Loudoun County School Board
Zoning Map Amendment (ZMAP 2010-0001) and Special Exception (2010-0003)
Statement of Justification
High School (HS-7) and Elementary School, Goshen Road Assemblage
March 18, 2010

Proposal

The Loudoun County School Board (LCSB) seeks approval of a Zoning Map Amendment (ZMAP) to rezone three (3) acres of land, MCPI 248-48-6530, from PD-GI, Planned Development General Industrial, to TR-1 Transitional Residential-1, and a Special Exception (SPEX) to allow a high school (HS-7) and an elementary school on approximately 97.16 acres of land zoned TR-1, Transitional Residential (including the 3 acres to be rezoned), located south of Route 50, north of Route 620/Braddock Road, on both sides of Goshen Road within Dulles South. The property is situated to the west of future Relocated Route 659, west of, and partially within, the community of Stone Ridge, and within the Dulles Election District. The assemblage includes the following properties:

MCPI #	Owner	Acreage	Zoning
247-17-3577	Aldie Investments, LLC	15.02 ac	TR-1
247-17-8636	Aldie Investments, LLC	10.74 ac	TR-1
248-47-9789	Atif Ihsan Shah	2.26 ac	TR-1
248-47-8669	Aldie Investments, LLC	4.36 ac	TR-1
248-47-8234	Aldie Investments, LLC	12.93 ac	TR-1
248-37-9082	Robert & Frances L. Hall	8.57 ac	TR-1
248-37-9637	Doris Mae Larsen	14.04 ac	TR-1
248-38-2718	Frances L. Hall	3.0 ac	TR-1
248-48-6530	Floyd & Sandra Kline	3.0 ac	PD-GI (ZMAP 89-0008)
247-28-4151 (portion)	Stone Ridge Community Dev. IV, LLC	23.24 ac	TR-1 (ZMAP 1994-0017, ZMAP 2002-0013, ZCPA 2002-0004-Approved and ZMAP 2006-0011 & ZCPA 2006-0003-Pending)
	Total Acreage	97.16 ac	

The property is also within one mile of the LDN60 of Dulles Airport within the AI, Airport Impact Overlay District and contains major floodplain within the FOD, Floodplain Overlay District.

The Loudoun County Public Schools program for a high school includes a building of up to 292,000 square feet with a student capacity of 1800 and various recreational and athletic facilities including the high school football stadium, concession stands, ticket booths, storage buildings, the field house, baseball and softball dugouts and various athletic fields for both the physical education program and competition. The structures associated with the recreational facilities (concession stand, storage buildings, etc) contain an additional 10,000 square feet. The planned opening for the high school (HS-7) is the Fall of 2012, as identified in the FY 2011-2016 School Board Adopted Capital Improvements

Program (CIP). The elementary school program includes a two story building of up to 105,000 square feet with a student capacity of 875 and recreational facilities including a softball field and an all purpose field. A specific elementary school has not been identified for this site but will be determined later as a part of the CIP review.

Background

The land funds for HS-7 became available in July of 2006. Consideration was given to different sites, all of which were evaluated utilizing school site guidelines. Locations presented environmental obstacles, unwilling sellers, and asking prices significantly beyond appraised values. In February of 2008, SPEX (2008-0017) and CMPT (2008-0007) applications were filed for a site known as the Lenah Property. After extensive review, the applications were denied on October 21, 2008. During the review of the Lenah Property applications, concern was raised as to why LCSB did not choose a location within the Suburban Area, closer to the higher density communities of South Riding, Stone Ridge and surrounding neighborhoods. LCSB had found that there are limited opportunities for sites in the Suburban Area and purchasing sites in these higher density areas exceeded the land acquisition budget. Vacant land in the Dulles South Suburban Area consists primarily of land with zoning entitlements that result in higher land values and land within the County's planned Route 50 Business/Retail/Industrial corridor. A land inventory of the Dulles South Suburban Area was conducted at the direction of the Board of Supervisors in the Fall of 2008.

The proposed site is located within the Transition Area, adjacent to the Suburban Area, across future Relocated Route 659. A portion of the property (23+ acres) is located within the Stone Ridge community. Utilities (public water and sewer, gas and electric lines) are in close proximity to the site and may be readily extended for development. The property will accommodate the high school program and provide a location for an elementary school. The construction funds for HS-7 were approved by the voters on November 4, 2008. A Commission Permit (CMPT 2009-0013) was submitted for this property, known as the Goshen Road Assemblage, in October 2009, approved by the Planning Commission on 12/17/09, and ratified by the Board of Supervisors on 1/5/10. The Commission Permit found that the general location, character, and extent of the proposed site are in substantial accord with the adopted Comprehensive Plan. The proposed ZMAP and SPEX applications seek the additional legislative approvals required to permit the construction of the school facilities.

It is important to note that based on land use approvals, this area is expected to experience continued growth. Previously approved, funded, and under construction are ES-20 and MS-5. ES-20 is a proffered site located in the Seven Hills community, opening Fall 2010, and MS-5, located at the intersection of Braddock and Ticonderoga Roads, was acquired by the School Board and approved by the County in 2009, with an opening for Fall 2011. Beyond these schools, the FY11-16 School Board Adopted Capital Improvement Program (Recommended Projects) includes three elementary schools, two middle schools and one high school that will be needed to serve Dulles South and vicinity to the south of Route 50. The proposed elementary school site could satisfy one of these future needs. On the north side of Route 50, there are an additional four elementary schools, and one high school planned to serve the Dulles area. Of these, there are four proffered sites available (Brambleton (ES-14), Moorefield Station (ES-16), Arcola Center (ES-23), and Loudoun Valley Estates (HS-6)). It is important to note

that the CIP is for a five year planning period and does not reflect buildout of approved development. In addition, there are approximately 5,500+ acres planned for residential use within the Freedom (and planned HS-7) service boundary that could potentially be developed. This planned acreage is not included in the CIP projections.

PD-GI Property Background:

On March 19, 1991, the Board of Supervisors approved ZMAP 89-08, Alliance Resource Industries, for 1,027 acres for a quarry site and industrial uses. The rezoning was an assemblage of several properties located south of Route 50, between Route 616, Goshen Road, and Route 659, north of Braddock Road. Two hundred acres were rezoned to I-1, Industrial, for resource extraction and 827 acres were rezoned to PD-GI, Planned Development-General Industrial, for industrial uses. The zoning was never implemented and over time portions of the property were rezoned. The majority of the Alliance Resource Industries property became a part of the Stone Ridge Community and a portion became a part of the C.D. Smith property. There is one parcel remaining from the original Alliance Resource Industries Rezoning, MCPI 248-48-6530, zoned PD-GI. As a part of the HS-7/ES assemblage, it is proposed to rezone this three acre parcel to TR-1 to be consistent with the remainder of the assemblage, secure a Special Exception for the school use and to remove all prior proffers associated with ZMAP 89-08. The mitigation measures and appropriate conditions for the proposed school use would be evaluated and imposed as a part of the accompanying special exception.

SPECIAL EXCEPTION AND ZONING MAP AMENDMENT FACTORS FOR CONSIDERATION:

Sections 6-1310 and 6-1211 of the Zoning Ordinance outline various factors for consideration in the review of a special exception and zoning map amendment request. The following analysis first applies the special exception (Section 6-1310) factors to the Property, followed by additional criteria under Section 6-1211 (not already included in the special exception factors) for the zoning map amendment:

(A) Whether the proposed special exception/zoning district classification is consistent with the Comprehensive Plan.

The proposed school site is governed under the policies of the Revised General Plan (The Plan), the Countywide Transportation Plan (CTP), and the Bicycle and Pedestrian Mobility Master Plan (BPMMP). The subject property is designated as Transition Policy Area under The Plan and is located in the Upper Broad Run and Upper Foley Subareas. The Transition Policy Area is intended to provide a visual and spatial transition between the suburban development in the eastern part of the County and rural development in the west. All development within the Transition Policy area is to achieve a balance between the built and natural environments and to provide significant open space respecting the Green Infrastructure polices. The narrative for the non-residential component of the Transition Area recognizes the need to provide public schools that will serve both the rural and suburban populations. The Transition policies envision that the Transition area will develop in varying densities and

development patterns including large-lot low density residential development, higher density mixed-use villages and residential clusters. The Upper Broad Run and Upper Foley subarea policies state that development in a clustered pattern at existing zoning of one dwelling unit per three acres or one unit per acre is reasonable and appropriate.

Ideally, new non-residential uses are to be organized within the community cores of villages and, in general, should be compatible with the overall land use pattern. Plan policies provide that non-residential uses within the Transition Policy Area are to front on major arterial or collector roads and are to be developed at a scale that allows them to blend effectively into the rural landscape. The scale and volume of primary structures and accessory elements should not dominate over the natural landscape and should be screened through the use of natural landscaping and earthen berms. Building heights are to relate to the surrounding landscape. Specific school policies provide that public school sites should be located at the focus of the attendance area and provide safe and convenient access for students.

The proposed school site is situated west of planned Relocated Route 659, a planned, minor arterial and is separated from Relocated Route 659 by a 7 acre wetlands conservation area in Stone Ridge. To the west and south of the site are planned residential neighborhoods within the community of Stone Ridge (ZMAP 1994-0017, ZMAP 2002-0013, ZCPA 2002-0004, & pending ZMAP 2006-0011, ZCPA 2006-0003) and there is a 23 acre portion of the school site that is situated within Stone Ridge. The site is bisected by Goshen Road, a portion of which is proposed to be abandoned as a part of the school development (from the new public access road, Road A, south to Braddock Road. To the west and south of the site is the approved preliminary subdivision (SBPL 2006-0040) for Westport (Zoned TR-1). Also to the south and east is a proffered park to be conveyed to the County as a part of ZMAP 2002-0003, C.D. Smith. A second public access road, Road B, that will serve both the school facilities and the park, is proposed across the park site.

This site will provide a transition between the suburban development of Stone Ridge to the east and the lower density residential properties and uses within the Transition Area to the north (Stone Ridge), west (Westport), and south (Westport and C.D. Smith). As noted above, a community park/civic space of approximately 14.5+ acres is located to the south of the site on the east side of Goshen Road. This park is to be conveyed to the County upon the issuance of the 300th residential zoning permit within the C.D. Smith development. The total number of residential units approved for ZMAP 2002-0003 is 455.

As noted above, the site is situated such that there is a 7 acre wooded wetland conservation area located off-site between the proposed high school and planned Relocated Route 659. This 7 acre area will serve to shield the high school from Relocated Route 659 consistent with Plan design guidelines. Buffers will also be provided on site consistent with the Plan policies for green infrastructure elements and the County's landscape ordinance. To the extent possible, existing mature vegetation will be incorporated into the site buffers. Both the high school and elementary school will utilize a two story design, not to exceed 40 feet in height. Location of the school near an arterial road, at the eastern edge of the Transition Area, will allow the school to blend in with the developing adjacent Suburban Community and, through the use of buffers, existing vegetation, and open space, "transition" into the planned lower density of the surrounding properties. Further, building design will incorporate features to provide an aesthetic appearance including double hung windows similar to residential construction and accent

materials to provide interest in color and texture. The site is well positioned to serve the currently developed communities and the future population planned for the surrounding area. Safe and convenient vehicular access will be provided via Relocated Route 659. Pedestrian trails will be provided on site with connections to the nearby communities. A pedestrian plan has been provided as a part of the Special Exception.

The proposed high school will provide relief to Freedom High School which had an enrollment of 1,609 students on September 30, 2009 (capacity 1600). By 2012 when HS-7 is planned to open, preliminary projections place the student population for Freedom High School at 2,325.

Overall, school sites provide a balance between the built and natural environment and afford significant open space. The Plan provides guidelines for development in accord with Conservation Design. Chapter 5 of The Plan identifies four components of the Green Infrastructure to be considered as a part of Conservation Design:

Group One/Natural Resource Assets. The proposed site contains various natural features including steep slopes, wooded areas, wetlands and floodplain. Presently the site is situated on both sides of Goshen Road. Studies performed on the assemblage have been conducted as a part of studies for larger adjacent projects, specifically Westport and Stone Ridge. Together, these studies provide information relative to the majority of the site.

Limited areas of steep slopes, both very and moderate, are located in the northwestern portion of the property, to the north and south of the floodplain/wetlands area. The portion of the site located east of Goshen Road is comprised of relatively uniform topography, with slopes generally at 5%. This acreage drains east to an unnamed tributary of the South Fork of Broad Run. The portion of the site located west of Goshen Road consists of more varied topography, with the southern half of this acreage including slopes of 4% to 5%, and the northern half generally consisting of slopes of 12% to 20%. The western portion of the site drains north and west to the South Fork of Broad Run and an unnamed tributary, respectively. Areas of moderate (2.53 acres) and very steep (.64 acre) slopes exist at the convergence of these two features, as well as along the banks of the South Fork of Broad Run. Development of the site will avoid very steep slopes and development within the moderately steep slopes is minimized. There are two small areas of moderately steep slopes adjacent to a planned soccer field to be located on the northern portion of the site that will be disturbed. The major flood plain (3.61 acres) crosses the northwestern portion of the site on MCPI 247-17-3577. No development is proposed in the flood plain. (Please reference the Existing Conditions Map, Sheet 2 of the SPEX/ZMAP Plan).

A Forest Management Plan and Cover Type Map, prepared by Zimar & Associates, Inc., dated February 15, 2005, for Westport includes the portion of the site located west of Goshen Road. This study describes the western area as having Cover Type 1 on the southern third of the property. Cover Type 1 is defined as “uneven-aged, mature between 10” to 20” DBH with some larger trees present, primarily oaks, up to 30 inches”. Just to the north of the Cover Type 1 is Cover Type 5, described as “even–aged, immature between 4” and 6” DBH, which is comprised primarily of eastern red cedar and Virginia pine species.” The northeastern portion of the site that is to the west of Goshen Road is in Cover Type 7(a) which contains “immature early successional pioneer tree species with larger trees located within lawn

area surrounding current and abandoned home sites." On the northern portion of the property near the floodplain is additional Cover Type 5 and Cover Type 2 which is defined as "uneven-aged, young mature to mature mixed hardwoods between 6" to 14" DBH with some scattered larger trees present, primarily oaks, up to 26 inches, occurring primarily in wetter areas". There is also a small area of Cover Type 3 which is described as "uneven-aged, young mature to mature hardwoods between 10" to 20" DBH" with some larger trees present, primarily sycamore, up to 30".

As a part of ZMAP 2002-0013 and ZCPA 2002-0004, Stone Ridge, a Cover Type Inventory Report prepared by Zimar & Associates Inc, dated April 14, 2002, was provided. For the area east of Goshen Road the predominate tree cover is identified as Cover Type 7(b), described as "even-aged, immature to young (15-20 years), 3 to 12 inches DBH, Virginia pine, eastern red cedar, black locust, persimmon and scattered oaks." There is also a small portion of the site that is Type 4, described as "young mature to mature sawtimber, 10 to 20 inches DBH. (Please Reference Existing Tree Cover Map Sheet 4 of the SPEX/ZMAP Plan)

The development of the property will necessitate removal of wooded areas. To the extent practical, existing trees will be utilized to meet landscape buffer requirements along the site boundaries and adjacent to green infrastructure elements. Wooded areas outside of the required school facilities have been identified for preservation on the Special Exception plat, specifically along the western boundary of the site and in the northwestern portion of the site adjacent to the floodplain and wetlands. (Please reference Sheet 3 of the SPEX/ZMAP Plat)

Jurisdictional wetlands have been delineated on the property and are primarily located along the western boundary and in the northwest portion of the site. There is also a small segment of wetlands located at the southeast corner of the site. Wetlands information is based on a draft report entitled "Wetland Delineation – Dulles South High School" prepared by Bowman Consulting Group, Ltd. dated 2/16/10. Issuance of a jurisdictional determination by the US Army Corps of Engineers to verify said information has been requested and is pending review. The proposed plan avoids development in the wetland areas and provides a 50 foot buffer adjacent to these areas in accord with Plan Policy.

The Virginia Department of Conservation and Recreation (DCR) provided a project review for Westport, including the subject properties on the west side of Goshen Road, dated December 15, 2004. The review referenced the possibility of the wood turtle within the project area if appropriate habitat was present. The wood turtle is classified as threatened by the Virginia Department of Game and Inland Fisheries. In June of 2005 a Wood Turtle Habitat Assessment was conducted by Williamsburg Environmental Group, Inc. The assessment indicated that no wood turtles were noted during the site visit and that wood turtles typically inhabit perennial systems. DCR provided a review for the Stone Ridge development on November 23, 2004, indicating that natural heritage resources had not been documented in the project area. Natural heritage resources are defined by DCR as the habitat of rare, threatened, or endangered plant and animal species, unique or exemplary natural communities and significant geologic formations. LCPS is unaware of any review that may have been done for the 3 acre parcel (MCPI 248-48-6530) situated to the south of the Stone Ridge portion of the site. LCPS sent a request to DCR for an updated and consolidated review of the assemblage. DCR responded in a letter

dated September 3, 2009, stating that the proposed project is not expected to adversely impact any natural heritage resources.

The property is not adjacent to any scenic rivers and does not possess limestone conglomerate area. No adverse impact to groundwater is anticipated. The project will utilize public sewer and water. It is proposed to have a well for athletic field irrigation. It is noted that the football field will be an artificial turf surface and if funding permits, one of the practice fields will also be artificial turf. Development will be accomplished in accord with the County regulations and development standards. Overall, the physical characteristics of the site are well suited for the proposed school use.

Group Two/Heritage Resource Assets. The majority of the subject property has been examined under two separate archaeological investigations. In addition, portions of the site were reviewed in 2004 by Coastal Carolina Research, Inc. in the context of a proposed Tri-County Parkway Corridor and the 3 acre Kline property had a Phase I investigation in December 2009.

In 2000, a Phase I Archeological Investigation was conducted by Thunderbird Archeological Associates, Inc. for 800 acres of the Stone Ridge property. A portion of the proposed school site (23+ acres of MCPI 247-28-4151) was included in this review. While the study identified eleven archeological sites within the larger 800 acre property, none are located within the 23+ acre portion of the proposed school site. No further archeological work was or is required for this area.

In 2005, Cultural Resources, Inc. conducted a Phase I investigation of 731 acres of the then proposed Westport Development. A portion of the proposed school site (67.9 acres, 247-17-3577, 247-17-8636, 248-47-9789, 248-47-8669, 248-47-8234, 248-37-9082 and 248-37-9637) was included in this review. Of the resources identified during this study (five archeological resources, three architectural resources and 13 artifact locations) only one architectural resource is located within the project site. Resource 053-6070 is the Larsen House, a 1940's one-story frame building with two lean-to additions, located in the northwest portion of the school site. The CRI study noted that the dwelling had been vacant for a number of years and was in poor condition. CRI determined that Resource 053-6070 was not eligible for the National Register of Historic Places and made a recommendation for non-eligibility. The Virginia Department of Historic Resources (DHR) did not evaluate the property, likely because no federal permits were involved. Testing in the vicinity of the Larsen House did not produce artifacts and no archeological site is associated with this resource.

In 2004, Coastal Carolina Research, Inc. (CCR) conducted an architectural survey for Corridor D of the proposed Tri-County Parkway including a portion of the proposed school site. Twelve new architectural resources were recorded and five previously recorded resources were contained in the corridor study. Of these, two of the new resources lie within the proposed school site: Resource 053-6050, the Kline House, and Resource 053-6051, the Monday-Larsen-Hall House. Neither house was considered eligible for the National Register of Historic Places by CCR. DHR concurred with the CCR recommendation.

In December of 2009, Thunderbird Archeology conducted a Phase I Archeological Investigation of the three acre Kline Property (248-48-6530) and identified one archeological site, 44LD1560. This site consisted of artifact scatter around the Kline House. The artifacts occurred at a low density within either

a plow zone or disturbed fill context. Because of the low yield and lack of intact context, the site is not considered to be eligible for the National Register of Historic Places. The December 2009 report prepared by Thunderbird details the Phase I for the Kline Property and summarizes the prior archeological investigations that have been conducted on the proposed school site. The report is included with this application submission.

Group Three/Open Space Assets. The development of this property for a high school and an elementary school will include significant open space assets. The Plan recognizes public school sites as an element of the County's Green Infrastructure system. Facilities provided at the school site will afford active recreational opportunities for the community. The location of the site in relation to the proffered park site will also provide an opportunity for co-location of recreational and community facilities.

Group Four/Complementary Elements. Development will comply with the County's standards for air quality, light and noise. No adverse impacts are anticipated. The high school competition fields (stadium, baseball and softball) will be lighted. Lighting will be cutoff and fully shielded, directed inward and downward toward the interior of the property. The site layout provides significant distance between the lighted competition fields and the closest proposed lots in the Westport subdivision to the west. The baseball field is positioned approximately 200 feet from the western property boundary and the stadium is approximately 400 feet from the western property boundary. There is also a proposed tree save area within this area (between the stadium/baseball field and the western property boundary). It is noted that on the approved Westport preliminary subdivision plan there is open space of 50 to 150 feet plus for the residential lots closest to the competition fields. In addition, it is proposed to enhance the required Type II buffer on the west and south sides of the elementary school to provide a double row of evergreen trees.

(B) Whether the proposed special exception/zoning district will adequately provide for safety from fire hazards and have effective measures of fire control.

The school facilities will be constructed to meet required building safety codes, including the provision of a sprinkler system. Fire protection services will be provided by the volunteer fire companies serving the area.

(C) Whether the level and impact of any noise emanating from the site, including that generated by the proposed use, negatively impacts the uses in the immediate area.

Primary noises associated with the school facility will be generated from the dropping off and picking up of students and from outside sports activities. The site is located at the periphery of the Stone Ridge and C.D. Smith communities, across Relocated Route 659, and at the periphery of the planned Westport community. There is a seven acre wetlands conservation area situated between the site and Relocated Route 659 and a proposed tree save area on-site between the playing fields and the Westport community. Landscaping will be provided in accord with County requirements. In addition an enhanced buffer will be established to the south and west of the elementary school. (Also reference (A)/Complementary Elements above) No adverse impacts are anticipated.

(D) Whether the glare or light that may be generated by the proposed use negatively impacts uses in the immediate area.

Lighting of school facilities is provided for visibility in the parking lot and around the immediate school building for safety and security purposes. In addition, the high school stadium, baseball and softball fields will be lighted. Lights will be shielded and directional. As noted previously there is significant distance between the lighted ball fields and future residential lots. A tree save area along the western property boundary is proposed as well as enhanced buffering adjacent to the elementary school. (Also reference (A) and (C) above.

(E) Whether the proposed use and the range of uses in the proposed zoning district classification are compatible with other existing or proposed uses in the neighborhood, and adjacent parcels.

Planned uses around the proposed school site include residential uses to the north across Road A (Stone Ridge), to the east across Relocated Route 659 (Stone Ridge and C.D. Smith), and to the west and south (Westport). Also to the south and east is a proffered park. The proposed school use will be compatible with surrounding planned land uses. School facilities are traditionally constructed in residential areas because they serve residential communities and are considered to be a welcome and compatible land use. The Plan envisions the location of schools in the Transition Area.

(F) Whether sufficient existing or proposed landscaping, screening and buffering on the site and in the neighborhood will adequately screen surrounding uses.

The proposed school will be adequately screened from surrounding uses and Relocated Route 659 by existing vegetation and proposed landscaping. The seven acre wooded wetlands preservation area is situated between the school site and Relocated Route 659. There is a proffered park to the east and south of the high school. To the north of the high school athletic complex is a natural floodplain area and to the west, along the western property boundary, is a planned tree save area to the west of the competition fields. Landscaping will be provided in accord with the County's requirements and enhanced along the western and southern boundaries of the elementary school with a double row of evergreen trees.

(G) Whether the proposed special exception and zoning map amendment will result in the preservation of any topographic or physical, natural, scenic, archaeological, or historic feature of significant importance.

The proposed school facilities will avoid floodplain and wetland areas and minimize grading to the moderately steep slopes. There are no known archaeological or historical features of significance on the property.

(H) Whether the proposed special exception and zoning map amendment will damage existing animal habitat, vegetation, water quality (including groundwater) or air quality.

The natural features of the property will be changed as a part of the construction process. An evaluation of the site for endangered and threatened species was prepared by the Department of Conservation and Recreation and included with this application submission. No adverse impacts to environmentally sensitive land, rare or endangered plant/animal species habitat, water or air quality are anticipated.

(I) Whether the proposed special exception at the specified location will contribute to or promote the welfare or convenience of the public.

The proposed school will contribute to the welfare of the public by providing a much needed facility to alleviate overcrowding in existing schools. This site will also serve the growth projected to occur in the vicinity.

(J) Whether the traffic expected to be generated by the proposed use will be adequately and safely served by roads, pedestrian connections and other transportation services.

As noted previously, the proposed school site is located in close proximity to a planned arterial road, Route 659 Relocated. Access to the school site is proposed via two new public roads (Roads A and B) to be constructed between Relocated Route 659 and Goshen Road. Prior to the opening of the high school, Route 659 Relocated will be constructed as a two lane road between Tall Cedars Parkway to the north and Braddock Road to the south. Braddock Road between Relocated Route 659 and the eastern edge of Braddock Crossing (approximately 1500 feet to the east) is presently unpaved but will be paved prior to the opening of the high school. Both of these improvements are proffered by surrounding developments. (Please reference the attached summary of related transportation proffers) LCSB staff is working with the surrounding property owners to determine the anticipated timing for respective proffered improvements. If the surrounding communities are not moving forward in the same timeframe as the proposed school use, then the LCSB will construct these improvements and at such time as the communities reach the level of development that would require the improvement cash in lieu of construction would be provided to the County as outlined in the particular community's proffers.

With the construction of Relocated Route 659 the portion of Goshen Road from Road A to Braddock Road is no longer needed. It will be replaced with a significantly improved roadway and, as such, a request to abandon the existing unpaved Goshen Road from Road A south to Braddock Road had been filed with the County. A copy of the abandonment request is included with this application. It is important to note that with this assemblage of properties there would be no properties dependent on this section of Goshen Road for access. Further, abandonment of this portion of Goshen Road would eliminate a hazardous intersection at Braddock Road that is at an undesirable angle. Meetings have been held with the Office of Transportation and the Virginia Department of Transportation for a preliminary review of this proposed transportation network. LCSB staff is also working with the County Department of Parks and Recreation and the owner of the C.D. Smith property to implement Road B, a public road between Route 659 Relocated and the proposed schools, across the proffered park site.

The proposed transportation network has been analyzed in a detailed traffic study. Briefly:

- Access will be provided to the school site from Relocated Route 659 (two paved lanes, with turn lanes as required). Relocated Route 659 will connect to Tall Cedars Parkway to the north and Braddock Road to the South.

- Road A will be constructed from Relocated Route 659 to Goshen Road and will provide access to the school bus loop and staff parking lot.

- Road B will be constructed from Relocated Route 659, across the proffered park site, to the school site and will provide access to the high school student/visitor parking lot, the parent drop off and the elementary school.

- For special events there will be the ability to open up the internal road between the staff parking lot and the internal road that serves the student parking lot to release traffic out both Roads A and B.

- Goshen Road is proposed for abandonment from Road A to Braddock Road. Initially it is proposed to barricade Goshen Road south of the new cul-de-sac on Goshen at Road A, north of the parent drop off/student parking lot, and just north of Braddock Road until such time as the abandonment is officially approved. Goshen Road from the north (Route 50) will also provide access to the school but the majority of the traffic will access via Relocated Route 659.

Overall, a safe and efficient access is proposed consistent with Plan policies. Also included in the application is a pedestrian access plan that will afford pedestrian access to the surrounding communities, the proffered park to the south, and internally. (Please reference Pedestrian Circulation Exhibit Sheet 5 of the SPEX/ZMAP Plan). Sidewalks/trails have been provided along Roads A and B and internally to the site. A trail connection location has also been coordinated with Westport, to the west of the school site. The proffered improvements for Relocated Route 659 include an eight foot in width trail along the east side of the road. LCSB proposed two pedestrian crossings at Roads A and B for pedestrian access across Relocated Route 659 from the communities to the east. In order to support a walk zone across Relocated Route 659 it is necessary to have an all stop condition, either signalization without a crossing guard or an all way stop with a crossing guard, and a designated cross walk. The Loudoun County Sherriff's Office will be asked to provide crossing guards.

(K) <u>Whether, in the case of existing structures proposed to be converted to uses requiring a special exception, the structures meet all code requirements of Loudoun County</u>.

Not applicable.

(L) Whether the proposed special exception and zoning map amendment property will be served adequately by essential public facilities and services.

The site possesses good access and will be served by public water and sewer extensions. Police, fire and rescue services will be provided through the County and the volunteer fire and rescue companies.

(M) The effect of the proposed special exception and zoning map amendment on ground water supply.

As a part of development, good engineering practices will be implemented. No adverse impact to groundwater supply is anticipated.

(N) Whether the proposed use will affect the structural capacity of the soils.

Soil analysis and construction in compliance with the findings and recommendations of the required soil investigations required at site plan stage will ensure that adequate structural capacity is maintained for the proposed use.

(O) Whether the proposed use will negatively impact orderly and safe road development and transportation.

Safe road access will be available to the proposed school site. Please reference Item (J) above and the traffic analysis submitted with this proposal

(P) Whether the proposed special exception and zoning map amendment use will provide desirable employment and enlarge the tax base by encouraging economic development activities consistent with the Comprehensive Plan.

The proposed elementary school will employ approximately 90 people and the high school approximately 200 people. In addition, the availability of an excellent education system encourages economic development. A key consideration for many businesses in determining location is the quality of a jurisdiction's education system.

(Q) Whether the proposed special exception and zoning map amendment considers the needs of agriculture, industry, and businesses in future growth.

Reference (P) above.

(R) Whether adequate on and off-site infrastructure is available.

The site will have adequate infrastructure for the proposed use.

(S) Any anticipated odors which may be generated by the uses on site and which may negatively impact adjacent uses.

Not applicable.

(T) Whether the proposed special exception and zoning map amendment use sufficient measures to mitigate the impact of construction traffic on existing neighborhoods and school areas.

Construction traffic traveling to the site will not travel through residential neighborhoods. LCSB staff will coordinate with the contractor to avoid conflict with peak school bus periods.

ADDITIONAL ZCPA CRITERIA FOR CONSIDERATION FROM SECTION 6-1211(E):

(2) Whether there are any Changed or Changing Conditions in the Area Affected That Make the Proposed Rezoning Appropriate.

The growth of the surrounding area generates the need for school facilities. There is a demand for school sites and limited available properties. The proposed zoning amendment responds to these changing conditions.

(8) Whether a Reasonably Viable Economic Use of the Subject Property Exists Under the Current Zoning.

No. The 3 acre parcel to be rezoned from PD-GI to TR-1 is the last remaining parcel of the larger Alliance Property assemblage. To utilize this 3 acre site for industrial use would necessitate proffer/concept plan change. Equally important, the character of the surrounding land uses has significantly changed such that the PD-GI parcel would be isolated and incompatiable.

(12) Whether the Proposed Rezoning Considers the Current and Future Requirements of the Community as to Land for Various Purposes as Determined by Population and Economic Studies.

The proposed proffer amendment (and special exception request) have taken into consideration the future school service demands of the surrounding community.

(13) Whether the Proposed Rezoning Encourages the Conservation of Properties and Their Values and the Encouragement of the Most Appropriate Use of Land Throughout the County.

Yes, the proposed use provides a school facility to meet the growth demands of the area. The school is designed to avoid environmentally sensitive areas and buffer the adjacent residential lots. Schools are considered by most to be a valuable asset which may result in increased

property values.

(14) Whether the Proposed Rezoning Considers Trends of Growth or Changes, Employment, and Economic Factors, the Need for Housing, Probable Future Economic and Population Growth of the County and the Capacity of Existing and/or Planned Public Facilities and Infrastructure.

Please reference items 2, 12 and 13 above.

(15) The Effect of the Proposed Rezoning to Provide Moderate Housing by Enhancing Opportunities for all Qualified Residents of Loudoun County.

Not directly applicable.

Phasing Plan:

The planned opening for HS-7 is Fall of 2010. As a part of the development for the high school the transportation network providing two lanes of Relocated Route 659, Road A, Road B, and the extension of the two lane paved section of Braddock Road from its current terminus to Relocated Route 659 will be in place prior to opening. There is not an identified ES in the LCSB Adopted CIP for the proposed ES site. The LCSB 2011-2016 CIP does identify the need for 3 additional ES and this site could satisfy one of those projected needs. The ES will be constructed at such time as the LCSB identifies which ES is to be constructed on this site and when funding is made available.

Additional Information:

Sustainable Design

Loudoun County School Board, as a goal for design, construction, renovation and operation of all Loudoun County public facilities will strive to meet or exceed the criteria of nationally recognized programs for measuring energy efficiency such as:

- The Energy Star rating system developed by the United States Environmental Protection Agency and the United States Department of Energy (USEPA & USDOE) which are Federal Agencies,
- The Collaborative for High Performance Schools (CHPS) scorecard system developed by the CHPS technical committee which is made up of state agency officials, designers, school district officials, contractors, product manufacturers and energy and water utility officials.
- Leadership in Energy and Environmental Design (LEED) rating system developed by The United States Green Building Council (USGBC) a not-for-profit public interest organization,
- The Green Globes rating system developed by the Green Building Initiative a not-for-profit public interest organization

- Other relevant programs designed to rate energy efficiency

LCSB currently incorporates a number of sustainable materials and practices into the prototype school facilities as an effort to be good stewards of the environment. Some notable examples include:

- Sustainable design and operations standards in accordance with the EPA, Energy Star Program
- Energy management control systems (EMCS) for lighting and temperature control
- Variable air volume (VAV) HVAC systems
- HVAC systems commissioning services during design and construction
- Electrical and control commissioning systems services during design and construction
- CO^2 sensors in high occupancy areas
- Multiple levels of classroom lighting allows adjustment based on levels of natural light
- Full cut-off security and parking lot lighting.
- Energy use per square foot in all prototypical facilities reduced with energy efficient lighting fixtures
- Use of low volatile organic compound (VOC) materials such as interior paints
- Incorporation of water saving control valves in plumbing fixtures.
- Use of urinals and toilets that utilize less water than that required by Table 604.4 of the International Plumbing Code (i.e. 1.6 gallons per flush)
- Low impact design storm water management features
- Specification of local products to minimize travel of deliveries

It is noted that in evaluation of the design toward the Board of Supervisors goal to strive to attain Silver level of LEED certification, there are numerous sustainable features incorporated into the LCSB prototype designs that may not gain a point in the LEED rating system but which meet or exceed the intent of particular point and result in energy efficiency, improved air quality, or otherwise implement sustainable measures. LCSB will continue to evaluate the level of certification as the project design progresses.

LCSB's Energy Education team administers a well developed system of monitoring, measurement and verification of all utility costs including water, electricity, gas, fuel oil, etc. To date LCSB has saved over $29 million in energy cost avoidance and over 1 billion pounds of carbon output. The Energy Education team includes seasoned educators and a Certified Energy Manager. Their program includes educational presentations to staff and students, Energy conservation awareness student contest and the Energy Cost Avoidance Program (CAP). This program includes "Energy Report Cards" that are provided to each school that describes the energy and water use as well as that particular school's level of cost avoidance.

Existing Proffers

Within the Goshen Road Assemblage there are two parcels that are a part of rezonings that include proffers. These are the 3 acre Kline Property (MCPI 248-48-6530) and the 23 acre Stone Ridge Property (portion of MCPI 247-28-4151). It is proposed to rezone the Kline Property from PD-GI to

TR1 and remove the prior proffers. For the Stone Ridge Property a proffer analysis has been conducted by LCSB staff and we believe there are no proffers in conflict with the proposed use. A copy of the analysis is included in this application.

The proposed site is situated in a developing area. There are numerous proffers associated with the planned transportation network. As a part of this application copies of related proffers have been assembled and provided for easy reference. In addition, LCSB staff has outlined the improvements recommended in the Goshen Road Assemblage School Site traffic study and identified, where applicable, proffers for those recommended improvements. If the proffers included a cash in lieu contribution, that proffer was likewise identified. The intent in providing this information is to provide the approved proffers in a readily accessible format for staff review and to demonstrate that a safe and efficient road network will be available for the proposed school use. (Reference Attachment to this Statement of Justification and separate proffer document).

Summary

The proposed school use is consistent with the policies of the County's Adopted Comprehensive Plan, complies with the Special Exception and Zoning criteria, and meets the TR-1 zoning standards. Specifically:

- The School Board has determined the need for the proposed high school and elementary school. This high school will provide relief to Freedom High School which had an enrollment of 1,609 students on September 30, of 2009, (capacity 1600) and a projected (preliminary) student population of 2,325 by 2012 when HS-7 is planned to open.
- HS-7 is a part of the Loudoun County School Board Adopted CIP. Land acquisition funds were made available in July of 2006 and construction funds were approved by the voters in November of 2008.
- The proposed site is located at the focus of the existing and potential future attendance area, within the Transition Area, immediately adjacent to the Suburban Area. The Transition Area is planned for growth. The Transition Area policies recognize the need to provide public schools in the area that will serve not only the Transition Area but also the rural and suburban student populations.
- Safe and convenient access will be provided to the schools via the proposed road network. The site has convenient access to a minor arterial in accord with Transition Area policies. The schools will be linked to adjacent neighborhoods via sidewalks/trails. Sidewalks/trails are proposed along the proposed new access roads, Route 659 Relocated and throughout the school site.
- The County's Parks and Recreation Department will review the proposed school site through the referral process. LCPS and Parks and Recreation have a long standing coordination policy for shared use of fields.
- The proposed development has taken into account planning goals related to elements of Green Infrastructure including protection of environmentally sensitive areas, incorporation of tree save areas and indigenous vegetation into proposed buffers, use of low impact design techniques and best management practices, and the use of sustainable design measures.

- The proposed site will be served by public sewer and water and will have all utilities needed to support the proposed use.
- The proposed use is compatible with the anticipated residential uses. Buffers will be provided along the property boundaries. Existing trees will be utilized as a part of the buffers to the extent practical. Tree Save areas outside of those areas required for school facilities have been identified. Building design will incorporate features to provide an aesthetic appearance including double hung windows similar to residential construction and accent materials to provide interest in color and texture. The building height will be less than 40 feet consistent with Transition Area policies. The athletic fields have been sited to minimize conflicts with surrounding residential areas. Proposed building, parking and security lighting will be cutoff and shielded, directed downward and toward the interior of the property.
- The proposed use complies with the zoning standards of the TR-1 District.
- The proposed use addresses the Special Exception and Zoning Amendment criteria.

Overall, the proposed school use is in substantial accord with the County's Adopted Comprehensive Plan (CMPT 2009-0013), meets the zoning district requirements for development, will be compatible with existing and proposed surrounding land uses and will be served by adequate infrastructure. Further, the proposed schools will meet a critical school service need. Your favorable consideration is respectfully requested.

Attachment: Summary of Related Road Improvement Proffers (for Traffic Impact Study Recommended Road Improvements)

HS-7/ES: Goshen Road Assemblage
Traffic Impact Study (TIS): Recommended Road Improvements
Summary of Related Road Improvement Proffers
Prepared by Loudoun County Public Schools Staff
March 18, 2010

Timeframe	**Recommended Improvement (Executive Summary TIS Dated 3/8/10)**	**Status/Proffer**
Prior to HS-7 Opening Fall 2012	**Intersection of Braddock/Rt. 659 (existing)** Signalization	Existing
	Braddock EB • Separate Right Turn Lane (to SB 659)	Proffered (taper existing) (Kirkpatrick Farms: Proffer II. B.2.b.5 and II.F.)
	• Separate Left Turn Lane (to NB 659)	Proffered (Kirkpatrick Farms: Proffer II. B.2.b.5 and II.F. and Seven Hills: Proffer IV.C.2.d.iii.)
	Braddock WB • Separate Right Turn Lane (to NB 659)	Existing (but not open)
	• Separate Left Turn Lane (to SB 659)	Proffered (Seven Hills: Proffer IV.C.2.d.iv.)
	Rt. 659 NB • Separate 2nd Thru (Shared Right Turn Lane to EB Braddock)	Proffered (Seven Hills IV.C.1.a. and IV.C.2.d.i.)
	• Separate Left Turn Lane (to WB Braddock)	Existing (Kirkpatrick Farms Proffer II.B.2.b.5.and to be upgraded as part of future Seven Hills widening)
	Rt. 659 SB • Separate Right Turn Lane (to WB Braddock) • Second Thru Lane • Separate Left Turn Lane (to EB Braddock)	Existing Existing (but not open) Existing

Timeframe	Recommended Improvement (Executive Summary TIS Dated 3/8/10)	Status/Proffer
	Braddock Road • Extend Paved Two Lanes from East to Relocated Rt. 659/Goshen Road	Proffered (Braddock Crossing Proffers III.B.1, III.B.2, III.C) Note: If not constructed by others, LCSB will construct. Cash equivalent for construction by others
	Relocated Rt. 659/Northstar Blvd • Construct Two Lanes (Braddock to Tall Cedars) • Separate Right Turn Lane @ Braddock Road Intersection	Proffered (Braddock Crossing Proffers III.B.3, III.B.4, III.C; C.D. Smith: Proffers IV.B.2 and IV.C; Stone Ridge/ZCPA 2006-0003/ZMAP 2006-0011 (PENDING):Proffer II.C.3 & ZMAP 1994-0017 II.E) Note: If not constructed by others, LCSB will construct, Cash equivalent for construction by others.
	Relocated Rt. 659/Northstar Blvd & Roadway A (3-Way Stop) <u>Relocated Rt. 659 SB</u> • Separate Right Turn Lane <u>Relocated Rt. 659 NB</u> • Separate Left Turn Lane <u>Roadway A EB</u> • Two Lanes (Left and Right Direction)	LCSB/Stone Ridge (contractual)
	Relocated Rt. 659/Northstar Blvd & Roadway B (3-Way Stop) <u>Relocated Rt. 659SB</u> • Separate Right Turn Lane <u>Relocated Rt. 659NB</u> • Separate Left Turn Lane <u>Roadway B EB</u> • Two Lanes (Left and Right Direction)	LCSB
	Goshen Road • Abandon between Roadway A and Braddock Road	LCSB Application

Improvements contained in Traffic Study to be done by others (background) and assumed to be in place by 2015; Improvements NOT required for School Use		
Timeframe	**Recommended Improvement (Executive Summary TIS Dated 3/8/10)**	**Status/Proffer**
Background 2015	**West Spine Road** • Four Lanes between Rt. 50 and Rt. 659 @ Tall Cedars Parkway (existing Rt. 659 connection to Rt. 50 is removed)	C.D. Smith, Alternate Proffer Proffer IV.B.2.
	Goshen Road • Realign south of Rt. 50 with 90 degree intersection with Westport Boulevard • Signalization at Rt. 50 (with new Westport Blvd. connection)	Westport, SBPL 2006-0040 (Ref: Sheet 17 of 26, Rt. 50 Intersection Improvements)