SPECIAL PERMIT APPLICATION
(see Article V, Section B of the Zoning Regulations)

Mansfield Planning and Zoning Commission

File # 1284-2
Date 8-28-12

1. **Name of development** (where applicable) Whispering Glen

2. **Proposed use** of the property is residential apartments in accordance with Sec.(s) I.1 of Article VII (Permitted Use provisions) of the Zoning Regulations

3. **Address/location** of subject property 73 Meadowbrook Lane

   Assessor's Map 38 Block 101 Lot(s) 6 Vol. 591 Page 111

4. **Zone** of subject property DMR **Acreage** of subject property 10.12

5. **Acreage of adjacent land in same ownership** (if any) N/A

6. **APPLICANT** Lakeway Farms, L.P. _____
   (please **PRINT**) Signature

   Street Address 2 Birch Street Telephone (860) 204-9811
   Town Ledyard Zip Code 06339

   Interest in property: Owner ✓ Optionee _____ Lessee _____ Other _____

   (If "Other", please explain) _____

7. **OWNER OF RECORD:** Lakeway Farms, L.P. _____
   (please **PRINT**) Signature

   (**OR** attached Purchase Contract _____ **OR** attached letter consenting to application _____)
   Street Address 2 Birch Street Telephone (860) 204-9811
   Town Ledyard Zip Code 06339

8. **AGENTS** (if any) representing the applicant who may be directly contacted regarding this application:

   Name Development Solutions Telephone (860) 204-0248
   Address 33 East Town St. Norwich, CT Zip Code 06360
   Involvement (legal, engineering, surveying, etc.) engineering

   Name _____ Telephone _____
   Address _____ Zip Code _____
   Involvement (legal, engineering, surveying, etc.) _____

(over)

Development Solutions, L.L.C.
33 East Town Street, Norwich, Connecticut 06360
Fax: (860) 204-0652 • Phone: (860) 204-0248
dev.soln@yahoo.com

Whispering Glen
Statement of Use
December 19, 2011

The proposed development is a 54-unit residential community of multi family structures, having one (1) amd two (2) stories and a Cape Cod style architecture. The site contains 10.12 acres of land, which would allow for 54 units based on the density allowance of Article X Sec. A.5.b (multifamily).

The proposed Design Multiple Residence (DMR) multifamily use is identical to the existing DMR zone to the east, is compatible with the PB-1 zone to the east and south and meets all the dimensional and buffer requirements for the R-20 zone to the west and east. The plan provides an enhanced landscaped area along the front of the property which is across from a R-20 zoned area to the north.

The proposal is consistent with the Town's Plan of Development in that it:

1. Proposes increased residential density in a zone that has a medium to high density
2. The site has immediate access to public water and sewer
3. The site is located on a collector street affording vehicular accessibility
4. The site abuts similarly zone land (DMR)
5. The proposal provides preservation of the onsite watercourse and associated wetlands
6. The site is near Town recreation facilities
7. The site is near existing commercial and retail establishments
8. The proposal provides 20% Affordable Housing units
9. The proposal incorporates Best Management Practices (BMP) for stormwater management

In addition, the location, size, character, and suitability of this proposal, is in general, compatible with Article I – Intent and Purpose, of the Town's Zoning Regulations.

The location of the proposal on a collector street in a residential area and its size of units, is in harmony with the orderly development of the Town and compatible with other existing uses abutting the property to the east and south.

Finally, the proposal calls for a New England Cape Cod style architecture with abundant landscaping in order to provide the appearance of an established community immediately after construction. This also provides enhanced stabilization of the site after construction, which appeals to abutting property owners. The on site soils (Canton and Charlton) being well drained sandy, loams will minimize off site impacts resulting from blasting, rock removal, removal of poor quality material to offsite and subsequently bringing good material to the site.

In presenting this proposal, the applicant has proposed a 25-foot side yard to the east abutting existing DMR and PB-1 zones, in accordance with Article X, A.4.d. This setback is considered appropriate due to the existence of very dense mature vegetation (brush and large trees) along the property line, 10+ feet of which will be undisturbed. There exist a 10-12 foot vertical separation between the two (2) sites, with the proposed site development being on the higher ground. The existing development has a 50-foot setback due to it's abutting a residential zone at the time of approval. In addition, privacy fencing will be used at the rear outdoor spaces of the proposed units. These measures will minimize neighborhood impacts.

The enhancement for the proposed project will be in allowing for larger separating distances between buildings providing for larger yards, areas for landscaping and other amenities. A 50-foot side yard will be maintained on the west and east sides abutting residentially zoned land.

A 57-foot setback is proposed to the north abutting Meadowbrook Lane.

This setback is justified as the project plan calls for intense landscaping in this front area to provide a privacy buffer to the road. Measures are to include landscaped mounds, a waterfall entrance logo/sign, mature tree plantings, etc. The intent of the proposed landscape plan is to provide a visual and noise buffer between Meadowbrook Lane and the most northerly units.

The enhancement to the project will be in that the limits of development can be moved further away from the on site wetlands allowing for a mostly 100-foot undisturbed area to the

wetlands. The proposed intense landscaping along the front of the property will enhance the streetscape along the southerly side of Meadowbrook Lane.

This proposal also seeks approval to reduce the separating distances between buildings from 50-feet to 30-feet minimum, in accordance with Article X, A.5.f. This request for reduction was first put to the Fire Marshall who responded that he only needed emergency vehicle access (30 feet) around buildings that have foot prints of 5,000 sq. ft. and larger.

Maintaining a separation between buildings creates more of a community effect rather than the complex effect several large buildings with multiple units would have and still allow for some density of units. The Cape Cod style architecture with the individuality of separate structures crates a village effect which will further be enhanced by landscaping, both vegetative and structural, i.e., fences, arbors, trellises, etc.

Mitigation of Impacts

Traffic

A traffic study prepared as a part of this proposal has determined that the operating Levels of Services will be very good and that no off site roadway improvements are recommended other than vegetation clearing to obtain recommended sightlines. See attached Traffic Impact Study by Traffic Engineering Solutions, P.C.

Buffers/Landscaping

A mostly 100-foot minimum undisturbed buffer is proposed along the south end of the property in order to protect the wetlands. Existing vegetation and mature trees are to be preserved along the east and west property lines and enhanced with additional new plantings. The area of the parcel along the north property line and parallel with Meadowbrook Lane is to be intensely landscaped within its width of 57 feet to 100 feet to provide a visual screen between structures and Meadowbrook Lane. See attached Sheets 7 and 8 for Landscape Architect plans.

Stormwater

Stormwater from this proposal is to be addressed as to its quality and quantity. Stormwater from roofs is considered clean and will for the most part be discharged to rain

gardens which will allow for infiltration into the ground to recharge groundwater and eventually the wetlands downgrade.

Stormwater from roads and drives which has the potential to contain contaminants, will be collected in a stormwater collection system, diverted to a stormwater pretreatment structure which is capable of removing up to 80% of settables and floatables, and then to a stormwater quality basin sized to retain the water Quality Volume (WQV) per the Connecticut Stormwater Quality manual (DEP 2004).

Upon discharge from the basin's controlled outlet structure, stormwater will flow to a flow diversion chamber which will create an overland sheet flow discharge towards the wetlands. All stormwater facilities have been designed for the 25-year storm event. See the attached Stormwater Drainage Evaluation.

Wetlands/Environmental Impact

Impacts to the onsite wetlands are mitigated by the creation of a mostly 100-foot undisturbed buffer and stormwater water quality measures as previously described.

Sewer and Water

Sewage from this proposal will be collected in a sewage collection system and discharged to the public sewerage system (interceptor) which runs along Conantville Brook. This is described in the attached Sanitation Report.

Water for domestic and fire protection is to be provided from the existing 16-inch line on Meadowbrook Lane. This line has adequate supply and pressure.

Neighborhood Impact

Evaluations contained in this application, i.e., traffic, wetlands/environmental, buffer/landscaping, stormwater, sewer and water, all indicate that there will be no impact on the surrounding neighborhood. Abutters to the south consists of a commercial condominium, to the east a residential condominium project and one single-family house, to the west a single-family residence and to the north across the street several single-family residences. The residential nature of the proposed development fits in with existing uses.

Open/Recreation Space

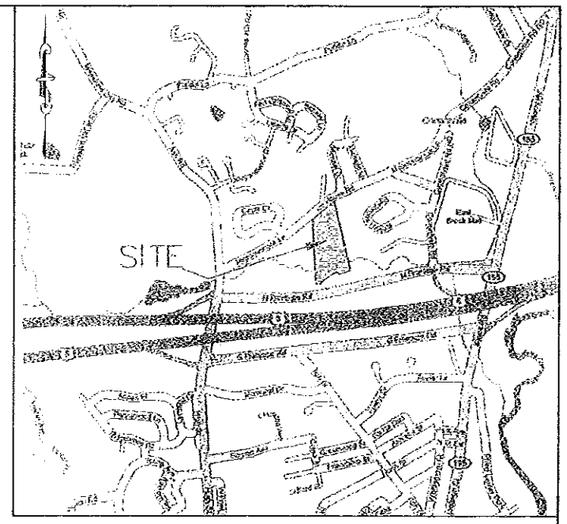
Large areas of open space are proposed as part of this proposal. Approximately one third of the site at the rear is to be left undisturbed to protect and preserve wetlands. An intensely landscaped area at the front of the property is proposed to provide aesthetics, visual buffers and some passive recreation opportunities. In addition, there are off-site Town recreation facilities within walking distance of this site to the west.

SCHEDULE OF DIMENSIONAL REQUIREMENTS (R-20) DMR ZONE

	REQUIRED	PROVIDED
MINIMUM LOT AREA	5 ACRES	10.12 ACRES
MINIMUM LOT FRONTAGE	300 FEET	402.57 FEET
MAXIMUM BUILDING HEIGHT	40 FEET	38 FEET
MAXIMUM BUILDING COVERAGE	25 %	11.5 %
*UNIT DENSITY (5000 SF/UNIT)	54	54
SEE ART. X.A.4.0 REGARDING SPECIAL DIMENSIONAL EXCEPTIONS BY THE COMMISSION		
AFFORDABLE HOUSING UNITS (20%) (1,400 SF OR LESS)	11 (MINIMUM)	11
UNITS IN 2-FAMILY DWELLINGS (20%)	11 (MAXIMUM)	0
UNITS > 2,400 SF LIVABLE AREA	8 (MAXIMUM)	0
ACCESSIBLE HOUSING UNITS (AFFORDABLE UNITS ARE ALSO ACCESSIBLE)	4 (MINIMUM)	4

*UNIT DENSITY CALCULATION (ART.X.A.5.8.)
TOTAL SITE AREA = 10.11 ACRES (440,827 SF)
AREA OF SLOPES > 15% = 1.5 ACRES (50,400 SF)
AREA OF WETLANDS = 2.71 ACRES (118,200 SF)
6.25 ACRES (272,250 SF)
5,000 SF/UNIT = 54.45 UNITS

APPLICATION PACKAGE FOR:
1. SPECIAL PERMIT



LOCATION MAP
ZONING DISTRICT R-20
GRAPHIC SCALE
40 0 40 80
(IN FEET)
1 inch = 1000 ft.

WHISPERING GLEN

54 UNIT RESIDENTIAL DEVELOPMENT

73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

LAKEWAY FARMS, L.P.
(OWNER / APPLICANT)
2 BIRCH STREET
LEDYARD, CT. 06339
DECEMBER 10, 2011

GENERAL NOTES:
1. MAP REFERENCES
   A) "SUBDIVISION PLAN EAST BROOK HEIGHTS MANSFIELD, CONNECTICUT OWNER & SUBDIVIDER: JOSEPH MIHALIAK ET AL 27 MIHALIAK ROAD WILLINGTON, CONNECTICUT GARDNER & PETERSON ASSOCIATES 576 OLD POST ROAD TOLLAND, CONNECTICUT PROFESSIONAL ENGINEERS & LAND SURVEYORS SCALE AS SHOWN DATE: NOV. 30 1983 SHEET NO. 1 OF 1"
   B) "SUBDIVISION PLAN EAST BROOK CONDOMINIUM MANSFIELD, CONNECTICUT APPLICANT:EAST BROOK HEIGHTS GARDNER & PETERSON ASSOCIATES 576 OLD POST ROAD TOLLAND, CONNECTICUT PROFESSIONAL ENGINEERS & LAND SURVEYORS SCALE 1"=40' DATE: 1/23/86 SHEET NO. 1 OF 1"
   C) CONDOMINIUM PLAN LEDGEBROOK NORTH MANSFIELD, CONNECTICUT GARDNER & PETERSON ASSOCIATES 576 OLD POST ROAD TOLLAND, CONNECTICUT PROFESSIONAL ENGINEERS & LAND SURVEYORS SCALE 1"=40' DATE: 12/10/91 SHEET NO. 1 OF 1 REVISIONS 8/6/96 UNIT NO. 2 8/28/96 REMINDER PARKING SPACES UNIT NO. 2"
   D) WHISPERING GLEN, 32 UNIT CONDOMINIUM DEVELOPMENT, 73 MEADOWBROOK LANE, MANSFIELD, CONNECTICUT, WHISPERING GLEN, LLC (DEVELOPER/APPLICANT) P.O. BOX 370218, WEST HARTFORD, CT 06137-0218, OCTOBER 15, 2008, REV. SEPTEMBER 23, 2009, DEVELOPMENT SOLUTIONS, LLC. SCALE AS SHOWN, SH 1-10"
2. ELEVATIONS SHOWN HEREON ARE TIED TO THE CONNECTICUT PLANE COORDINATE SYSTEM OF 1983.
3. THIS PROJECT WILL BE SERVED BY PUBLIC WATER AND ON PUBLIC SEWER.
4. CALL BEFORE YOU DIG 1-800-922-4455 WILL BE CONTACTED PRIOR TO CONSTRUCTION.
5. ALL CONSTRUCTION TO BE IN ACCORDANCE WITH APPLICABLE TOWN OF MANSFIELD ROAD AND DRAINAGE CONSTRUCTION STANDARDS AND ANSI STANDARDS.
6. ALL NEW UTILITIES, INCLUDING CATV AND TELEPHONE TO BE INSTALLED UNDERGROUND
7. THIS PARCEL OF LAND IS LOCATED IN THE SAWMILL DRAINAGE BASIN.
8. SOILS ON SITE ARE CANTON AND CHARLTON FINE SANDY LOAMS AT 3 TO 8% SLOPE (CaB). THERE ARE WETLANDS ON OR ADJACENT TO THIS SITE.
9. THE PREDOMINANT ON SITE VEGETATION IS GRASS FIELDS AND DECIDUOUS WOODS.

SHEET INDEX
1) TITLE SHEET AND GENERAL NOTES
2) A-2 BOUNDARY SURVEY AND NATURAL FEATURES
3) SITE LAYOUT PLAN
4) GRADING & DRAINAGE PLAN
5) UTILITY LAYOUT PLAN
6) SEWER LINE STREAM CROSSING
7) EROSION & SEDIMENTATION CONTROL PLAN
8) LANDSCAPE PLAN
9) LANDSCAPE DETAILS
10) SITE DETAILS
11) UTILITY DETAILS

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION
SECRETARY OR CHAIRMAN ____ DATE ____

APPROVED BY THE DIRECTOR OF PUBLIC WORKS
DIRECTOR ____ DATE ____

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY
SECRETARY OR CHAIRMAN ____ DATE ____

DATE	REVISION

TITLE SHEET AND GENERAL NOTES

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

PREPARED FOR
LAKEWAY FARMS, L.P.
2 BIRCH STREET
LEDYARD, CT 06339

DATE: DECEMBER 2011
DRAWN BY: TJ
SCALE: AS SHOWN
SHEET NO. 1 of 11
DRAWING NO. -

Development Solutions, L.L.C.
A Technical Services Company
33 East Town St., Norwich, Connecticut
Phone:(860)204-0248 ~ Fax:(860)204-0552

MAP REFERENCES:

1. "SUBDIVISION PLAN EAST BROOK HEIGHTS MANSFIELD, CONNECTICUT OWNER & SUBDIVIDER: JOSEPH MAHAJAK ET AL 27 MAHAJAK ROAD MILLINGTON, CONNECTICUT GARDNER & PETERSON ASSOCIATES 576 OLD POST ROAD TOLLAND, CONNECTICUT PROFESSIONAL ENGINEERS LAND SURVEYORS SCALE AS SHOWN DATE NOV. 30 '83 SHEET NO. 1 OF 1".
2. "SUBDIVISION PLAN EAST BROOK HEIGHTS CONDOMINIUM MANSFIELD, CONNECTICUT APPLICANT: EAST BROOK HEIGHTS ASSOCIATES GARDNER & PETERSON ASSOCIATES 576 OLD POST ROAD TOLLAND, CONNECTICUT PROFESSIONAL ENGINEERS LAND SURVEYORS SCALE 1"=40' DATE 1/23/86 SHEET NO. 1 OF 1".
3. "CONDOMINIUM PLAN LEDGEBROOK NORTH MANSFIELD CONNECTICUT GARDNER & ASSOCIATES 178 HARTFORD TURNPIKE TOLLAND CONNECTICUT PROFESSIONAL ENGINEERS LAND SURVEYORS SCALE 1"=40' DATE 12/10/91 SHEET NO 1 OF 1 REVISIONS 8-6-96 UNIT NO. 2 8-28-96 REMAINDER PARKING SPACES UNIT NO. 2".
4. FEMA FLOOD INSURANCE RATE MAP TOWN OF MANSFIELD, CONNECTICUT TOLLAND COUNTY PANEL 20 OF 30 COMMUNITY-PANEL NUMBER 090128 0020 C EFFECTIVE DATE JANUARY 2, 1981

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION.

CHAIRMAN OR SECRETARY _____ DATE _____

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR _____ DATE _____

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

CHAIRMAN OR SECRETARY _____ DATE _____

CONSERVATION EASEMENT (WETLANDS AND UNDISTURBED VEGETATED BUFFER) 1.28 ACRES (CROSSHATCHED AREA)

EDGE OF CONSERVATION EASEMENT

INLAND WETLANDS

N/F JAMES J. CHASSE

N/F LEDGE BROOK SOUTH CONDOMINIUMS

N/F LEDGE BROOK NORTH CONDOMINIUMS

N/F EASTBROOK HEIGHTS CONDOMINIUMS

N/F GEOFFREY G. KANE

AREA=438,348 Sq.Ft. 10.06 ACRES

STONE FOUNDATION

REMAINS CONCRETE HEADWALL

CONCRETE DAM

CONCRETE WING WALL

4.5' HIGH ANGLE IRON END

FENCE LINE

2 STORY HOUSE

WELL H.O.

REMAINS OF GARAGE

STONE RETAINING WALL

GRAVEL DRIVE

PAVED DRIVE

GUY WIRE

LAND WITHIN 30' OF THE CENTERLINE OF MEADOW BROOK LANE TO BE DEDICATED TO THE TOWN OF MANSFIELD

MEADOWBROOK LANE

BROOK

CLAP 278

CLAP 284

CLAP 279E2

CLAP 278S

CLAP 253

Δ=8°22'50" R=340.80 L=49.85 T=24.97

LEGEND

STONE WALL	MAPLE TREE
PROPERTY LINE	CHERRY TREE
STREET LINE	OAK TREE
EXISTING CONTOUR	APPLE TREE
UTILITY POLE	ASH TREE
IP IRON PIPE FOUND	HICKORY TREE
RB REBAR FOUND	HEMLOCK TREE
INLAND WETLANDS & FLAG NUMBER	PINE/CEDAR TREE
SEWER MANHOLE	

GRAPHIC SCALE

(IN FEET)
1 inch = 40 ft

NOTE: BOUNDARY LINES OF ADJOINING PROPERTIES ARE SHOWN FOR GENERAL INFORMATIONAL PURPOSES ONLY AND ARE NOT TO BE CONSTRUED AS BEING ACCURATELY LOCATED OR DEPICTED

THE STONE WALLS AND/OR FENCES SHOWN AS BOUNDARIES MAY HAVE IRREGULARITIES OF COURSE BETWEEN PRINCIPAL POINTS OF COURSE INDICATED

© THIS DRAWING IS THE PROPERTY OF THE LAND SURVEYOR THIS PLAN AND REPRODUCTIONS, ADDITIONS OR REVISIONS OF THIS PLAN ARE NOT VALID WITHOUT THE EMBOSSED SEAL AND SIGNATURE OF THE LAND SURVEYOR WHO PREPARED THIS PLAN. 2009 06-113M2

THE WORD "CERTIFY" IS UNDERSTOOD TO BE AN EXPRESSION OF THE PROFESSIONAL OPINION BY THE LAND SURVEYOR WHICH IS BASED ON HIS OR HER BEST KNOWLEDGE, INFORMATION AND BELIEF, AS SUCH IT CONSTITUTES NEITHER GUARANTEE OR WARRANTY.

NOTE:
ANY SIGNIFICANT TREES (12" DIAMETER AND LARGER) IN THE BUFFERS AND/OR SETBACKS ARE TO BE SAVED.

DIETER & GARDNER
LAND SURVEYORS • PLANNERS
P. O. BOX 335
1641 ROUTE 12
GALES FERRY, CT. 06335
(860) 464-7455
FAX (860) 464-5028
EMAIL: DIETER.GARDNER@SNET.NET

PLAN SHOWING
A-2 BOUNDARY SURVEY
& NATURAL FEATURES
WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

SCALE: 1"=40'

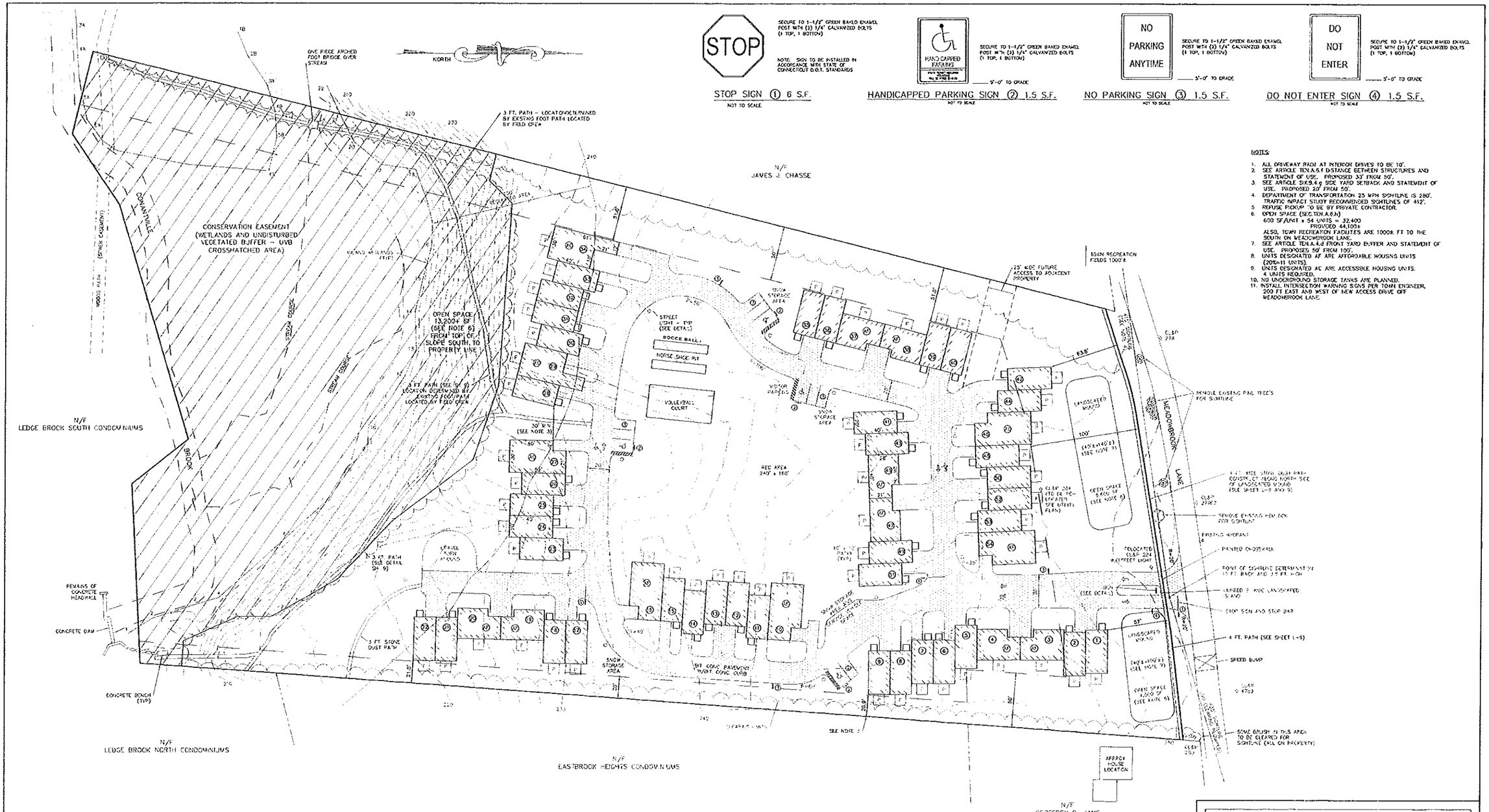
OCTOBER 2008

REVISED: MAY 5, 2009
REVISED: JUNE 30, 2009
REVISED: AUGUST 10, 2009
REVISED: SEPTEMBER 23, 2009

THIS SURVEY AND MAP HAS BEEN PREPARED IN ACCORDANCE WITH SECTIONS 20-300b-1 THRU 20-300b-20 OF THE REGULATIONS OF CONNECTICUT STATE AGENCIES — "MINIMUM STANDARDS FOR SURVEYS AND MAPS IN THE STATE OF CONNECTICUT" AS ENDORSED BY THE CONNECTICUT ASSOCIATION OF LAND SURVEYORS, INC. IT IS A BOUNDARY SURVEY BASED CONFORMING TO HORIZONTAL ACCURACY CLASS A-2, TOPOGRAPHIC ACCURACY T-2. TO MY KNOWLEDGE AND BELIEF, THIS MAP IS SUBSTANTIALLY CORRECT AS NOTED HEREON

TITLE: LAND SURVEYOR CT. No. 14206

DATE: OCTOBER 15, 2008



LEGEND

- PROPERTY LINE
- APPROXIMATE ABUTTERS LINE
- CONTOURS
- CLEARING LIMITS
- STONEWALL
- UTILITY POLE
- SEWER MANHOLE COVER
- EP EDGE OF PAVEMENT
- (07) AFFORDABLE UNITS
- (AC) ACCESSIBLE UNITS
- STREET LIGHT
- 10' x 10' PATIO

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

SECRETARY OR CHAIRMAN _____ DATE _____

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR _____ DATE _____

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

SECRETARY OR CHAIRMAN _____ DATE _____

GRAPHIC SCALE IN FEET
40 0 40 80

DATE	REVISION
–	–

SITE LAYOUT PLAN

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

PREPARED FOR
LAKEWAY FARMS, L.P.
2 BIRCH STREET
LEDYARD, CT 06339

DATE: DECEMBER 2011
DRAWN BY: –
SCALE: 1" = 40'
SHEET NO. 3 of 11
DRAWING NO. –

Development Solutions, L.L.C.
A Technical Services Company
33 East Town St., Norwich, Connecticut
Phone (860)204-0248 – Fax (860)204-0552

BASIN PLANTINGS				
ZONE	SIZE	SCIENTIFIC NAME	COMMON NAME	QUANTITY
WET MEADOW (0-6")	#1	CAREX LURIDA	SEDGE	20
	#1	CAREX STRICTA	TUSSOCK SEDGE	20
	#1	JUNCUS CANADENSIS	CANADA RUSH	20
	#1	JUNCUS EFFUSUS	SOFT RUSH	20
	#1	SCIRPUS ATROVIRENS	DARK GREEN BULRUSH	20
	#1	SCIRPUS CYPERINUS	WOOLGRASS	20
DEEP MARSH (6-18")	#3	PELTANDRA VIRGINICA	ARROW ARUM	70
	#3	PONTEDERIA CORDATA	PICKERELWEED	70
	#3	SAGGITARIA LATIFOLIA	ARROWHEAD	70
	#3	SPARGANIUM AMERICANUM	BURREED	70

PLANTS AVAILABLE FROM NEW ENGLAND WETLAND PLANTS (413)256-1752.
ALL PLANTINGS ARE 3FT ON CENTER

RAIN GARDEN PLANTINGS

WELL DRAINED SOILS

Aster laevis – SMOOTH BLUE ASTER
Carex scoparia – POINTED BROOM SAGE
Euchinacea purpurea – PURPLE CONEFLOWER
Helenium autumnale – DOG TOOTHED DAISY
Monarda fistulosa – BURGAMOT
Ratibida pinnata – YELLOW CONEFLOWER
Rudbeckia hirta – BLACK EYED SUSAN
Tradescantia ohiensis – SPIDERWORT

GROUP 2 TO 3 OF EACH SPECIES TOGETHER IN THE RAIN GARDEN BEDS.

SITE CUT/FILL ANALYSIS
CUT = 8,640 CY
FILL = 2,000 CY (MOSTLY TOPSOIL FROM CUT MATERIAL)

NET 6,640± CY TO OFF SITE

NOTE: ALL EXCESS MATERIAL REMOVED FROM THE SITE SHALL BE DEPOSITED IN APPROPRIATE LOCATIONS THAT COMPLY WITH MUNICIPAL ZONING AND INLAND WETLANDS REQUIREMENTS.

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

SECRETARY OR CHAIRMAN DATE

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR DATE

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

SECRETARY OR CHAIRMAN DATE

STORMWATER SYSTEM STRUCTURE SCHEDULE

STRUCTURE	TF	INVERT IN	INVERT OUT
CB-1	246.3	----	242.3
CB-2	246.1	242.0	242.0
CB-3	245.2	241.2	241.2
CB-4	242.0	238.0	238.0
CB-5	235.8	231.8	231.8
CB-6	232.2	228.0	228.0
CB-7	223.0	219.0	219.0
CB-8	232.0	228.2	228.2
CB-9	239.5	----	235.5
CB-10	239.3	235.3	235.3
CB-11	243.8	240.0	240.0
CB-12	244.2	----	240.2
PRETREATMENT STRUCTURE	220.0	218.0	218.0
FEU-1	----	----	217.5
FLOW CONTROL BASIN	218.0	217.5	217.0
CONTROLLED OUTLET	218.0	217.0	217.6
SPILLWAY	----	----	217.5
FDC	----	211.0	208.0

STORMWATER SYSTEM PIPE SCHEDULE

RUN	SIZE/PIPE	LENGTH	SLOPE
CB-1 TO CB-2	12"/HDPE	35'	0.01
CB-2 TO CB-3	12"/HDPE	35'	0.02
CB-3 TO CB-4	12"/HDPE	140'	0.02
CB-4 TO CB-5	12"/HDPE	170'	0.04
CB-5 TO CB-6	12"/HDPE	80'	0.05
CB-6 TO CB-7	12"/HDPE	175'	0.05
CB-8 TO CB-6	12"/HDPE	20'	0.01
CB-10 TO CB-8	12"/HDPE	240'	0.03
CB-9 TO CB-10	12"/HDPE	15'	0.013
CB-11 TO CB-10	12"/HDPE	185'	0.025
CB-12 TO CB-11	12"/HDPE	20'	0.01
CB-7 TO PRETREATMENT STRUCTURE	12"/HDPE	45'	0.02
PRETREATMENT TO FEU-1	12"/HDPE	10'	0.05
CONTROLLED OUTLET TO FDC	6" /PVC	110'	0.09

BEST MANAGEMENT PRACTICES

THE FOLLOWING BEST MANAGEMENT PRACTICES (BMP) WILL BE THE RESPONSIBILITY OF THE OWNER AND WILL BE IMPLEMENTED TO PROTECT THE ENVIRONMENTAL SURROUNDINGS OF THE SITE.

CATCH BASINS AT THE SITE WILL BE EQUIPPED WITH HOODED OUTLET (CB-8) AND DEEP SUMPS TO TRAP DEBRIS AND SEDIMENT AND TO SEPARATE OIL. THE CATCH BASINS AND WATER QUALITY STRUCTURES WILL BE INSPECTED AT LEAST TWICE PER YEAR AND CLEANED AS NEEDED TO REMOVE TRAPPED SEDIMENT AND LITTER.

ONCE CONSTRUCTED, THE FLOW CONTROL BASIN WILL BE INSPECTED AFTER SEVERAL STORM EVENTS TO CONFIRM DRAINAGE SYSTEM FUNCTIONS, BANK STABILITY AND VEGETATION GROWTH.

THE FLOW CONTROL BASIN WILL BE INSPECTED AT LEAST ONCE PER YEAR TO ENSURE THAT THEY ARE OPERATING AS DESIGNED. THE CONTROLLED OUTLET STRUCTURE WILL BE INSPECTED FOR EVIDENCE OF CLOGGING OR TOO RAPID AN OUTLET RELEASE. POTENTIAL PROBLEM AREAS THAT WILL ALSO BE INSPECTED INCLUDE SUBSIDENCE, EROSION, SEDIMENT ACCUMULATION AROUND THE OUTLET, ADEQUACY OF THE INLET/OUTLET EROSION CONTROL MEASURES, AND EROSION WITHIN THE BASIN AND BANKS.

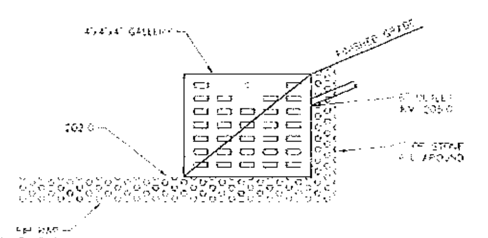
AT LEAST TWICE DURING THE GROWING SEASON, THE BERM AND OUTSIDE EMBANKMENTS OF THE FLOW CONTROL BASIN WILL BE MOWED, AND ACCUMULATED TRASH AND DEBRIS WILL BE REMOVED.

SEDIMENT WILL BE REMOVED FROM THE FLOW CONTROL BASIN AS NECESSARY.

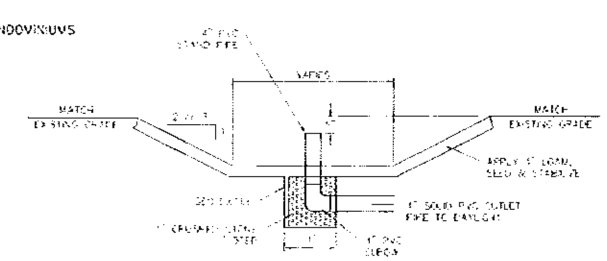
THE PRETREATMENT SYSTEM SHALL BE MAINTAINED IN ACCORDANCE WITH THE MANUFACTURES RECOMMENDATIONS, BUT CLEANED AT A MINIMUM, ONCE PER YEAR.

THE PAVED AREAS WILL BE SWEPT AT APPROPRIATE INTERVALS TO REMOVE DEBRIS AND ROAD SAND APPLIED DURING THE WINTER MONTHS.

DEICING PRACTICES AND MATERIAL STORAGE WILL EMPHASIZE A MINIMUM USE OF SALT AND STORMWATER RUNOFF TO SENSITIVE RECEPTORS.



4'x4'x4' FDC (FLOW DISPERSION CHAMBER)
NOT TO SCALE



TYPICAL RAIN GARDEN
NOT TO SCALE

DEPTH VARIES – SEE PLANS FOR DEPTHS AND LOCATIONS

MAINTENANCE SCHEDULE

1. REMOVE WEED GROWTH TWICE (2) PER GROWING SEASON.
2. CLEAR OUTLET PIPE OPENING OF GROWTH ONCE PER YEAR.
3. TRIM OVERGROWN GARDEN SPECIES AS NECESSARY.
4. MAINTAIN STONE OUTLET AREA TO BE WEED FREE.

40 0 40 80
GRAPHIC SCALE IN FEET

LEGEND

(solid line)	PROPERTY LINE
(dashed line)	APPROXIMATE ABUTTERS LINE
(dotted line)	CONTOURS
(scalloped line)	CLEARING LIMITS
(stone line)	STONEWALL
	UTILITY POLE
	CATCH BASIN
RD	ROOF DRAIN
RG	RAIN GARDEN

DATE	REVISION
–	–

GRADING AND DRAINAGE PLAN

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

PREPARED FOR
LAKEWAY FARMS, L.P
2 BIRCH STREET
LEDYARD, CT 06339

DATE: DECEMBER 2011
DRAWN BY: –
SCALE: 1" = 40'
SHEET NO. 4 of 11
DRAWING NO. –

Development Solutions, L.L.C.
A Technical Services Company
33 East Town St., Norwich, Connecticut
Phone:(860)204-0246 – Fax:(860)204-0652

SANITARY SEWER SYSTEM STRUCTURE SCHEDULE

STRUCTURE	TOP OF FRAME	INVERT IN	INVERT OUT
SMH-1	248.0	---	240.5
SMH-2	245.6	236.3	236.1
SMH-3	242.0	235.3	235.1
SMH-4	236.0	229.3	229.1
SMH-5	232.2	222.6	222.4
SMH-6	223.2	218.2	218.0
SMH-6A	228.5	217.0	216.8
SMH-7	237.5	214.9	214.7
SMH-8	208.5	203.9	198.8
SMH-8A	204.0	198.2	198.0
EXIST. SMH	206.9	197.1	196.4
SMH-10	247.0	237.2	237.0
SMH-11	243.8	---	238.0

SANITARY SEWER SYSTEM PIPE SCHEDULE

RUN	SIZE/PIPE	LENGTH	SLOPE
SMH-1 TO SMH-2	8" PVC	100	0.04
SMH-2 TO SMH-3	8" PVC	160	0.005
SMH-3 TO SMH-4	8" PVC	140	0.04
SMH-4 TO SMH-5	8" PVC	60	0.07
SMH-5 TO SMH-6	8" PVC	150	0.03
SMH-6 TO SMH-6A	8" PVC	140	0.007
SMH-6A TO SMH-7	8" PVC	230	0.009
SMH-7 TO SMH-8	8" PVC	120	0.09
SMH-8 TO SMH-8A	8" PVC	145	0.005
SMH-8A TO EX. SMH	8" PVC	140	0.005
SMH-10 TO SMH-2	8" PVC	145	0.005
SMH-11 TO SMH-10	8" PVC	125	0.006

UTILITY CONTACT NOTES:

1. CONTACT CLICK PRIOR TO THE START OF ANY UNDERGROUND UTILITY WORK (1-800-286-5000).
2. CONTACT TOWN OF WINDHAM WATER DEPARTMENT PRIOR TO THE START OF ANY WATER SYSTEM WORK (465-3085).
3. CONTACT TOWN OF WINDHAM SEWER DEPARTMENT PRIOR TO THE START OF ANY WATER SYSTEM WORK (465-3078).

UTILITY NOTES:

1. WATER LINES ARE TO BE A MINIMUM 4.5 FT BELOW GRADE TO TOP OF PIPE.
2. WATER AND SEWER LINES ARE TO BE SEPERATED BY 10 FT HORIZONTALLY OR 18 INCHES VERTICALLY.
3. SEWER LINES ARE TO BE ENCASED IN CONCRETE 10 FT EITHER SIDE OF CROSSING OVER WATER LINES.
4. SEWER LINES ARE TO BE A MINIMUM OF 5 FT AND WATER LINES A MINIMUM OF 3 FT AWAY FROM CATCH BASINS.
5. RETAINER GLANDS REQUIRED ON ALL MJ JOINTS (I.E. MEGA LUGS OR EQUAL) RESTRAINTS NEEDED 2 LENGTHS IN EACH DIRECTION FROM BENDS, TEES AND VALVES.
6. WATER CURB BOXES ARE TO BE INSTALLED BEHIND CURB AT FINISHED GRADE AND ACCESSIBLE.
7. ALL WATER MATERIALS TO MEET WWW SPECIFICATIONS.
8. SITE LIGHTING SCHEDULE
   A. A STREET LIGHT (CL&P) WILL BE INSTALLED ON RELOCATED CL&P POLE #284.
   B. THE ENTRANCE SIGN WILL BE DOWN LIT FROM UNDER THE CANOPY (200W INCANDESCENT).
   C. SITE LIGHTING (7) WILL BE AS SHOWN ON SHEET 9.
   D. DECORATIVE LIGHTING WILL BE TO UPLIGHT FIXTURES (150W INCANDESCENT, SOFT) ON THE FRONT OF EACH UNIT.
   E. LOW VOLTAGE WASH LIGHTING TO GIVE PROJECT UNDERSTATED RESORT FEEL.
   F. LANDSCAPING LIGHTING IS TO REPLACE UPLIGHT FRONTS OF UNIT.
9. UTILITY DEPTHS ARE AS FOLLOWS:
   WATER – TOP OF PIPE 4.5 FT. DEEP
   BOTTOM OF PIPE 5.3 FT. DEEP
   SEWER – BOTTOM OF PIPE (INVERT) AVERAGES 7+ FT. DEEP
   TOP OF PIPE 3+ FT DEEP
   STORM – BOTTOM OF PIPE 4± FT. DEEP
   TOP OF PIPE 3+ FT. DEEP
   UNDERGROUND UTILITES – 3 FT. DEEP AVERAGE.

LEGEND

- PROPERTY LINE
- APPROXIMATE ABUTTERS LINE
- 8" SEWER MAIN
- 6" SEWER SERVICE
- 8" WATER LINE / WATER VALVE
- 1" WATER SERVICE
- SEWER MANHOLE COVER
- UNDER GROUND UTILITIES
- TRANSFORMER
- STREET LIGHT
- HYDRANT

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

SECRETARY OR CHAIRMAN — DATE

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR — DATE

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

SECRETARY OR CHAIRMAN — DATE

GRAPHIC SCALE IN FEET
40 0 40 80

DATE	REVISION
-	-

UTILITY LAYOUT PLAN

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

PREPARED FOR
LAKEWAY FARMS, L.P.
2 BIRCH STREET
HADDAM, CT 06339

DATE: DECEMBER 2011
DRAWN BY: -
SCALE: 1" = 40'
SHEET NO. 5 of 11
DRAWING NO. -

Development Solutions, L.L.C.
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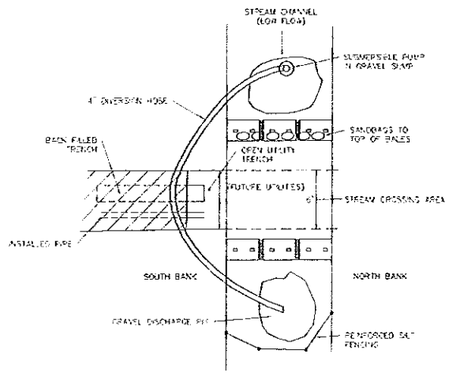
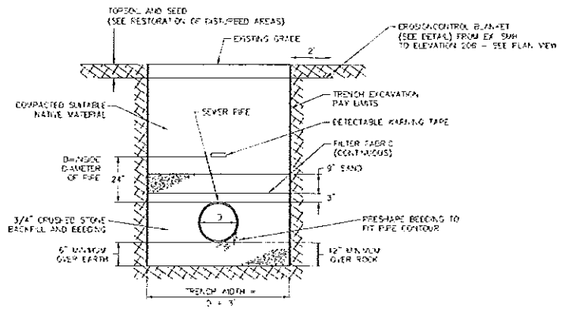


STREAM DIVERSION
NOT TO SCALE

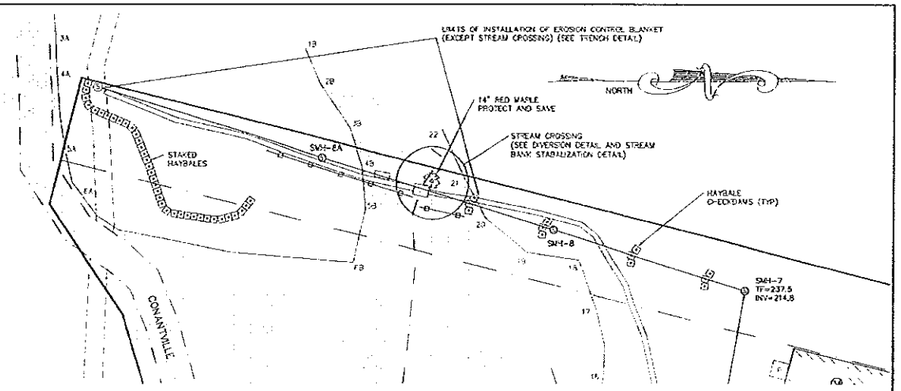
RESTORATION OF DISTURBED AREAS

DURING UTILITY INSTALLATION, THE SOILS IN THE EXCAVATED TRENCH SHALL BE SEGREGATED INTO A, B, & C HORIZONS AND STOCKPILED. WHEN THE TRENCH IS BACKFILLED, THE SOILS SHALL BE LAYED BACK DOWN IN THE REVERSE ORDER. THAT IS, THE C HORIZON IS PLACED IN THE BOTTOM OF THE TRENCH, THEN THE B HORIZON AND FINALLY THE A HORIZON. THE SOIL SCIENTIST SHALL SUPERVISE THIS WORK IN CONJUNCTION WITH THE TOWN WETLANDS OFFICER. THE TRENCH AREA AND ANY OTHER DISTURBED AREAS NEAR THE WETLANDS SHALL BE SEEDED WITH A COMBINATION "WET MIX" AND "CONSERVATION MIX". THE AREA WILL THEN BE MULCHED. SPECIES FROM THE BASIN PLANTINGS TABLE ON SHEET 4 UNDER "WET MEADOW" SHALL BE PLANTED IN THE DISTURBED AREA.

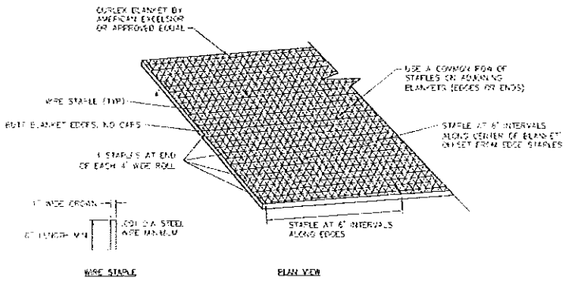
NOTE:
A PLASTIC TARP IS TO BE KEPT, ON HAND, OF SUFFICIENT SIZE TO SERVE AS AN EMERGENCY LINER FOR STREAM FLOW.



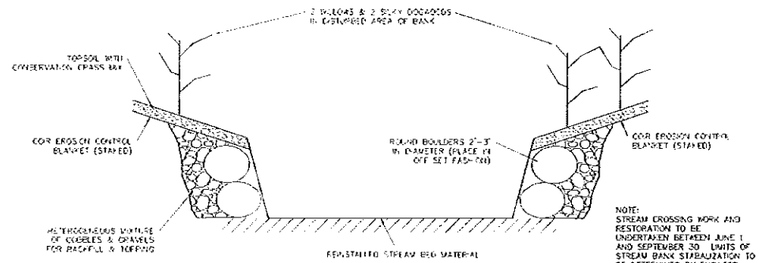
SANITARY SEWER TRENCH DETAIL
NOT TO SCALE



INSTALL HAYBALE CHECKDAMS 50 FEET DOWN GRADIENT OF SEWER LINE INSTALLATION IN THIS AREA. DAMS SHALL BE A MINIMUM OF 15 FEET LONG AND SHALL BE INSTALLED IMMEDIATELY AFTER WORK PROGRESSES UPGRADE. ALL WORK IS TO BE DONE BETWEEN JUNE 1 AND SEPTEMBER 30.

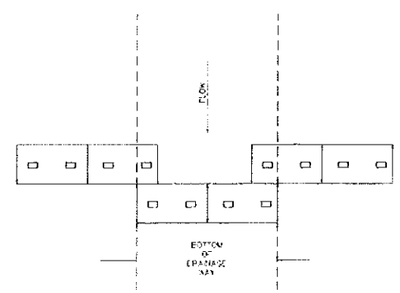


EROSION CONTROL BLANKET INSTALLATION
NOT TO SCALE

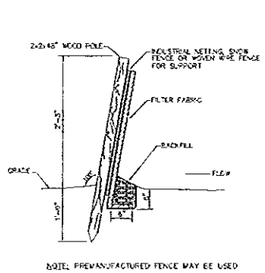


NOTE:
STREAM CROSSING WORK AND RESTORATION TO BE UNDERTAKEN BETWEEN JUNE 1 AND SEPTEMBER 30. LIMITS OF STREAM BANK STABILIZATION TO BE DETERMINED BY ENGINEER.

BANK STABALIZATION AT STREAM CROSSING
NOT TO SCALE

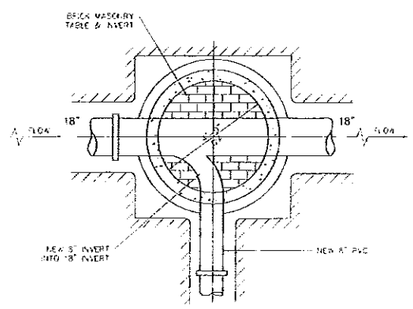


PLAN VIEW



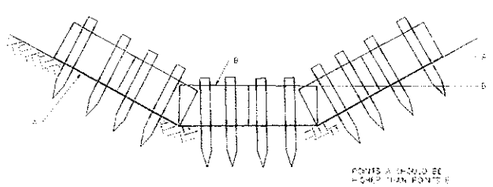
NOTE: PREMANUFACTURED FENCE MAY BE USED

SEDIMENT FENCE
NOT TO SCALE



PLAN - INVERT TABLE

CONNECTION TO EXISTING SEWER MANHOLE
NOT TO SCALE



ELEVATION VIEW

HAYBALE CHECK DAM
NOT TO SCALE

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

SECRETARY OR CHAIRMAN _____ DATE _____

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR _____ DATE _____

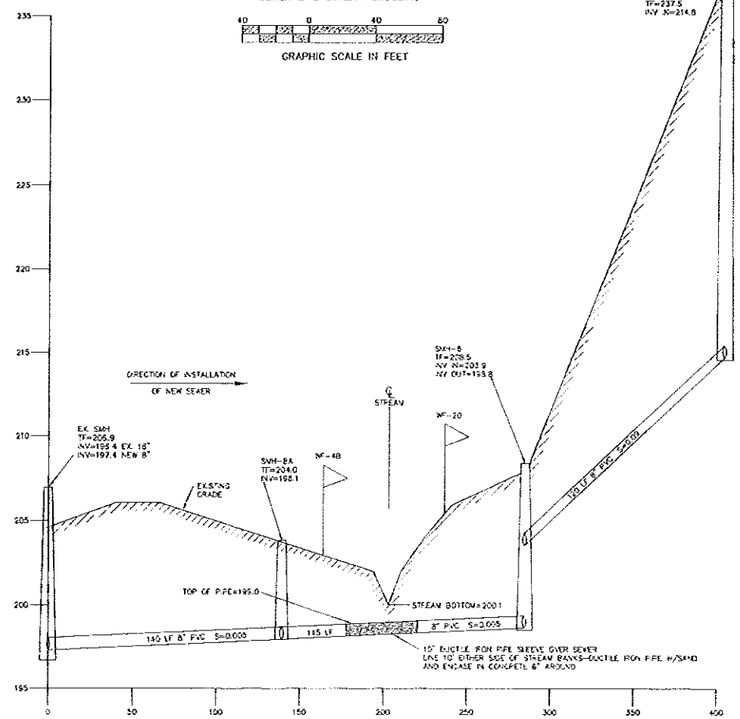
APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

SECRETARY OR CHAIRMAN _____ DATE _____

PLAN VIEW

SEWER LINE STREAM CROSSING

GRAPHIC SCALE IN FEET



PROFILE

SCALE: HORIZ. 1"=40'
VERT. 1"=4'

SECTION OF SEWER PIPE W/LESS THAN 4 FT. OF COVER TO BE SCHEDULE 40 PVC W/GLUED JOINTS ENCASED IN CONCRETE (MIN. 6" THICK)

DATE	REVISION
--	--

SEWER LINE STREAM CROSSING

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

PREPARED FOR
LAKEWAY FARMS, L.P.
2 BIRCH STREET
LEDYARD, CT 06339

DATE: DECEMBER 2011
DRAWN BY: --
SCALE: 1" = 40'
SHEET NO.: 6 of 11
DRAWING NO.: --

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I. GENERAL EROSION AND SEDIMENTATION CONTROL NOTES

(SEE II. & III. FOR SPECIFIED CONSTRUCTION MEASURES)

THIS CONSTRUCTION PLAN PROPOSES EROSION CONTROL MEASURES WHICH WILL PERFORM ONE OR MORE OF THE FOLLOWING FUNCTIONS: MINIMIZATION OF SOIL EXPOSURE, CONTROL OF RUNOFF, SHIELDING OF THE SOILS AND BINDING OF THE SOILS. PROPER EROSION MANAGEMENT WILL MINIMIZE THE EROSION, BUT IT MUST BE UNDERSTOOD THAT ONLY "REASONABLE" EROSION CONTROL CAN BE EXPECTED. THUS, EVEN WITH THE BEST PLAN, SOME EROSION MUST BE ANTICIPATED. SEDIMENTATION CONTROLS ARE THE SECONDARY LINE OF DEFENSE ON THE CONSTRUCTION SITE.

DURING THE COURSE OF SITE CONSTRUCTION DAILY INSPECTIONS OF ALL EROSION AND SEDIMENTATION MEASURES WILL OCCUR AND REPORTS FILED WITH THE TOWN'S ZONING AGENT, BI-WEEKLY DURING ROADWAY CONSTRUCTION.

WATER GENERATED SEDIMENT IS A SERIOUS PROBLEM WHEN NATURAL VEGETATION IS REMOVED OR ALTERED, FOR THIS REASON, A RECOMMENDATION FOR MINIMAL SITE DISTURBANCE TO EXISTING VEGETATION AND SOIL IS PROPOSED. MINIMAL SOIL EXPOSURE NOT ONLY ENTAILS DEMARCATING SITE DISTURBANCE LIMITS, BUT ALSO CALLS FOR THE STAGING OF GRADING AND SUBSEQUENT REVEGETATION OF DISTURBED AREAS, SO THAT THE LEAST AMOUNT OF SOIL SURFACE IS EXPOSED AT ANY ONE TIME.

RUNOFF SHALL BE CONTROLLED BY THE INTERCEPTION, DIVERSION AND SAFE DISPOSAL OF PRECIPITATION RUNOFF SHALL ALSO BE CONTROLLED BY THE STAGING OF CONSTRUCTION ACTIVITY AND THE PRESERVATION OF NATURAL VEGETATION WHENEVER POSSIBLE. THE BINDING OF SOIL PARTICLES TO MAKE THEM LESS SUSCEPTIBLE TO REMOVAL BY RAIN SPLASH OR RUNOFF BY THE USE OF NATURAL AND PHYSICAL "BINDERS" (MULCHES AND FABRICS) MAY BE REQUIRED AS DIRECTED BY ENGINEER.

TO PREVENT SEDIMENT FROM LEAVING THE SITE, TURBID SURFACE RUNOFF SHALL BE DIVERTED THROUGH "LEVEL SPREADER" DEVICES. TEMPORARY LEVEL SPREADER DEVICES SHALL BE CREATED BY PLACING ENGINEERING FABRIC DOWN GRADIENT OF SOIL DISTURBING ACTIVITIES. THIS FLOW WILL BE DISPERSED OVER A WIDE AREA AND FILTERED BY THE FABRIC. THE FENCE SHALL FOLLOW THE EXISTING CONTOURS WITH THE ENDS OF THE FENCE TURNED UPHILL TO PREVENT END OUTFLOW. FILTER FABRIC USED AS SILT FENCE AND NOT PLACED ON CONTOUR SHOULD HAVE "WINGS" AT INTERVALS OF NO GREATER THAN 100 FEET TO INTERRUPT FLOWS PARALLEL TO THE FENCE. TECHNIQUES SUCH AS "WINGED" FABRIC SILT FENCE CHECK DAMS, HAY BALES INSTALLED AND MAINTAINED AROUND ALL CATCH BASINS, FABRIC SILT FENCE/ LEVEL SPREADERS AND SEDIMENTATION PONDS MAY BE USED.

DUST CONTROL, IF DETERMINED TO BE REQUIRED DURING THE DAILY INSPECTIONS, SHALL BE ADHERED BY THE APPLICATION OF ANIONIC OR CATIONIC ASPHALT EMULSIONS, LATEX EMULSION OR RESIN IN WATER. FOR APPLICATION RATES AND DILUTION REQUIREMENTS, REFER TO MANUFACTURER'S GUIDELINES. THE EXPOSED SOIL SURFACE SHOULD BE MOISTENED PERIODICALLY WITH ADEQUATE WATER TO CONTROL DUST, BUT WATER SHALL NOT BE EXCESSIVELY.

IN AN EFFORT TO REDUCE THE POTENTIAL FOR TRACKING MUD OFF THE SITE, COARSE STONE "TRACKING PADS" AND IMMEDIATE CONSTRUCTION OF GRAVEL SUBBASE FOR ROADWAYS WILL MINIMIZE ANY OFF-SITE TRACKING. ACCUMULATED DIRT TRACKED ONTO EXISTING ROADWAYS SHALL BE REMOVED BY SHOVEL AND BROOM AT THE END OF EACH WORK DAY.

BEFORE AND AFTER EACH STORM EVENT AND ONCE EVERY DAY, ALL SEDIMENT AND EROSION CONTROLS WILL BE INSPECTED BY THE ENGINEER OR ENVIRONMENTAL SUPERVISOR. ANY CORRECTIVE MEASURES TO MITIGATE ENVIRONMENTAL CONCERNS WILL BE ORDERED AT THAT TIME. THERE WILL BE 150FT. OF SILT FENCE WITH THE REQUIRED POSTS ON HAND FOR EMERGENCY SITUATIONS.

EXCAVATIONS WHICH MUST BE DEWATERED WILL BE PUMPED INTO AN ACTIVE DRAINAGE SYSTEM, BOTH THE INLET AND OUTLET OF THE PUMPS SHOULD BE FILTERED AND PROTECTED FROM SURGE ACTION, DEBRIS AND OTHER WASTE RESULTING FROM EQUIPMENT MAINTENANCE AND CONSTRUCTION SHALL NOT BE DISCARDED ON SITE.
THE BI-WEEKLY EROSION AND SEDIMENT MONITORING REPORTS SHALL BE SUBMITTED TO THE ZONING AGENT DURING THE TIME THE ROADWAYS ARE BEING CONSTRUCTED.
IN THE EVENT OF CONFLICT BETWEEN THESE PLANS AND OTHER REGULATIONS, THE MORE STRINGENT SHALL APPLY.

II. CONSTRUCTION SEQUENCE AND DETAILED EROSION CONTROL MEASURES

1. A REGISTERED LAND SURVEYOR SHALL FIELD STAKE THE CENTER LINE OF THE ROADWAY.

2. UPON COMPLETION OF THE FIELD STAKING, EXISTING TREES WHICH ARE TO BE SAVED ARE TO BE FLAGGED AND PROTECTED. ALL REMAINING VEGETATION INCLUDING OVERHANGING LIMBS FROM TREES TO BE SAVED SHALL BE CHIPPED AND SUCH CHIPS STORED IN NON-DISTURBED AREAS ALONG THE RIGHT OF WAY FOR FUTURE USE AS MULCH. COARSE WOOD AND/OR TIMBER FROM THE CLEARED AREAS SHALL BE REMOVED FROM THE SITE. EROSION AND SEDIMENT MEASURES SHALL BE INSTALLED AS APPROPRIATE PRIOR TO ANY SITE DISTURBANCE.
3. THE STORM DRAINAGE SYSTEM FROM CB-1 THRU CB-8 SHALL BE INSTALLED INCLUDING THE PRETREATMENT SYSTEM AND FLOW CONTROL BASIN.
4. STUMPING SHALL COMMENCE ALONG BOTH PROPOSED ROADS WITHIN AREA STAKED BY THE SURVEYOR AND CLEARED IN TASK 2 ABOVE. LOAM SHALL BE STRIPPED FROM THE CLEARED AREA, STOCKPILED JUST OUTSIDE THE ROAD GRADING LIMITS AT INTERVALS NOT EXCEEDING 300 FEET, AND PROTECTED WITH HAY BALES ON THE DOWN GRADIENT SIDE OF THE STOCKPILE. UPON STRIPPING THE LOAM ALONG THE FIRST 100' OF ROADWAY, THE ANTI-TRACKING PAD SHALL BE INSTALLED BEFORE PROCEEDING WITH STRIPPING THE BALANCE OF THE ROADWAY. THIS ANTI-TRACKING PAD SHALL BE MAINTAINED AND REPLACED AS NECESSARY WHEN NO LONGER EFFECTIVE IN PREVENTING TRACKING OF MATERIALS OFF SITE. STUMPS SHALL BUSTED OUTSIDE RIGHT OF WAY.
5. THE ROAD SHALL BE BROUGHT TO ROUGH GRADE AND SILT FENCE CHECK DAMS SHALL BE PLACED IN THE GUTTERS OF THE DRAINED ROADWAYS AT 100' INTERVALS (MAXIMUM), AS SHOWN UPON THE PLAN, OR MORE FREQUENTLY AS REQUIRED AND DIRECTED BY THE ENGINEER.
6. ROAD SHOULDERS BEYOND THE STREET PROPERTY LINE, IN BOTH CUT AS FILL AREAS, SHALL BE FINE GRADED AND STABILIZED PRIOR TO PROCEEDING WITH THE INSTALLATION OF UNDERGROUND UTILITIES. STABILIZATION SHALL BE IN ACCORDANCE WITH "III GENERAL NOTES".
7. THE STORM DRAINAGE SYSTEM CONSTRUCTION SHALL PROCEED UPGRADIENT FROM CB 1-8. AFTER INSTALLATION OF ALL CATCH BASINS, SEVERAL BLOCKS ON THE UPGRADIENT SIDE OF ALL CATCH BASINS ALONG THE NEW ROADWAYS SHALL BE LEFT OUT AT THE SUBBASE LEVEL TO ALLOW STORM WATER RUNOFF TO ENTER THESE STRUCTURES. A SEDIMENT POOL SHALL BE EXCAVATED JUST BEFORE THESE INLETS, AND HAY BALE CHECK DAMS SHALL BE INSTALLED TO PREVENT SEDIMENT FROM ENTERING THESE STRUCTURES.
8. INSTALLATION OF THE WATER MAIN FROM MEADOWBROOK LANE INTO THE PROJECT SHALL BE INSTALLED NEXT. UPON PRESSURE TESTING OF THE WATER MAINS, INDIVIDUAL LOT SERVICES SHALL BE INSTALLED IMMEDIATELY FOLLOWING INSTALLATION OF THE WATER SERVICES. THE ROADBED SHALL BE BROUGHT TO SUBBASE GRADE WITH A CROWNED CROWN. SILT FENCE CHECK DAMS WHICH HAVE BEEN REMOVED FROM THE GUTTERS TO ALLOW FOR THE REPLACEMENT OF THE SUBBASE, SHALL BE REINSTALLED AS DIRECTED UNDER TASK 4.
9. UNDERGROUND TELEPHONE, ELECTRIC, ETC. SHALL BE INSTALLED, IMMEDIATELY FOLLOWED BY THE PLACEMENT OF THE PROCESS GRAVEL BASE, BITUMINOUS PAVEMENT, AND BITUMINOUS CONCRETE LIP CURBING. THE SHOULDERS OF ALL ROADWAYS BETWEEN THE BACK OF CURB AND THE STREET LINE SHALL BE FINE GRADE, LOAM AND SEEDED AS SPECIFIED UNDER "III. GENERAL NOTES".

III. BUILDING SITE DEVELOPMENT

IN ADDITION TO THE RECOMMENDATIONS FOR THE INDIVIDUAL PHASES OF THE DEVELOPMENT, THE FOLLOWING PROCEDURES SHALL APPLY TO INDIVIDUAL BUILDINGS BEING DEVELOPED.
1. THE LIMITS OF DISTURBANCE SHALL BE ESTABLISHED IN THE FIELD FOR EACH PROPOSED RESIDENTIAL STRUCTURE. MAXIMUM DISTURBANCE LIMITS OF 25-30 BEYOND THE PHYSICAL DIMENSIONS OF THE STRUCTURE AND RELATED APPURTENANCES IS RECOMMENDED.
2. TOPSOIL AND EXCAVATED SUBSOIL FROM THE FOUNDATION AREA SHALL BE STOCKPILED WITHIN THE AREA OF DISTURBANCE IF NOT USED FOR ON SITE REGARDING. EACH STOCKPILE SHALL BE ADEQUATELY RINGED ON THE DOWN GRADIENT SIDE WITH SEDIMENT CONTROL MATERIALS (i.e., HAY BALES AND/OR FABRIC FENCE).
3. ANY ADDITIONAL STOCKPILING OF LUMBER AND BUILDING MATERIALS SHALL ALSO BE CONFINED TO THE AREA OF DISTURBANCE. SIMILARLY, VEHICULAR MOVEMENT SHALL BE DIRECTED TO ESTABLISHED PARKING AREAS.
4. ONCE THE PROPOSED STRUCTURE IS ENCLOSED, ALL EFFORTS SHALL BE MADE TO COMPLETE ON SITE IMPROVEMENTS SUCH AS WELLS, FOOTING DRAINS, SEPTIC SYSTEMS, DRIVEWAYS, ETC. THEREAFTER, ALL RAW SOIL AREAS SURROUNDING THE HOME SITE SHALL BE FINE GRADE AND MULCHED.

IV. GENERAL NOTES

SEED BED PREPARATION

FINE GRADE AND RAKE SOIL SURFACE TO REMOVE STONES LARGER THAN 2 INCH DIAMETER. INSTALL NEEDED EROSION CONTROL DEVICES SUCH AS SURFACE WATER DIVERSIONS. APPLY LIMESTONE AT A MINIMUM RATE OF 2 TONS PER ACRE OR 10 LBS PER 1000 SQUARE FEET. FERTILIZE WITH 10-10-10 OR AT THE RATE OF 300 LBS PER ACRE OR 7.5 LBS PER 1000 SQUARE FEET. WORK LIME AND FERTILIZER INTO SOIL UNIFORMLY TO A DEPTH OF 4 INCHES WITH A HOE, SPRINGTOOTH HARROW OR OTHER SUITABLE EQUIPMENT FOLLOWING THE CONTOUR LINES.

SEED APPLICATION

APPLY GRASS SEED MIXTURE BY HAND, CYCLONE SEEDER OR HYDROSEEDER. INCREASE SEED MIXTURE BY 10 PERCENT IF HYDROSEEDING. LIGHTLY RAKE OR ROLL THE SEEDED SURFACE TO COVER SEED. SEEDING SHOULD BE DONE BETWEEN APRIL 1 AND JUNE 1, OR BETWEEN AUGUST 15 AND OCTOBER 15. IF SEEDING CANNOT BE DONE DURING THESE DATES, REPEAT MULCHING PROCEDURE UNTIL SUCH TIME AS SEEDING CAN TAKE PLACE. THE TYPE OF SEED MIXTURE SHALL BE DETERMINED FROM PAGES 6-7 AND 6-11 OF THE "CONNECTICUT GUIDELINES FOR SOIL EROSION AND SEDIMENT CONTROL".

MULCHING

IMMEDIATELY FOLLOWING SEEDING, MULCH THE SEEDED SURFACE WITH STRAW OR HAY AT A RATE OF 1.5 TO 2 TONS PER ACRE. SPREAD MULCH BY HAND OR MULCH BLOWER. PUNCH MULCH INTO SOIL SURFACE WITH TRACK MACHINE OR DISH HARROW SET STRAIGHT UP. MULCH MATERIAL SHOULD BE "SET" INTO SOIL SURFACE APPROXIMATELY 2-3 INCHES.

DURING CONSTRUCTION IT SHALL BE THE RESPONSIBILITY OF MR. PATRICK LAFAYETTE OF DEVELOPMENT SOLUTIONS, LLC (TEL. NO. (860) 204-0248) TO ENSURE THE IMPLEMENTATION OF THIS EROSION AND SEDIMENT CONTROL PLAN. A BI-WEEKLY INSPECTION OF THE SITE SHALL BE PERFORMED TO ENSURE COMPLIANCE WITH THIS SEDIMENT AND EROSION CONTROL PLAN. A BI-WEEKLY INSPECTION REPORT SHALL BE SUBMITTED TO THE ZONING ENFORCEMENT AGENT. THIS RESPONSIBILITY INCLUDES INSTALLATION AND MAINTENANCE OF CONTROL MEASURES, INFORMING ALL PARTIES ENGAGED ON THE SITE OF REQUIREMENTS AND OBJECTIVES OF THIS PLAN, NOTIFYING THE ZONING AGENT OF ANY TRANSFER OF THIS RESPONSIBILITY AND FOR CONVEYING A COPY OF THE EROSION AND SEDIMENT CONTROL PLAN IF AND WHEN TITLE OF LAND IS TRANSFERRED.

PHASING PLAN

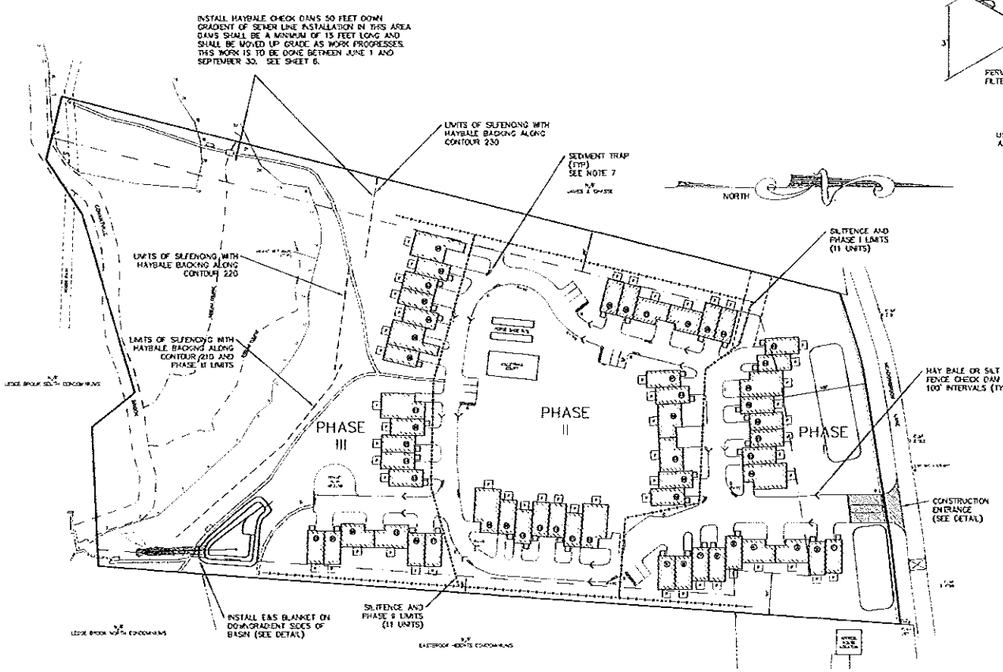
PHASE I (17 UNITS, 2.45 ACRES)
1. CLEAR, GRUB AND ROUGH GRADE ROADWAY TO PHASE I LIMITS AND INSTALL PHASE I E&S.
2. INSTALL STORM DRAINAGE SYSTEM, CB'S 1-7, PRETREATMENT STRUCTURE, STORMWATER QUALITY BASIN AND DISCHARGE PIPING AND STRUCTURE.
3. INSTALL UTILITIES
   A. INSTALL THE ENTIRE SEWER LINE EXCEPT FOR SMH-9.
   B. INSTALL UNDERGROUND UTILITIES TO THE PHASE I LIMITS.
   C. INSTALL THE WATER LINE TO PHASE I LIMITS, ENDING AT HYDRANTS (2).
4. INSTALL ALL LANDSCAPING ACROSS THE FRONT OF THE PROPERTY WITH THE STONE DUST PATH AND RAIN GARDENS AT DESIGNATED COMPLETED UNITS.
5. INSTALL WOOD CHIP PATH ACROSS REAR OF THE PROPERTY.
6. STABILIZE DISTURBED AREAS.

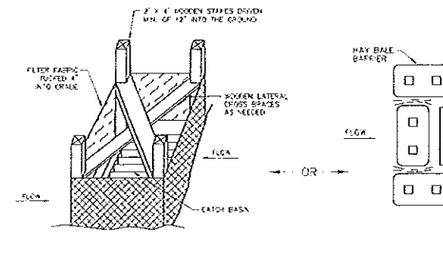
PHASE II (19 UNITS, 2.5 ACRES)
1. CLEAR, GRUB AND ROUGH GRADE ROADWAY TO PHASE II LIMITS AND INSTALL PHASE II E&S.
2. INSTALL STORM DRAINAGE SYSTEM, CB'S 8-12.
3. INSTALL UTILITIES
   A. INSTALL SMH-9 AND CONNECT INTO PHASE I SYSTEM.
   B. INSTALL UNDERGROUND UTILITIES TO THE PHASE II LIMITS.
   C. INSTALL THE WATER LINE TO PHASE II LIMIT ENDING AT HYDRANTS (2).
4. INSTALL ALL SUPPLEMENTARY LANDSCAPING WITHIN PHASES I AND II AND RAIN GARDENS AT DESIGNATED COMPLETED UNITS.
5. STABILIZE DISTURBED AREAS.

PHASE III (18 UNITS, 1.5 ACRES)
1. CLEAR, GRUB AND ROUGH GRADE.
2. INSTALL UTILITIES
   A. COMPLETE UNDERGROUND UTILITY INSTALLATION.
   B. COMPLETE THE WATER SYSTEM INSTALLATION ENDING AT HYDRANT (1).
3. COMPLETE ALL SUPPLEMENTARY LANDSCAPING AND RAIN GARDENS.
4. STABILIZE DISTURBED AREAS.

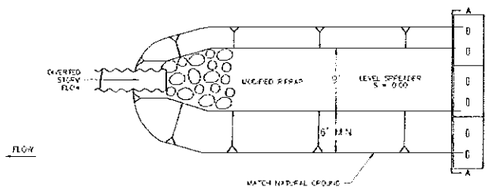
A SOIL SCIENTIST OR OTHER PROFESSIONAL DEEMED QUALIFIED BY THE PZC CHAIRMAN WITH STAFF ASSISTANCE, SHALL OVERSEE THE WET BASIN AND RAIN GARDEN PLANTINGS.

DURING PERIODS OF CONSTRUCTION, THE APPLICANT SHALL SUBMIT TO THE ZONING AGENT BI-WEEKLY EROSION AND SEDIMENT CONTROL MONITORING REPORTS UNTIL DISTURBED AREAS ARE STABILIZED.

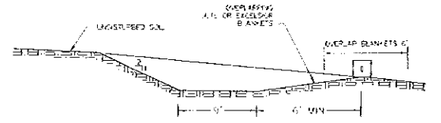




HAY BALE INSTALLATION AT FRAME AND GRATE
NOT TO SCALE

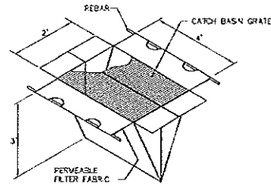


PLAN VIEW

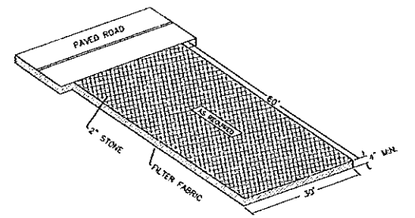


SECTION A-A

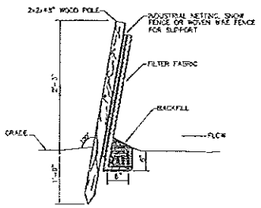
LEVEL SPREADER/SEDIMENT TRAP
NOT TO SCALE



SILTATION BAG
NOT TO SCALE
USE "SILTSACK" AS MANUFACTURED BY ATLANTIC CONSTRUCTION FABRICS, INC. OR EQUIVALENT

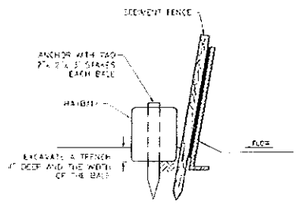


ANTI TRACKING PAD
NOT TO SCALE

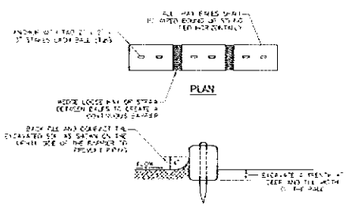


NOTE: PREMANUFACTURED FENCE MAY BE USED.

SEDIMENT FENCE
NOT TO SCALE



HAYBALE BACKED SEDIMENT FENCE
NOT TO SCALE



HAY BALE BARRIER
NOT TO SCALE

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION	
SECRETARY OR CHAIRMAN	DATE
APPROVED BY THE DIRECTOR OF PUBLIC WORKS	
DIRECTOR	DATE
APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY	
SECRETARY OR CHAIRMAN	DATE

DATE	REVISION
-	-

EROSION AND SEDIMENTATION CONTROL PLAN

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

PREPARED FOR
LAKEWAY FARMS, L.P.
2 BIRCH STREET
LEDYARD, CT 06339

DATE: DECEMBER 2011
DRAWN BY: -
SCALE: AS NOTED
SHEET NO. 7 of 11
DRAWING NO. -

Development Solutions, L.L.C.
A Technical Services Company
33 East Town St., Norwich, Connecticut
Phone: (860)204-0248 - Fax: (860)204-0652

PLANT SCHEDULE TREE PLANTING

TREES	QTY	BOTANICAL NAME / COMMON NAME	CONT	CAL	SPACING
ACE CAP	4	Acer rubrum 'Columnare' / Columnar Red Maple	B & B	2.5"Cal	
ACE FRE	5	Acer rubrum 'Bowhall' / Bowhall Red Maple	B & B		5-6' ht
ACE OCT	11	Acer rubrum 'Autumn Glory' TM / Autumn Glory Maple	B & B	2.5"Cal	
ACE RUB	11	Acer rubrum 'Red Sunset' / Red Sunset Maple	B & B	2.5"Cal	
BET NIG	13	Betula nigra 'Heritage' / Heritage River Birch	B & B	2.5"Cal	
CER SIL	2	Cercis siliquastrum / Judas Tree	B & B	2.5"Cal	
CEL OCC	3	Celtis occidentalis / Common Hackberry	B & B		6-7' ht
COR GLO	6	Cornus florida 'Cloud Nine' TM / New Eastern Dogwood	B & B		6-7' ht
FAG RIV	2	Fagus sylvatica 'Riversii' / Rivers Purple Beech	B & B	2.5"Cal	
PRU CHA	12	Prunus cerasifera 'Okame' / Okame Flowering Plum	B & B	2.5"Cal	
STE PSE	2	Stewartia pseudocamellia / Japanese Stewartia	B & B	2"Cal	
SYR RET	18	Syringa reticulata / Japanese Tree Lilac	B & B		6-7' ht
ZEL SER	3	Zelkova serrata 'Green Vase' / Sawleaf Zelkova	B & B	2.5"Cal	

SHRUBS	QTY	BOTANICAL NAME / COMMON NAME	CONT
BUX SEM	91	Buxus sempervirens 'Graham Blandy' / Graham Blandy Boxwood	5 gal

PLANT SCHEDULE RAIN GARDEN

SHRUBS	QTY	BOTANICAL NAME / COMMON NAME	CONT
ACE RUB	59	Acer rubrum 'Autumn Flame' / Autumn Flame Red Maple	B & B
ACO CAL	58	Acorus calamus 'Variegatus' / Variegated Sweet Flag	1 gal
CEP OCC	18	Cephalanthus occidentalis / Buttonbush	3 gal
CLE ALN	60	Clethra alnifolia 'Hummingbird' / Hummingbird Summersweet	3 gal
COR AMO	18	Cornus amomum / Silky Dogwood	3 gal
ILE GLA	51	Ilex glabra 'Shamrock' / Shamrock Inkberry	3 gal
ITE VIR	107	Itea virginica 'Henry's Garnet' / Henry's Garnet Sweetspire	3 gal
MYR PEN	16	Myrica pensylvanica / Bayberry	3 gal

PERENNIALS / GRASSES	QTY	BOTANICAL NAME / COMMON NAME	CONT
CAR STR	154	Carex stricta / Tussock Sedge	1 gal
DEC CES	207	Deschampsia cespitosa 'Goldtau' / Goldtau Tufted Hair Grass	1 gal
HEM FUL	154	Hemerocallis fulva / Orange Daylily	1 gal

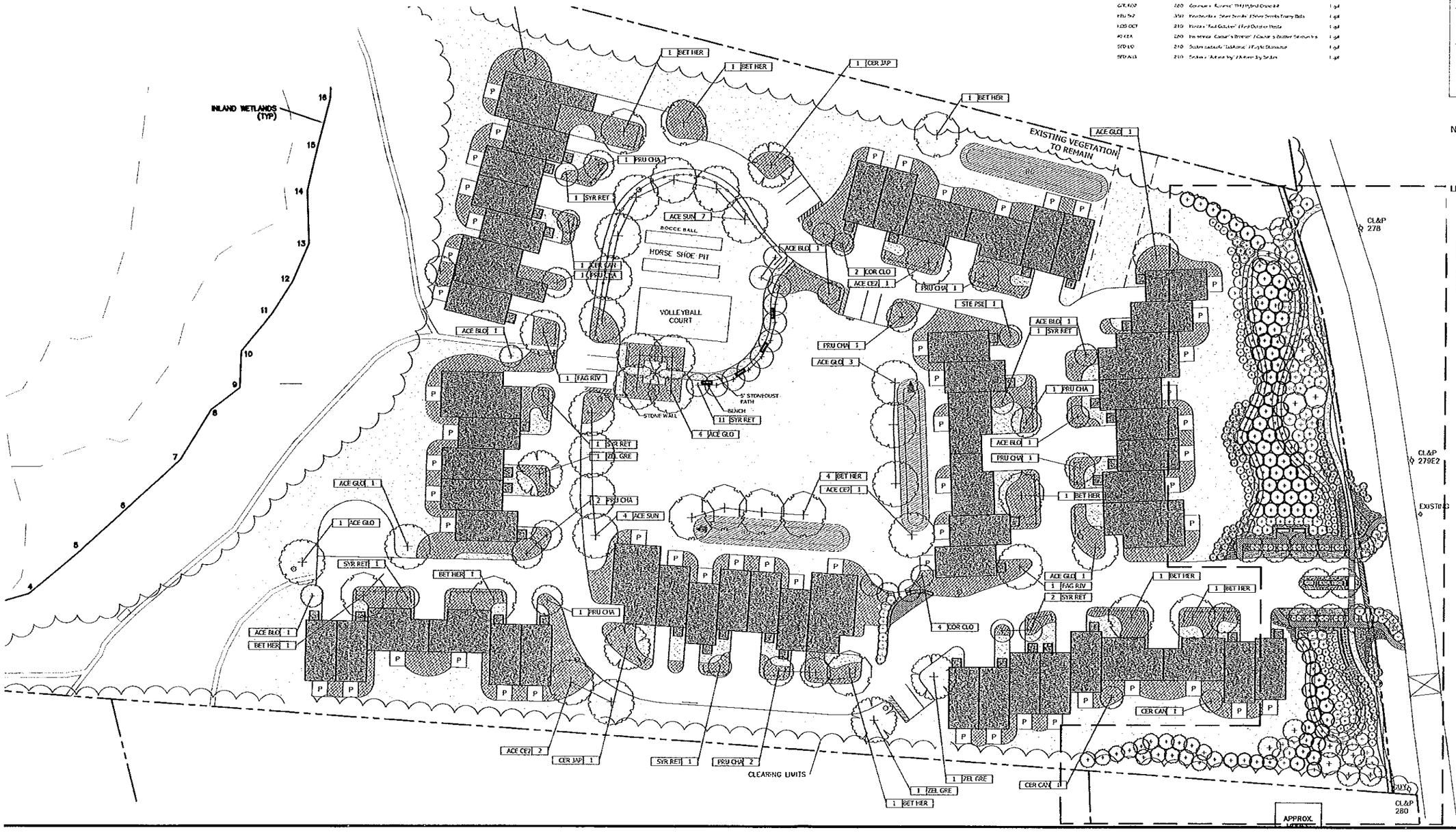
PLANT SCHEDULE PLANTING BEDS

SHRUBS	QTY	BOTANICAL NAME / COMMON NAME	CONT
ACE GLO	210	Acer rubrum 'Jeffersred' TM / Autumn Flame Red Maple	B & B
ACE PEN	140	Acer pensylvanicum 'Erythrocladum' / Striped Bark Maple	B & B
BET NIG	140	Betula nigra 'Dura-Heat' TM / Dura-Heat River Birch	B & B
CEP OCC	70	Cephalanthus occidentalis / Buttonbush	3 gal
CLE ALN	70	Clethra alnifolia 'Hummingbird' / Hummingbird Summersweet	3 gal
COR KOU	210	Cornus kousa 'Satomi' / Satomi Kousa Dogwood	B & B
COR SER	140	Cornus sericea 'Bailey' / Bailey Redosier Dogwood	3 gal
DEU GRA	70	Deutzia gracilis 'Nikko' / Nikko Slender Deutzia	3 gal
FOT VIR	140	Fothergilla gardenii 'Blue Mist' / Blue Mist Dwarf Witch Alder	3 gal
HAM VER	70	Hamamelis vernalis 'Sandra' / Sandra Vernal Witch Hazel	3 gal
HYD QUE	140	Hydrangea quercifolia 'Alice' / Alice Oakleaf Hydrangea	3 gal
ILE VER	140	Ilex verticillata 'Red Sprite' / Red Sprite Winterberry	3 gal
ITE VIR	350	Itea virginica 'Henry's Garnet' / Henry's Garnet Sweetspire	3 gal
MYR PEN	210	Myrica pensylvanica / Bayberry	3 gal
PIE GRA	70	Pieris japonica 'Grayswood' / Grayswood Japanese Andromeda	3 gal
POT FRU	70	Potentilla fruticosa 'Abbotswood' / Abbotswood Potentilla	3 gal
RHO CAT	70	Rhododendron catawbiense 'Boursault' / Boursault Catawba Rhododendron	3 gal
ROS CHI	70	Rosa chinensis 'Mutabilis' / Mutabilis China Rose	3 gal
SPI JAP	140	Spiraea japonica 'Anthony Waterer' / Anthony Waterer Spirea	3 gal
SYR PAT	140	Syringa patula 'Miss Kim' / Miss Kim Korean Lilac	3 gal

ORNAMENTAL GRASSES	QTY	BOTANICAL NAME / COMMON NAME	CONT
CAR OSH	370	Carex oshimensis 'Evergold' / Evergold Japanese Sedge	1 gal

VINES	QTY	BOTANICAL NAME / COMMON NAME	CONT
HED HEL	210	Hedera helix 'Baltica' / Baltic Ivy	1 gal
LON JAP	70	Lonicera japonica 'Aureo-reticulata' / Aureo-reticulata Japanese Honeysuckle	1 gal
PAR TRI	140	Parthenocissus tricuspidata 'Veitchii' / Veitch Boston Ivy	1 gal
POL CUS	140	Polygonum cuspidatum 'Compactum' / Compact Fleeceflower	1 gal
TRA JAS	210	Trachelospermum jasminoides / Star Jasmine	1 gal
WIS FRU	140	Wisteria frutescens 'Amethyst Falls' / Amethyst Falls American Wisteria	1 gal

PERENNIALS / GRASSES	QTY	BOTANICAL NAME / COMMON NAME	CONT
ACH MIL	420	Achillea millefolium 'Fire King' / Fire King Common Yarrow	1 gal
ASC TUB	350	Asclepias tuberosa / Butterfly Weed	1 gal
ECH PUR	210	Echinacea purpurea 'Magnus' / Magnus Purple Coneflower	1 gal
HEM FUL	420	Hemerocallis fulva / Orange Daylily	1 gal
HEU MIC	140	Heuchera micrantha 'Palace Purple' / Palace Purple Coralbells	1 gal
HOS FOR	140	Hosta 'Fortunei Aureomarginata' / Fortunei Aureomarginata Hosta	1 gal
HOS SIE	140	Hosta 'Sieboldiana Elegans' / Sieboldiana Elegans Hosta	1 gal
HOS SUM	140	Hosta 'Sum and Substance' / Sum and Substance Hosta	1 gal
LIR SPI	140	Liriope spicata / Creeping Lilyturf	1 gal
PAN VIR	140	Panicum virgatum 'Heavy Metal' / Heavy Metal Switch Grass	1 gal
PEN DIG	210	Penstemon digitalis 'Husker Red' / Husker Red Beardtongue	1 gal
PER ALS	210	Perovskia atriplicifolia / Russian Sage	1 gal
RUD FUL	210	Rudbeckia fulgida 'Goldsturm' / Goldsturm Black-Eyed Susan	1 gal
SED SPE	210	Sedum 'Autumn Joy' / Autumn Joy Sedum	1 gal



Whispering Glen

73 Meadowbrook Lane
Mansfield, CT

LANDSCAPE
KENT+ FROST
ARCHITECTURE
1 HIGH STREET
MYSTIC, CT 06355
860.572.0784
f 860.572.7047

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

CHAIRMAN OR SECRETARY — DATE

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

SIGNATURE — DATE

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

CHAIRMAN OR SECRETARY — DATE

NOTE:
ALL FENCING SHALL BE WHITE VINYL, 4' HIGH, WITH VARIED STYLES (PICKET, SLAT, SOLID)

LEGEND:

- LAWN
- PLANTING BED
- RAIN GARDEN

NOT ISSUED FOR CONSTRUCTION

Revisions	Date
1 Staff Comments	5.5.09
2 New Configuration	7.17.09
3 P & Z Revision	9.23.09 & 6.28.12

0 10 20 30 60

Planting Plan

Scale	1" = 30'
Date	20 January 2012
K+F Project No.	2011013
Drawing No.	

Planting Notes

1. NOTIFY LANDSCAPE ARCHITECT AT LEAST 24 HOURS PRIOR TO ANY ACTIVITY REQUIRING FIELD OBSERVATION.

2. PLANT LOCATIONS ARE TO BE STAKED BY CONTRACTOR AND APPROVED LANDSCAPE ARCHITECT. INDIVIDUAL STAKES SHALL BE PLACED FOR TREES AND SHRUBS. EDGE OF PLANTING BEDS SHALL BE PAINTED. NOTIFY LANDSCAPE ARCHITECT 24 HOURS PRIOR TO DESIRED APPROVAL.

3. PLANTS SHALL COMPLY WITH SIZING AND GRADING STANDARDS OF THE LATEST EDITION OF "AMERICAN STANDARDS FOR NURSERY STOCK". PROVIDE STOCK TRUE TO BOTANICAL NAME AND LEGIBLY TAGGED. PLANTS SHALL BE FREE OF DEFECTS, DISEASES AND ALL FORMS OF INSECT INFESTATIONS.

4. ALL PLANTS SHALL BE PLANTED TO SAME DEPTH AS AT PLACE OF GROWTH, EXCEPT WHERE NOTED OTHERWISE.

5. ALL PLANTING AREAS SHALL RECEIVE 12" OF SPECIFIED SOIL MIXTURE: 10" SCREENED LOAM, 2" OF COMPOST. BLEND COMPOST INTO TOP 4" OF SOIL. PLANTING SOIL MIXTURE SHALL BE FREE OF SUBSOIL, LUMPS, STONES, PLANTS, ROOTS, AND OTHER FOREIGN MATTER.

6. ALL LAWN AREAS SHALL RECEIVE A MIN. OF 4" OF SCREENED LOAM.

7. ALL PLANTING AREAS SHALL BE MULCHED WITH WELL-ROTTED, FINELY SHREDDED, DARK HEMLOCK BARK MULCH. TREES AND SHRUBS SHALL RECEIVE 3 INCHES, PERENNIAL AND GROUNDCOVER BEDS SHALL RECEIVE 2 INCHES. PROVIDE L.A. WITH SAMPLE FOR APPROVAL.

8. NO SUBSTITUTIONS OF PLANT SPECIES OR CULTIVARS ALLOWED BY CONTRACTOR. CONTRACTOR SHALL NOTIFY K+F OF AVAILABILITY ISSUES PRIOR TO FINALIZATION OF PLANT ORDER(S).

9. ALL BURLAP, TWINE, AND WIRE SHALL BE COMPLETELY REMOVED OR CUT AWAY AT TIME OF INSTALLATION.

10. PLANT WARRANTY SHALL BE FOR 2 GROWING SEASONS FROM THE TIME OF INSTALL.

11. IF NO IRRIGATION SYSTEM IS PLANNED, CONTRACTOR SHALL INFORM OWNER OF WATERING REQUIREMENTS.

12. ALL DISTURBED AREAS NOT DESIGNATED FOR OTHER IMPROVEMENTS SHALL BE HYDROSEEDED AS LAWN. HYDROSEED GRASS MIX SHALL BE DETERMINED BASED ON SEASON OF INSTALLATION.

13. ALL GRASS, OTHER VEGETATION AND DEBRIS SHALL BE REMOVED FROM ALL PLANTING AREAS PRIOR TO PLANTING OR BACKFILLING. CONTRACTOR SHALL REMOVE ALL DEBRIS FROM SITE AS WORK PROGRESSES.

15. CONTRACTOR SHALL ENSURE POSITIVE DRAINAGE AWAY FROM ALL STRUCTURES.

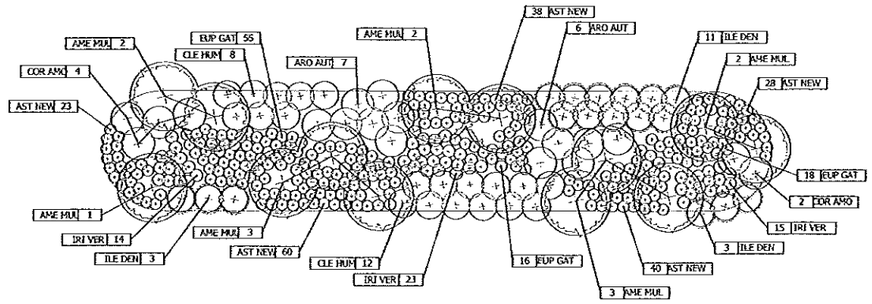
16. LANDSCAPE CONTRACTOR IS RESPONSIBLE FOR MAINTAINING CLOSE COORDINATION WITH OWNER, GENERAL CONTRACTOR, RELATED SUBCONTRACTORS, LANDSCAPE ARCHITECT, AND ALL SITE WORK RELATED ITEMS.

17. NO PLANTINGS SHALL BE PLACED WITHIN 5 FEET OF FIRE HYDRANTS.

18. NO PLANTS ON THE STATE OF CONNECTICUT'S INVASIVE SPECIES LIST SHALL BE USED.

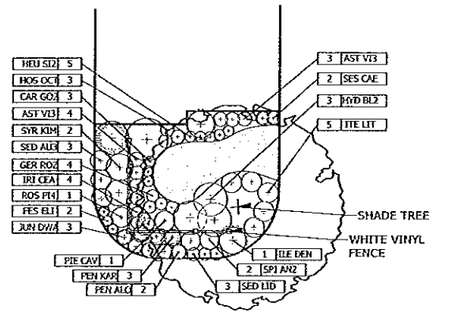
PLANT SCHEDULE FRONT ENTRY

TREES	QTY	BOTANICAL NAME / COMMON NAME	CONT	CAL	SIZE
CER CAN	12	Cercis canadensis / Eastern Redbud	B & B		6-7' ht
CUP CYP	16	Cupressocyparis leylandii / Leyland Cypress	B & B		5-6' ht
PIN NIG	92	Pinus nigra / Austrian Black Pine	B & B		6-7' ht
PRU CHA	11	Pyrus calleryana 'Chanticleer' / Chanticleer Pear	B & B	2.5"Cal	
SHRUBS	**QTY**	**BOTANICAL NAME / COMMON NAME**	**CONT**		
ABE MOS	12	Abelia mosanensis 'Fragrant Abelia' / Fragrant Abelia	3 gal		
CAL SWE	10	Calycanthus floridus / Sweet Shrub	3 gal		
COR FLO	15	Cornus sericea 'Flaviramea' / Yellow Twig Dogwood	3 gal		
HYD LIM	16	Hydrangea paniculata 'Limelight' TM / Limelight Hydrangea	3 gal		
ILE DEN	7	Ilex glabra 'Densa' / Inkberry Holly	3 gal		
ITE VIR	71	Itea virginica 'Henry's Garnet' / Henry's Garnet Sweetspire	3 gal		
JUN VIR	23	Juniperus chinensis sargenti 'Viridis' / Green Sargent Juniper	3 gal		
RHO SCI	12	Rhododendron x 'Scintillation' / Azalea	3 gal		
RHO PUR	28	Rhododendron x 'Purple Gem' / Rhododendron	3 gal		
ROS CA7	24	Rosa shrub 'Carefree Sunshine' / Carefree Sunshine Shrub Rose	3 gal		
SPI NIP	15	Spiraea nipponica 'Snowmound' / Snowmound Spirea	3 gal		
VIB MA2	38	Viburnum plicatum 'Mariesii' / Mariesii Doublefile Viburnum	3 gal		
ORNAMENTAL GRASSES	**QTY**	**BOTANICAL NAME / COMMON NAME**	**CONT**		
CAR GO2	36	Carex x'ova / Golden Sedge	1 gal		
MIS GRA	78	Miscanthus sinensis 'Gracillimus' / Maiden Grass	1 gal		
MIS SIL	6	Miscanthus sinensis 'Silberfeder' / Silver Feather Grass	1 gal		
PEN ALO	160	Pennisetum alopecuroides 'Hameln' / Hameln Dwarf Fountain Grass	1 gal		
SES CAE	85	Sesleria caerulea / Blue Moor Grass	1 gal		
PERENNIALS	**QTY**	**BOTANICAL NAME / COMMON NAME**	**CONT**		
AST AST	29	Aster x frikartii 'Wood's Pink' / Wood's Aster	1 qt		
HEM HAP	207	Hemerocallis x 'Happy Returns' / Happy Returns Daylily	1 gal		



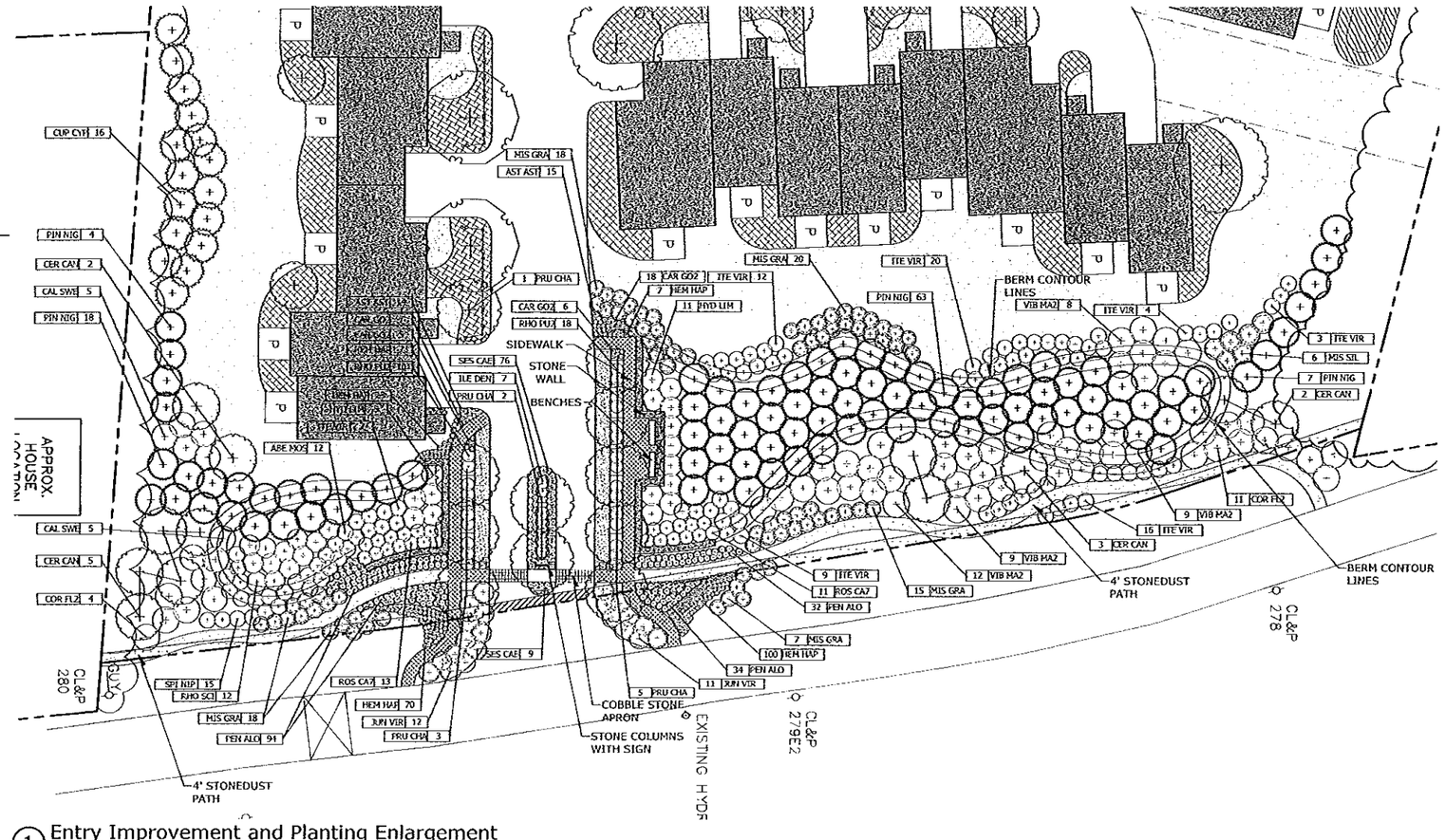
2 Typical Rain Garden
Scale: 1" = 10'

Sample Rain Garden= 1716 SF
Total Site Rain Gardens= 5,148 SF



3 Representational Building Frontage
Scale: 1" = 10'

Sample Planting Bed= 405 SF
Total Site Planting Bed= 28,378 SF



1 Entry Improvement and Planting Enlargement
Scale: 1" = 20'

Whispering Glen

73 Meadowbrook Lane
Mansfield, CT

LANDSCAPE
KENT+ FROST
ARCHITECTURE
1 HIGH STREET
MYSTIC, CT 06355
860.572.0784
f860.572.7047

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION
CHAIRMAN OR SECRETARY — DATE
APPROVED BY THE INSPECTOR OF PUBLIC WORKS
INSPECTOR — DATE
APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY
AUTHORIZED OFFICIAL — DATE

NOTE:
ALL FENCING SHALL BE WHITE VINYL, 4' HIGH, WITH VARIED STYLES (PICKET, SLAT, SOLID)

STATE OF CONNECTICUT — JOHN D. KENT — REGISTERED LANDSCAPE ARCHITECT

NOT ISSUED FOR CONSTRUCTION

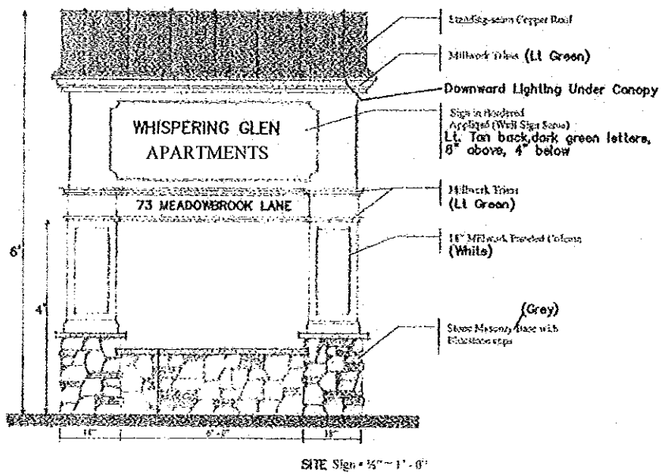
Revisions	Date
1 Staff Comments	5.5.09
2 New Configuration	7.17.09
3 P & Z Revision	9.23.09 & 6.28.12

0 10 20 30 40

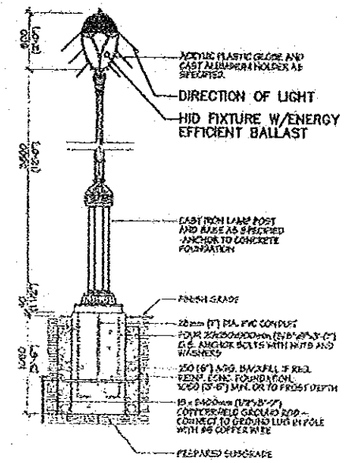
Planting Plan

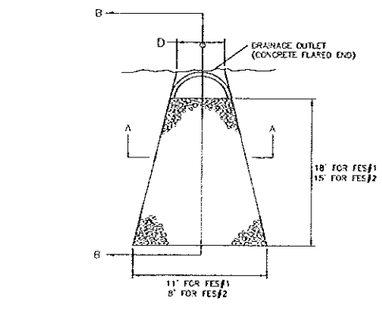
Scale	1" = 30'
Date	20 January 2012
K+F Project No.	2011013
Drawing No.	

Sheet 9 of 11

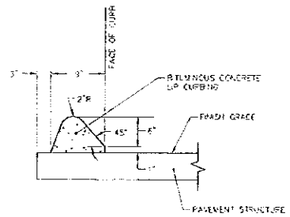


SITE Sign • ½" = 1'-0"



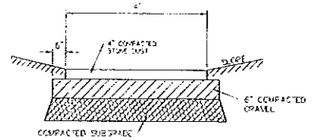


RIP RAP APRON
NOT TO SCALE

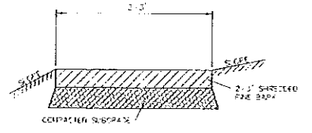


CURB NOTES:
1. SURFACE ON WHICH CURBING IS PLACED SHALL BE CLEAN AND AN APPROVED TACK COAT SHALL BE APPLIED JUST PRIOR TO PLACING CURB.
2. CURBING MAY BE PLACED ON BITUMINOUS BASE COURSE IF APPROVED BY THE ENGINEER.

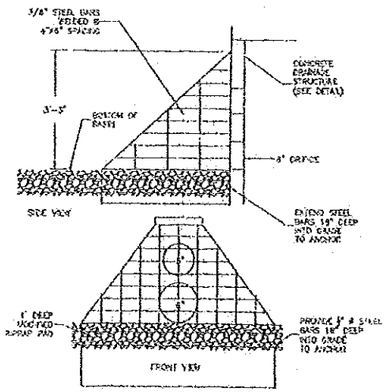
BIT. CONC. LIP CURBING
NOT TO SCALE



STONE DUST PATH
NOT TO SCALE
NOTE: NO TREES NEED OR ARE TO BE REMOVED

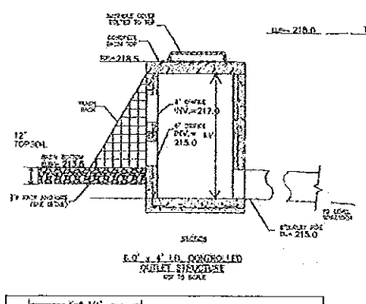


WOODS PATH
NOT TO SCALE
NOTE: NO TREES NEED OR ARE TO BE REMOVED
1. REMOVE (RAKE) FOREST UTTER FROM FIELD MARKED ESTABLISHED FOOT PATH
2. COMPACT FOOT PATH SOIL W/VIBRATORY COMPACTOR, ADDING AS NEEDED TO THE UP-SLOPE SIDE.
3. PLACE 2-3" OF SHREDDED PINE BARK AND LIGHTLY COMPACT.



TRASH RACK DETAIL (TYP)
NOT TO SCALE

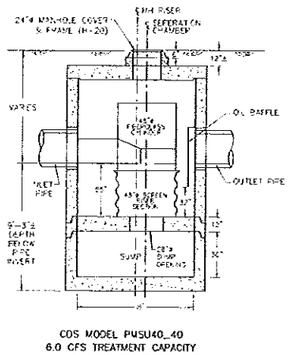
NOTES:
1.) BARS SHALL BE NON-GALVANIZED CORROSION-PROOF.
2.) ANCHOR RACK TO STRUCTURE TO PREVENT SHIFT OR VIBRATION.



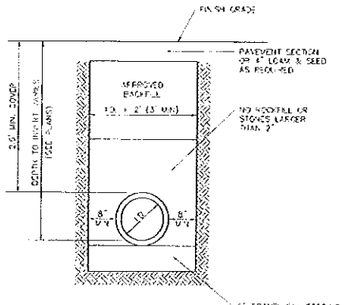
8.0' x 4' I.D. CONCRETE OUTLET STRUCTURE
NOT TO SCALE

PRECAST CATCH BASIN
NOT TO SCALE

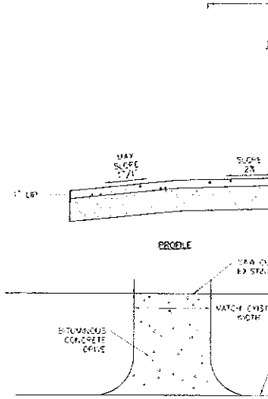
PERMANENT PAVEMENT REPAIR
NOT TO SCALE



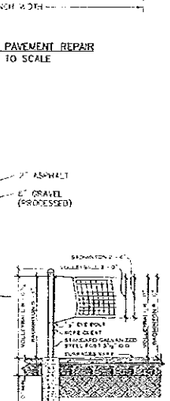
COS MODEL PUSU40_40
6.0 CFS TREATMENT CAPACITY
STORM WATER TREATMENT UNIT
NOT TO SCALE



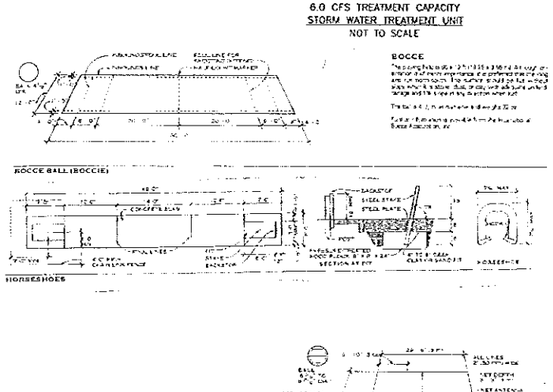
STORM DRAIN TRENCH
NOT TO SCALE

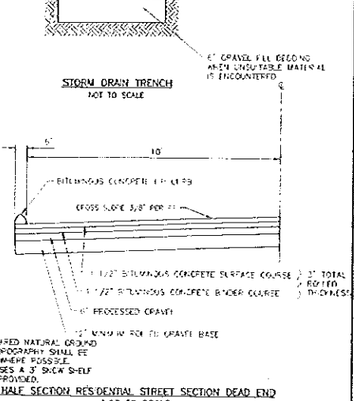


PAVED APRON DETAIL
NOT TO SCALE



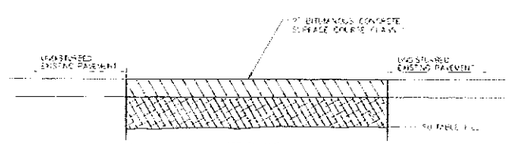
VOLLEYBALL AND BADMINTON NET AND POST



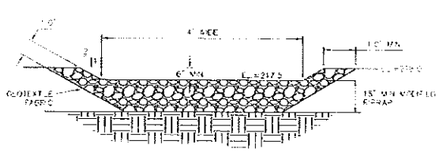


NOTE:
WHERE REQUIRED NATURAL GROUND COVER & TOPOGRAPHY SHALL BE PRESERVED WHERE POSSIBLE.
**IN ALL CASES A 3' SNOW SHELF MUST BE PROVIDED.

HALF SECTION RES.DENTIAL STREET SECTION DEAD END
NOT TO SCALE
(TOWN OF MANSFIELD DEPT OF PUBLIC WORKS JAN. 1983)



TEMPORARY PAVEMENT REPAIR
NOT TO SCALE



SPILLWAY SECTION
NOT TO SCALE

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

SECRETARY OR CHAIRMAN _____ DATE _____

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR _____ DATE _____

APPROVED BY THE MANSFIELD INLAND WETLANDS AGENCY

SECRETARY OR CHAIRMAN _____ DATE _____

DATE	REVISION

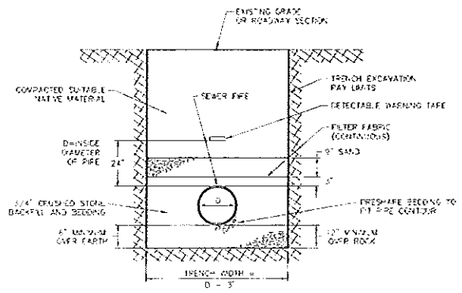
SITE DETAILS

WHISPERING GLEN
73 MEADOWBROOK LANE
MANSFIELD, CONNECTICUT

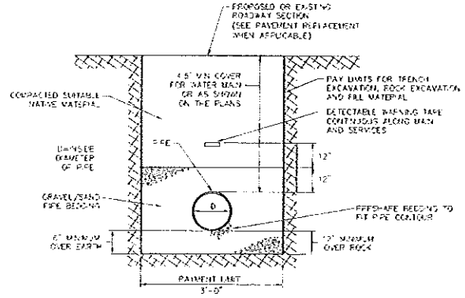
PREPARED FOR
LAKEWAY FARMS, L.P.
2 BIRCH STREET
LEDYARD, CT 06339

DATE: DECEMBER 2011
DRAWN BY: -
SCALE: AS NOTED
SHEET NO. 10 of 11
DRAWING NO. -

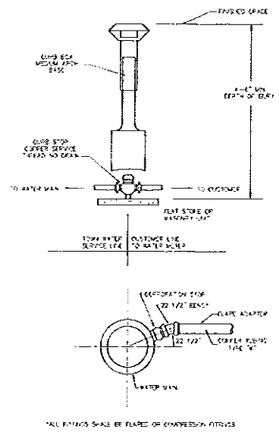
RS Development Solutions, L.L.C.
A Technical Services Company
33 East Town St., Norwich, Connecticut
Phone:(860)204-0248 ~ Fax:(860)204-0252



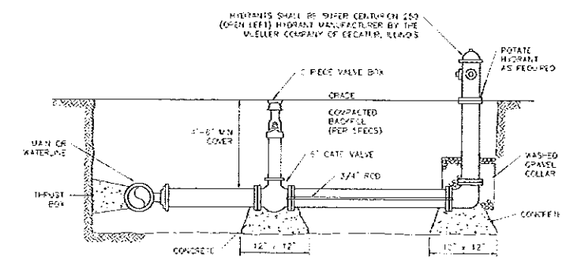
SANITARY SEWER TRENCH DETAIL
NOT TO SCALE



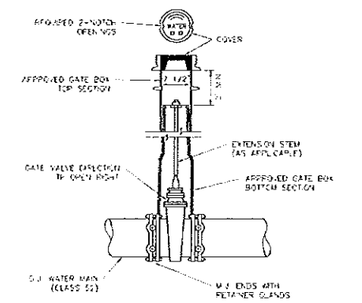
WATER MAIN AND SERVICE TRENCH DETAIL
NOT TO SCALE



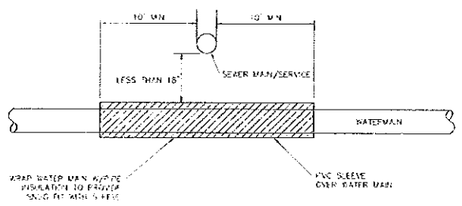
WATER SERVICE CONNECTION DETAIL
NOT TO SCALE



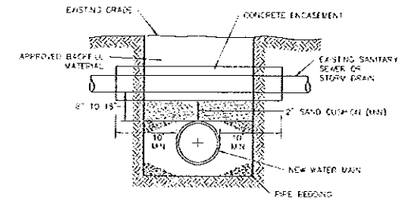
FIRE HYDRANT ASSEMBLY
NOT TO SCALE



12" OR LESS VERTICAL GATE VALVE AND GATE BOX (OPEN LEFT)
NOT TO SCALE

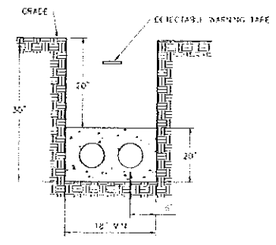


WATER SEWER CROSSING
NOT TO SCALE

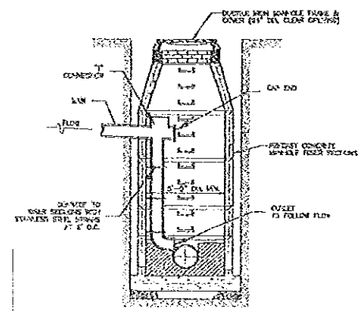


NOTES:
1. WHERE VERTICAL SEPERATION BETWEEN THE WATER MAIN AND SANITARY SEWERS OR STORM DRAINS IS 18" OR LESS A 6" ENCASEMENT IS REQUIRED FOR A DISTANCE OF TEN FEET ON EACH SIDE OF THE CROSSING.
2. A FULL LENGTH OF WATER MAIN SHALL BE CENTERED AT ALL SANITARY SEWER AND STORM DRAIN CROSSINGS.

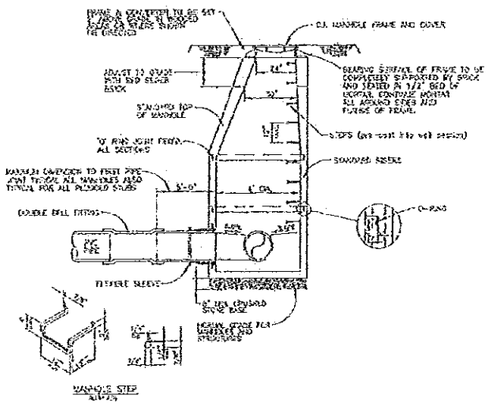
CONCRETE ENCASEMENT DETAIL
NOT TO SCALE



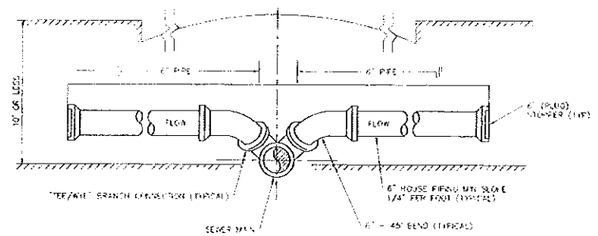
TYPICAL 2" CONDUIT DUCT BANK
NOT TO SCALE



DROP MANHOLE DETAIL
NOT TO SCALE



SANITARY SEWER MANHOLE
NOT TO SCALE



ELEVATION

GRAVITY SERVICE CONNECTION DETAIL
NOT TO SCALE

APPROVED BY THE MANSFIELD PLANNING & ZONING COMMISSION

SECRETARY OR CHAIRMAN _____ DATE _____

APPROVED BY THE DIRECTOR OF PUBLIC WORKS

DIRECTOR _____ DATE _____

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