

Syfeld Keene Associates

File No.: 198100675

City and State: Keene, NH

General Impacts: 9.8 acres PSS/PFO/PEM (permit states “most of 13 acre site”)

Functions and Values Lost: Floodflow alteration (only function noted in permit); “areas for accumulation of water and future growth of wetland species” per a letter dated 8/5/82 from the applicant’s attorney.

Year(s) Mitigation Constructed: Was underway in 1983; completed after 1983.

Size and Type of Mitigation as Proposed: Unknown but general area shown on Drawing #3 (Reel 904 Frame 0869). In a letter dated 8/5/82 from the applicant’s attorney, the site was estimated to be 4-5 acres.

Proposed Functions and Values of Mitigation: Unknown

Mitigation Special Condition(s):

f. Per the agreement of the applicant, Syfeld Development, Inc. and Realities, Inc. and Ellis Robertson Corporation, owners of both the land which is the subject of this application and the land north of site of this proposed shopping center, the applicant will excavate the area cross-hatched on the “Site Location Plan” drawn by Stephen M. Davis, undated to a wetland elevation designated by the U.S. Army Corps of Engineers and with deeper pockets in certain locations. Plan for seeding and/or planting will be submitted to the Corps for approval before project begins. The purpose of this activity is to create further areas for the accumulation of water and the future growth of wetland species. The precise location of the cross-hatched area will be finalized after the New Hampshire Water Supply and Pollution Control Commission approves the final design of the shopping center drainage system.

g. Construction work in the mitigation area shall be done first with excavation completed to final grade and subject to Corps of Engineers approval prior to placement of fill material in wetlands at the shopping center location.

Remarks:

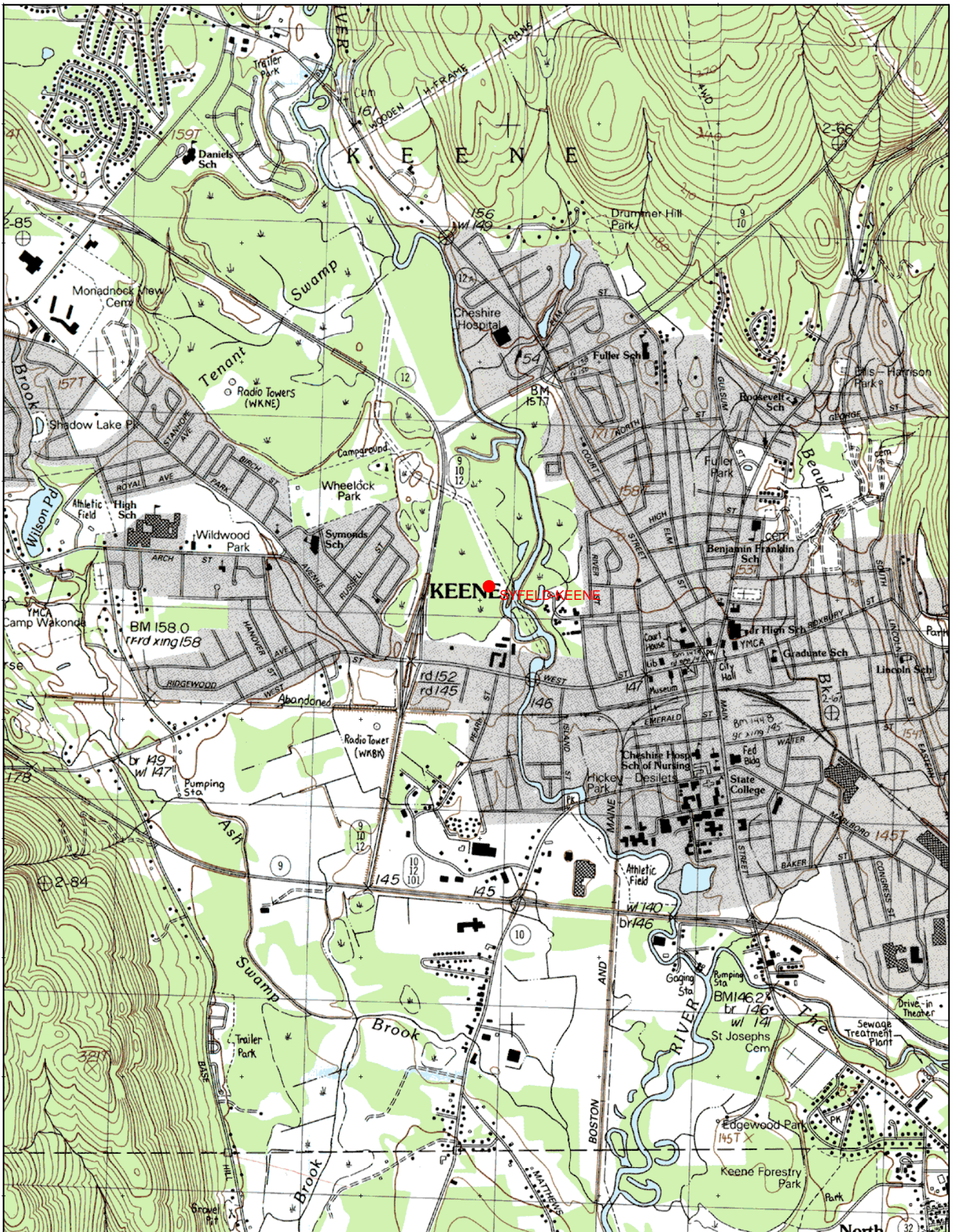
Permit indicates mitigation plan to be submitted, but we do not have a copy in our file.

Directions:

Take Route I-95/128 north to Route 2 west to Route 140 north. At the end of Route 140, take a left onto Route 12 north. Stay on Route 12 north through Keene. Take the West

Street exit. At the end of the exit, take a right at the lights. It will be a few yards on your left. The mitigation site is behind the shopping center on the northeast corner.





MITIGATION SITE FIELD DATA FORM

Site Name: Syfeld-Keene Associates / West Street Plaza File No. 198100675

City/Town: Keene State: NH Waterbody: adjacent to Ashuelot River

Monitor(s): Keith Wright Date: 7-23-02

Was site constructed? yes

Is site wetland? yes

Size of proposed wetland: 4-5 acres

Actual size of wetland: TBD

Landscape position: canals that connect to the Ashuelot River.

Lat/Long Points: N42.93614 W072.29180

Saved GPS Waypoint name: SYF

GPS Tracking Log Name: N/A

Perimeter: TBD

Surrounding land use:

Forested/shrub-scrub buffer behind shopping mall on one bank, residential on other bank

Is wetland function compromised by surrounding land use?

Yes

Plant health:

Vigorous

Invasive species:

Rhamnus frangula, Lythrum salicaria

Wildlife use:

Frogs and ducks were observed

Plants:

In the water:

Iris versicolor
Nuphar lutea
Nymphaea odorata
Pontederia cordata
Sparganium sp.
Typha latifolia
Viburnum dentatum

On the banks:

Carex sp.
Carex stricta
Cornus amomum
Impatiens capensis
Juncus effusus
Lonicera sp.
Lyonia ligustrina
Lythrum salicaria
Onoclea sensibilis
Osmunda regalis
Poaceae spp.
Rhamnus frangula
Rhus typhina
Scirpus cyperinus
Solidago sp.
Sphagnum sp.
Spiraea tomentosa
Thelypteris palustris
Vitis sp.

Soils data:

None collected—all except the banks is permanently inundated.

Sketch approximate mitigation site, noting areas and types of wetlands, waters, other features, landscape position, landmarks, etc., and data and photo point(s)

Site is upstream of a dam.

See aerial photo in file.

Overall Description of site:

The site is behind the West Street Plaza. It is comprised of a series of canals whose water comes from the Ashuelot River upstream from the old mill. The entrance to this system is just upstream from what appears to be a large island formed by a fork in the river that may itself be part of the mitigation site. The canals are deep in spots (>10ft.) and taper off into shallow marshy areas with stagnant water. The dominant vegetation for this site was *Pontederia cordata*, which grew in vast stands. The canals are surrounded by a thin (approx. 1 ft.) band of wetland vegetation before ascending steeply to upland communities.

Comments, problems, recommendations:

Due to poor documentation, this site had to be visited twice just to get a sense of where the mitigation site was located. Additionally, the file should contain detailed and permanently archived information regarding what the mitigation site was mitigating for.

Due to the complexity of this site, it was accessed by canoe. An aerial photograph would have greatly enhanced this effort. It is unclear from the file whether these canals were intended or if there was a mistake in the grading elevation.

Wetland Function-Value Evaluation Form

Total area of wetland unknown Human made? yes Is wetland part of a wildlife corridor? yes or a "habitat island"? no

Adjacent land use forest, river, mall Distance to nearest roadway or other development 100'

Dominant wetland systems present ROW, REM Contiguous undeveloped buffer zone present yes

Is the wetland a separate hydraulic system? no If not, where does the wetland lie in the drainage basin? lower portion

How many tributaries contribute to the wetland? 0 Wildlife & vegetation diversity/abundance (see attached list)

is a set of meanders of the Ashuelot River

Wetland I.D. Syfeld-Keene; 198100675













Latitude N42.93610 Longitude W072.29160

Prepared by: KW Date 7/23/02

Wetland Impact:
Type _____ Area _____

Evaluation based on:
Office _____ Field X

Corps manual wetland delineation
completed? Y X N _____

Function/Value	Suitability Y N		Rationale (Reference #)*	Principal Function(s)/Value(s)	Comments
 Groundwater Recharge/Discharge		X			
 Floodflow Alteration	X		6,8,10,13,14,18	X	
 Fish and Shellfish Habitat	X		2,3,5,6,8,9		
 Sediment/Toxicant Retention		X			
 Nutrient Removal		X			
 Production Export	X		2,6,7,11,12		
 Sediment/Shoreline Stabilization	X		2,5,6,12		
 Wildlife Habitat	X		1,3,5,7,8,10,13		
 Recreation	X		2,5,7,9		
 Educational/Scientific Value		X			
 Uniqueness/Heritage		X			
 Visual Quality/Aesthetics		X			
ES Endangered Species Habitat		X		none known	
Other					

**sharp transition from
inundated to upland**

Notes:

* Refer to backup list of numbered considerations.

198100675
Syfeld-Keene
Keene, NH
7/23/02



Looking north-northeasterly across the site towards the powerline easement.



A close-up of the herbaceous (foreground) and shrub (background) vegetation looking towards the shoreline of the mitigation site.

USGS Keene, New Hampshire, United States 13 Apr 1998



0 100M 0 100yd

Image courtesy of the U.S. Geological Survey
© 2002 Microsoft Corporation. All rights reserved.