

A. PROPOSED PROJECT

The Town of Dover Town Board has received an application from Dover Knolls Development Company II, LLC, (the “Applicant”) to construct a 1,376 unit residential project with approximately 245,800 square feet of commercial floor area and community service uses known as the Knolls of Dover on (i) a 853± acre site known as the Harlem Valley Psychiatric Center (“HVPC”), located east and west of NYS Route 22 near Wheeler Road; and (ii) a 83± acre site known as the Dykeman Farm, located at Pleasant Ridge Road, both in the hamlet of Wingdale, Town of Dover, New York to be known as “Dover Knolls.” Approximately 65% of the Project Site would be open space. The Project is located in the SR, CO, HM, HR, and RU Zoning Districts, and the MC, SC, and FP Overlay Districts.

The Town of Dover Town Board has declared itself to be the Lead Agency for purposes of State Environmental Quality Review Act (SEQRA) review. Based upon its review of an Environmental Assessment Form submitted for the project, the Town Board has designated the Proposed Project a Type I action under SEQRA and has issued a Positive Declaration for the project.

Public scoping sessions were held on May 7, 2008 and May 10, 2008 and a written comment period was held open until May 14, 2008.

This Scoping Document sets forth the issues to be evaluated, analyzed, and discussed in the Draft Environmental Impact Statement (DEIS) to be prepared for the Proposed Project. A glossary of terms used in this Scoping Document appears at the end of this Scoping Document.

A number of permits and approvals are required for this project, as shown in the table below.

Required Approvals and Involved Agencies

Approval/Permit/Review	Involved Agency
Town of Dover	
Master Development Plan	Town Board
Site Plan Approval	Town Board
Zoning Text and Map Changes for the MC Overlay District	Town Board
Sediment and Erosion Control Permit	Town Board
Recommendation on the Master Development Plan and the Zoning Text and Map Changes	Planning Board
Architectural Review Board Review	Architectural Review Board
Building Permits and Certificates of Occupancy	Town Building Inspector
Dutchess County	
Sewage Disposal System	Department of Health
Water Supply	Department of Health
Subdivision	Department of Health
New York State	
SPDES Permits (Wastewater and Stormwater)	Department of Environmental Conservation
Wetlands Permit	Department of Environmental Conservation
Highway Work Permit	Department of Transportation

Approval of Homeowners Association	Attorney General
United States	
Wetlands Permit	Army Corps of Engineers

POTENTIAL ENVIRONMENTAL IMPACTS

The Environmental Assessment Form prepared for the Proposed Project identified potential environmental impacts in the following areas:

LAND USE, ZONING, PUBLIC POLICY, AND COMMUNITY CHARACTER

The Proposed Project would be a change in the existing land use in the project area.

GEOLOGY, SOILS, AND TOPOGRAPHY

Construction of the Proposed Project would involve disturbance to slopes in excess of 15 percent and would occur on land where bedrock is exposed or generally within 3 feet of the existing ground surface.

VEGETATION AND WILDLIFE

Construction of the Proposed Project would disturb vegetated areas and is being considered in an area with known sensitivities for wildlife.

WETLANDS AND WATER RESOURCES

Several regulated wetlands are located throughout the property. The Project Site is located within the Great Swamp watershed. The proposed project would discharge sanitary wastewater using the existing (improved) surface-discharge wastewater treatment plant. Water quality impacts of the Proposed Project will be evaluated.

SOCIOECONOMIC CHARACTER, FISCAL IMPACTS, AND COMMUNITY CHARACTER

Potential development would generate new employment and commercial activity for the Town, Dutchess County, and New York State. New property and sales taxes would be generated by the project. The Proposed Project would increase the residential population of the Town of Dover. An economic impact analysis will be completed.

COMMUNITY FACILITIES

The project would create a demand for additional community services such as police, fire, highway maintenance, schools, and recreation.

CULTURAL AND AESTHETIC RESOURCES

The Project Site is located in an area listed as sensitive for prehistoric or historic archaeological resources and contains buildings that are eligible for the State and National Register of Historic Places.

TRAFFIC

The Proposed Project would generate new traffic on the local roadway network. Intersections surrounding the Project Site will be evaluated to determine where, and to what extent, levels of service would be affected by trips generated by the new development.

AIR QUALITY

The Proposed Project would generate new mobile- and stationary-sources of potential pollutants. The Proposed Project would result in generation of greenhouse gases.

NOISE

The Proposed Project would generate noise associated with additional traffic on the local roadway network.

INFRASTRUCTURE AND UTILITIES

The Proposed Project would result in additional demand on infrastructure (wastewater treatment and water supply) and utilities (electricity and gas).

HAZARDOUS MATERIALS

The HVPC site and buildings are known to contain a number of recognized environmental conditions that will require remediation as part of redevelopment of this site.

CONSTRUCTION

Construction of the Proposed Project may have temporary impacts on neighboring properties and the roadway network.

B. REQUIRED ELEMENTS OF THE DEIS**GENERAL GUIDANCE**

The DEIS is intended to convey general and technical information regarding the potential environmental impacts of the Proposed Project to the Town of Dover Town Board (as Lead Agency), as well as several other agencies involved in the review of the Proposed Project. The DEIS is also intended to convey the same information to the interested public. The Preparer of the Draft Environmental Impact Statement is directed to keep this audience of the DEIS in mind as it prepares the document. Enough detail shall be provided in each subject area to ensure that most readers of the document will understand, and be able to make decisions based upon, the information provided.

As the DEIS will become, upon acceptance by the Lead Agency, a document supporting objective findings on approvals requested under the application, the Preparer is directed to avoid subjective statements regarding potential impacts. The EIS shall contain objective statements and conclusions of facts based upon technical analyses. Subjective evaluations of impacts where evidence is inconclusive or subject to opinion shall be prefaced by statements indicating that “It is the applicant’s opinion that...”. The Town of Dover Town Board reserves the right, during review of the document, to request that subjective statements be removed from the document or otherwise modified to indicate that subjective statements are not necessarily representative of the findings of the Board.

REQUIRED ELEMENTS

The DEIS shall include a Comprehensive Development Plan (also known as a Conceptual Site Plan) for the Proposed Project. Narrative discussions shall be accompanied by appropriate tables, charts, graphs, and figures whenever possible. If a particular subject can be most effectively described in graphic format,

the narrative discussion should merely summarize and highlight the information presented graphically. All plans and maps showing the site shall include adjacent properties (if appropriate), neighboring uses and structures, roads, and water bodies. At the time of the DEIS submission, the applicant shall submit under separate cover to the Town of Dover GIS/IT Department a CD containing the following information:

- All technical maps required by the Dover Code and as outlined in this scope in the form of .mxd files with supporting data in .lyr (layer) or .shp (shape file) format with meta data supporting all calculations;
- All 100' scale drawings converted to GIS format where possible. In the event that GIS files cannot be created, CAD drawings with supporting metadata may be submitted; and
- All newly delineated environmentally sensitive areas such as flagged wetlands and habitats, rights of way and conservation easement locations with XY coordinates in raw or CAD form with metadata to support all calculations.

The DEIS shall contain an analysis of environmental impacts in the subject areas outlined below and an identification of any significant adverse environmental effects that cannot be avoided if the Proposed Project is implemented. Information for each of the subject areas shall be provided in individual chapters or sections describing existing conditions, conditions in the future without the Proposed Project (the “No Build” condition), potential impacts of the Proposed Project, and mitigation measures for any significant adverse impacts identified. Each chapter shall include a brief introduction identifying the major topics to be considered, relevant methodology used, and thresholds for determining if significant adverse impacts exist. An Executive Summary describing the Proposed Project and all significant adverse impacts identified shall also be included.

The current conditions on the site shall be considered as the “existing conditions” throughout the technical analyses. Qualitative analyses, with supportive quantitative analyses as appropriate, of conditions with the HVPC in full operation shall be provided for comparative purposes with respect to socioeconomic and fiscal impacts, community facilities, traffic, air quality, noise, visual, land use and community character, and infrastructure and utilities. The analysis of the future without the project, and the background growth factor used in the traffic analysis, shall be based upon conditions projected in the build year for the Proposed Project. This No Build analysis shall account for, at a minimum, the following projects in the vicinity of the Proposed Project and any approved mitigation measures (such as road improvements) for the projects:

- Wind Rose, Dover and Pawling, NY
- Brady Brook, Pawling, NY
- Silo Ridge, Amenia, NY
- Keane Stud Ridge, Amenia NY
- Carvel, Pine Plains, NY
- Other, smaller projects on Route 22 recently approved or pending approval by the Town of Dover (list of projects to be confirmed through Town of Dover and Town Planner).

The Applicant shall contact surrounding communities to identify any other large projects that should be added to this list.

The applicant proposes to construct the project in two phases. The first phase of the Dover Knolls project will include a proposed site plan application for development on both sides of Route 22. The first phase of the plan will include at least 65% of the Project's commercial development, and at least 35% of the residential development. It will also include infrastructure improvements (water supply, sanitary sewage, stormwater management), some of which is to serve the first and second phases, road improvements along the site's frontage on Route 22, as well as potential demolition of structures such as the prison and other dilapidated or potential safety and health hazards. The second phase comprises the balance of the Project.

Chapter III of the DEIS shall include an analysis of the full build-out of the Proposed Project (Phases I and II) as depicted in the Comprehensive Development Plan. Although Phase II will be studied in detail in the DEIS in accordance with the adoption of the Comprehensive Development Plan; it is understood that site plan approval for Phase II will not be sought at this time and that detailed site plan drawings will be submitted at a later date. Chapter IV of this DEIS shall include a detailed analysis of Phase I of the Proposed Project and identify impacts of Phase I. The applicant shall submit site plan drawings for Phase I with sufficient details for analysis prior to the acceptance of the Draft Environmental Impact Statement (DEIS) by the Town Board.

ORGANIZATION AND EXPECTED CONTENT OF DEIS

COVER SHEET AND GENERAL INFORMATION

The Cover Sheet shall identify: the Proposed Project; its location; the name, address, and phone number of the Lead Agency; the name, address, and phone number of the Preparer of the DEIS including a Contact Person; the document as a Draft Environmental Impact Statement; the Date of Acceptance of the DEIS by the Lead Agency; the internet address at which the DEIS is posted; and the date of the Public Hearing and the closing of the Public Comment Period.

Additional information, to be provided on pages following the Cover Sheet, shall list: the name(s) and address(es) of the applicant and its representatives; the name(s) and address(es) of all consultants involved in the project and their respective roles.

The DEIS shall include a list of all Involved and Interested Agencies, Town Departments, and Town Consultants to whom copies of the DEIS and supporting material will be distributed.

A Table of Contents followed by a List of Tables and List of Figures shall be provided.

CHAPTER I: EXECUTIVE SUMMARY

- A. Introduction
- B. Description of the Proposed Project
- C. Description of prior approvals and site work completed
- D. List of all Local, County, State, and other approvals required
- E. List of all Interested and Involved Agencies
- F. Summary of significant impacts identified in each subject area
- G. Summary of Mitigation Measures proposed for significant project impacts
- H. Description of Alternatives analyzed

CHAPTER II: DESCRIPTION OF THE PROPOSED ACTION

1. Introduction
 - a. The introduction should identify the document as the Draft Environmental Impact Statement for the Proposed Project and describe the location of the Proposed Project and development program proposed.
2. Project Description
 - a. Location and Site Definition—include local and regional geographic descriptors, tax map designation(s), size of parcel(s) affected by Proposed Project, existing zoning designation(s), adjoining streets and land uses, natural features or habitats on-site or contiguous (physically, hydrologically, or otherwise) to the site, and existing site conditions including a description of the existing hospital complex, previous community uses, and prior site uses.
 - b. Project Description and Site Design—include all information necessary to describe the Comprehensive Development Plan and its component parts. Information to be provided should include a description of: the proposed site layout, proposed buildings; operational information including vehicular access, parking, and loading requirements, including truck size limitation, typical hours of operation for the commercial portion, and site security; site improvements including grading, roadways, parking areas, landscaping, signs, lighting, drainage features, and pedestrian improvements; programmatic information describing the anticipated use of the common facilities; description of how age-restricted and age-targeted housing units would be regulated and enforced for the life-span of the project; description of any workforce/affordable housing including location, amount, and phasing; a description of any off-site improvements to be undertaken by the applicant; and the detailed phasing schedule for the Proposed Project. Include a description of how site improvements are to be maintained and by whom (i.e. public and private roads, community buildings, etc).
 - c. Building Design—Include description of architectural features of the proposed buildings, including graphic depictions of the commercial and multi-family buildings, representative depictions of single-family homes, façade treatments, building materials, screening for HVAC equipment, and integration of green building practices such as those suggested by the United States Green Building Council’s Leadership in Energy and Environmental Design (LEED) program.
 - d. Project Context—Brief description of the previous application and planning process.
 - e. Phasing—Describe the anticipated phasing of the project and any financial considerations relevant to the completion of each phase.
4. Summary of approvals required and a list of Involved and Interested Agencies
5. Project Purpose and Need—Describe the purpose and need for the Proposed Project.

*CHAPTER III: IMPACTS***A. Land Use and Community Character, Zoning, and Public Policy**

1. Introduction
2. Land Use and Community Character

- a. Existing Conditions—Describe existing conditions on the Project Site, including on-site uses, buildings, and conditions. Also describe the existing conditions in the vicinity of the project. The study area for the land use survey shall include the general land use pattern within two miles of the project boundaries. A parcel by parcel inventory by land use category (e.g., residential, agricultural, retail, other commercial, public, etc.) based on field survey within ¼ mile of the site shall be provided.
 - b. Future Without the Project—Describe changes in land use within the study area in the future without the Proposed Project. The discussion should include changes in land use within the study area resulting from projects identified in the No Build analysis (see page 4).
 - c. Potential Impacts of the Proposed Project—Describe the relationship of the Proposed Project with adjoining uses and discuss the effects of the Proposed Project on the general land use pattern and community character within the ¼ mile and 2-mile study areas. Include a discussion of opportunities for extension of infrastructure improvements (e.g., water, sewer, sidewalks, bike paths, trails, etc.), especially toward the Hamlet of Wingdale.
 - d. Proposed Mitigation Measures—Provide mitigation measures for any potentially significant adverse impacts. Potential mitigation could include the alteration of the project's size, design and layout.
3. Zoning
 - a. Existing Conditions—Describe the existing zoning for the Project Site. Include information on allowed uses, density, bulk, and setbacks required within the district. Also include a description of the requirements for subdivision and clustering.
 - b. Potential Impacts of the Proposed Project—Describe the proposed amendments to the Zoning text and Zoning map. Describe how the Proposed Project would conform to the amended zoning regulations with respect to use, density, bulk, and setback requirements. Describe any potential impacts of application of the proposed zoning text amendments to other sites within the Town.
 - c. Proposed Mitigation Measures—Provide mitigation measures for any potentially significant adverse impacts. Potential mitigation could include the alteration of the project's size, design and layout.
 4. Public Policy
 - a. Existing Conditions—Identify and describe relevant policies contained in the Town of Dover Master Plan (dated September 1993 and as last revised). Identify specific provisions within the Master Plan of relevance to the redevelopment of the former HVPC and Route 22.
 - b. Potential Impacts of the Proposed Project—Assess the compatibility of the Proposed Project with relevant policies contained in the Master Plan, particularly focusing on the redevelopment of the former HVPC and Route 22. Provide specific references to the full text of relevant Master Plan policies. Also assess the consistency of the Proposed Project with various planning studies for the site including, but not limited to, the New York State plan for the site as set forth in the SEQR analysis done for the sale of the site and any studies completed by Harlem Valley Partnership. The Proposed Project shall also be evaluated for consistency with Dutchess County plans and policies including, but not limited to, *Greenway Connections*; *Hamlet Design Guidelines*; *Historic Resources Survey, Town of Dover, New York*; and *Natural Resources, Dutchess County, New York*.

- c. Proposed Mitigation Measures—Provide mitigation measures for any potentially significant adverse impacts. Potential mitigation could include the alteration of the project's size, design and layout.

B. Visual Resources

The visual analyses shall follow the NYSDEC guidelines “Assessing and Mitigating Visual Impacts” (DEC Policy, 2002).

1. Existing Conditions—Describe through text and photographs the visual character of the Project Site within the context of its surrounding area. Include a photographic survey of representative buildings within 1 mile of the Project Site and along the Route 22 corridor. Include a description of prevalent land-forms and vegetative cover. Identify any significant views of the Project Site from adjoining properties, the Appalachian Trail, publically accessible parks and open spaces, and from Route 22.
2. Future Conditions without the Proposed Project
3. Potential Impacts of the Proposed Project—Describe any changes to the surrounding landscape as a result of the Proposed Project. Describe visibility of the project from Route 22 and surrounding local roads. Provide topographic maps indicating potential visibility of the Project Site from locations within a two-mile radius of the site. Provide color perspective renderings and line-of-sight drawings showing the proposed buildings in the context of the site from any location from which substantial views of the site are possible but from the following sites at a minimum:
 - a. Routes 22 and 21 (Pleasant Ridge Road) (Wingdale hamlet);
 - b. Wheeler Road and Main Street;
 - c. Metro-North Station area;
 - d. Hutchinson Avenue;
 - e. Appalachian Trail ROW on-site, Lake Ellis, and Southernmost lookout on Schaghticoke Mountain;
 - f. Hammersly Ridge;
 - g. Nature Conservancy's pathways within two-miles of the Project Site; and
 - h. Golf course

Describe the architectural design concept drawings (new construction and adaptive reuse) illustrating design, height, massing, scale and facade treatment of selected buildings. Describe the proposed landscape and architectural design treatment. Describe any proposed signs and site lighting and impacts on near and far views. Identify any impacts to the visual character of the area resulting from the Proposed Project. Include an assessment of the Project's impact on the key elements defining the surrounding area's community character, in particular the change from a rural and historic institutional character to a suburban and mixed-use hamlet character.

The visual analysis and photo-simulations shall use existing conditions photographs from the leaf and leafless seasons. A lighting plan and photo-simulations of night views (when lights are on in the buildings) during the leafless season shall also be submitted.

4. Mitigation—Using the list of mitigation strategies contained on pages 5-8 of the NYSDEC Visual Policy as a guide, the DEIS will describe practicable mitigation techniques that will avoid, minimize

or offset identified visual impacts. Narrative descriptions may be enhanced with graphic tools as necessary to thoroughly communicate proposed mitigation techniques.

C. Geology

1. Introduction

2. Existing Conditions

- a. Soils—Describe on-site soils and their suitability for urban development and on-site stormwater management. Identify soils with high water table and shallow depth to bedrock at locations on the Project Site. Identify any soils known to be highly erodible or significant areas of soil with a high clay fraction. The subsurface investigation plan shall be prepared and approved by the Town Engineer prior to completion. All tests shall be witnessed by representatives of the Town.

The Applicant shall consult the Dutchess County Soil Survey and identify the limitations of various on-site soils to development. A distribution of hydrologic soil groups A, A/D, B, C, C/D and D shall be provided for the site along with percentages of impervious surface for the site relative to acreages of each hydrologic soil group.

- b. Topography—Describe the topography of the site and include a topographic map based on 2-foot contour survey map, including low areas along Route 22 and the Swamp River and higher elevations to the east and west. Provide a topographic map with information about the following slope categories: 0-15 percent, 15-25 percent, and greater than 25 percent.
- c. Bedrock—Describe the depth to bedrock on the Project Site and the amount, if any, of any bedrock removal and the means and methods anticipated to be used for removing bedrock.
- d. Unique Features—Identify unique site features such as fen, marble knolls, forests and slopes in excess of 15%, exposed bedrock faces and other sensitive environmental areas. Identify and discuss Critical Environmental Areas ("CEAs") within 1 mile of the Project Site, including, but not limited to, the Deuel Hollow CEA and the Great Swamp CEA. All CEA designation documents shall be part of the DEIS.

3. Potential Impacts of the Proposed Project

- a. Soils—Describe the suitability of on-site soils for the proposed stormwater basins; quantify the amount of cut-and-fill and the amount of any soils to be exported from or imported to the site. Describe any fill to be used on the Site in accordance with Chapter 65 of the Dover Code and the method by which the Applicant will ensure that any fill brought to the Site is clean fill.
- b. Topography—Changes to the site's topography resulting from project grading should be identified and the techniques proposed to minimize soil erosion and slope failure should be described. The Applicant shall describe, recognize and comply with the 12% or less limits on driveways in the Dover Code and state that all driveways will comply with the Dover Code. Identify the extent of construction impacts on various steep slopes, particularly steep slopes in excess of 15% and 25%.
- c. Bedrock—Discuss likelihood of blasting and, if needed, identify areas that will require blasting and quantity amount/extent.
- d. Erosion and Sediment Control Plan—Describe grading and excavation plans with respect to changes in drainage patterns and potential soil erosion. Identify and describe measures for controlling erosion and preventing sediments from migrating off site.

- e. Unique Features—Identify any potential impacts to areas with marble knolls, CEAs, and other sensitive and critical environmental areas and the visual and ecological impacts to the CEAs. Identify any impacts resulting from an increase in impervious surfaces.
4. Mitigation Measures
- a. Discussion should include methods for minimizing impervious surfaces and/or maximizing compensatory recharge through the use of pervious swales, infiltration areas, recycling of stormwater for irrigation, etc.
 - b. Site stabilization and protection of steep slopes/construction techniques for sloped areas.
 - c. Rock removal and blasting protocols and notification/claim procedure to/for neighbors.
 - d. Limitation on construction or avoidance of sensitive environmental resources on the site.

D. Natural Resources

1. Introduction—Portions of the Town of Dover are identified in the United States Fish and Wildlife Service “Significant Habitats and Habitat Complexes of the New York Bight Watershed” as significant upland habitats. Further, initial studies of the Project Site and surrounding area by Dr. Michael Klemens have identified ecosystems of high sensitivity. This chapter shall include an overall depiction of the natural conditions found on the Project Site and shall serve as a means for assessing cumulative impact on natural resources on the Project Site and for assessing impacts to terrestrial habitat and wildlife.
2. Existing Conditions—Using detailed studies conducted within the past five years identify vegetative communities and habitat types on the Project Site and in the vicinity of the site, including a description of species presence and abundance, age, size, distribution, dominance, community type, productivity and value as habitat for wildlife. Also include a description of any invasive species found on the site, including the “mile a minute.” Include both migratory and resident wildlife species. Identify any protected native plants, State-listed threatened or endangered plant and animal species, unique or locally rare plants and animals, and significant habitat areas on or in the vicinity of the Project Site. An on-site investigation should be completed and discussed in this section.

Provide a summary of the detailed studies undertaken by consultants to the Town (i.e. Dr. Klemens, et. al.). Include the key conclusions of these studies and address the need for additional evaluation of environmentally sensitive site features (i.e. vernal pools) and potential endangered species (i.e. Jefferson salamander, Indiana Bat) habitats.

Provide graphic figures of existing onsite slopes, soil types, vegetation, wetlands and streams and other relevant resources separately. Provide a single graphic depicting all natural resources or constrained lands with the outline of proposed improvements shown for reference. Where the environmental features continue beyond site boundaries into neighboring properties, indicate this graphically.

3. Potential Impacts of the Proposed Project—Assess the potential impacts to existing vegetative communities or habitat as a result of the Proposed Project. Describe the proposed method for tree removal and disposal and measures to protect trees to remain, including quantification of loss of wooded areas and analysis of forest quality/fragmentation impact. Describe potential impacts to the Pawling Nature Preserve and Critical Environmental Areas adjacent to the Project Site (i.e. Deuel Hollow and the Great Swamp). Assess the potential impacts on resident plant and animal populations, particularly protected species, and migratory patterns. Discuss the potential impacts of fertilizers and

pesticides. Discuss the potential impacts of night lighting on adjacent wildlife areas. Discuss any proposed recreation activities that could impact the onsite and adjacent natural environment (i.e. hunting, ATV trails, etc.). Assess the potential impacts on vegetation and species due to loss of marble knolls.

4. Mitigation Measures—Address HOA/condo association responsibilities and methods for ensuring responsibilities are carried out. Discuss access to the Swamp River with a description of the type of access and users. Discuss potential augmentation and restoration of wildlife habitats including wildlife corridors.

E. Water Resources and Wetlands

1. Introduction
2. Existing Conditions—Describe and identify graphically all watercourses and wetlands on the Project Site and in the vicinity of the site. The description should include the existing drainage patterns on the site, inter-wetland connectivity, a description of the watershed, and discharge points of existing drainage. Identify any regulations or regulated activities within Town of Dover Town Code, NYSDEC, and ACOE regulations. The description shall also include the following:
 - a. General condition of wetlands, identifying areas of degradation, existing salinity conditions due to runoff from roads and opportunities to mitigate degraded conditions as part of the development process.
 - b. Description of waterbodies including the reservoir, the Great Swamp, the Swamp River and its tributaries and the downstream Ten Mile River and their classifications. The "Water Supply Study, HVPC, Wingdale, NY" by Lu Engineers shall be referenced and discussed.
 - c. Description of existing flooding issues, if any.
 - d. Potential bog turtle habitats.
 - e. Hydrologic discussion of relationship between the Swamp River and geologic formations and Harlem Valley aquifer underlying the site. Hydrologic information shall address limited gain of Swamp River flows near the site detailed by stream gauging work in the "Harlem Valley Watershed Investigation, Dutchess County, 1999, prepared by The Chazen Companies." Flow in the Swamp River increases as it flows northward through Dover (Chazen, 1999, Tables A-3(a/b) and A-4(a)) but this increase likely occurs north of the site, where the Swamp River valley widens near Wingdale based on basin dimensions. Hydrologic discussion shall also include a site water budget estimating current on-site total groundwater and aquifer recharge, using methods outlined in recent groundwater studies of the adjacent Wappinger Creek watershed (Chazen, April/May 2006 for DCWWA). This section shall recognize the Harlem Valley aquifer as the Town's sole drinking water supply.
3. Potential Impacts of the Proposed Project—Assess the potential impacts to existing waterbodies, watercourses, wetlands, and aquifers. Evaluate wetland and wetland buffer impacts (including any associated with construction of stormwater management facilities). Identify and analyze proposed measures to mitigate any disturbance to the Town, NYSDEC, and ACOE buffers. Identify how on-site drainage patterns will be altered including an assessment of the resulting impacts to wetlands, streams, and aquifers. Potential impacts on the 100-year flood plain, including a discussion of current flooding on Route 22 and potential for exacerbated flooding due to post-development conditions, shall be discussed.

The DEIS shall utilize the methodology established in Hollands and Magee (1985), including a determination of biological and physical characteristics, geology, hydrology of the site and the substrate and vegetation comprising the wetlands.

4. Mitigation Measures—Address wetland and buffer avoidance and potential for wetland restoration. Discussion of alternate construction methods and equipment in sensitive areas (e.g., construction mats, timber mats, lighter equipment alternates). Discuss alternative management techniques for golf course to minimize pesticide and chemical use and encourage water conservation.

F. Community Services

1. Introduction
2. Police—Describe existing police protection in the area. Describe any changes to service levels in the future without the project. Using information obtained from comparable projects and local law enforcement agencies assess potential impacts of the Proposed Project on police protection on- and off-site. The need for additional on- or off-site facilities, personnel, and equipment, and the anticipated cost of these items shall be identified.
3. Fire—Describe existing fire protection in the area. The applicant shall coordinate with the J.H. Ketcham Hose Company, Inc. to establish the existing call volume, equipment, and facilities. The DEIS shall describe any anticipated changes to service levels in the future without the project. Using information obtained from comparable projects and local fire departments, the DEIS shall assess potential impacts of the Proposed Project on fire protection. The DEIS shall include the anticipated increase in call volume and describe on-site measures to be used to prevent or fight fires, including any future use of the existing hydrant system. The need for additional on- or off-site facilities, renovations to existing facilities, personnel, and equipment, and the anticipated cost of these items shall be identified.
4. Emergency Services—Describe existing emergency services in the area. Describe any anticipated changes to service levels in the future without the project. Using information obtained from comparable projects and local emergency service organizations or companies assess potential impacts of the Proposed Project on emergency service provision on- and off-site. The need for additional on- or off-site facilities, personnel, and equipment, and the anticipated cost of these items shall be identified. Include an analysis of the potential impacts of age-targeted versus age-restricted housing types. Also consider the potential to reuse the existing on-site hospital.
5. Parks, Recreation, Library—Describe existing public and private park and recreation facilities, including Town, County, State and Federal facilities, and their proximity to the Site, expected population growth due to the project and the park, recreation and library needs of the new residents. The Appalachian Trail, the public golf course, public access to the Swamp River such as that at the Wheeler Road Bridge and CEA recreational areas shall be described and mapped. The description of library services shall be based upon discussions with the Head Librarian, especially with respect to standards for libraries serving the anticipated population of the Town of Dover in the future with the Proposed Project. The need for additional on- or off-site parks, recreation, and library facilities, personnel, and equipment, and the anticipated cost of these items shall be identified. The proposed on-site recreational resources and the availability of these resources to the general public shall be identified. The DEIS shall also identify potential pedestrian connections from the site to existing public trails, parkland, and other recreational resources.

6. Schools

- a. Existing Conditions—Describe the location of the Site in relation to the public school districts that serve the Site, including identification, location and description of school facilities. Describe existing public school enrollment, projections, trends and capacities in each for each school facility that serves the Site. Describe available school bus service, routing and location of school bus stops that serve the Site from each school facility. Set forth the current education costs per student in the school district to Town of Dover residents.
 - b. Potential Impacts of the Proposed Project—Project the number of public school children for each housing type in the proposed development by school and age-group based upon data developed by the Dover PTA and/or the School District using actual information from subdivisions within the Town of Dover such as Reagans Mill and Woodwinds, Urban Land Institute (ULI), Rutgers University Center for Urban Policy Research, Dutchess County and other available sources, and evaluate the impact of projected enrollment increases on the budget of the school district. Consider a “worst-case scenario” in which all of the housing types could include school-age children. Evaluate the need for expanded school bus service and/or new bus stops to serve the site. The need for additional school facilities, personnel, and equipment, and the anticipated cost of these items shall be identified. Include an analysis of the potential impacts of age-targeted versus age-restricted housing types.
7. HOA/Condominium Association—Describe the responsibility of the HOA for community services provided to the residential portion of the development.

G. Economic Conditions

1. Introduction
2. Construction Period—Quantify the expected economic impacts to the local economy during the construction period. Identify the number of jobs (in person-years) to be generated directly and indirectly as a result of construction. Calculate income to the local economy from sales of construction material, construction labor, and sales tax.
3. Operation Period— Identify approximate number of employees that would be generated by the Proposed Project, including information with regard to type and salary level. Using available Town, Dutchess County, Census, and Department of Labor data on employment, identify anticipated residence for the employees. Indicate whether employees would be likely to relocate to the Town of Dover or surrounding communities to fill jobs. Also identify the approximate number of residents that would be generated by the Proposed Project, and indicate what portion of these residents would be new to the Town of Dover and to Dutchess County. Calculate existing and estimated tax revenues to the Town of Dover, Town of Dover School District, Dutchess County, and New York State from the Project Site as a result of operation of the Proposed Project. Coordinate with the Town of Dover tax assessor to obtain relevant data for the analysis. Existing population data should be obtained from the Town of Dover, Dutchess County, and the US Census Bureau. 2010 Decennial Census Local Update of Census Addresses data should be utilized wherever possible.
4. Economic Impact Analysis — Complete an economic impact analysis of the Proposed Project based on the specific types of commercial and residential units known or anticipated to be included in the Proposed Project. Specifically, complete the following analysis:
 - a. Determine the primary trade area for the Proposed Project;
 - b. Develop a profile of shoppers within the primary trade area;

- c. Develop a profile of the retail/entertainment sector within the trade area;
- d. Develop a profile of the most potentially competitive stores within the Town of Dover and surrounding towns (i.e., Amenia and Pawling) in terms of variety of goods and services offered;
- e. Develop an expenditure profile of the primary trade area shoppers, as well as sales generated by existing stores in the trade area;
- f. Compare expenditures with sales to determine whether the trade area is currently saturated with retail uses or whether there is an outflow of expenditures from the trade area;
- g. Determine whether any factors would emerge that would affect conditions within the trade area by the project Build year;
- h. Identify any significant neighborhood character impacts, based on how the Proposed Project would affect businesses that define or substantially contribute to defining the character of the Town of Dover, or if a substantial number of businesses or employees would be displaced that collectively define the character of the Town of Dover.
- i. Describe the anticipated market demand and absorption rate for new residential units.
- j. Compare the economic benefits of the Proposed Project to the anticipated costs to the Town of Dover, and Town of Dover School District. Analyze whether or not the anticipated tax revenues will meet or exceed the anticipated cost for the increase in community services (i.e. police, fire, school, and recreation).

H. Cultural Resources

1. Introduction
2. Archaeological Resources—A Phase IA documentary study shall be prepared that will address the Project Site's potential to have hosted prehistoric and historic archaeological resources as well as the likelihood that such resources have survived the subsurface disturbances concomitant with construction episodes, infrastructure systems, landscaping, and agricultural practices. Sufficient information must be gathered to compare the prehistoric past, the historic past, and the subsurface disturbance record. This assessment will take into consideration known archaeological sites in the area and site file information from the New York State Office of Parks, Recreation, and Historic Preservation, the New York State Museum, and local sources. The Phase IA must identify the location of existing cemeteries on the Project Site or immediately adjacent to the project site and must identify whether any areas of unmarked graves exist within the Project Site.

If the Phase IA analysis identifies potential sensitivity for cultural resources or grave sites on the Project Site, a Phase IB site survey, including a subsurface investigation, should be completed to determine the presence or absence of cultural resources on the Project Site.

3. Historic Resources
 - a. Existing Conditions—Identify designated historic resources on the Project Site and on adjacent properties. Assess potential project-related impacts on any identified resources. The Applicant shall reference and annex to the DEIS the 1993 and 1996 NYSOPRHP determination that, at that time, certain components of the former HVPC on the National Register. Existing stone walls shall be identified and discussed with respect to their historic nature.
 - b. Future without the Proposed Project—Describe future conditions of historic resources on the Project Site in the future without the Proposed Project.

- c. Potential Impacts of the Proposed Project—Identify potential impacts to historic, architectural and archaeological resources that would result from the Proposed Project. Identify which existing onsite buildings would be removed and which would be preserved. In coordination with State Historic Preservation Office, include a discussion of the physical condition of these existing buildings and their historical significance. Include a discussion of the potential for rehabilitation of the historic HVPC buildings, especially those grouped along Route 22. Identify the location and any potential impacts of the Proposed Project on the former HVPC cemetery and any potential unmarked grave locations.
- d. Mitigation Measures—Coordination with SHPO shall be undertaken to obtain a determination of effect and to identify possible mitigation measures. The applicant shall consider the project design, including the rehabilitation of historic HVPC buildings and the restoration and preservation of the former HVPC cemetery.

I. Stormwater Management

1. Introduction
2. Existing Conditions—Describe existing stormwater flow rates and patterns on the site. Provide stormwater flow volumes and peaks using methodologies in “Urban Hydrology for Small Watersheds,” Technical Release Number 55, by the United States Department of Agriculture, Natural Resource Conservation Service, or those required by NYSDEC for compliance with regulatory programs. Peak flow rates and flow volumes shall be provided for the 1-, 2-, 10-, 25-, and 100-year storm events using site-specific runoff coefficients. Describe any differences in analysis results which are caused by the use of different methodologies to satisfy regulatory requirements.
3. Potential Impacts of the Proposed Project—Using the methodology and storm events analyzed in the existing conditions assessment, quantitatively describe the expected stormwater flows and peaks with the Proposed Project and related improvements for the 1, 2, 10, 25, and 100 year storm events. Describe measures to ensure that post-development stormwater peak flows will be below existing peak flows. Describe measures to ensure that stormwater runoff from the site in the post-development condition will not adversely affect adjacent and downstream properties and existing off-site drainage facilities. Describe any impacts to adjacent wetlands and waterbodies, including the Great Swamp, and underlying aquifers. Describe all stormwater practices to be used to detain and treat stormwater runoff. Describe the use of de-icing materials, fertilizers, and pesticides on the quality of surface runoff.

Describe measures to provide, at a minimum, storage and treatment for the 2 year, 24 hour storm. Provide an analysis of pre- and post-development phosphorus, biological oxygen demand, total suspended solids, and total nitrogen levels. Identify areas on the Project Site where underlying soils, geology, or groundwater may create conditions that are not suitable for construction of stormwater management facilities. Identify any additional Best Management Practices (BMPs) that will reduce phosphorus exported from the developed site to below pre-construction levels.

Identify and evaluate potential thermal impacts on receiving water bodies. Describe the type and quantity of vegetation proposed for the proposed stormwater basins. Evaluate the use of sub-surface detention/infiltration. Include description of the proposed maintenance for all stormwater management facilities.

4. Discuss the use of Low Impact Development Techniques (LID) including pervious pavement/pavers, bioswales, perimeter sand filters, and filter strips in the parking area and the potential benefit with respect to stormwater management.

5. Mitigation Measures—Discuss provisions for stormwater detention to reduce the peak rate of flow to no more than the existing peak rate of flow and stormwater quality measures in accordance with the NYSDEC Stormwater Management Design Manual. Include provisions to minimize soil loss by utilizing temporary and permanent erosion and sediment control systems for construction and post-construction activities including operation and maintenance (O&M), which meet New York State Standards and Specifications for Erosion and Sediment Control and Dutchess County guidelines with respect to design and installation. The plan for O&M of all stormwater facilities shall be attached to the DEIS and shall include the necessary O&M activities, frequency and responsible party(ies) for each O&M task. Include a discussion of compliance with all requirements imposed by NYSDEC SPDES General Permit for Construction Activity.

J. Traffic and Transportation

1. Introduction
2. Existing Conditions
 - a. Traffic Data Collection
 - (1) The traffic impact study (TIS) shall describe the physical conditions of the street network in the project study area. Physical conditions of the street network including roadway and sidewalk widths, traffic light signalization (i.e., ratio of green to total cycle timings), and other control data and traffic flow conditions (i.e., effective roadway width, etc.) shall be inventoried.
 - (2) Automatic Traffic Recorder (ATR) counts shall be conducted on northbound and southbound sides of US Route 22 in front of the Project Site for a contiguous seven (7) day period not including any national, state, or school holiday to identify weekday AM and PM and Saturday midday peak hours.
 - (3) Manual traffic counts shall be conducted during the weekday AM and PM peak hours and the Saturday midday peak hour at the following intersections:
 - NYS Route 22 and Cricket Hill Road (CR 26);
 - NYS Route 22 and Wheeler Road;
 - NYS Route 22 and Hutchinson Avenue;
 - NYS Route 22 and Pleasant Ridge Road (CR 21);
 - NYS Route 22 and County Route 68;
 - Pleasant Ridge Road (CR 21) and West Dover Road (CR 20);
 - Pleasant Ridge Road (CR 21) and State Route 55;
 - State Route 55 and Hutchinson Avenue;
 - Hutchinson Avenue and Wheeler Road;
 - Wheeler Road and Harlem Valley Golf Club;
 - Wheeler Road and West Dover Road (CR 20);
 - Hutchinson Avenue and Johnson Hill Road;

- NYS Route 22 and Rural Avenue;
 - NYS Route 22 and Old Pawling Road/Kitchen Corners Rd; and
 - NYS Route 22 and Hurds Corners Road.
- (4) Obtain the most recent three years of accident data from the NYSDOT or other local agencies for the study area intersections.
- b. Capacity Analysis—Perform a capacity analysis for each of the peak periods for which manual counts were collected at each of the study area intersections using methodology in the Highway Capacity Manual and the latest version of the Highway Capacity Software. Present HCS results (Levels of Service) tabularly for each peak period.
3. Future without the Proposed Project
- a. Background Traffic Growth—Estimate traffic volumes in the study area in the future without the project (No Build). Future traffic volumes shall be estimated using existing volume information and by adding a background growth factor, as well as incremental increases in traffic from No Build projects identified in this Scope as well as any others scheduled to be completed by the Build Year. Trips generated by these projects shall be determined using Institute of Transportation Engineers (ITE) Trip Generation rates or information presented in other recent studies (which studies shall be referenced).
- b. Capacity Analysis—Perform a capacity analysis for the Future Without the Proposed Project for each of the peak periods for which manual counts were collected at each of the study area intersections using methodology in the Highway Capacity Manual and the latest version of the Highway Capacity Software. Present HCS results (Levels of Service) tabularly for each peak period.
4. Potential Impacts of the Proposed Project
- a. Trip Generation—Use ITE trip generation data to estimate future traffic volumes resulting from the proposed development program. The Applicant shall provide documentation of any trip reductions associated with access to public transit. Identify projected arrival and departure patterns for project-generated traffic. Overlay the project-generated traffic on the future No Build network to determine future Build traffic volumes.
- b. Capacity Analysis—Perform a capacity analysis for each of the peak periods for which manual counts were collected at each of the study area intersections using methodology in the Highway Capacity Manual and the latest version of the Highway Capacity Software. Present HCS results (Levels of Service) tabularly for each peak period. Identify potential significant adverse impacts of the Proposed Project. For locations where significant adverse impacts are identified, the feasibility of potential mitigation measures will be evaluated. Conventional transportation system management (TSM) measures—such as revisions to the signal timings and changes in lane usage, signalization of intersections, street widening, and pavement marking, etc.—will be considered.
- c. Parking—Describe proposed off-street parking for the Proposed Project. Determine if the number of parking spaces proposed is adequate to accommodate the projected demand. Evaluate the potential for shared parking using the methodology described in Urban Land Institute’s “Shared Parking” (2nd edition). Discuss proposed parking for the train station and related transit-oriented design principles.

- d. Circulation—Identify primary access paths for passenger vehicles, emergency vehicles, delivery vehicles, and pedestrians. Provide diagrams showing truck tire turning radii in relation to parking spaces and pedestrian walkways for all turns between the site access and loading area(s). Include a description of the types of vehicles expected and the time and frequency of the visits to the Site. Include the anticipated pedestrian volumes at major Project Site intersections (i.e. Route 22 and Wheeler Rd.).
 - f. Public Transportation—Describe potential access to public transportation to the site, including bus and train service, commuter parking, and the future growth of the train station and needed parking requirements as planned by Metro-North Railroad; potential of train station as transit hub.
5. Mitigation—Describe any proposed mitigation measures in sufficient detail to assess feasibility of implementation, including the consideration of a transit-oriented design to decrease traffic impacts, offsite pedestrian access to Site, traffic-calming on Route 22 through the use of a vegetated median and other pedestrian amenities, bike paths, and local busing.

K. Air Quality

1. Introduction
2. Existing Conditions—Describe existing ambient air quality. Discuss, analyze, and evaluate ambient air quality conditions and standards within the study area based on data obtained from NYSDEC.
3. The Future Without the Proposed Project—Describe results of air quality analyses and assumptions with respect to development conditions in the Future Without the Proposed Project.
4. Potential Impacts of the Proposed Project—A screening analysis shall be performed to determine whether any location should undergo a detailed microscale CO analysis. The screening analysis will follow the procedures outlined in NYSDOT's *Environmental Procedures Manual*. The effects of the emissions from stationary sources at the Project Site shall be quantitatively assessed. Potential air quality impacts associated with the demolition and rehabilitation of the HVPC buildings, including a discussion of potential air borne contaminants such as asbestos and lead paint, shall be evaluated.

Using the PLACE3S (<http://www.energy.ca.gov/places/index.html>) model developed by the Oregon Department of Energy, Washington State Energy Office, and California Energy Commission estimate the carbon footprint of the Proposed Project compared with a typical single-family home development of a comparable number of dwelling units. Estimate total vehicle miles traveled (VMT) by residents and visitors to the Project Site and the potential carbon footprint of those VMT. Compare the VMT of the Proposed Project to comparable development in a traditional low-density single-family home development and commercial strip pattern.

L. Noise

1. Introduction
2. Existing Conditions—Assess existing noise levels on the Project Site using actual measurements of existing noise levels.
3. The Future Without the Proposed Project—Describe expected changes to noise levels as a result of No Build traffic levels.
4. Potential Impacts of the Proposed Project—Calculate project-generated noise levels from mobile and stationary sources (e.g. HVAC equipment) associated with the Proposed Project. Assess whether increased noise levels constitute a significant impact based on criteria in the NYSDOT *Environmental*

Procedures Manual. The noise assessment shall also include an evaluation of construction activities, equipment and methods (e.g., blasting) and vehicular traffic during each phase of construction and after construction, based upon "DEC Policy DEP-001: Assessing and Mitigating Noise Impacts." The Applicant shall discuss the impact of the duration of the noise on the public.

M. Hazardous Materials

1. Existing Conditions

- a. Summarize the findings of a full Phase I Environmental Site Assessment (ESA) of the site, and any Phase II investigations, including all existing buildings and publicly accessible areas, prepared in accordance with ASTM Standard E 1527-05 and identify any and all recognized environmental conditions. The Phase I shall include an investigation for heavy metals, molds, pesticides and herbicides in and around the HVPC buildings and the existing golf course. Summarize technical analyses conducted of all site buildings for the presence of asbestos, lead paint, or other regulated materials within the HVPC buildings. The full Phase I ESA and any supplemental investigations of the site or site buildings shall be included as an Appendix to the DEIS.
 - b. Identify and describe any areas of environmental concern including, but not limited to, solid waste facilities (dumps, ashfills, landfills), petroleum spills (active and closed), chemical spills, petroleum bulk storage facilities and any location where residual contamination is known to exist such that soil, subsurface vapor, sediment, surface water or groundwater standards or guidance values have been exceeded. In addition to any recognized environmental conditions identified by the Phase I ESA, the Applicant shall address the following known areas of environmental concern: 1) the Ash Landfill behind Building 34 north and south of Wheeler Road; 2) the Old Golf Course Landfill; 3) Western, Eastern, and Southern Fill Areas of Dump No. 2; 4) the Soil Vapor Extraction System behind Building 34; 5) active Petroleum Spill No. 9012798; 6) closed Petroleum Spill Nos. 8703 175, 88071 17,8900727, 9012799, 9012800, 9108302, 9109455, 9206178, 9211052,921 1275,9402939, 9703270; and 7) closure of active Petroleum Bulk Storage Tank Nos. 11 8, 344,381,461,531,591,601,641,672,741,911,and 931 per PBS Registration No. 3-049654. The Applicant shall also address the impacts from any other active or closed petroleum or chemical spill not already mentioned.
 - c. Prepare a map showing the locations of all recognized environmental conditions identified in (a.) above and the locations of the known areas of environmental concern identified in (b.) above.
2. The Future Without the Proposed Project—Identify any current obligation of the site owner to remediate any recognized environmental conditions or regulated materials whether by virtue of any Consent Order or Remedial Action Plan applying to the site. Identify any potential obligation of the site owner to remediate any recognized environmental conditions or regulated materials should the project not be approved.
 3. Potential Impacts of the Proposed Project
 - a. Describe how environmental contaminants will be abated prior to commencement of construction including, but not limited to, remediation of asbestos, lead paint, contaminated soil, groundwater, and sub-surface vapor, removal or closure of chemical or petroleum storage tanks, solid waste facilities, and maintenance of institutional or engineering controls if contaminants are to remain.

- b. Describe how construction and demolition (C&D) debris will be disposed of and, specifically, how the existing HVPC tunnels will be back-filled. Back-filling of the existing tunnels shall not be done with any materials regulated as hazardous materials.
 - c. Describe any constraints on redevelopment of residential or public uses (e.g., open spaces) given any contamination to remain on the site.
 - d. Identify any hazardous materials to be generated or stored on the Site in both the construction and operations periods of the project. Describe storage and disposal practices to be implemented for these hazardous materials.
4. Mitigation Measures
 - a. Describe mitigation measures/best management practices to be utilized during construction or rehabilitation of the project. Describe any required mitigation as part of any Remedial Action Plan developed for the site.

N. Construction

1. Introduction
2. Describe proposed construction phasing, overall schedule for project completion, and hours of construction operations. Describe the equipment and materials storage and/or staging area, anticipated number of construction workers, anticipated lighting and security, and the delivery means and methods. Describe the erosion and sediment control plan for the Proposed Project and any stormwater management practices to be used on a temporary basis. Identify how the existing tunnels on the site will be demolished and what materials will be used to fill them. Identify how demolition debris will be sorted and carted off-site and/or re-used on the Project Site.
3. Assess the potential environmental impacts anticipated due to the construction of the Proposed Project including traffic, noise, air quality, dust, blasting, erosion and sedimentation and its impact on the surrounding area.
4. Discuss construction management techniques and enforcement, control plans, ideal management practices to be employed, along with mechanisms to minimize impacts related to partial project completion.

O. Infrastructure and Energy

1. Introduction
2. Sanitary Sewage
 - a. Existing Conditions—Describe the existing HVPC wastewater treatment plant, its design capacity, and its current/former SPDES permit discharge limits.
 - b. Potential Impacts of the Proposed Project—

Describe the anticipated flow volumes from the Proposed Project. Describe any necessary improvements to the existing wastewater treatment plant and collection system to accommodate the anticipated flow volumes from the Proposed Project and any improvements or modifications to the treatment plant to allow projected flow volumes to meet SPDES permitting requirements.

Evaluate any potential impacts associated with wastewater treatment plant improvements and operation including potential visual impacts, increased effluent impact on public use of the Swamp River (e.g., non-motorized boating and kayaking), and identification of any separation

distances from drinking water resources on-site and near the Site. Describe any potential stream and wetland impacts related to system construction, conveyance of sewage, and discharge to the Swamp River.

- c. Mitigation Measures—Discuss water saving fixtures, use of tertiary treatment plant, reuse of treated water for irrigation and commercial uses; recycling of grey water, and creation of natural resources for filtering purposes.

3. Water Supply

- a. Existing Conditions—Describe existing water supply to Project Site.
- b. Potential Impacts of the Proposed Project—Describe how water will be supplied to the Proposed Project and the ability of the local and regional groundwater system to handle the anticipated demand including any potential impacts to private wells off the Project Site. Estimate the usage for all proposed buildings including estimates for fire fighting purposes. Describe the project's fire-fighting system, including water storage capacity, number and location of fire hydrants, and building sprinkler systems. Include a discussion of the potential for the use of a graywater system and analyze its effect on total water usage.

Include an evaluation of anticipated aquifer withdrawal versus rate of recharge and well draw-down projections for 180-day drought. The pump test report should include a groundwater recharge and use budget describing whether the Site is self-supporting in its water requirements or relies on water migrating onto the Site from the Swamp River or elsewhere.

The Applicant shall complete a 72-hour pump test to demonstrate adequate water yield and monitoring to evaluate potential impacts to wetlands, waterbodies and off-site wells. Applicant shall obtain pre-approval of the 72-hour pumping test and aquifer test report protocol. The protocol shall show pumping well locations, monitoring well locations (including- monitoring wells between any site contamination areas and pumping wells), conditions which would trigger extension of tests beyond 72-hours, discussion of relationship and likely quality impacts of pumped wells relative to the proposed wastewater treatment system outfall area, discharge locations for water pumped during the test, surface water and wetland gauging sites, and should authorize the Town to periodically visit the site during the test to observe the flow test procedure. The protocol shall provide a draft table of contents for the aquifer report and should include a site recharge budget, analysis of any on-site and off-site impacts including surface water bodies and nearby private wells, any water supply quality concerns associated with any potential contaminant sources on the Site, and drought yield estimates based on reduced annual recharge rates during droughts and 180-day periods without precipitation. Recharge areas for existing and proposed wells and a wellhead protection plan shall be described.

- c. Mitigation Measures—The DEIS shall evaluate measures to reduce and conserve water resources, potential system and infrastructure improvements, and reuse treated sewage for irrigation for the entire site to reduce water demands. In the case where an on-site water supply system can not supply the entire needs of the proposed project, the DEIS shall also consider alternate off-site water supply source, including off-site locations along the Ten Mile River which take advantage of the larger catchment area of a larger watershed area and so could pose reduced localized drawdown or stream flow reduction impacts. Measures to be enforced by HOA/condominium associations to minimize the use of the community water supply for activities such as grass and garden irrigation and pool filling shall be identified. A discussion and consideration of Leadership in Energy and Environmental Design (LEED) methods to reduce the communities demand on

water resources shall be provided. A discussion of wellhead protection plans to protect well recharge areas and well locations shall be provided.

4. Electrical Supply

- a. Existing Conditions—Identify service providers and existing energy infrastructure including a discussion of where and how petroleum products, including heating oil, will be stored. A description of whether the development, or portions thereof, will be subject to 40 CFR112 and/or 6 NYCRR Parts 612-614 and methods of compliance with the regulations shall also be included. The potential for use of natural gas, solar and alternative fuels shall also be discussed. The proposed location of electrical lines shall also be set forth in the DEIS.
- b. Potential Impacts of the Proposed Project—Evaluate anticipated energy demand and ability of providers to service the project including, but not limited to, a discussion of the use of energy efficient appliances, lighting and all other measures of energy conservation. Identify the anticipated heating fuel type.
- c. Mitigation Measures—Discuss the Applicant's use of alternate energy resources and LEED community, commercial and residential building design methods.

CHAPTER IV: PROJECT PHASING

The first phase of the Dover Knolls project will include a proposed site plan application for development on both sides of Route 22. On the east side, it will include the proposed grocery store and adjacent buildings and parking; construction of the parking area to the south, which will serve the Main Street shops, the grocery store, the existing church and rehabilitated community center; and rehabilitation of the administration building and the open space lawn along Route 22. It will also include improvements to the existing running track, and other potential public amenities.

On the west side of Route 22, the first phase will include the commercial, residential and parking improvements closest to the Metro-North Station; the new bridge across the Swamp River; certain public amenities involving the Swamp River; the first residential neighborhood to the west of the bridge; the relocation of existing golf holes on the north and south of Wheeler Road to the north into the former Dykeman property; the construction of the northern loop road with access to Pleasant Ridge Road; and the development of additional residential neighborhoods in the western portion of the site.

The first phase of the plan will include at least 65% of the Project's commercial development, and at least 35% of the residential development. It will also include infrastructure improvements (water supply, sanitary sewage, stormwater management), some of which is to serve the first and second phases, road improvements along the site's frontage on Route 22, as well as potential demolition of structures such as the prison and other dilapidated or potential safety and health hazards.

While the DEIS will consider the potential impacts of the full-build out (e.g., Phases I and II combined), this DEIS chapter shall include a detailed analysis of the potential impacts of Phase I of the Proposed Project. The analysis will follow the same general format as Chapter III of this DEIS and will evaluate the following areas:

- A. Land Use and Community Character, Zoning, and Public Policy***
- B. Visual Resources***
- C. Geology***
- D. Natural Resources***

*E. Water Resources and Wetlands**F. Community Services**G. Economic Conditions**H. Cultural Resources**I. Stormwater Management**J. Traffic and Transportation**K. Air Quality**L. Noise**M. Hazardous Materials**N. Construction**O. Infrastructure and Energy**CHAPTER V: ALTERNATIVES*

1. Introduction—Provide a narrative description of each impact issue for each alternative identified below. Provide a comparable level of analysis for each potential impact area to allow the Town Board to evaluate the Proposed Project in relation to potential alternatives. Summarize the comparative analysis in tabular format.
2. Alternatives
 - a. No Action Alternative—The HVPC site and Dykeman parcel are not redeveloped.
 - b. Existing Underlying Zoning—Development of the HVPC site and Dykeman parcel using the underlying Zoning Districts applicable to each site while complying with the requirement of clustering development to the maximum extent practical. Uses within this alternative must comply with restrictions on the location of different permitted uses in the underlying zoning districts.
 - c. Extension of MC Overlay to Dykeman Parcel—Development of the HVPC and Dykeman parcel with the Existing Overlay Zoning extended onto the Dykeman Property.
 - d. Lower Density Mixed-Use Alternative—Alternative lower density design including, but not limited to, consideration of the following:
 - (1) An 18-hole golf course;
 - (2) Reduction in the number of total housing units and removal of all proposed residential units from all environmentally sensitive areas and reasonable or regulatory buffers, such as the steep hillsides, marble knolls and wetlands, as well as the identified wildlife corridors lying between these identified resources with greater clustering of residential development within a ½-mile radius of the train station; and
 - (3) Reduction in total land disturbance.
 - e. Enhanced Commercial Mixed-Use Alternative—Development of a greater mix of commercial uses while retaining residential and civic uses.
 - f. Adaptive Reuse Alternative—Consideration of the same mix of commercial and residential uses (but not necessarily same amount) as the Proposed Action but within existing buildings.

CHAPTER VI: MITIGATION

Summarize all proposed mitigation for significant impacts identified in the environmental impact statement. Because these measures, once recommended, would become part of the Proposed Project, their formulation and analysis of their effectiveness would be undertaken in close coordination with the lead agency and other agencies, if necessary.

CHAPTER VII: UNAVOIDABLE ADVERSE IMPACTS

Summarize any unavoidable environmental impacts identified in the DEIS.

CHAPTER VIII: IRREVERSIBLE AND IRRETRIEVABLE COMMITMENT OF RESOURCES

Identify any resources the use of which would be irreversible and irretrievable.

CHAPTER IX: GROWTH INDUCING AND CUMULATIVE IMPACTS

Assess potential growth-inducing impacts of the Proposed Project in terms of potential new off-site development of residential dwelling units to accommodate new employees attracted to the area or new commercial development along Route 22 seeking to benefit from proximity to the Proposed Project. Evaluate potential ancillary growth with respect to potential impacts to each of the topics of analysis for the Proposed Project. Also include an assessment of the following:

1. General effects on immediate areas to the north and south on Route 22;
2. Discussion of economic "halo" effects typically expected in terms of taxes and jobs;
3. Capturing regional growth in a concentrated center, as opposed to scattered growth.

CHAPTER X: ENERGY CONSUMPTION AND CONSERVATION

Summarize the use of energy and the management of solid waste produced by the Proposed Project.

APPENDICES

Materials to be provided in DEIS Appendices include:

1. All SEQRA documentation including a copy of the Full Environmental Assessment Form, the positive declaration and the DEIS Final Scope.
2. All official correspondence related to issues discussed in the DEIS.
3. All technical reports in their entirety including, but not limited to, the following:
 - a. Traffic Studies
 - b. Water and Sanitary Sewer Reports
 - c. Drainage Report
 - d. Stormwater Management Plan
 - e. Geotechnical Report and/or narrative
 - f. Phase I Environmental Site Assessment, any Phase II investigations, and any building reports identifying potential environmental contaminants

- g. SHPO studies including the Phase 1A investigation and building assessments
- h. Environmental Reports (Klemens, Hudsonia, Evans et.al.)
- i. Dover Union Free School District Capacity/Projection
- j. MTA Railroad Capacity Projection
- k. Other

C. GLOSSARY OF TERMS

Age-Targeted – Housing units created to appeal to a population that is of a specific age but the ownership of which is not restricted by age.

Age-Restricted – Housing units that can only be inhabited by residents of a specific age.

Commercial Uses – Non-manufacturing businesses including retail, professional offices, or professional services.

Community Uses – Uses that benefit members of the community including churches, community centers and recreational amenities.

Comprehensive Development Plan – An overall plan showing the layout of streets, location of uses, and public and private open spaces for development within the Mixed-Use Institutional Conversion (MC) Overlay District (§145-16 of the Town of Dover Zoning Code).

Conceptual Site Plan – A Comprehensive Development Plan prepared pursuant to §145-16 of the Town's Zoning Code.

Master Plan – The Town of Dover Master Plan.

Non-residential Uses – Uses that are designated for purposes other than housing people and/or families. Non-residential uses include commercial uses and community uses.

Proposed Project – The buildings, open spaces, uses, and activities shown on the Comprehensive Development Plan.

Site Plan – Documents and drawings describing proposed improvements to land as listed in §145-65.B of the Town of Dover Zoning Code.

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