INSPECTION DETAILS

Site: McClelland – 123 Wormer Road, Voorheesville

Date: December 20, 2008

Topography:

A review of US Department of Interior Geological Survey Map Voorheesville Quadrangle of 1954 (photorevised 1980) show a drop in elevation from west to east. The contour lines on the Concept Plan drawing shows elevation of 430 feet AMSL at the point where the west boundary of Lot #2 meets the west boundary of Lot #4. Going eastward on Lots 1, 2 and 4 the contour lines drop rather rapidly for the first 60 to 100 feet to where the elevation decreases to 390 to 400 feet AMSL. From that point east on these three lots the slope is more gradual. While the slope on Lot #3 is not as steep as that at the rear of the other three lots, it does have a relatively consistent slope with a drop in elevation of about ten feet every fifty feet to the east. Its rear (west) elevation is 380+ feet AMSL and the front (east) is 350+ feet AMSL. Geological Survey map (US Dept. of Interior -Voorheesville Quadrangle 1954 – photorevised 1980) shows elevation of 340 AMSL near the south east corner of Lot #3. Overall slope of the property was computed to be approximately 10° downward from west to east. In the Soil section of this report the slopes are also noted with the west side being considerably steeper than the rest of the terrain to its east. Since a snow storm was predicted, GCAC Chair viewed the property from the roadway on December 18th and noted that there is a gradual incline from Wormer Road to the residence. In the rear area, within the wooded area to the north of the residence it was observed that there is a noticeable drop in elevation toward Wormer Road after which the slope is more gradual toward the Road. The front area of proposed Lot #3 to the south of the driveway has a rather sharp drop in elevation just prior to meeting Wormer Road. The original site visit of December 20th was postponed due to amount of snow covering the driveway and was rescheduled to January 10th. At site visit of January 10th, it was noted that the terrain was basically as describe above with the addition of Lot #1 also sloping slightly toward the northeast on its way to the east. The rather sharp drop of Lot #3 near Wormer Road was also verified.

<u>Vegetation/Trees</u>: Presenter noted that much of the property is lawned with the wooded area having hardwoods including sugar maples. Site drawing shows the treeline running along the north side of Lot #1 and along the rear section of Lots #1, 2 and 4 as well as most of the front southeast half of Lot #3. At site visit, it was noted that the hardwood trees on the western slope are mainly tall and that the wooded area was of medium density. In addition to maples, the Presenter also noted there were oaks. There are also a few pines amongst the hardwoods. Near the south west boundary of open portion of Lot #1, there are some large white pine which should be avoided if possible as that lot is developed. On Lot #4 east of the driveway near the Town boundary line there is a line of a few deciduous trees. The wooded area on Lot #3 near Wormer Road contains much thick brush and was noted by Presenter as containing thickets. Thus, GCAC did not attempt to forge our way through the snow on that strip of brush along Wormer Road.

Soil: Presenter described the soil as being pretty consistent clay and rocks.

A review of Sheet 18 in "Soil Survey of Albany County, New York" by James H. Brown (1992) shows the property has two types of soil MbD and NuB. The upper portion of the wooded hill area along the west boundary has MbD soil while the soil on the rest of the property to the west is NuB. A brief description and some limitations of the soils are as follows:

MbD - Manlius channery silt loam, 15 to 25 percent slopes - This moderately steep soil is moderately deep and well drained to somewhat excessively drained. Depth to bedrock is 20 to 40 inches. It limits rooting to 15 to 24 inches. Permeability is moderate. Available water capacity is low. The main limitations of this soil for dwellings with basements are the depth to bedrock and the slope. Areas of included soils and nearby soils that are less sloping and deeper to bedrock are better suited to this use. The soil reference notes that on this Manlius soil, placing the building on bedrock and adding fill to landscape around it or ripping the weathered bedrock are suitable management practices. It further notes that designing the dwelling to conform to the slope or cutting and filling in construction benches are also suitable management practices. Maintaining the vegetative cover adjacent to the site, diverting runoff, and mulching help control erosion. The main limitation of this soil for local roads and streets is the slope. Depth to bedrock is also a limitation. Laying out roads on the contour is a suitable management practice. Landscaping and grading help overcome the slope limitation. The main limitations affecting the use of this soil as a site for septic tank absorption fields are the depth to bedrock and the slope. Septic tank absorption fields on the included soils that are deeper to bedrock will properly filter effluent. Installing distribution lines on the contour, with drop boxes or other structures, will ensure even distribution of effluent and more effective operation of the system.

<u>NuB</u> – <u>Nuna silt loam, 3 to 8 percent slopes</u> – This gently sloping soil is very deep and moderately well drained. The seasonal high water table is at a depth of 18 to 24 inches from March to May. Depth to bedrock is more than 60 inches. Permeability is moderate in the surface layer and in the upper part of the subsoil and slow to very slow below. The available water capacity is high, and runoff is medium. This soil is well suited to pasture. Maintaining ground cover to reduce surface runoff helps control erosion. The main limitation of this soil on sites for dwellings with basements is the seasonal high water table. Foundation drains and interceptor drains upslope from construction sites divert runoff and lower the water table. The main limitation of this soil for local roads and streets is the frost-action potential. Constructing roads on coarse textured fill material provides drainage away from the roadway. The main limitation affecting the use of this soil as a site for septic tank absorption fields are the seasonal high water table and the slow percolation in the subsoil and substratum. Installing a drainage system around the absorption field and diversions to intercept runoff from the higher areas will reduce wetness. Enlarging the absorption field or the trench below the distribution lines will improve percolation. Since the plan is to hook up to Town water and sewer, these limitations related to septic systems will not apply in this situation.

Drainage/Wetlands: The Application for Subdivision form indicates there are no wetlands, or streams on the property. It should be noted that there is a pond on the overall acreage but the pond itself is actually located in the Town of New Scotland to the south of the residence. No streams or ponds were noted at time of site visit although ground was covered with snow. Further review of the Soil Survey map indicates no watercourses or wet spots on the property. At time of site visit, it was observed that there is a short narrow strip of water lying in a north south direction on Lot #1 west of the large white pines. Near this water, which was not frozen despite the temperature being quite cold (11° to 12° F at time of site visit per wunderground.com). Further evidence of wet area was the existence of a few plants which at least resemble a type of rush. This may very well bee only a small area where water has settled on frozen ground, but since it is not frozen, it is of some concern to GCAC. As the plan for the lot is developed, the existence of this wet area should be considered. -Based on the contour lines on the Concept Plan natural drainage is to the east and southeast toward Warmer Road with some drainage from Lot #1 going northeast prior to its flow to the east. On upper portion Lot #3 and possibly lower portion of Lot #4 it was observed that there is what appears to be a drainage ditch and culvert about 15 to 20 feet long running in an easterly direction. At the time of exiting the property, it was also noted that on the left (northwest) side of the lower portion of the driveway there is what appears to be a drainage ditch. Along Wormer Road there is a drainage ditch and it is assumed a culvert under the area of the entrance to the driveway. While viewing the rear wooded area of Lot #2, it was observed that there are two lengths of large drain pipes (12 to 15 inches in diameter) lying on the hill in the wooded area lined up in a west/east direction. Presenter did not know of these being of any function, but the reason for them being there remains a question. Area where these pipes are is close to the lines on the concept plan denoting the waterline easement to Bennet.

<u>Septic/Wells</u>: According to the Presenter, the existing residence has a septic system which may actually be in the Town of New Scotland; and that residence is hooked up to the Town of Guilderland system. Application for Subdivision form indicates plan is to hookup to Town water and sewer. Presenter further noted that according to Bill West, Town Superintendent of Water/Wastewater, there are five water taps available.

<u>Visual Impact</u>: According to the Presenter, the development of the subdivision would have little or no visual impact to neighbor Bennet on the west nor to the neighbors to the east due to the vegetation on the west and the terrain to the east. While this vegetation along the west side of proposed Lot #2 does contain many tall trees, during at least the winter months, it is easy to view the Bennett mansion which sits on highest hill of the triangular shaped area bounded by State Farm, Wormer and Normans Kill Roads. This large mansion is at an elevation of 430 feet AMSL and the midpoint elevation of the proposed building envelope for Lot #2 is 390 feet AMSL. Proposed building envelopes of Lots #1 and #3 would be about fifteen and twenty-five feet respectively lower than Lot #2. Due to this thirty to forty foot or more difference in elevation and the aforementioned trees, structures on the McClelland site may be insignificant from the Bennet's property when looking off into the distance. While the umbrella of this wooded area may hide much of the view of the proposed structures from the Bennets, and even though this neighbor chose to build relatively close to the property line, it may be prudent for the applicant to confer with this neighbor in an effort to minimize any possible negative visual impact of the planned development of these lots.

<u>Endangered species</u>: None, including Karner Blue according to the Presenter to the best of his knowledge. None observed at time of January 10th site visit.

<u>Historical Considerations</u>: According to the Presenter, no burial grounds and nothing of historical significance. Nothing of historical significance observed at time of January 10th site visit.

Submitted By:_

John G. Wemple, Jr. - Chairperson

To: Guilderland Planning Board

From: Guilderland Conservation Advisory Council

Date: January 14, 2009

Re.: Subdivision of McClelland, 123 Wormer Rd., Voorheesville, NY

APPLICATION

Applicants: Jon McClelland, 123 Wormer Road, Voorheesville, NY

Proposed Subdivision: A four-lot subdivision of 4.3 acres. (This lot is listed as being 2.5 acres on the Town website under the Assessor's list of vacant land while Tax map shows it to be 4.3 acres (c)).

Location: Property is along the southern boundary line of Guilderland and New Scotland about 0.3 miles southeast of Route 155 on the west side of Wormer Road.

Zoning: R-20.

SITE INSPECTION SUMMARY

Site Inspection Date: January 10, 2009

Meeting Attendees: (December 15, 2008) Presenter Eric Miller. GCAC Members Stephen Albert, Herbert Hennings, Gordon McClelland (no relation to Owner), Stuart Reese and John Wemple, Chair.

Inspected by: Presenter Eric Miller; GCAC Members Stephen Albert, David Heller, Herbert Hennings, Gordon McClelland, Stuart Reese, Steven Wickham and John Wemple, Chair.

<u>Conclusions</u>: At the December 15, 2008, the Presenter Eric Miller noted that the property had been that of the Applicant's aunt, Ann Schadler, from in the 1930's until the Applicant bought it from her about ten years ago. Mr. Miller further noted that the Applicant, who lives on the property, would like have the property utilized by family members particularly his two daughters. Presenter also noted, related to Lot #3, that the location of the Wormer Road curb-cut for the driveway would be decided by the Town Superintendent of Highways. It should be noted that, even though there is no apparent plan to build on the Guilderland portion of Lot #4, there does appear to be sufficient space to accommodate a residence on that portion of the lot. While it does not show on the concept plan, there is a large storage or utility shed, which appears in very good condition, on Lot #4 just below the treeline west of the upper driveway.

As noted on the Concept Plan as well as on the subdivision application, there are two water easements on the property. One runs along the north boundary of Lot #1 and then along the west boundaries of Lots # 2 and #4. The second easement runs along the southeast boundary of Lot #1 and much of the northwest portion of the driveway easement for Lots #1 and 2 and then to the west across Lot #2 south of the midsection of that lot.

GCAC does not feel that the subdivision and subsequent development of this property will poise any noticeable negative environmental impact provided appropriate measures are taken to incorporate proper stormwater management, tree cutting is kept to a minimum, limitations of the soil as noted under the soil section of this report are considered and that any necessary remediation be take regarding the wet area noted on proposed Lot #1 and the adjacent area. If the water found on Lot #1 is actually the result of one or more springs, the resulting runoff into the drainage system along Wormer Road may poise a problem due to the potential of this runoff containing chemical fertilizers once the lot is developed.

It should be noted that after further review of information related to the property, the question of the source of the water on the wet area still remained unanswered. This lead to the speculation that possibly there was a leak in one of the waterlines which cross the property as noted on the concept plan. On January 13th, GCAC Chair spoke to Bill West, Superintendent of Water/Wastewater regarding the issue. Mr. West checked out the property the same day and reported back that he did not find any water, which may have been covered over by snow. He checked the pressure of two of the pipelines and found no indication of a leak. From what he said, there appears to be a possible third waterline easement. The issue of a possible waterline leak was left that Mr. West would anticipate that he would hear from the owner(s) if there was a drop in water pressure. In speaking to Mr. West, he noted that care would have to be taken in building on Lot #2 to avoid building on top of the waterline easement which crosses that proposed lot. Thus, the buildable area within the building setbacks of Lot #2 becomes greatly diminished if the structure is kept below the treeline and to the north of the waterline easement.

Submitted by:

John G. Wemple, Jr. - Chairperson