

For Office Use Only
 Executive Office of Environmental Affairs
 EOE No.: 13451
 MEPA Analyst: Bill GAGE
 Phone: 617-626-1025

ENF Environmental Notification Form

The information requested on this form must be completed to begin MEPA Review in accordance with the provisions of the Massachusetts Environmental Policy Act, 301 CMR 11.00.

Project Name: School Street on-site Wastewater Treatment Facility		
Street: School Street (Assessors Map: Map 65 Parcel 11)		
Municipality: Southborough	Watershed: Concord River	
Universal Transverse Mercator Coordinates:	Latitude: 42° 18' 46" N	Longitude: 71° 31' 43" W
	Estimated commencement date: July 1, 2005 Estimated completion date: July 1, 2006	
Approximate cost: \$2,500,000.00	Status of project design: 50%complete	
Proponent: Security Realty Trust		
Street: 303 Worcester Road		
Municipality: Framingham	State: MA	Zip Code: 01701
Name of Contact Person From Whom Copies of this ENF May Be Obtained: Desheng Wang		
Firm/Agency: Carr Research Laboratory, Inc	Street: 251 W. Central St., D-36	
Municipality: Natick	State: MA	Zip Code: 01760
Phone: 508-651-7027	Fax: 508-647-4737	E-mail: deshengw@yahoo.com

- Does this project meet or exceed a mandatory EIR threshold (see 301 CMR 11.03)?
 Yes No
- Has this project been filed with MEPA before?
 Yes (EOEA No. _____) No
- Has any project on this site been filed with MEPA before?
 Yes (EOEA No. _____) No
- Is this an Expanded ENF (see 301 CMR 11.05(7)) requesting:
 - a Single EIR? (see 301 CMR 11.06(8)) Yes No
 - a Special Review Procedure? (see 301 CMR 11.09) Yes No
 - a Waiver of mandatory EIR? (see 301 CMR 11.11) Yes No
 - a Phase I Waiver? (see 301 CMR 11.11) Yes No

Identify any financial assistance or land transfer from an agency of the Commonwealth, including the agency name and the amount of funding or land area (in acres): N/A

Are you requesting coordinated review with any other federal, state, regional, or local agency?
 Yes (Specify MA DEP) No

List Local or Federal Permits and Approvals:

Which ENF or EIR review threshold(s) does the project meet or exceed (see 301 CMR 11.03):

- | | | |
|---------------------------------|--|--|
| <input type="checkbox"/> Land | <input type="checkbox"/> Rare Species | <input type="checkbox"/> Wetlands, Waterways, & Tidelands |
| <input type="checkbox"/> Water | <input checked="" type="checkbox"/> Wastewater | <input type="checkbox"/> Transportation |
| <input type="checkbox"/> Energy | <input type="checkbox"/> Air | <input type="checkbox"/> Solid & Hazardous Waste |
| <input type="checkbox"/> ACEC | <input type="checkbox"/> Regulations | <input type="checkbox"/> Historical & Archaeological Resources |

Summary of Project Size & Environmental Impacts	Existing	Change	Total	State Permits & Approvals
LAND				<input type="checkbox"/> Order of Conditions <input type="checkbox"/> Superseding Order of Conditions <input type="checkbox"/> Chapter 91 License <input type="checkbox"/> 401 Water Quality Certification <input type="checkbox"/> MHD or MDC Access Permit <input type="checkbox"/> Water Management Act Permit <input type="checkbox"/> New Source Approval <input type="checkbox"/> DEP or MWRA Sewer Connection/ Extension Permit <input type="checkbox"/> Other Permits (including Legislative Approvals) – Specify:
Total site acreage	3.42			
New acres of land altered		2		
Acres of impervious area	0	0.07	0.07	
Square feet of new bordering vegetated wetlands alteration		0		
Square feet of new other wetland alteration		0		
Acres of new non-water dependent use of tidelands or waterways		0		
STRUCTURES				
Gross square footage	0	3000	3000	
Number of housing units	0	0	0	
Maximum height (in feet)	0	35	35	
TRANSPORTATION				
Vehicle trips per day	/	2	2	
Parking spaces	/	2	2	
WATER/WASTEWATER				
Gallons/day (GPD) of water use	/	50	50	
GPD water withdrawal	/	N/A	N/A	
GPD wastewater generation/treatment	/	80,000	80,000	
Length of water/sewer mains (in miles)	/	0.04	0.04	

CONSERVATION LAND: Will the project involve the conversion of public parkland or other Article 97 public natural resources to any purpose not in accordance with Article 97?

- Yes (Specify _____) No

Will it involve the release of any conservation restriction, preservation restriction, agricultural preservation

restriction, or watershed preservation restriction?

Yes (Specify _____) No

RARE SPECIES: Does the project site include Estimated Habitat of Rare Species, Vernal Pools, Priority Sites of Rare Species, or Exemplary Natural Communities?

Yes (Specify _____) No

HISTORICAL /ARCHAEOLOGICAL RESOURCES: Does the project site include any structure, site or district listed in the State Register of Historic Place or the inventory of Historic and Archaeological Assets of the Commonwealth?

Yes (Specify _____) No

If yes, does the project involve any demolition or destruction of any listed or inventoried historic or archaeological resources?

Yes (Specify _____) No

AREAS OF CRITICAL ENVIRONMENTAL CONCERN: Is the project in or adjacent to an Area of Critical Environmental Concern?

Yes (Specify _____) No

PROJECT DESCRIPTION: The project description should include (a) a description of the project site, (b) a description of both on-site and off-site alternatives and the impacts associated with each alternative, and (c) potential on-site and off-site mitigation measures for each alternative (You may attach one additional page, if necessary.)

See Attachment

(b) Alternative Analysis

The entire project will consist of residential and commercial buildings, which generate up to 80,000 gpd of domestic wastewater per 310 CMR 15.203. There is no public domestic sewer in the Town of Southborough. The area of subdivision has very low permeable soil and cannot meet the percolation requirements in 310 CMR 15.00. Therefore, the project proponent will have to build a PSTF on-site. The PSTF will be a tertiary treatment system consisting of a Lotus system, dual dyna sand filters, and disposal fields. See attached Figure for schematic layout. The sewage sources include single-family houses, elderly housing, intensive care units, office complex, etc. The facility will provide wastewater treatment functions to domestic sewage only. Table 1 summarizes the planned usage of the development for the treatment facility.

Table 1. Summary of proposed project and sewage rate

Land use	Sewage flow rate, gpd	Subtotal sewage rate, gpd	Remarks
Elderly housing, 150 units	150 per unit	22,500	
Single family houses, 38 lots Overlook Dr.	660 per lot	25,080	
Single family houses, 25 lots Newton St.	660 per lot	16,500	
Office, 160,000 sq. ft.	75 per 1000 sq. ft	12,000	
Community Center + others		3920	52,500 sq. ft
Total		80,000	

(c) Mitigation

In order to minimize the impact on environment, the highest water quality standard have been adopted in choosing the wastewater treatment. Tertiary treatment standard will be met before the treated water is further treated by soil absorption system building very permeable gravely sand. The site hosting the treatment facility and SAS, as described above, is currently open field, which will be mostly maintained as so under the post-development condition. The groundwater recharge will not have negative impact to the environment. At the current stage the treatment plant will not generate significant solid waste. The impact on traffic, energy, air quality, wildlife habitat, wetland, water supply, as discussed in the related section of ENF, will be negligible.

Project Description:

(a) Description of the Project Site

A tertiary private sewage treatment facility (PSTF) is proposed for construction on 3.42 acres of land off School Street in Southborough. See attached USGS locus map for general location and the project site plan for details. There is a 10-ft sewer easement across the railroad tracks of CSX. An 8-inch sewer line has been installed in a 10-inch steel case under the railroad easement. See the as-built railroad-crossing plan for details. Most of the sewage will be generated and transported from east of the railroad to the treatment and disposal site through this easement. The design and construction of housing will be a separate project in the Phase II development. This project is limited to the wastewater treatment plant only.

This site is located to the north of Route 30 (Main Street), between School Street and CSX railroad, to the south of the wastewater treatment facility for St. Mark's School. The site consists of Merrimac soil (NRCS Hydrologic Class A soil), well-drained gravelly sand. See Figure 2. The underlying bedrock is Westboro formation bedrock, which would be more than 40 ft below ground surface. The bedrock was formed during the Proterozoic Z age (620 million years ago); and is made of quartzite, schist, calc-silicate quartzite and amphibolite. The land uses of property consist of open field, shrubs, and clustered woods. Four abandoned old sewage leaching pits are located in the middle east of the property, which is fenced and covered by secondary growth of shrubs. This area will be cleaned up and used as part of new leaching field #1. Historic record review shows that the abandoned leaching pits were designed and constructed in 1971. The leaching pits stopped operation about 20 years ago in 1980s. A general plant list was documented during my site inspection for the site and its vicinity as shown in Table 1. It can be seen that the dominant plants are upland species.

Table 1. General Plant List

Trees:

White pine, white oak, red oak, red maple, white ash, Norway maple

Shrubs:

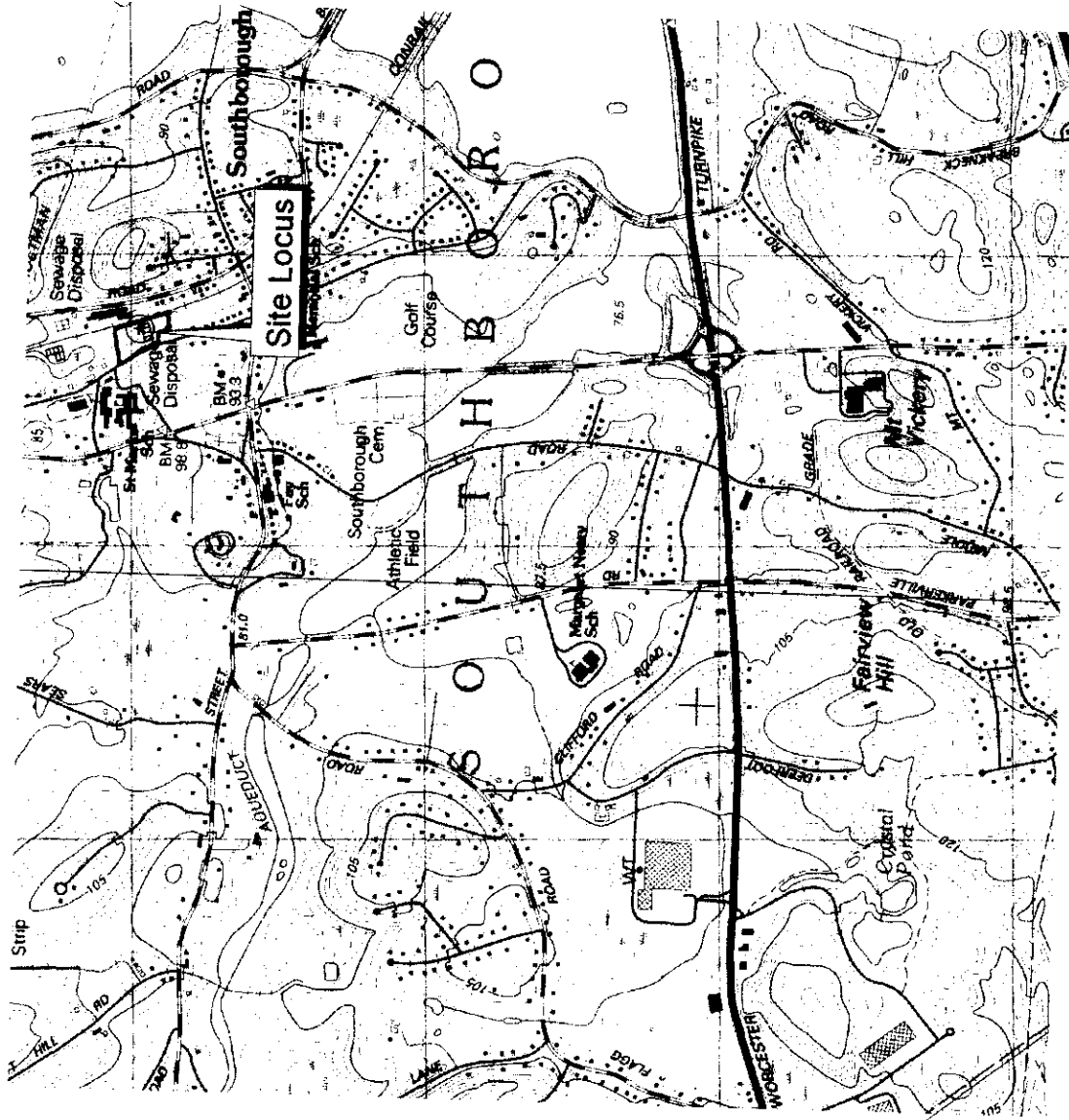
Hollow-stemmed honey suckle, stag-horn sumac, pin cherry, Russian olive, bittersweet vine, multiflora rose, Japanese barberry, willow, silky dogwood, steeple bush, poison ivy

Herbs:

Vetch, pokeweed, golden rod, hair cap moss, non-sphagnum moss, Japanese knotweed, millet, Virginia creeper.

The site surface hydrology drains from southwest to northeast, ultimately to Sudbury River Reservoir. The closest wetland is located about 280 ft to the north of the property; and over 300 ft from the proposed soil absorption system (SAS). No streams or rivers are located within 200 ft of the property. The area is not located in a 500-year or a 100-year floodplain according to MSGIS and FEMA flood insurance study. Southborough Conservation Commission made a negative determination on June 3, 2004 for the proposed project. No further conservation commission filing will be needed in the later process.

School Street, Southboro, MA USGS Quadrangle Map, Marlboro 1983



Project: On-site Wasterwater Treatment

Site: School Street, Southboro, MA

Latitude: 42° 18' 46" N

Longitude: 71° 31' 43" W

Designer: Desheng Wang

Date: October 31, 2004

Revision:

