SUBJECT: CPAM-2020-0001, Public Facilities in the Rural Policy Area

ELECTION DISTRICTS: Blue Ridge and Catoctin

CRITICAL ACTION DATE: At the pleasure of the Board

STAFF CONTACTS: Pat Giglio, Planner III, Planning and Zoning
Dan Galindo, AICP, Planning Manager, Planning and Zoning
Alaina Ray, AICP, Director, Planning and Zoning

PURPOSE: The purpose of the Comprehensive Plan Amendment (CPAM) is to amend the Loudoun County 2019 General Plan (2019 GP) to add text and policies to permit the extension of the central water and wastewater system to serve only public facilities located on contiguous publicly-owned parcels in the Rural Policy Area (RPA) located immediately adjacent to the western boundary of the Transition Policy Area (TPA). The CPAM would also add a potential future middle school site located on the south side of Red Hill Road, west of Evergreen Mills Road, as a feature shown on the 2019 GP Existing Facilities Map (see page 2 of Attachment 1).

RECOMMENDATIONS:

Planning Commission: At the Planning Commission (Commission) Work Session on October 8, 2020, the Commission forwarded (8-1: Vance opposed) the application to the Board of Supervisors (Board) with a recommendation of denial of CPAM 2020-0001. The Commission approved (8-1: Kirchner opposed) a follow-up motion to request that the Board direct staff and the Commission to do a broader evaluation of the land use of the potential middle school site and the RPA east of Greene Mill Preserve and to evaluate potential land use changes in the area.

Staff: Staff supports Board approval of CPAM-2020-0001.
PROPOSAL: At the Board Business Meeting on June 16, 2020, the Board unanimously voted (9-0) to initiate a CPAM to permit the extension of the central water and wastewater system (i.e., Loudoun Water) to serve public facilities located on contiguous publicly-owned parcels in the RPA immediately adjacent to the western boundary of the TPA. The 2019 GP currently provides for the extension of municipal water and wastewater systems originating from the Towns to serve public facilities located in the RPA but does not provide for the extension of the central water and wastewater system to serve public facilities within the RPA. The CPAM will partially reconcile the 2019 GP’s treatment of the extension of municipal and central systems into the RPA to serve public facilities.

The CPAM proposes minor text amendments, discussed in greater detail beginning on page 5, to the fiscal management and public infrastructure policies in Chapter 6 and the Implementation Matrix in Chapter 7 of the 2019 GP. The CPAM also amends the Existing Facilities Map in Chapter 6 of the 2019 GP to add a future middle school as a feature shown on a potential County-owned public use property located along the eastern edge of the RPA where it adjoins the TPA (see Figure 1). The potential future public middle school site is 172.9 acres in size and is located on the west side of Evergreen Mills Road (Route 621), on the south side of Red Hill Road (Route 617), and southwest of Ryan Road (Route 772). This site consists of two properties more particularly identified as PIN: 242-18-1260 and PIN: 242-28-8988. The addition of the future school site as a feature shown on the Existing Facilities Map will expedite the approval process for the future middle school which has a planned opening in fall 2024.

BACKGROUND: Continued residential growth in the County has necessitated the planning and construction of additional public schools to accommodate growing student enrollment. Recognizing that vacant land suitable for school sites has become significantly more difficult to acquire and that most school sites obtained by dedication from developers have already been developed, Loudoun County Public Schools (LCPS) has identified and initiated a contract for the purchase of land located along the eastern edge of the RPA bordering the TPA to accommodate a planned future middle school site within the LCPS Dulles North Planning District. The 2019 GP identifies the establishment of institutional uses, such as schools, as conditional uses within both the Rural North and Rural South Place Types (2019 GP, Chapter 2, Rural Policy Area, Rural North and Rural South Place Types). The proposed CPAM will update the 2019 GP to depict the planned future middle school site as a feature shown on the County’s Existing Facilities Map. This will expedite the County’s review process for the school because facilities shown in the comprehensive plan do not require an application for a Commission Permit. The CPAM will also amend the water and wastewater policies to permit the extension of the central system (i.e., Loudoun Water) to serve public facilities more efficiently. 2019 GP policies support LCPS acquisition of needed sites through the fiscal planning and land development process (2019 GP, Chapter 6, Action 1.1.A). The potential middle school site is located near existing and planned communities to serve the growing school population in this area of the County. Proposed updates to Chapters 6 and 7 can be found in redline in Attachment 1.
The water and wastewater policies of the 2019 GP currently preclude extension of the central system into the RPA except where needed to address a public health threat to an existing rural community (2019 GP, Chapter 6, Action 4.5.A). This policy differs from the 2019 GP’s treatment of municipal (i.e., Town) water and sewer extensions into the RPA, which are permitted to serve public facilities located in the RPA (2019 GP, Chapter 6, Action 4.6.F). For reference, Kenneth W. Culbert Elementary and Harmony Middle School are both located within the RPA and served by municipal water and wastewater provided by the Town of Hamilton. The CPAM will partially reconcile the 2019 GP’s treatment of municipal and central systems with regards to public sewer and water extensions into the RPA to serve public facilities, such as schools. The extension of central water and wastewater to serve public facilities in the RPA provides other long-term benefits to the County including reduced land requirements for future public facilities that will not have to provide space for wells and septic systems, more efficient service of larger public facilities via the larger capacity of the central system, lower maintenance and operations costs, and the provision of adequate water pressure and storage capacity for fire protection for public facilities. LCPS’ review comments (beginning of Attachment 2) and letter to the Planning Commission (Attachment 3) discuss this in further detail.

The proposed CPAM policy language specifies that extensions of the central system into the RPA would only be allowed to serve public facilities on contiguous parcels directly adjacent to the western boundary of the TPA, which currently serves as the western geographic limit of the central system’s existing sewer and water service. The western boundary of the TPA also serves as the County’s growth boundary, marking a distinct shift in land use, density and development characteristics as it gives way to the RPA. The proposed text amendment and geographic limits of the CPAM were developed to ensure that such water and sewer extensions were limited in size and scope to serve only public facilities and would not allow central utilities to serve other users in the RPA. The proposed CPAM does not expand the central sewer and water service boundary into the RPA but rather provides an exception for public facilities only.

**Planning Commission:** The Commission held a Public Hearing on CPAM 2020-0001 on September 22, 2020. Six members of the public spoke, primarily residents in vicinity of the potential future public middle school site. Issues raised by the speakers included increased traffic, visual impacts, impacts to environmental and historic resources, the potential for other public facilities to be located on the proposed site, and larger land use considerations regarding access to utilities and redesignation of the subject site from RPA to TPA.

In addition to the issues raised during the public hearing, the Commission’s discussion also covered the following issues:

1. Concerns that the introduction of central water and wastewater connections in the RPA, even to serve County-owned public facilities as contemplated in the CPAM, would represent a significant change in County land use policies that restrict central utilities in the RPA;
2. The geographic scope of the CPAM and the process for consideration of additional future schools on the potential Middle School site and other public facilities located elsewhere in the RPA adjoining the TPA through the Commission Permit process;

3. The logistics of serving the proposed middle school site and potentially other future schools with onsite water and wastewater systems and the location of potential connections to extend central water and wastewater systems to serve the site; and

4. The establishment of the middle school site and larger land use and utility policy consideration for the surrounding Red Hill community.

The Commission forwarded (9-0) the application to a future Work Session for further discussion.

At the Commission Work Session on October 8, 2020, the Commission discussed many of the same issues identified at the Public Hearing. The Commission asserted that the geographic scope of the CPAM was too large. An alternate motion to recommend approval of the CPAM while limiting the area to contiguous parcels immediately adjacent to Evergreen Mills Road and on the south side of Red Hill Road failed (2-7: Barnes, Combs, Frank, Hayes, Kirchner, Miller and Salmon opposed).

The Commission did not believe the CPAM to be the best method to address the goal of allowing a central utility system connection to the proposed middle school site and sought to further analyze future land uses in the vicinity and possibly reconsider the re-designation of the area currently located within the RPA to the TPA. However, the Commission acknowledged that the Board’s direction for the CPAM and the legal advertisement limited the scope of their deliberations. The Commission encouraged the Board to work with the Commission and community in the future to initiate a holistic evaluation and planning effort for the Red Hill community.

The Commission forwarded (8-1: Vance opposed) the CPAM to the Board with a recommendation of denial. The Commission further requested (8-1: Kirchner opposed) that the Board direct staff and the Commission to do a broader evaluation of the land use of the potential middle school site and the RPA east of Greene Mill Preserve and to evaluate potential land use changes in the area. Figure 2 displays the portion of the RPA east of Greene Mill Preserve.
OUTSTANDING ISSUES: Staff continues to support approval of the CPAM, and does not have any outstanding issues with the proposed plan amendment.

SUMMARY OF PROPOSED TEXT CHANGES: CPAM-2020-0001 Public Facilities in the Rural Policy Area proposes amendments to the following Chapters and provisions of the Loudoun County 2019 General Plan (see Attachment 1).

Amendments to Chapter 6 - Fiscal Management & Public Infrastructure:

- Establish new and/or revise certain existing policy language regarding the extension of central water and wastewater to serve public facilities located on contiguous parcels within the RPA and immediately adjacent to the western boundary of the TPA.
- Revise certain existing policy language regarding the definition of utility system service areas.
Amendments to Chapter 6 - Fiscal Management & Public Infrastructure, Loudoun County:

- Revise the existing map regarding the identification of a future middle school as a feature shown on a property located along the eastern edge of the RPA where it adjoins the TPA.

Amendments to Chapter 7 - Implementation, Implementation Matrix, Chapter 6, Fiscal Management & Public Infrastructure:

- Establish new and/or revise certain existing policy language regarding the extension of central water and wastewater to serve public facilities located on contiguous parcels within the RPA and immediately adjacent to the western boundary of the TPA.
- Revise certain existing policy language regarding the definition of utility system service areas.

The proposed text amendment is similar to existing policy language in the 2019 GP that permits the extension of municipal water and wastewater systems originating from the Towns to serve public facilities in the RPA. While this policy support has been in place for many years, it has not resulted in increased pressure to allow other users to connect because 2019 GP policies prohibit such connections. The extension of utilities into the RPA for very limited purposes is not unprecedented; the CPAM will simply allow another utility provider to serve public facilities within a limited area of the RPA. The addition of the future school site as a feature shown on the Existing Facilities Map will expedite the approval process for the future middle school by avoiding the need for the school to receive a Commission Permit.

AGENCY REFERRALS: The proposed text was referred to various agencies and committees within the County Government for comment. Comments were received from LCPS, Loudoun Water, the Department of Planning and Zoning (DPZ), the Department of Transportation and Capital Infrastructure (DTCI) and the County Attorney’s Office. Referral agencies did not raise significant concerns with the proposed amendment. Loudoun Water raised the possibility of a scenario where water and wastewater lines may be required to possibly cross properties within the RPA that are not public use properties to provide the most effective and efficient alignment. Staff notes that the 2019 GP already includes provisions that prohibit connection of water distribution and wastewater collection systems outside a defined water and wastewater service area. This amendment would not expand the Loudoun Water service area but rather provide exceptions for only public facilities in a specific geographic area, in the same manner this exception is provided for Town utility extensions into the RPA. More specific to the proposed middle school site, the property boundaries abut properties located in the TPA already served by Loudoun Water and would not require utility crossings on intervening properties (Attachment 3). Copies of all agency referrals are included as Attachment 2.

FISCAL IMPACT: No significant fiscal impacts are expected from the proposed CPAM. Should the Board approve the CPAM, the use of central water and wastewater to serve the proposed school is expected to decrease long-term utility maintenance and operational costs as compared to onsite water and wastewater systems.
ALTERNATIVES: The following alternatives have been identified for the Board’s consideration:

1. The Board may forward CPAM-2020-0001 to the next available Board Business Meeting for action.

2. The Board may suspend the rules and approve CPAM-2020-0001 as provided in Attachment 1 as recommended by staff.

3. The Board may forward CPAM-2020-0001 to the next available Transportation and Land Use Committee (TLUC) Meeting for further discussion.

4. The Board may take no action.

DRAFT MOTIONS:

1. I move that the Board of Supervisors forward CPAM-2020-0001, Public Facilities in the Rural Policy Area, to the December 1, 2020, Board of Supervisors Business Meeting for action.

OR

2a. I move that the Board of Supervisors suspend the rules.

AND

2b. I move that the Board of Supervisors approve CPAM 2020-0001, Public Facilities in the Rural Policy Area, provided as Attachment 1 to the November 12, 2020, Board of Supervisors Public Hearing Staff Report.

OR

3. I move an alternate motion.

ATTACHMENTS:

1. CPAM-2020-0001 Draft Revisions to the Text and Policies of the Loudoun County 2019 General Plan
2. Review Agency Comments
3. Loudoun County Public Schools Letter to Planning Commission, dated September 28, 2020
CPAM-2020-0001, Public Facilities in the Rural Policy Area

New proposed language for the Loudoun County 2019 General Plan is shown underlined in red below. Proposed existing language to be struck is shown in red strike-through. In addition, the Plan’s Existing Facilities Map (Map Number 2018-147) is also proposed to be revised as an Existing and Planned Facilities Map depicting the location of a future middle school site on the eastern edge of the RPA bordering the TPA within the area of the circle as shown on the map.

Chapter 6 - Fiscal Management & Public Infrastructure

Countywide Strategies

Strategy
4.2 Define specific service areas for utility systems to protect the viability of County land use goals.

Actions
A. Establish the geographic limits of standards-based utility service, and ensure adequate capacity and supply safeguards through the Commission Permit process prior to expanding existing service boundaries, or adding new boundaries in the case of the Rural Policy Area.

B. Prohibit connection to water distribution and wastewater collection systems when such requires crossing land outside a defined service area, except as allowed herein.

Rural Policy Area – On site and Community Systems

Strategy
4.5 Protect the rural character of western Loudoun by considering the ability of an area to support onsite or community water and wastewater systems for any areas proposed for development.

Actions
A. Prohibit extension of central water and wastewater service into the Rural Policy Area, except as allowed herein to address a public health threat to an existing rural community or to serve public facilities on contiguous parcels immediately adjacent to the western boundary of the Transition Policy Area.
Chapter 7 - Implementation

Implementation Matrix

The ability to monitor and evaluate the progress of the *Loudoun County 2019 General Plan* is crucial to determining whether the Plan is achieving the community’s vision and goals. The implementation matrix that follows summarizes all action items found in the Plan that require subsequent County action, such as studies, analyses, program development, and regulatory changes. The implementation matrix is provided as a tool for the Board to use as the framework for developing a work program to implement the Plan.

**IMPLEMENTATION MATRIX**

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<thead>
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<th>Chapter 6</th>
<th>Fiscal Management and Public Infrastructure</th>
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<td><strong>Action</strong></td>
<td><strong>Responsibility (Loudoun County Department or Agency)</strong></td>
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<td>4.2.B.</td>
<td>Prohibit connection to water distribution and wastewater collection systems when such requires crossing land outside a defined water or sewer service area, <em>except as allowed herein</em>.</td>
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<td>4.5.A.</td>
<td>Prohibit extension of central water and wastewater service into the Rural Policy Area, except <em>as allowed herein</em> to address a public health threat to an existing rural community, <em>or to serve public facilities on contiguous parcels immediately adjacent to the western boundary of the Transition Policy Area</em>.</td>
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</table>
July 31, 2020

Mr. Patrick Giglio, Project Manager
County of Loudoun
Department of Planning and Zoning
1 Harrison Street, SE
Leesburg, VA  20175

RE: CPAM-2020-0001, Public Facilities in the Rural Policy Area

Dear Mr. Giglio,

Loudoun County Public Schools (LCPS) appreciates the opportunity to provide comment on CPAM-2020-0001 and respectfully requests the Board of Supervisors approve the proposed amendments to:

1) allow the extension of central water and wastewater to serve public facilities located on contiguous parcels in the Rural Policy Area (RPA) located immediately adjacent to the western boundary of the Transition Policy Area (TPA); and

2) identify a future middle school on a potential County-owned public use property located on the far eastern edge of the RPA where it adjoins the TPA.

The School Board Adopted FY2021-FY2026 Capital Improvement Program (CIP) identifies the need for a Dulles North area middle school/MS-14 (page 29, attached) with a planned opening of fall, 2024. The LCPS Dulles North Planning District is one of the fastest growing areas in the County; the scarcity of developable land, with utilities, makes locating schools near the population they will serve challenging.

The Loudoun County Board of Supervisors and the Loudoun County School Board executed a Contract of Sale with Timber Ridge at Hartland, LLC in December 2019, for the purchase of 172.9 acres of land (MCPI 242-18-1260 (171.0 ac.) and MCPI 242-28-6988 (1.9 ac.) located on the west side of Evergreen Mills Road, southwest of the intersection of Evergreen Mills Road with Red Hill Road/Ryan Road. The contract is conditioned upon the proposed comprehensive plan amendment, as well as a due diligence study to determine the suitability of the property for the proposed development – including a planned middle school. Currently, LCPS is conducting feasibility studies for the property including archaeological, environmental, traffic, geotechnical, and similar preliminary assessments to ensure the property may be developed for the intended use. The study period ends in December 2020, with closing on the property to occur by the end of January 2021.

Attachment 2
The 172.9-acre property is the proposed location for MS-14. It is intended that the property will accommodate additional public facilities, including schools, in the future. However, LCPS understands that only MS-14 will be considered as a part of CPAM-2020-0001. Additional public facilities would be reviewed separately under the Commission Permit application process.

Identification of MS-14 as a feature on the public facilities map of the Loudoun County 2019 General Plan (2019 General Plan), as a part of CPAM-2020-0001, allows the school to be open by the planned 2024-2025 academic year. In addition to the legislative approval (CPAM-2020-0001), the site will need to be designed and engineered; a site plan must also be reviewed and approved. The general time frame for design, site plan review, the construction bid process, and construction of the school is approximately four (4) years. Thus, identification of the site with the comprehensive plan amendment, which has a projected action by December 2020, provides 3.5 years to open this needed facility.

CPAM-2020-0001 is the first step in the review of MS-14. If adopted, and the property acquired, the next step involves additional detailed studies and site engineering. The zoning of the property is A-3, Agricultural Residential, which allows public schools by-right. The development of the site would be regulated by the A-3 Zoning District requirements as well as the public school performance standards contained in Section 5-666 of the Zoning Ordinance. These performance standards dictate the development standards for public schools and address all aspects of development including utilities, lighting, landscaping, setbacks, noise, stormwater management, building design, environmental aspects, and transportation. A site plan typically includes conditions for development as a part of the review process.

The property is situated at the eastern edge of the RPA, immediately adjacent to the TPA. Currently the 2019 General Plan policies do not permit the extension of central utilities into the RPA. The ability to serve the proposed school site with central utilities has multiple benefits including the overall efficiency of the service, long term maintenance responsibility, reduced land requirements, anticipated lower cost, and central water for fire protection.

Loudoun Water is the established service provider for the County’s central water and sewer system. As such, Loudoun Water has the established infrastructure, resources, and experience to operate efficient and effective water and sewer service. In addition to the efficiency of the central system, extending existing water and sewer lines, as compared to providing on-site water and wastewater treatment facilities, is expected to cost less. While studies to quantify the comparative costs have not been conducted, it is expensive to conduct the required testing, construct on-site water and sewer treatment facilities, and set aside the land areas necessary to operate such facilities. Extending existing water and sewer lines will consume less land area (i.e., extension of existing service lines versus provision of land area for on-site treatment plants and drainfields) and, overall, will be more efficient to maintain than on-site treatment plants. Of the 17 schools located in the rural area of the County, 6 are served by on-site treatment facilities. The majority are connected to municipal systems provided by the western towns.
Water and sewer lines currently exist to the east and south of the proposed MS-14 school site. LCPS respectfully submits that connection to central facilities promotes the general public health, safety, and welfare and will be a better utilization of public funds.

Should you require further information, please contact myself or Sara Howard-O’Brien, Land Management Supervisor.

Sincerely,

[Signature]

Beverly I. Tate, Director

Attachment

c:  Eric Williams, Superintendent
    Kevin Lewis, Assistant Superintendent, Department of Support Services
    Sara Howard-O’Brien, Land Management Supervisor, Division of Planning Services
MIDDLE SCHOOL, MS-14

The middle school will be built using a two-story middle school design. The estimated 184,593 square foot building that will serve students in grades six through eight. With an anticipated capacity of 1,445, the middle school design will utilize the “house” concept for each grade and will include classrooms, a media center, cafeteria, auditorium, gymnasium, auxiliary gymnasium, and unlighted outdoor physical education fields.

A site will need to be acquired for MS-14 in the Dulles North Planning District.

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SCHOOL BOARD ADOPTED FY 2021 - FY 2026 CIP

DECEMBER 17, 2019
July 31, 2020

Pat Giglio
Department of Planning & Zoning
1 Harrison Street SE
PO Box 7000
Leesburg, VA 20175

RE: PUBLIC FACILITIES IN THE RURAL POLICY AREA
CPAM 2020-0001

Dear Mr. Giglio:

Loudoun Water has reviewed the proposed amendment and offers the following:

1. A school, or other public facility, will require a robust, preferably looped water system that can supply adequate (3,000 gallons per minute) fire flow. In order to provide this level-of-service appropriate for a school, or any other potential public facility, outside of Loudoun Water’s existing planning area, additional system upgrades (storage, upgraded pumping and/or upgraded transmission piping) in our existing system could be required.

2. The most efficient looped water system may require crossing additional parcels in the RPA (that may not be contiguous or intended to be served). Language should be considered to allow crossing of additional RPA parcels to serve any public facilities site in the most effective and efficient manner. Please see example illustration below.

![Diagram of water system](image)

3. In order to provide an appropriate wastewater level-of-service for a school, or any other public facility, outside of Loudoun Water’s existing planning area,
additional wastewater system upgrades (upgraded pumping and/or upgraded conveyance piping) in our existing system could be required.

4. Effective and efficient wastewater collection via a gravity connection could potentially require crossing additional parcels in the RPA (that may not be contiguous or intended to be served). Language should be considered to allow crossing of additional RPA parcels to serve any public facilities site, such that it could allow for the most effective and efficient alignment. Please see example illustrations below.

5. Would extension of central water and wastewater into the RPA to serve public facilities or address a public health need necessitate a redefinition of Loudoun Water’s service area? (See Strategy 4.2 - Define specific service areas for utility systems to protect the viability of County land use goals)

6. Does Strategy 4.2 Action B (Prohibit connection to water distribution and wastewater collection systems when such requires crossing land outside a defined water or sewer service area) preclude the requirement of parcels to be ‘immediately adjacent to the western boundary of the Transition Policy Area’? Please clarify.

Should you have any questions please do not hesitate to contact me.

Sincerely,

Andrew Beatty, PE
Project Engineer

Cc: Avril Andrews
The Loudoun County Board of Supervisors has initiated an amendment to the Loudoun County 2019 General Plan (2019 GP) (CPAM-2020-0001). The purpose of the amendment is two-fold. First, the text of the 2019 GP will be amended to allow the extension of central water and wastewater service into the Rural Policy Area to serve public facilities under certain conditions. Secondly, Comprehensive Plan Map Number 2018-147 is proposed to be renamed Existing and Planned Facilities and depict the location of a future middle school within the Rural Policy Area (RPA), adjacent to the Transition Policy Area (TPA) as a feature shown. Evaluation and comment from the zoning perspective is appropriate since zoning is an important implementation tool for policies of the General Plan.

1. **Amendment to Comprehensive Plan, Chapter 6 – Fiscal Management & Public Infrastructure, Strategy 4.5.**

   Currently, Strategy 4.5 states that the extension of central water and wastewater service into the Rural Policy Area (RPA) should be prohibited except in cases where there is a public health threat to an existing rural community. The strategy is proposed to be amended to add the phrase “or to serve public facilities on contiguous parcels immediately adjacent to the western boundary of the Transition Policy Area.” Public Facilities are defined in the Comprehensive Plan Glossary as “Public works supplied, owned, managed and/or maintained generally by a government organization or public authority. Examples include public roads, schools, water and sewer facilities, community centers, fire and rescue stations, public parks and recreation facilities, and libraries.” The proposed amendment is necessarily very specific to conditions and location to maintain the integrity of the affected policy areas and their intended purposes. Only a select group of properties will be included in an area that would be permitted to receive central water and wastewater service, those in the RPA that are immediately adjacent to the western edge of the Transition Policy Area (TPA), and then only for a very narrow category of uses, public facilities.
MEMORANDUM TO: Pat Giglio, Project Manager
DATE: September 2, 2020
Page 2

Affected Zoning Districts. There are four zoning districts administered under the Revised 1993 Loudoun County Zoning Ordinance in the RPA immediately adjacent to the western edge of the TPA, subject to CPAM-2020-0001: AR-1 (Agricultural Rural-1), AR-2 (Agricultural Rural-2), A-3 (Agricultural Residential) and PD-RV (Planned Development-Rural Village). Of these four zoning districts, only the A-3 district permits the extension of central water and sewer service as summarized in the table below.

<table>
<thead>
<tr>
<th>AR-1 (Section 2-100)</th>
<th>AR-2 (Section 2-200)</th>
<th>A-3 (Section 2-400)</th>
<th>PD-RV* (Section 4-1200)</th>
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</thead>
<tbody>
<tr>
<td>Individual systems on lot; Cluster Subdivision may use communal.</td>
<td>Individual systems on lot; Cluster Subdivision may use communal.</td>
<td>Except as expressly allowed, no municipal or communal water or wastewater system shall be extended or established. Central system permitted within Loudoun Water service area.</td>
<td>Each village will be serviced by its own public water and sewer facility. Lots in Conservancy sub-districts that are not adjacent to Village Center may use on-lot private well and septic.</td>
</tr>
</tbody>
</table>

If CPAM-2020-0001 is adopted, to permit central water and sewer service within the other districts to serve future public facilities, a Zoning Ordinance Amendment would be required.

Permitted Uses. Article 8 of the Zoning Ordinance defines the following terms that are applicable to the proposed CPAM:

“Public Utilities/Facilities: Public parks, playgrounds, trails, paths and other recreational areas and other public open spaces; scenic and historic sites; schools and other public buildings and structures. Any water or sewer system serving more than two (2) lots, and any building or structure owned by a public utility as defined in Section 56-232 of the Virginia State Code, all building and facilities owned by a public service corporation as defined in Section 56-1 of the Virginia State Code.”

“Public Use: Any area, building or structure held, used or controlled exclusively for public purposes by any department or branch of the Federal Government, Commonwealth of Virginia, or the Loudoun County government.”

It is important to note that the Zoning Ordinance definitions vary slightly from the “Public Facility” term in the Comprehensive Plan Glossary.

The types of public facilities that are permitted or special exception uses within the four zoning districts subject to CPAM-2020-0001 include, but are not limited to, public schools; public parks; fire,
rescue, and police stations; structures or uses for federal, state, county or local governmental purposes; libraries and post offices. For example, public school is a permitted use in A-3, a special exception use in AR-1 and AR-2 and either a permitted or minor special exception use in PD-RV, depending on the individual subdistrict.

Additional Zoning Requirements. The Zoning Ordinance requires certain approvals prior to establishing a use. In accordance with Section 6-1100 Commission Permit, certain public facility uses must be identified on the Comprehensive Plan. If not deemed a feature shown on the Comprehensive Plan, approval of a Commission Permit by the Planning Commission is required. If the use is a special exception use, special exception approval by the Board of Supervisors is also required. Further, in accordance with Sections 6-700 and Section 6-1000, site plan approval and zoning permit issuance are required.


The Comprehensive Plan Map is proposed to be modified by adding “and Planned” to its current title Existing Facilities and to include the site of a future middle school as a feature shown on the far eastern edge of the RPA immediately adjacent to the western edge of the TPA.

The future Middle School site is zoned A-3 (Section 2-400) where a “Public School (elementary, middle or high), pursuant to Section 5-666” is a permitted use (Section 2-402 (BB)). Section 5-666 requires all public schools be served by central or municipal sewer and public utilities. Central water and sewer are permitted in the A-3 zoning district within the Loudoun Water service area. Therefore, if the Loudoun Water service area is expanded to include the proposed Middle School site, it may be served by central water and sewer without the need for a Zoning Ordinance Amendment. If CPAM-2020-0001 is approved to include the site on the Comprehensive Plan Map, to commence the Middle School use, site plan approval and zoning permit issuance will be required.

Thank you for the opportunity to provide this information.
DATE: July 30, 2020

TO: Pat Giglio, Project Manager
Department of Planning and Zoning (DPZ)

FROM: Juliane Dixon-Crump, Senior Transportation Planner
DTCI, Transportation Planning & Traffic Engineering Division

SUBJECT: CPAM 2020-0001 – Public Facilities in the Rural Policy Area
First Referral

Background

This Comprehensive Plan Amendment (CPAM) proposes to permit the extension of central water and wastewater service to serve County-owned public facilities located in the Rural Policy Area (RPA) on property adjacent to the Transition Policy Area (TPA). The CPAM also proposes to amend the Loudoun County 2019 General Plan Facilities Map to identify future Loudoun County Public School (LCPS) sites, specifically to address the potential use of a ±173-acre contract property for a Middle School and/or other future public uses. This property is located in the southwest quadrant of the intersection of Evergreen Mills Road (VA Route 621) and Red Hill Road (VA Route 617) / Ryan Road (VA Route 772) in the Rural Policy Area.

Department of Transportation and Capital Infrastructure (DTCI) review of this CPAM is based on materials received from the Department of Planning and Zoning on July 6, 2020, including (1) Board of Supervisors Copy Tote initiating this CPAM process and related materials, all dated June 16, 2020; and (2) DPZ Referral Letter with the amended Loudoun County 2019 General Plan proposed text amendment and Facilities Map.

Transportation Comments

1. Per Chapter 3 of the Loudoun County 2019 Countywide Transportation Plan (2019 CTP), the planned roadway network in the TPA is intended to reflect the transitional character of the area between the Suburban and Rural Policy Areas. Given that the potential development site is located in the RPA immediately adjacent to the western boundary of the TPA, current transportation facilities in the TPA proximate to the site could in part be utilized to accommodate the increase in vehicle trips that would occur as a result of public facility development in this vicinity.

2. Evergreen Mills Road (VA Route 621) is one of the main roadways that runs along the boundary of the RPA and the TPA in this vicinity and is currently constructed as a two-lane undivided major collector roadway. Per the 2019 CTP, in its ultimate condition, Evergreen
Mills Road is planned as a four-lane median divided major collector roadway with a 10-foot shared use path along both sides of the roadway. If this site is developed as a public school, a comprehensive Traffic Impact Study would be required at the initial Site Plan application submission stage to address specific traffic impacts and necessary mitigation / transportation improvements.

cc:  John Thomas, PTP, Assistant Director, DTCl  
     Lou Mosurak, AICP, Senior Coordinator, DTCl
MEMORANDUM

DATE: July 30, 2020

TO: Pat Giglio, Project Manager

FROM: Courtney R. Sydnor, Sr. Deputy County Attorney

SUBJECT: CPAM 2020-0001, Public Facilities in the Rural Policy Area
Referral Comments

I suggest the following edit to the proposed amendment of Chapter 6, Strategy 4.5, Action A, as shown in red:

A. Prohibit extension of central water and wastewater service into the Rural Policy Area, except as allowed herein to address a public health threat to an existing rural community or to serve public facilities on contiguous parcels immediately adjacent to the western boundary of the Transition Policy Area.

The purpose of this edit would be for clarity and consistency with similar policy language elsewhere in the 2019 General Plan.

In addition, I suggest that you update the corresponding provision of the Implementation Matrix to reflect the amended policy (see page 7-35 of the 2019 General Plan).

cc: Avril Andrews, Planning and Zoning
September 28, 2020

Mr. Patrick Giglio, Project Manager
County of Loudoun
Department of Planning and Zoning
1 Harrison Street, SE
Leesburg, VA 20175

RE: CPAM-2020-0001, Public Facilities in the Rural Policy Area and Designation of Middle School as Feature on Public Facilities Map

Dear Mr. Giglio:

At the September 22, 2020 Planning Commission Public Hearing, the Planning Commission requested additional information specific to the proposed middle school use. The purpose of this letter is to offer additional information for the Commission’s consideration.

Cost Analysis of Extension of Central Utilities Compared to On-Site Treatment Facilities

In response to the question as to whether a cost analysis has been conducted for the extension of public utilities vs the provision of on-site facilities, LCPS staff responded that it has not. The reason an analysis has not been performed is because of the extensive requirements for such an analysis and, in this instance, public utilities are being requested. Without conducting a site-specific analysis, general information can be offered that will provide a perspective of the cost differential. A generally accepted cost for the extension of central sewer and water lines is $200-$300 per linear foot, depending on physical conditions. Loudoun Water utility lines are currently located in the northeast quadrant of the intersection of Evergreen Mills Road and Ryan Road, approximately 700 feet from the subject property. The lines will need to be extended from their current location into the site to serve the middle school. To be conservative, the width across the entire site is 3,100 feet. The cost to extend sewer and water lines to serve the property is estimated between $1.5 and $2.3 million dollars. \[ (700 + 3100) \times 2 \text{ lines} \times (\$200-\$300) \]

The most recently bid LCPS project for an on-site utility is the replacement of the Luckets Elementary School wastewater treatment facility. This facility will serve the elementary school, the Luckets Community Center, and the Luckets Fire Station. On September 22, 2020, the School Board awarded the construction contract to the lowest responsive and responsible bid in the amount of $4,369,000.00. Design and associated costs result in a total cost for the Luckets Elementary wastewater treatment facility of $5.4M. Staff does not have a recent water treatment facility cost. Nonetheless, utilizing an example cost of one of the two facilities that would be required demonstrates the efficiency in extending central water and sewer lines to the proposed middle school site. It is also anticipated that on-site facilities would be more expensive than the Luckets facility given the comparative use size. In

Attachment 3
addition to the cost benefits of extending central utilities, there will be lower maintenance and operations costs, efficiency in land utilization, and central water for fire protection. As noted at the public hearing, public buildings such as schools, are national security assets utilized in the event of disasters and could best serve the public with the availability of central utilities.

**Due Diligence Studies Including Traffic Assessment for Proposed School Sites**

During the feasibility period of a land contract, due diligence review is conducted to ensure that the site is suitable for the use intended. Preliminary studies involve review of available records and data and further may include performing more detailed assessments as determined appropriate during the study period. These studies include review of rare and endangered species, wetlands, floodplain, topography, soils, historical and archaeological resources, utilities, and traffic.

Additional information was requested by Planning Commission members regarding the traffic assessment. During the review of a site, adjacent roads and the area transportation network are considered. Existing road conditions, planned road projects, and area development proffers are taken into account. The Countywide Transportation Plan and County Capital Improvement Plan are consulted. This information coupled with previous school project experience, enables LCPS staff to determine if the surrounding network will be sufficient and identify potential road improvements that may be necessary. In this particular case, the adjacent roads are Red Hill Road and Evergreen Mills Road. Improvements will be necessary for Red Hill Road, which is a two-lane, undivided, unpaved, local roadway. Evergreen Mills Road is a two-lane, undivided major collector, planned as a future four-lane divided roadway. The intersection of Red Hill Road and Evergreen Mills Road is signalized. Peak hour trip generation for the middle school is projected at 923 AM school, 458 PM school, and 246 PM commuter peak hour trips. Based on this information, the preliminary traffic assessment indicates that the area road network, with improvements, such as to Red Hill Road, can accommodate the proposed middle school use.

As noted at the public hearing, a detailed traffic analysis will be provided at the time of site plan. The scope of the analysis is determined by County staff and the study is reviewed by both the County and VDOT. The study will evaluate the road network, examine the proposed and planned land uses in the vicinity, incorporate background and new growth projections and recommend needed road improvements. The County will ultimately determine the road improvements required at the time of site plan.

**Proposed Uses and Potential Future Uses**

CPAM 2020-0001 seeks the identification of a middle school as a feature shown on the County’s Comprehensive Plan. Any other public use must be submitted for consideration as a Commission Permit under a separate legislative review. The purpose of a commission permit is to review the proposed use to determine if it is in compliance with the adopted comprehensive plan. In addition to the Commission Permit, any use must meet the requirements of the Zoning Ordinance, Facilities Standards Manual, and other code requirements and regulations. For the public school use, there are specific development performance standards within the Zoning Ordinance in addition to the requirements of the A-3 Zoning District.
Both the School Board and the Board of Supervisors review and approve capital projects. The proposed middle school, MS-14, is planned for the Dulles North area and is to open in Fall 2024 (2024-2025 school year). Reference to the middle school has been included in CPAM 2020-0001 for contractual reasons (i.e., to ensure that the proposed use is approved before purchasing the property) and for service delivery reasons. After land acquisition, a site plan, including the required traffic and archaeological studies, as well as construction plans and profiles must be submitted for review and approval. The engineering and approval process take approximately two years. Once the site plan and construction plans are approved, the construction process may begin which also requires +/- two years.

We appreciate the Commission’s time and consideration.

Sincerely,

Sara Howard-O’Brien, AICP
Land Management Supervisor

Enclosures: Graphic Depicting Existing Water and Sewer Lines

C: Beverly I. Tate, LCPS Planning Director
NOTICE OF ELECTRONIC MEETING: Due to the ongoing COVID-19 Pandemic, this Public Hearing will be conducted as an Electronic Meeting pursuant to the Continuity Ordinance re-adopted by the Board of Supervisors on October 14, 2020.

Members of the public are strongly encouraged to view and participate in the public hearing by electronic means, in furtherance of the Governor’s Executive Orders and social distancing directives. Board of Supervisors Public Hearings are available for viewing on television on Comcast Government Channel 23, Open Band Channel 40 and Verizon FiOS Channel 40, and are livestreamed at loudoun.gov/webcast. Options for electronic public input include:

Electronic/call-in public input: To give electronic public comments, speakers are strongly encouraged to sign up in advance by contacting the Office of the County Administrator at (703) 777-0200 by 12:00 p.m. on the day of the Public Hearing. Electronic input in this Public Hearing will be facilitated by the WebEx Events platform. To participate, speakers may log-on with a computer or dial in by phone. Detailed log-on instructions will be provided to individuals who sign up in advance and posted online the day of the Public Hearing at loudoun.gov.

(* Proposed on Consolidated Hearing)

I. CALL TO ORDER

II. CONDUCT AN ELECTRONIC MEETING

1. Resolution to Conduct an Electronic Meeting Under the Readopted Continuity of Government Ordinance (Countywide)

   Staff Contact: Leo Rogers, County Attorney’s Office

III. BOARD OF SUPERVISORS PUBLIC HEARING ITEMS FOR CONSIDERATION:

1. *Proposed Conveyance of County Property – Grant of Easement to Loudoun Water – 20272 Savin Hill Drive (Broad Run)

   Staff Contacts: Ernest Brown, General Services; Carlos Teran & Leo Rogers, County Attorney’s Office

2. *2020 Interim Additions to Agricultural and Forestal Districts (Blue Ridge and Catoctin)

   Staff Contacts: Rachael Iwanczuk & Alaina Ray, Planning and Zoning


   Staff Contacts: Richard Hancock & Alaina Ray, Planning and Zoning
IV. ADJOURN

Please note:
Advanced sign-up for Public Comment is available for the Public Hearing only. Contact the Office of the County Administrator at (703) 777-0200 to sign-up to speak on an item on the hearing’s agenda. Advanced sign-up is open until noon the day of the Public Hearing. The hearing can be viewed via webcast at www.loudoun.gov/meetings.

Copies of agenda items are available in the County Administrator’s Office, the Government Center, and also available on-line at http://www.loudoun.gov/bosdocuments. The Action Report of the hearing is usually available on-line by close of business two days following the Public Hearing. If you need assistance accessing this information contact County Administration at 703-777-0200.

If you require a reasonable accommodation for any type of disability in order to participate in this meeting, please contact the Office of the County Administrator at 703-777-0200. At least one business day of advance notice is requested; some accommodations may require more than one day of notice.

FM Assistive Listening System is available at the hearing. Agenda – 11-12-20

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