on one side and a landscaped median divide. In this instance, rear-loaded alley access is permitted on one side of the street section. Where possible, vehicular access drives should be shared with the adjacent properties and/or alleys should be utilized for access.
- **Requested:** The Applicant proposes a modified Main Street Cross-Section for the development's access drive (currently known as Tart Farm Road). The proposed design of this road meets the standards outlined in Section 7.2.A.2 of the UDO, except for the landscaped median. The Applicant proposes to remove this required median so that driveway and alley access are not restricted.

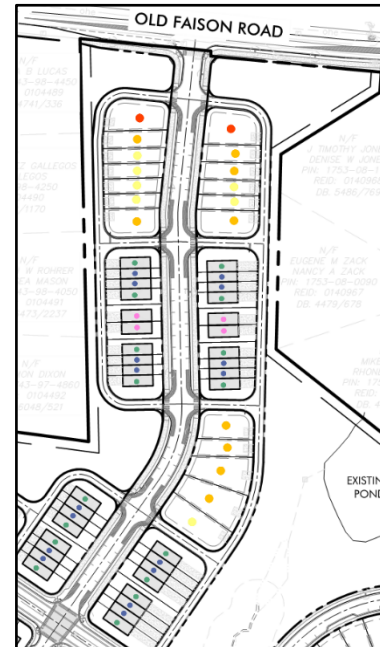
Staff Analysis (April 18, 2024): *Although the proposed design for this roadway and surrounding residential lots comply with Section 7.2.A.2 of the UDO, the number of driveway curb cuts along a main entrance to the neighborhood could create unsafe conditions. Staff encourages the Applicant to consider changing these lots from a front-loaded product to a rear-loaded product, or to recreational space to limit potential roadway conflict points.*

Applicant Response: *The design of this portion of the neighborhood has been revised to propose rear-loaded housing products rather than front- and rear-loaded housing products. The roadway design has also been revised to implement the Urban Main Street – Wide Sidewalk Cross-Section.*

April 18, 2024 Proposed Design



May 16, 2024 Proposed Design





Town of Knightdale

Staff Report

Staff Analysis: Staff support the proposed revisions to this roadway as they eliminate several driveway curb cuts along a main entrance to the neighborhood that could have created unsafe conditions. In addition, the change to all rear-loaded housing products and roadway design present an opportunity to provide a high-quality streetscape with landscaping, hardscaping, and fencing.

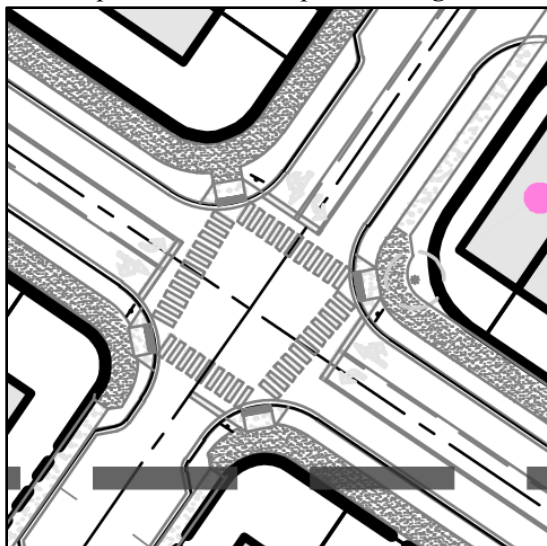
11. Intersection Design, Collector Streets (Section 11.3.B.4): *(No changes since May 16, 2024 JPH)*

- **Required:** In accordance with UDO Section 11.3.B.4, the intersection of two (2) collector streets...shall be designed as a roundabout when under the jurisdiction of the Town of Knightdale.
- **Requested:** In lieu of the construction of a roundabout at the intersection of the current Tart Farm Road and future Widewaters Parkway Extension, the Applicant proposes a four-way stop with traffic calming measures such as bump-outs to shorten pedestrian crossing distance. The Applicant also proposes high-visibility crosswalks at this intersection, which is a requirement for all pedestrian crossing pavement markings.

Staff Analysis (April 18, 2024): Staff have not had the ability to review the proposed traffic calming measures as they were not illustrated on the Master Plan. Staff encourages the Applicant to continue to explore additional traffic calming measures at this intersection for further review.

Applicant Response: The Applicant revised the Master Plan and PUD Book to include a detailed exhibit showing the proposed intersection improvements.

April 18, 2024 Proposed Design



May 16, 2024 Proposed Design





Town of Knightdale

Staff Report

VIII. TRANSPORTATION ANALYSIS *(Update since May 16, 2024 JPH)*

In accordance with UDO Section 11.3, a Transportation Impact Analysis was performed by the Applicant. Staff met multiple times with the developer to refine the scope of the analysis and ensure the proper uses were being included. The number of peak hour trips generated by this site exceeds the required 150 trips prescribed by the UDO requiring a TIA.

Lyndon Oaks TIA - Trip Generation Estimates

Land Use (ITE Code)	Intensity	Daily Traffic (vpd)	Weekday AM Peak Hour Trips (vph)		Weekday PM Peak Hour Trips (vph)	
			Enter	Exit	Enter	Exit
Single-Family Detached (210)	308 DU	2,840	52	155	180	106
Townhomes (215)	192 DU	1,414	24	70	66	45
Strip Retail Plaza (822)	10 KSF	652	17	12	39	39
High-Turnover Restaurant (932)	5 KSF	536	26	22	28	17
Total Trips		5,442	119	259	313	207
<i>Internal Capture (7% AM & 6% PM)*</i>			-9	-17	-20	-13
Total External Trips			110	242	293	194
<i>Pass-By Trips</i>			-0	-0	-19	-19
Total Primary (New) Trips			110	242	274	175

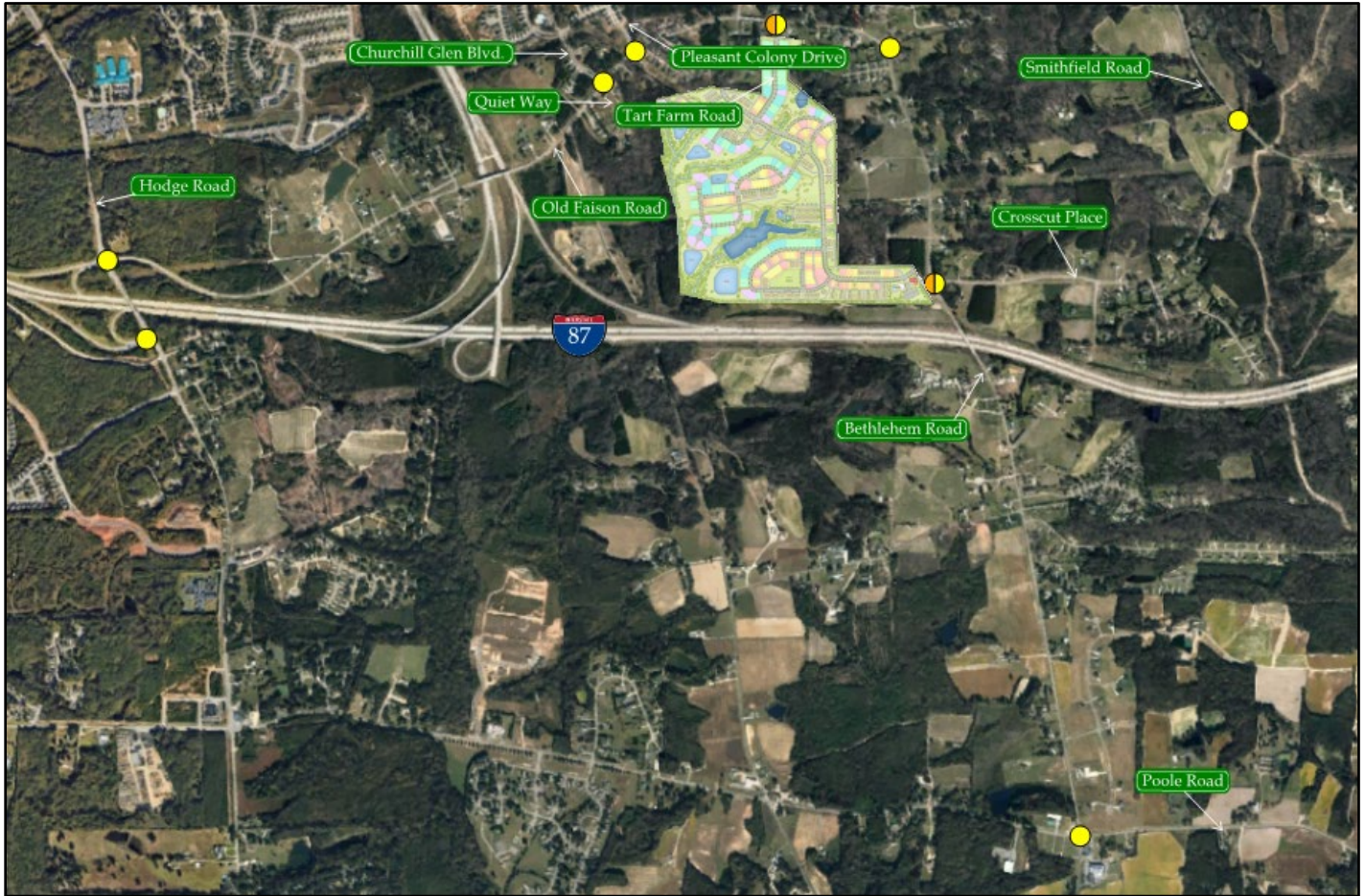
The following intersections were identified during the scoping phase of this project as being impacted by this development. The engineering team conducted traffic counts at these intersections during peak hours.

- | | |
|--|---|
| 1. Old Faison Road and Bethlehem Road | 6. US 64 EB Ramps and Hodge Road |
| 2. Old Faison Road and Tart Farm Road | 7. US 64 WB Ramps and Old Faison Road |
| 3. Old Faison Road and Pleasant Colony Drive | 8. Smithfield Road and Old Ferrell Road |
| 4. Old Faison Road and Quiet Way | 9. Bethlehem Road and Poole Road |
| 5. Bethlehem Road and Crosscut Place | |



Town of Knightdale

Staff Report



The TIA included recently approved or under construction projects including Elevate Riverview (FKA Riverview Commons) and Creekview Crossing (FKA Widewaters Expansion) as background data to assign future trips. Additionally, the TIA assumed a 3% trip growth rate during the period of construction for this project.

The following improvements are recommended by the TIA, and generally supported by Town staff and NCDOT, to be completed by the developer.

1. Old Faison Road and Bethlehem Road: Coordinate with Town on desired improvements. Provide fee in lieu contribution as necessary.

Staff Commentary (April 18, 2024): Although the TIA identifies that the installation of a traffic signal at this intersection would result in an acceptable level of service (LOS), the Town's 2022 Comprehensive Transportation Plan (CTP) identified this intersection as a hot spot project, which prioritizes the construction of a roundabout in this location. As noted in the TIA, there are concerns with the roundabout continuing to operate at an acceptable level of service with increasing levels of traffic over the next 10 years. Since this intersection was identified as a hot spot project in the 2022



Town of Knightdale

Staff Report

CTP, staff requested the Town's Consulting Engineer, AMT, to conduct an additional analysis that focuses on how the extension of I-540 affects traffic volumes and distributions in the vicinity.

Staff Recommendation (April 18, 2024): Once that analysis is complete, staff will continue to coordinate with the Applicant to determine the most appropriate design for this intersection. Because this intersection has been identified as a hot spot project and improving this intersection is a priority of Town Council, staff recommend that the option to make a fee-in-lieu contribution for the selected improvement be eliminated from consideration.

Additional Roundabout Analysis Update (May 16, 2024): AMT has obtained the necessary data from the Town's transportation partners to proceed with the analysis. According to AMT, the analysis is anticipated to be completed over the next couple weeks.

Additional Roundabout Analysis Update (July 17, 2024): AMT finalized the analysis on June 5, 2024, which can be found in the attachment section Council's Agenda Packet. According to the analysis, once the I-540 project complete, the traffic volumes at the study intersection (Old Faison/Bethlehem Roads) are expected to be lower, however, a single lane roundabout or a single lane roundabout with southbound right turn and eastbound right turn lanes both will not operate at an acceptable level of service. Other hybrid roundabout designs and a double lane roundabout were also considered, and could operate at acceptable levels of service, however, the size of the roundabout and the complexity of the design render those options unfeasible for this location.

Staff Recommendation (July 17, 2024): Based on the results of the additional roundabout analysis, Staff recommend that a signalized intersection be constructed at the intersection of Old Faison Road and Bethlehem Road in lieu of a roundabout. Based on the subject property's location and accessibility to Downtown, as well as its proximity to identified Gateway Entrances in the Comprehensive Plan, Staff recommend that decorative mast arms, along with enhanced roadside/intersection landscaping and gateway signage are installed by the Developer.

Applicant Response: The applicant commits to constructing a signal in this location, and, if the Town provides Transportation Development Fees credits (memorialized through Development Agreement), the Developer will provide and install the decorative mast arms as requested. In addition, the applicant commits to providing additional gateway features, such as gateway signage and/or landscaping in the right-of-way, provided that additional right-of-way or easements are not necessary to accommodate these gateway signage/landscaping features, and that such improvements are approved by both NCDOT and the Town. The applicant and Developer commit to contributing up to \$40,000 for these gateway signage/landscaping features.

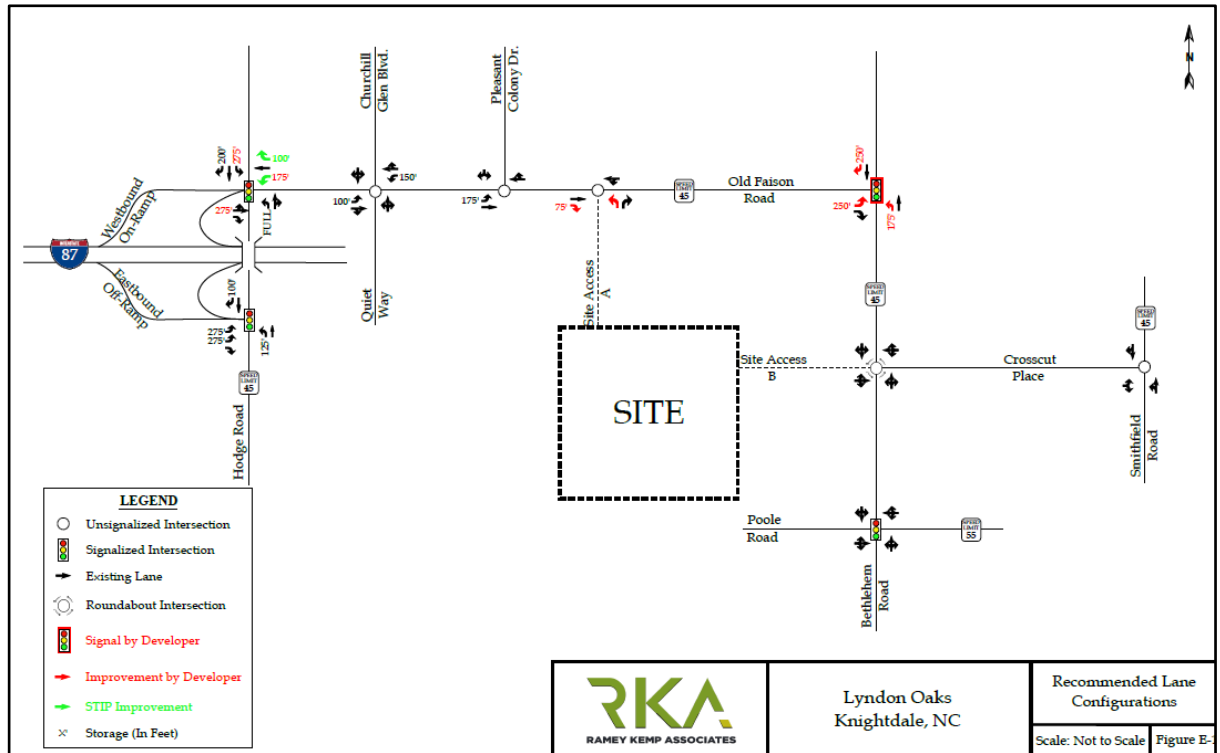
2. Old Faison Road and Tart Farm Road/Site Access A: Construct an eastbound right turn lane on Old Faison Road.
3. Bethlehem Road and Crosscut Place/Site Access B: Construct a single-lane roundabout.
4. Bethlehem Road and Poole Road: Construct left turn lanes



Town of Knightdale

Staff Report

- WB I-87 Ramps and Hodge Road: Extend westbound left turn lane and southbound left turn lane. Extend eastbound left-through lane.
- WB I-87 Ramps and Hodge Road (Completed by STIP W-5705AK): Construct westbound right turn lane. Construct westbound left turn lane.



Roadway Connectivity and Improvements (No changes since May 16, 2024 JPH)

The proposed development will construct a portion of the Widewaters Parkway Extension from the northern end of the site with access along Old Faison Road to the southeastern end of the site with access Bethlehem Road, as required by the CTP and the UDO. This roadway will not only serve as the primary access through the site but will also provide additional routing options for motorists that do not live within the development. The proposed development will also construct a portion of the east-west Main Street from the site’s northeastern property boundary to the proposed roundabout internal to the site, as required by the CTP and the UDO.

The proposed development will also construct a modified two-way local street from the internal roundabout to the western side of the site. This specific roadway is required to be constructed as a collector road with no front-loaded housing product per Section 11.3.B.3 of the UDO. According to the Applicant, the project places residential development in pods to avoid additional impacts to the site’s streams and wetlands. To limit impacts to these environmentally sensitive areas, the Applicant has requested a Site Development Allowance (see Site Development Allowance #7 on Page 27 of this Staff Report) to allow this road to be constructed to the same modified two-way local street cross-section highlighted in Site Development Allowance #5.



Town of Knightdale

Staff Report

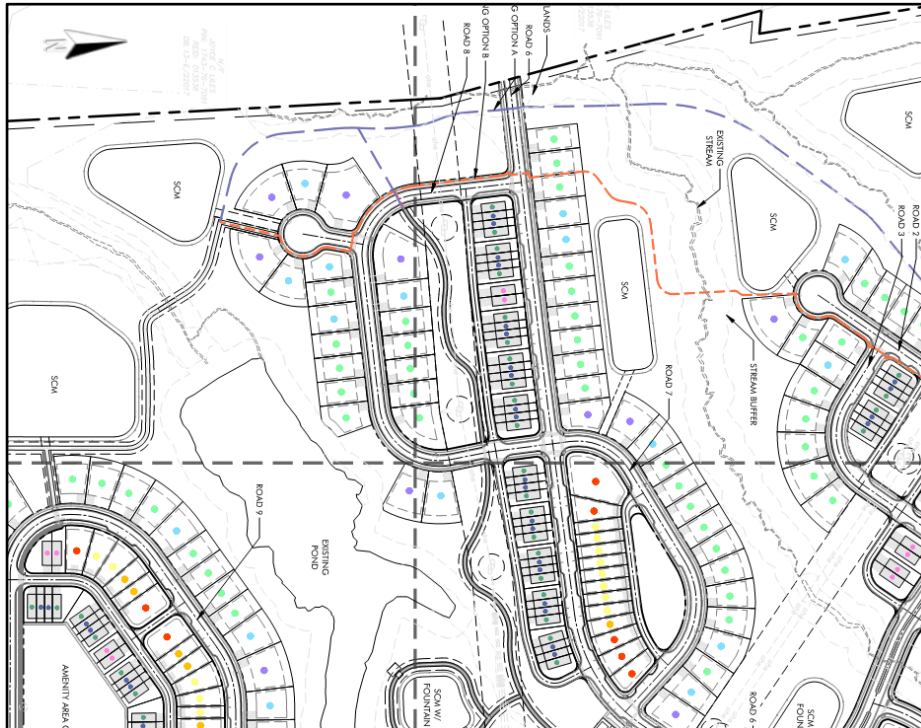
As part of the required roadway improvements for all new developments on existing publicly maintained streets, the Applicant is proposing to install all required improvements, such as sidewalks, multi-use paths, where applicable, curb & gutter, additional laneage, street trees, street lights, etc., along the site's frontage with both Old Faison Road and Bethlehem Road.

All other streets within the development will be dedicated to the Town and will be public streets, with the exception of certain private alleys throughout the development as shown on the Master Plan.

In terms of roadway connectivity, the Applicant proposes a street layout with a connectivity index of 1.47. Although the street layout exceeds the minimum 1.40 required in the RMX zoning district, which tends to represent a connected neighborhood with limited dead-end situations present, Section 11.3.E.5 of the UDO discourages permanent cul-de-sac streets and dead-end street, except when topography, the presence of natural features, and/or vehicular safety factors make a vehicular connection impractical.

Staff Analysis (April 18, 2024): Staff understand that there are environmentally sensitive areas along the western side of the site that present challenges for connecting the north, central, and southern pods of the development together via a street. Staff encourages the Applicant to continue to look for ways to increase connectivity and reduce the number of dead-end roads or cul-de-sacs.

Applicant Response: The Applicant revised the Master Plan to remove all dead-end roads, except for the three alleys near the southeast portion of the site (area where townhomes are proposed to front open spaces). The revised Master Plan still includes two cul-de-sacs in the northern and central portions of the site, which are shown on the following page of this Staff Report.





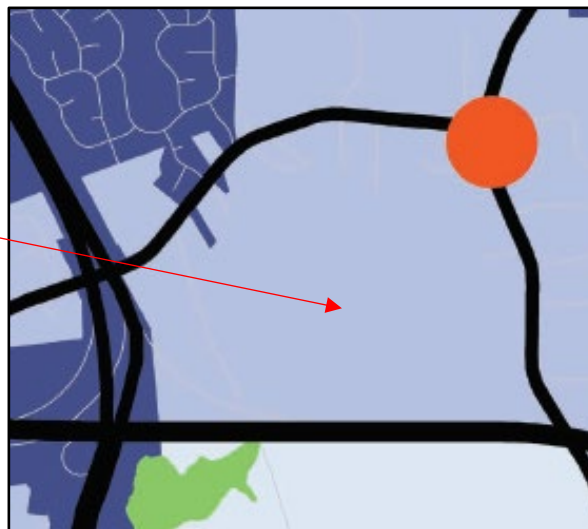
Town of Knightdale

Staff Report

IX. COMPREHENSIVE PLAN:

A. Growth Framework Map (No changes since May 16, 2024 JPH)

The Comprehensive Plan features the Growth Framework Map, a high-level tool for assisting in the decision-making process for development proposals. The intent is to prioritize development proposals based how well it fits within the surrounding area. The map designates this area as a Target Investment Area, which is nearby a neighborhood node at the intersection of Old Faison Road and Bethlehem Road.



Target Investment Areas are defined as:

The target investment area includes land within the current Town limits as well as closely surrounding land in the current ETJ that has existing or relatively easy potential access to both sewer and water. Infill development should be concentrated within the current Town limits. One or more new mixed-use centers locate inside the infill development area would provide walk-to or bike-to destinations that meet some of the residents' daily needs. Infrastructure investments in the target investment area should encourage active living with a complete and comprehensive network of walkable streets in a general grid pattern.

Future growth should be guided into more compact and efficient development patterns that will help manage the timing, location, and magnitude (length and size) of expensive infrastructure investments. The Town should prioritize infill development and redevelopment in identified activity centers (over continued green field development patterns) and use public infrastructure investments in the activity centers to encourage and leverage future private investments (emphasizing development in the activity center and surrounding one quarter mile area of influence).

Increased densities and intensities—and a mix of residential and nonresidential uses—will be needed in the activity centers to accommodate anticipated Town growth. Activity centers added to the Growth and Conservation Map in the future should reflect orderly and incremental growth patterns away from existing and identified activity centers in the 2035 KnightdaleNext Comprehensive Plan.



Town of Knightdale

Staff Report

Neighborhood Nodes are defined as:

Neighborhood nodes identified on the Growth Framework Map locate retail destinations closer to residential neighborhoods throughout the Town. Each node should be ‘neighborhood-serving’ and meet several daily needs for nearby residents.

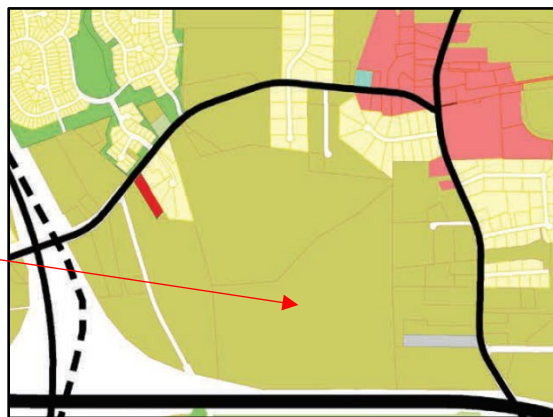
Their proximity to neighborhoods requires that operations be low-intensity, unobtrusive, and at a scale and design compatible with nearby residential development. The design of neighborhood nodes should transition effectively between residential and non-residential uses and include safe and convenient pedestrian and bicycle access for nearby residents.

Sites should also effectively minimize the impact of cut through traffic on nearby neighborhood streets by orienting vehicle access, circulation, etc. away from residential neighborhoods. Access between residential neighborhoods and adjacent commercial uses may be limited to pedestrian facilities. Town officials should resist any future land use changes or rezoning requests for residential development within any of the neighborhood nodes identified on the Growth Framework Map, and new neighborhoods should be built in close proximity to existing or planned neighborhood nodes.

B. Growth & Conservation Map (No changes since May 16, 2024 JPH)

The Growth & Conservation Map designates parcels in Knightdale into different place type categories based on their current state and the anticipated pattern of development. The subject properties are all within the “Mixed-Density Neighborhood” place type.

PLACETYPE CATEGORIES	
Preserved Open Space	Business Office
Rural Living	Light Industrial
Recreation Open Space	Heavy Industrial
Single Family Neighborhood	Civic & Institutional
Mixed-Density Neighborhood	Old Town
Multifamily Community	Mixed-Use Center
Neighborhood Node	Mixed-Use Center (Suburban Retrofit)
Retail	Transit-Oriented Development (BRT)
	Regional Mixed-Use Center



The “Mixed-Density Neighborhood” place type is defined as:

Mixed-density neighborhoods are formed as subdivisions or communities with a mix of housing types and densities. Homes are oriented to the interior of the site and are typically buffered from surrounding development by transitional uses, preserved open space, or landscaped areas. Lots along the perimeter of a new neighborhood should be sensitive to the density observed along the perimeter of an adjacent neighborhood in terms of size and scale (by providing a transition). Small blocks and a modified grid of streets support a cohesive, well-connected community.

All new mixed-density neighborhoods incorporate a comprehensive network of open space throughout to accommodate small parks, gathering places and community gardens; preserve tree stands; and help reduce stormwater runoff.



Town of Knightdale

Staff Report

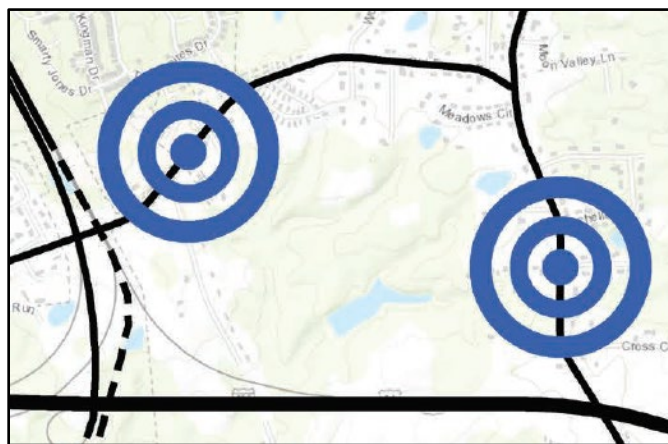
The place type transect, seen below, builds off of the Growth & Conservation Map and helps to illustrate how developments should blend together as Knightdale grows. The “Mixed-Density Neighborhood” place type falls into the “Neighborhoods” category.



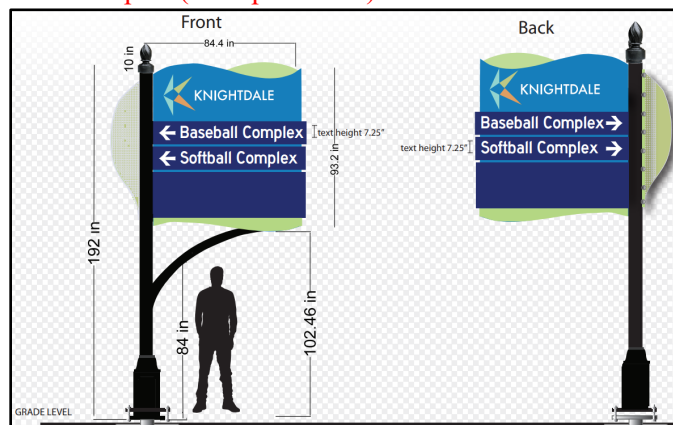
C. Gateway Entrances Map

(Changes since May 16, 2024 JPH)

Gateways help those traveling into Knightdale easily identify their entrance into Town. There are a number of different Gateway types, and the site is located between two Community-Focused Gateway, one to the west along Old Faison Road, and the other to the east along Bethlehem Road. Staff recommend enhanced landscaping, hardscaping, and unique signage at both entrances of the neighborhood. **The PUD Book (Page 38) has been updated to include an exhibit of potential sign and landscaping design (conceptual in nature) for the entrances to the neighborhood.**



In addition, the Applicant has committed to providing additional gateway features, such as gateway signage and/or landscaping in the right-of-way, as discussed on Page 34 of this Staff Report (example below).





Town of Knightdale

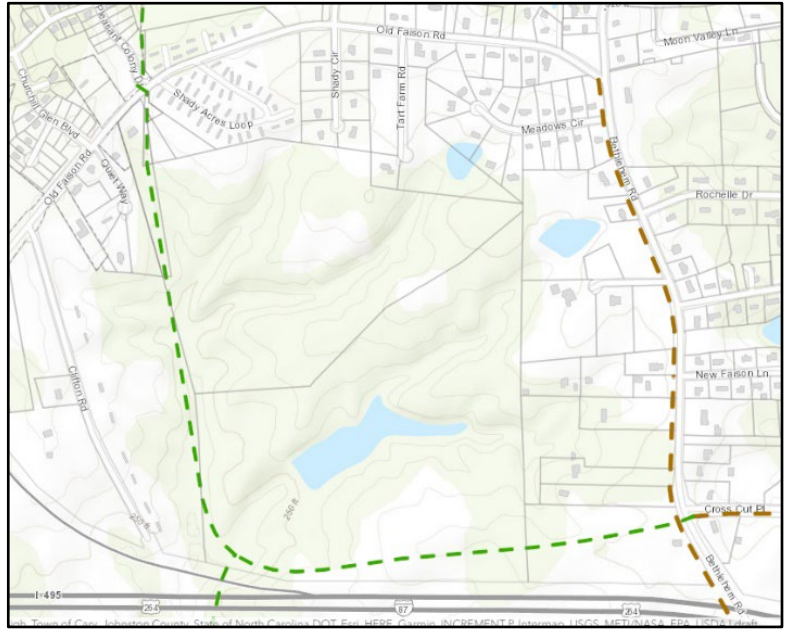
Staff Report

D. Trails and Greenways Map

(No changes since May 16, 2024 JPH)

The Trails & Greenway Map provides the general alignment of greenways in Knightdale. These trails should connect to the existing Town infrastructure or provide new recreational opportunities for residents.

As previously mentioned, the Applicant is proposing to construct the ten-foot-wide trunk-line greenway from the north to the south and west on the site. Option A is consistent with the Trails and Greenways Map but Option B is not. The Applicant has requested these two options in case the environmentally permitting process prohibits certain impacts associated with the construction of a greenway.



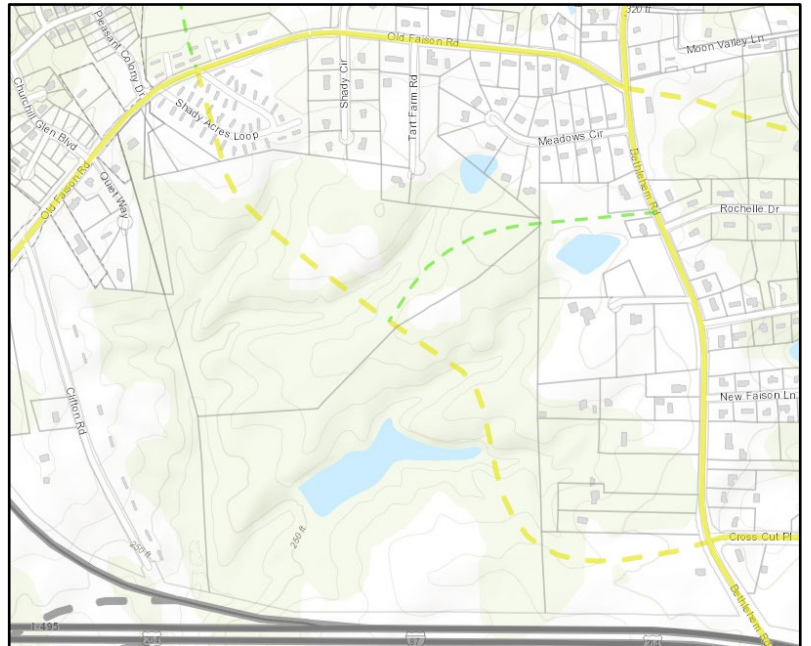
To encourage this trunk-line greenway to continue south of I-87, the Applicant has offered a condition that prior to approval of construction drawings for the first phase of the development, the Applicant will offer a minimum of 100 square feet of site area as a non-exclusive, permanent easement area to be dedicated to the Town for construction, maintenance, and repair of footings for a future pedestrian bridge over I-87.

E. Street Network Map

(No changes since May 16, 2024 JPH)

Development activities should assist with the construction of a comprehensive transportation network. The proposed development will construct the portion of Widewaters Parkway from the north to the south and west of the site. In addition, the proposed development will construct a portion of a Main Street collector road from the eastern property boundary to the proposed roundabout internal to the site.

In general, the proposed street network within the development is consistent with the location of those planned streets.





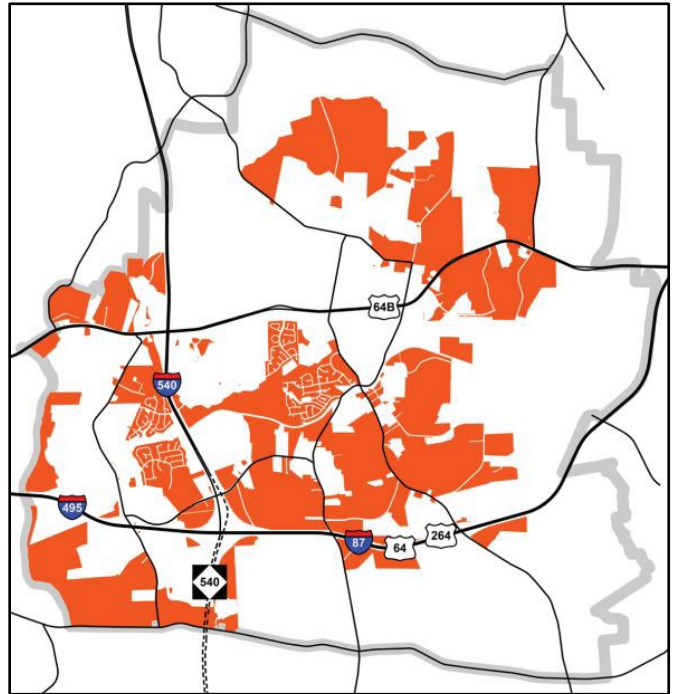
Town of Knightdale

Staff Report

F. Focus Area Studies (No changes since May 16, 2024 JPH)

The Comprehensive Plan developed conceptual plans with the intent to guide development proposals in certain areas of Knightdale and build off the place type categories defined by the Growth & Conservation Map. Illustrations provided in the Focus Area Studies sections are intended to convey the type of planning principles Knightdale encourages in these locations. Developments within the Mixed-Density Neighborhood place type category are encouraged to support the following Guiding Principles from the Comprehensive Plan:

- Community Facilities and Services
- Unique Activity Centers
- Parks & Recreation
- Great Neighborhoods
- Expanded Home Choices
- Economic Vitality

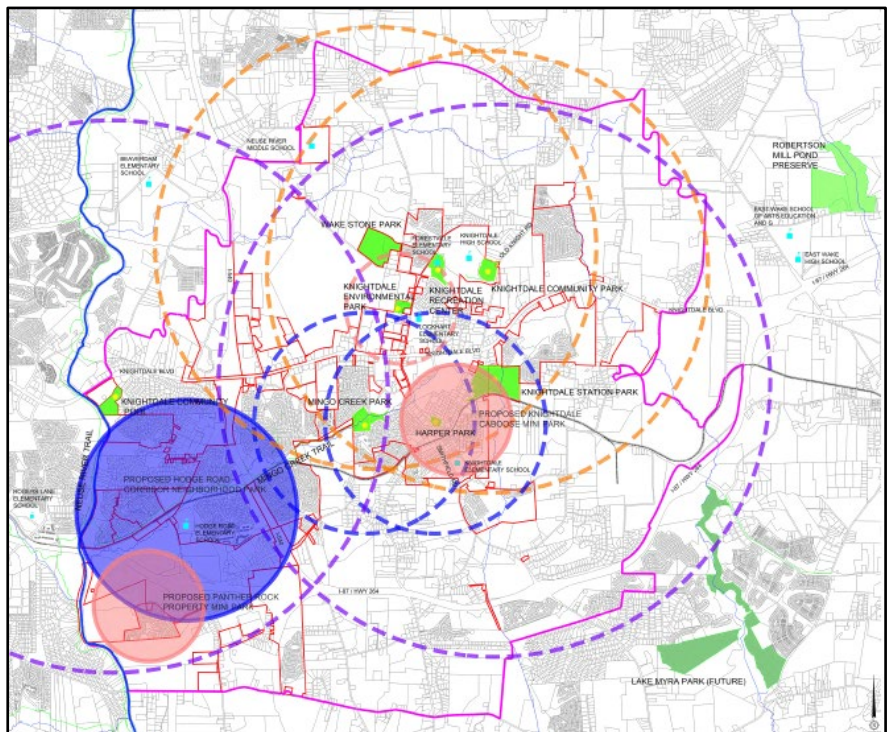


CONSISTENCY WITH THE COMPREHENSIVE PARKS AND RECREATION MASTER PLAN:

(No changes since May 16, 2024 JPH)

The Knightdale Town Council adopted the Town’s first ever Comprehensive Parks and Recreation Master Plan in April 2022. This plan includes recommendations for future park facilities based on community needs and existing conditions.

The plan indicates that this proposal is within the two-and-a-half mile service area of Knightdale Station Park and the Knightdale Community Pool. The northern portion of the development is also within the one-mile service area of Mingo Creek Park. Once the entire length of Widewaters Parkway is completed, residents of Lyndon Oaks will have the option to utilize the available pedestrian facilities to reach these parks.





Town of Knightdale

Staff Report

CONSISTENCY WITH AFFORDABLE KNIGHTDALE PLAN: (No changes since May 16, 2024 JPH)

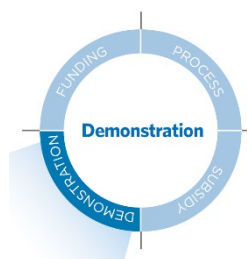
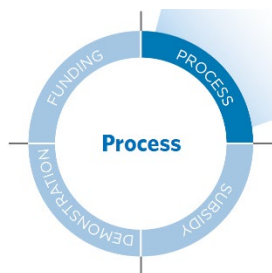
Town elected officials and leaders recognized the growing concern for the shortage of housing options available to serve a range of incomes in town and the need to ensure a variety of housing choices and opportunities for the present and future workforce. As a result, an action-oriented plan was developed, and adopted on March 20, 2024 by Town Council, that provides unique, innovative, and tailored policy recommendations for our community.

An essential aspect of Affordable Knightdale is inclusionary growth principles that ensure economic mobility to all Knightdale residents. While housing is an important tool to ensure livability, other variables also contribute. Elements to consider regarding housing include: the character of the neighborhood in which the house is located, the ease of navigation through streets that connect housing to the rest of the town, the amenities and services nearby, and the place of housing in the natural environment. When making planning decisions, mobility, connectivity, amenities, vitality, and opportunity should be the focus in order to ensure Knightdale remains a place for all who want to be here.

The Plan establishes twelve recommendations that encompass a variety of methods, approaches, programs, and policy goals and fit under four main categories: Funding, Process, Subsidy, and Demonstration.

Based on the revised Master Plan submitted, the Applicant included an Architectural Standard (Page 9 of this Staff Report) that applies to single-family detached rear-loaded homes. According to that standard, up to 50% (approximately 54 units of 109) of these housing types may have a minimum heated area of 800 square feet. The Applicant indicated that this standard is meant to align the development proposal with the Affordable Knightdale Plan and begin implementing recommendations of that plan. The Applicant also noted that the proposed variety of housing types and lot variety of the proposed development can help promote a diverse and walkable community, a key point of the Plan.

The development proposal includes elements that lend themselves to concepts and recommendations outlined in the Plan. Of the twelve recommendations detailed in Affordable Knightdale, the following apply to this development proposal:



Zoning Incentives. Modifications to the Zoning Ordinance that would permit added residential density and streamlined procedures and offer incentives to create affordable housing.



Expand Housing Options. Promote the development of housing types the market alone can't provide, including starter homes, accessory dwelling units, and cottage court concepts.



Inclusive, Livable Environment. Ensure that housing planning will incorporate principles of walkability, bikability, transit-oriented design, and proximity to schools, jobs, shops, and services.



Town of Knightdale

Staff Report

CONSISTENCY WITH THE COMPREHENSIVE PLAN: *(No changes since May 16, 2024 JPH)*

North Carolina General Statute 160D-605 requires that **prior to** adoption or rejecting any zoning amendment, the governing board shall adopt a statement describing whether its action is consistent with an adopted comprehensive plan and explaining why the board considers the action to be reasonable and in the public interest.

The KnightdaleNext 2035 Comprehensive Plan contains ten guiding principles categories developed by the community. These guiding principles should be embraced by development proposals to enhance quality-of-life and economic prosperity across town. The principles embody the core philosophy and Town vision expressed by the community.

Of the ten guiding principles detailed in the Comprehensive Plan, the following applies to this development proposal:

TRANSPORTATION



Provide a safe, reliable, and integrated transportation system that balances all modes of transportation, including walking, biking, public transit, and cars. Consider land use and infrastructure investments together, promoting a network of complete streets that emphasizes the quality and character of both the street and its surrounding development pattern (whether rural, suburban or urban in nature). Emphasize a safe and efficient transportation system for both destination- and recreation-focused trips, with special attention given to the mobility needs of children, seniors, runners, bikers and families.

COMPACT DEVELOPMENT PATTERNS



Guide future growth into more compact and efficient development patterns that will help manage the timing, location, and magnitude (length and size) of expensive infrastructure investments. Prioritize infill development and redevelopment in identified activity centers over continued green field development patterns, and use public infrastructure investments in the activity centers to encourage and leverage future private investments. Acknowledge that increased densities and intensities, and a mix of residential and nonresidential uses, will be needed in the activity centers to accommodate anticipated Town growth. Activity centers added to the Growth and Conservation Map in the future should reflect orderly and incremental growth patterns away from existing and identified activity centers in the 2035 KnightdaleNext Comprehensive Plan.

COMMUNITY DESIGN



Celebrate a distinct brand and sense of place that is uniquely Knightdale, while still tapping into the talent and creativity of the people that shape its residents, business owners, property owners, developers, planning and design professionals, etc. to keep things relevant and authentic. Prioritize Town investments in the spaces around, between, and within buildings (the "public realm") that create a certain vibe, identity, and reputation for Knightdale as a place for pedestrians and active public spaces. Use investments in the public realm—street improvements, public spaces, lighting, landscaping, artwork, etc.—to leverage greater private investment in terms of building use, scale, placement, materials and interactions with the public realm.

GREAT NEIGHBORHOODS AND EXPANDED HOME CHOICES



Promote distinct, safe, and vibrant neighborhoods throughout Knightdale that provide greater access to a range of housing choices people need at different stages of their life, including young adults, families, empty-nesters, retirees, seniors, and people of different income levels. Housing opportunities should include single family homes of all sizes, townhomes, apartments, condominiums, senior living units, live-work units, and accessory dwelling units. New neighborhoods should mix two or more housing choices into one community. Strong neighborhoods and a diverse housing strategy will make Knightdale a more livable community—one where residents can live their entire lives.



Town of Knightdale

Staff Report

X. JOINT PUBLIC HEARING SUMMARY:

A joint public hearing with the Land Use Review Board and Town Council was held at the May 16, 2024, Town Council meeting. The following items were discussed by Council and LURB members at that meeting, and the Applicant has provided additional information since. Information in red has been added since the LURB meeting. Please note that some questions and responses have been omitted from the below, however, a complete record of the Applicant's responses can be found in the attachments to the Agenda Packet.

1. Transportation Impact Analysis (TIA) study intersections and adjacent developments

- a. **Public Hearing Concern:** Why did the project's TIA exclude studying the intersection of N. First Avenue and Smithfield Road?

Applicant Response: The parameters for the TIA are coordinated with both NCDOT and Town staff through a scoping process in which many things are determined, including but not limited to, study intersections, background traffic growth, and other area developments.

This particular intersection was not included as NCDOT and Town staff determined during the aforementioned scoping process that the development traffic would not be expected to have as great an impact at this intersection. It was determined that the majority of the proposed development traffic would likely travel to/from the west on Old Faison Road (away from the N First Ave/Smithfield Road intersection). In addition, as staff stated during the public hearing, other developments in the area will already be providing improvements to this intersection.

Staff Analysis: Staff concurs. Through the scoping process, Town staff agreed that this intersection was not necessary to study with the Lyndon Oaks development. According to the approved TIA for the Downtown North project, that development is required to construct turn lanes along the southbound, eastbound, and westbound approaches and modify the traffic signal to accommodate these geometric changes.

- b. **Public Hearing Concern:** Why did the project's TIA exclude studying the traffic generated by the Silverstone and Stoneriver residential developments?

Applicant Response: Only developments that have been approved (but are not being built) at the time of traffic study scoping are studied separately outside of background traffic in the TIA. If a nearby development is 'underway' then it is typically assumed that the traffic associated with that development is captured in the background growth rate (3% per year). Because Silverstone and Stoneriver were already underway when the TIA was scoped last year, they weren't considered as separate "approved" (but not built/underway) developments, like Riverview Commons.

Staff Analysis: Staff concurs. Through the scoping process, Town staff agreed that these developments were not necessary to study with the Lyndon Oaks development.

2. Tart Farm/Old Faison Road Intersection Design

- a. **Public Hearing Concern:** Will a full movement intersection be safe considering the amount of traffic generated at full build-out?

Applicant Response: Site Access A will have a 75-ft right turn lane and a 100-ft left turn lane on Old Faison, and the northbound approach will be stop-controlled. The TIA did not recommend an all-way stop control at this intersection because of the potential for traffic to back up along Old Faison



Town of Knightdale

Staff Report

including into the adjacent intersection of Bethlehem/Old Faison creating an unsafe condition. Additionally, based on the expected volumes at this intersection, the TIA did not show that a signal would meet all of NCDOT's required warrants. As development continues in the area, then it is likely that the intersection would continue to be analyzed to determine if additional improvements would be needed. However, based on the projected impacts of this development, additional improvements are unlikely to be warranted.

Staff Analysis: Staff met with NCDOT to discuss this intersection design following the Joint Public Hearing. NCDOT indicated that this intersection was analyzed during the review of the TIA but did not warrant additional improvements or monitoring for a future signal, which is why improvements were not recommended.

Although not captured in the TIA recommendations, Staff share similar concerns as Town Council about the safety of this intersection and recommend a zoning condition be added to formalize this intersection monitoring process in the event intersection improvements become warranted as the development is built-out. NCDOT supports the inclusion of a zoning condition.

Staff Analysis (July 17, 2024): Based on the 2032 No-Build/Build AM and PM Peak Hour Trips for this intersection (Appendix E; PDF Pages 80-83), the intersection currently operates at an acceptable LOS B in both the AM and PM Peak Hours, however, the lefthand turn onto Old Faison degrades to a LOS E in the AM and a LOS D in the PM based on traffic generated from this development.

Applicant Response (July 17, 2024): The Development Team is aware that this intersection is a concern, has taken a closer look, and is willing to continue to look at it and discuss it further, however, below are a few concerns/observations:

This intersection movement LOS is based on the anticipated delay time to make a lefthand turn onto Old Faison from Tart Farm. A delay is expected since there will be 500 homes connected to that intersection vs. today's condition (only 3-4 homes). It's not uncommon for minor street approaches to have a lower peak hour LOS for left turns onto major streets, and the TIA's queuing data shows that there should not be more than ~4-5 vehicles waiting to make a left turn during peak hours (at least partially due to the installation of the signal at Old Faison/Bethlehem, which will help facilitate left turns from Tart Farm because it will create more breaks in the traffic on Old Faison). Peak hour LOS doesn't directly correlate to NCDOT's required sustained signal warrant volumes.

The Development Team also looked at a right-in/right-out for Site Access A with their Traffic Engineer. Restricting this intersection to a RI/RO would cause U-turns elsewhere along Old Faison Road. Because Old Faison is not set up for U-turns, other safety issues would be created at other intersections. Looking at the corridor as a whole, introducing U-turns at the already congested Old Faison Road will create additional conflict points. Plus, safety aside, if drivers had to U-turn or even for those drivers that would choose to reroute to the Bethlehem entrance rather than U-turn – significantly more traffic would be sent to the Old Faison/Bethlehem intersection.

3. I-87 Pedestrian Bridge

- a. **Public Hearing Concern:** Will the offered condition regarding the easement for the future pedestrian bridge be sufficient?



Town of Knightdale

Staff Report

Applicant Response: There is not a design at this time, and the Town does not yet control land on the other side of I-87 for the other side of a bridge, but a future pedestrian bridge over I-87 is shown on the Sidepaths & Greenways Plan in this approximate location. Thus, we will dedicate and show on its plat a minimum 100 sf easement for a future pedestrian bridge over I-87 so that when the Town is prepared to install this bridge, it will control enough land to install bridge footings on the northern side. We will work with staff on the exact area shown on the plat for the easement area.

Staff Analysis: Staff support the offered condition and process to establish said easement. The condition sets a minimum area for dedication rather than a maximum, and when the pedestrian bridge project boundary is further defined, the Town will have the ability to better communicate the needs for this pedestrian bridge. In addition, the future easement area is in a location that limits impacts to lot layout and site design.

4. Old Faison/Bethlehem Road Intersection Improvements

- a. **Public Hearing Concern:** When will these improvements be made?

Applicant Response: We plan to work out phasing of all off-site improvements through the Development Agreement process. We understand that the project cannot be built without a schedule that the Town Council agrees to during that process, and that the improvement of the Old Faison/Bethlehem Rd intersection is a priority for the Town Council.

Staff Analysis: Staff shares similar concerns about this intersection's current level of service and associated congestion. **The roundabout analysis shows that the appropriate intersection improvement is a signalized intersection.** Staff will continue to work with the Developer to prioritize these improvements and further define the anticipated construction timeline.

5. Alternative intersection designs for Widewaters Parkway and Tart Farm Road

- a. **Public Hearing Concern:** Can a mini-roundabout or raised intersection be constructed in this location?

Applicant Response: We would like to further explain all of the unique features of the intersection design in the context of the larger development. It will be the only all-way stop control intersection in Lyndon Oaks. This was intentional, as all drivers will have to stop and look for pedestrians and cyclists before proceeding through the intersection. All-way stop control is a form of traffic calming. Vehicles will have to come to a complete stop, vs. at roundabouts where they are in a yield condition. The additional elements added to this intersection will ensure safety for pedestrians and cyclists as well. Stamped concrete/asphalt provides better visibility for the drivers and pedestrians, as do the RRFBs at the pedestrian crossing to warn drivers to look for pedestrians, and pedestrian refuges in the median in the center of the wider Widewaters Parkway. This design should not need as much maintenance as either a roundabout or a raised intersection. With a roundabout, the center island would need to be traversable and would need to be repaired more often. A raised intersection would also require more physical maintenance for the Town and will make drainage design and maintenance more difficult and costly. In sum, we do believe that the all-way stop design with stamped concrete, RRFBs, pedestrian refuges in the medians, and high visibility crosswalks that we worked on with staff will create a safe environment for pedestrians and cyclists and prioritizes those users, without additional long term maintenance and drainage concerns.



Town of Knightdale

Staff Report

Staff Analysis: Staff supports the intersection design as proposed with stamped concrete, RRFBs, pedestrian refuges island, and high visibility crosswalks. Staff will continue to work with the Developer to ensure these improvements are installed.

6. On-street Parking

- a. **Public Hearing Concern:** How will the areas that do not allow on-street parking be designed and enforced?

Applicant Response: Travel lanes will be striped and will be narrow enough that drivers should not feel that they are able to park in the designated travel lanes; however recognizing the concern that some drivers might be tempted to park in front of front-loaded homes, the Applicant will commit to “No Parking” signage in these locations. The Town should be able to enforce “No Parking” areas on Town-owned streets for future residents.

Staff Analysis: All proposed streets throughout the development will be dedicated to the Town as public streets, which allows Town Police parking violations and enforcement measures if necessary.

- b. **Public Hearing Concern:** How does on-street parking affect fire access?

Applicant Response: The travel lanes adjacent to on-street parking are the same width as all other travel lanes, so emergency vehicles will be able to travel by on-street parking without issue. If there were an emergency situation in a home adjacent to on-street parking, a fire truck would still be able to park nearby and access the home.

Staff Analysis: The Town’s Deputy Fire Marshal currently serves as the Fire Department’s representative on the Development Review Committee. All plans (Sketch Plan, Master Plan, and Construction Drawings) are reviewed by the Fire Department for compliance with their regulations.

7. Widewaters Parkway Design Speed

- a. **Public Hearing Concern:** What is the proposed speed limit on Widewaters Parkway?

Applicant Response: Our understanding is that the speed limit would be around 30-35 MPH. Widewaters Parkway will be a Town-owned road, and the portion on Lyndon Oaks has been designed not to include any residential driveways to reduce impacts to future residents and give the Town flexibility on the appropriate speed limit on what will one day be an important connector avenue to US 64 Business.

Staff Analysis: Section 10.5.A of the UDO provides design criteria and standards, including maximum design speeds, for all street types. Widewaters Parkway will be constructed to the Avenue Roadway Standard, which has a maximum design speed of thirty to thirty-five miles per hour (30-35 mph). According to Section 10.4.A.2.c of the UDO, “Avenues connect neighborhoods to town centers, and provide key north-south and east-west mobility corridors across town. Two-lane roadways contain sufficient pavement for bicyclists and motorists. Avenues are richly landscaped, since they are civic spaces that serve as gateways to the town center. Avenues should have the tallest tree canopies. Since avenues serve as the transition between the town and the neighborhoods, speeds should be kept low, typically thirty to thirty-five (30-35) mph.”



Town of Knightdale

Staff Report

8. Longevity of roundabouts and design characteristics

a. Public Hearing Concern: How can roundabouts fail?

Applicant Response: Like any other intersection, they can reach capacity and have delays that result in extended queuing and wait times. The TIA ultimately recommended a signal at the Old Faison/Bethlehem Rd intersection because the analysis showed that, based on the expected traffic patterns at that intersection, the signal and turn lanes had more favorable long-term capacity and queuing results.

Staff Analysis: Although the TIA shows a signal and turn lanes as more favorable in the long-term, that analysis did not consider the impacts of the completion of I-540 and how travel patterns may change once open. As a result, staff requested that the Town's consulting engineer provide an additional analysis that considers these changes in travel patterns and their impacts to the roadways in the vicinity of the proposed development. **The roundabout analysis shows that the appropriate intersection improvement is a signalized intersection.**

9. Alternative SCM Design

a. Public Hearing Concern: Alternative designs such as bioswales, bioretention, constructed wetlands should be explored.

Applicant Response: These SCM designs typically cannot treat as much stormwater and have more long-term maintenance costs for the HOA, but we are proposing to incorporate green SCM features, such as cisterns, bioswales, or planted wetlands, into the stormwater control design in and around the main amenity where they can be a visible feature of the community, and add educational signage.



Staff Analysis: Staff support the inclusion of green infrastructure at the amenity center and will continue to work with the Developer to see how these systems can be further incorporated into the design.



Town of Knightdale

Staff Report

10. Public Alley Design and Landscaping

- a. **Public Hearing Concern:** How can trees and benches be incorporated into the design of the public alleys?

Applicant Response: The public alleys will look just like the private alleys but will have wider ROW to accommodate utility easements. We have not been able to plant trees in public utility easements in the past. Also, we have chosen to provide benches in improved open space areas, such as the common greens between the townhomes in the southern portion of the project, where there is pedestrian infrastructure, and we expect pedestrians and residents to enjoy open areas. Alleys do not have sidewalks or other pedestrian infrastructure and are provided so that owners of rear-loaded homes can have vehicular access. But we understand the importance of tree canopy and will look for areas to add trees adjacent to private alleys to provide additional tree canopy in these areas.

Staff Analysis: According to the City of Raleigh, no landscaping (trees, shrubs, bushes) or permanent structures (fences, sheds, buildings) can be placed on top of the water or sewer mains when located within public rights-of-way or City of Raleigh water or sewer easements. Town staff will continue to work with the Developer and City of Raleigh staff to see if any other options are available to add planted material or movable structures (benches) to these areas.

- b. **Public Hearing Concern:** In general, how can trees be incorporated into the design of all roads to provide shade over sidewalks and pedestrian corridors?

Applicant Response: We will add canopy trees to lots in areas where on-street parking is provided, at the same planting rate as street trees, to maintain the tree canopy adjacent to on-street parking spaces.

Staff Analysis: The Applicant has demonstrated general compliance with all Street Tree requirements outlined in Section 7.4.L of the UDO. Staff will ensure all UDO requirements related to street trees are met.

XII. LAND USE REVIEW BOARD SUMMARY:

The proposal was presented to the Land Use Review Board at their June 10, 2024, meeting. An overview of the proposal was shared, along with the proposal's consistency with the Comprehensive Plan. A motion was made to recommend approval of the proposed development, and to forward the following recommended advisory statement to Town Council. The motion was seconded and unanimously approved by a vote of 5-0.

The proposed Zoning Map Amendment is consistent with the KnightdaleNext 2035 Comprehensive Plan as it addresses several of the guiding principles such as expanding the roadway and greenway network and providing new connections, utilizing compact development patterns, creating a unique community design, and providing expanded home choices for current and future Knightdale residents. Further, it is consistent with the Plan's Growth & Conservation Map's designation as a Mixed-Density Neighborhood Place Type, the Growth Framework Map's designation as a Target Investment Area, the Roadway Network Plan, the Sidepaths & Greenways Plan, and the Mixed-Density Residential Focus Area Study. The request is reasonable and in the public interest as it aids in developing a vibrant, sustainable, and safe community design which achieves the spirit and intent of the Town's vision for growth.



Town of Knightdale

Staff Report

XII. STAFF RECOMMENDATION:

It is staff's recommendation that Town Council approve the request to rezone approximately ±171.88 acres consisting of seven tracts of land located at 940 Bethlehem Road and Wake County PINs 1743-95-3683, 1743-97-1085, 1753-07-1583, 1743-97-6575, 1753-15-2116, 1743-98-9384, and 1743-98-6356, from Rural Transition and GR3 to Residential Mixed-Use Planned Unit Development to allow for the construction of up to 500 residential lots and approximately 15,000 square feet of neighborhood serving commercial uses.

The proposed Zoning Map Amendment is consistent with the KnightdaleNext 2035 Comprehensive Plan as it addresses several of the guiding principles such as expanding the roadway and greenway network and providing new connections, utilizing compact development patterns, creating a unique community design, and providing expanded home choices for current and future Knightdale residents. Further, it is consistent with the Plan's Growth & Conservation Map's designation as a Mixed-Density Neighborhood Place Type, the Growth Framework Map's designation as a Target Investment Area, the Roadway Network Plan, the Sidepaths & Greenways Plan, and the Mixed-Density Residential Focus Area Study. The request is reasonable and in the public interest as it aids in developing a vibrant, sustainable, and safe community design which achieves the spirit and intent of the Town's vision for growth.