

2998 ROCKY RIVER RD

6/6/2007

duponbj

Groundwater and Wastewater Services File Imaging Project
May 2007
Barcode Font = IDAutomationHC39M

APPLICATION FOR AN IMPROVEMENT PERMIT

HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION
1200 BLYTHE BOULEVARD
CHARLOTTE, NC 28203
PHONE (704) 376-4603

Mecklenburg County services are available without regard to ethnic origin, sex, or disability.

(OFFICE USE ONLY)

FILE: 5887A

TC: 10511101 PO

SERIAL: № 19843 ☐ L ☐ CRT

JOB LOCATION

① ADDRESS: ROCKY RIVER ROAD (STREET NO. / STREET) ② FILE: 5887A

③ JURISDICTION: ④ TAX PARCEL NO.: 10511101 PO

⑤ SUBDIVISION: ⑥ LOT: ⑦ BLOCK:

OWNER

⑧ NAME: CITY OF CHARLOTTE - PARKS & RECREATION DEPT (FIRST / MIDDLE / LAST)

⑨ MAILING ADDRESS: 310 N. Kings Dr.

⑩ CITY: Charlotte ⑪ STATE: NC ⑫ ZIP: 28204

⑬ PHONE: (WORK) 336-2464 ⑭ (HOME)

REQUEST

This request is for a(n):

⑮ ☒ New permit

⑯ ☐ Repair or alteration permit

⑰ ☐ Authorization for mobile home exchange

⑱ ☐ Other (specify)

DESIGN CRITERIA

System will serve:

⑲ ☐ Residence ⑳ ☐ Mobile home

㉑ ☒ Business or (place of public assembly)

㉒ Number of bedrooms?

㉕ Type? EQUESTRIAN CENTER

㉓ Maximum occupancy?

㉖ Maximum number of employees?

㉔ Basement? ☐ yes ☐ no

㉗ Maximum number of seats?

WATER SUPPLY

㉘ Water supply from (present or proposed):

A ☒ Individual well

B ☐ Municipal system

C ☐ Community well

D ☐ Community system

㉙ The undersigned, owner of the property described above as the "JOB LOCATION" has read the foregoing application, acknowledges that the contents of same are true, and authorizes agents of the MECKLENBURG COUNTY HEALTH DEPARTMENT to enter onto the property for the purpose of processing this request.

Signed: Steven S. Wilson

Date: 6/15/90

IMPROVEMENT PERMIT

The undersigned, an authorized agent of the MECKLENBURG COUNTY HEALTH DEPARTMENT, certifies that the Department has approved the Request for the Job Location contained in this document. This approval is granted in accordance with the provisions of Laws And Rules For Sanitary Sewage Collection, Treatment And Disposal in effect at the time of issuance of the permit and is subject to the following provisions:

... No work shall be conducted on the septic tank system until an Installation, Construction, Alteration and/or Repair permit is issued by this Department.

... This permit is not transferable, and shall become null and void 36 months from the date of issuance.

Environmentalist / Date

Director or Authorized Section Head / Date

*This permit must be signed by the Director of Mecklenburg County Health Department or an authorized section head in order to be valid.

MECKLENBURG COUNTY HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION

CHARGE SLIP

Date: 6-15-90

Name/Company: DPR Associates

MECKLENBURG COUNTY
HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION
PAID
JUN 15 1990

Sanitation _____

Vector Control _____

O.P.W.D. ✓

Service: 310 N. Kings Dr
Charlotte
Hazardous Emergency Response
536-8467
FG 5887A

Fee: $ 200.00

Ck # 5188
$200.00

NOTICE:

A processing fee of $15.00 will be charged for all returned checks in accordance with N.C. General Statute 25-3-512.

Completed by

Collected by

MECKLENBURG COUNTY HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION

CHARGE SLIP

Date: 6-19-90

Name/Company: OPA Assoc.

2036 East 7th St.

Sanitation City 28204

Vector Control _____

O.P.W.D. ✓

Service: Soil Investigation

File 5881A

Fee: $40.00

NOTICE:

A processing fee of $15.00 will be charged for all returned checks in accordance with N.C. General Statute 25-3-512.

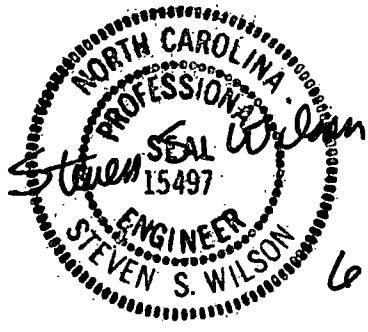
W.R. Marks
Completed by

W.R. Marks
Collected by

REEDY CREEK PARK

EQUESTRIAN CENTER

GROUND ABSORPTION SEWAGE DISPOSAL SYSTEM



6/15/90

SECTION 2L - GROUND ABSORPTION DISPOSAL SYSTEM

1. General:

A. Subcontractor shall have knowledge of the requirements relative to sewer line construction and testing of the local and state authorities.

B. Materials and construction of septic systems shall follow the specifications cited in the laws and rules for ground absorption sewage disposal systems, sections, section 1900 of the North Carolina Administrative Code, Title 110, Dept. of Human Resources, Chapter 10, Health Services; Environmental Health, Subchapter 10A sanitation. This reference is available through local environmental health departments.

2. Material:

A. Pipe
   1. 4" Schedule 40 PVC pipe, ASTM D-3034
   2. 6" Schedule 40 PVC pipe, ASTM D-3034
   3. 4" Diameter corrugated plastic tubing- see Paragraph 4C

B. Tanks (specifications - see Paragraph 3A, 3B)

   3. 1000 gal. septic tank (1) (Equestrian Center)

C. Additional Materials
   1. Distribution Box - size per Environmental Health Dept. specifications.
   2. Drop Boxes (As required)
   3. Clean Outs - Place 50' o.c. maximum for 4" PVC piping and 100' o.c. maximum for 6" PVC piping.
   4. Siphon Pump for 50 gpm at 13 ft. head.

3. Execution:

1. Permits:

a. An Improvements Permit shall be required before a ground absorption or a nonground absorption sewage treatment and disposal system is initially installed to serve a residence, place of business, or place of public assembly and before subsequent additions thereto which increase sewage flow and any repairs or renovations to a sewage treatment and disposal system.

b. No person shall construct, install, repair, or renovate, or cause to be constructed, installed, repaired, or renovated any ground absorption sewage treatment and disposal system without first having obtained an Improvements Permit from the local Health Department. The local Health Department shall issue an Improvements Permit only after it has determined that the system is designed and can be installed so as to meet the provisions of these rules. An Improvement Permit shall be valid for 36 months from the date of issue. If the installation has not been completed during that time period, the information submitted in the application for an Improvements Permit is falsified or changed, or the site is altered, the permit shall become invalid. When an Improvements Permit has become invalid, the installation shall not be commenced or completed until a new Improvements Permit has been obtained.

c. Application for an Improvements Permit shall be submitted to the local Health Department. The application shall contain at least the following information: name of Owner, mailing address, location of property, plat of property (if not readily available to local Health Dept.), type of facility, estimated sewage flow based on number of bedrooms or number of persons served, type of water supply, and signature of Owner or authorized agent.

d. Any person other than the Owner or controller of a residence, place of business, or place of public assembly, who engages in the business of constructing, installing, or repairing sewage treatment and disposal systems, or the collection, hauling, and disposal of septage from septic tanks shall register with the local Health Dept. in each county where he operates before constructing, installing, or repairing sewage treatment and disposal systems, or collecting and disposing of septage from septic tanks.

2. <u>Location of ground absorption systems:</u>

a. Nitrification line may be installed in fill ground where at least one (1') foot of naturally occurring soil is present with suitable or provisionally suitable soil characteristics with respect to texture, structure, and drainage as required by these rules and is specifically approved by the state and local Health Dept. Areal fill must be installed such that there is a

minimum separation of two (2') feet between the trench bottom and any soil horizon with unsuitable soil characteristics. In such areal fill sites, the soil used for fill and the areal extent of fill shall be approved by the local Health Dept. before placement and shall have such soil texture to be classified as sand, loamy sand, loam, or sandy loam. There shall be a mix of the fill soil and the original soil at the interface of the two soils.

b. Septic tank systems shall not be located under paved areas or driveways. Cast iron or other suitable pipe may be permitted to convey the effluent under a driveway or other paved area.

3.A. Septic Tank Construction:

a. A septic tank shall be watertight, structurally sound, and not subject to excessive corrosion or decay. Septic tanks shall be of two-compartment design. The inlet compartment of a two-compartment tank shall be between two-thirds and three-fourths of the total tank capacity. A properly designed dosing syphon or pump shall be used for discharging sewage effluent into nitrification lines when the total length of such lines exceeds 750 linear feet in a single system. Discharges from syphon systems shall be of such design so as to fill the nitrification lines from 66% to 75% of their capacity at each discharge or as required for pressure distribution systems. Discharges from pump systems shall be designed to maximize the distribution of the effluent throughout the system. Septic tanks installed where the top will be deeper than 30 inches below the finished grade shall have an access manhole, with cover, extending to within 12 inches of the finished grade, having a minimum opening adequate to accommodate the installation or removal of the septic tank lid. Pump or dosing chambers shall have an access manhole having a minimum diameter of 30 inches extending a minimum of six (6") inches above the finished grade. Syphon dosing chambers shall be designed in accordance with the minimum dose requirements in this rule. Effluent pump chambers shall meet the construction requirements of this section and shall have a minimum liquid capacity equivalent to the septic tank liquid

capacity required in this rule. All effluent pump chambers shall have a properly functioning high-water alarm installed independent of the electrical circuit for the pump.

3.B. Prefabricated Tanks:

When prefabricated concrete tanks or tanks of other material are used, they shall be constructed in accordance with the plans which have been approved by the State Department of Human resources and shall comply with all requirements of this section. Three (3) complete sets of plans and specifications for the design of the prefabricated septic tank shall be submitted to the Environmental Health Section, Division of Health Services, P.O. Box 2091, Raleigh, N.C. 27602-2091. These plans and specifications shall show the design of the septic tank in detail, including:

(1) All pertinent dimensions;
(2) Reinforcement material;
(3) Material strength;
(4) Liquid depth;
(5) Cleanout provisions;
(6) Other design features.

4. Construction Criteria for Sewage Systems:

a. In calculating the number of square feet of area needed for the nitrification field in trench system, the maximum trench width used in the calculations shall be 36 inches. Trenches shall be located not less than three (3) times the trench width on centers with a minimum spacing of five (5') feet on centers.

b. The pipe used between the septic tank and the nitrification field shall be a minimum of four-inch (4") inside diameter schedule 40 PVC or equivalent with a minimum fall of not less than one-eighth inch per foot. All joints shall be of watertight construction.

c. When four (4") or six (6") inch diameter corrugated plastic tubing is used for nitrification lines, it shall be certified as complying with applicable ASTM standards. The corrugated tubing shall have three rows of holes, each hole between one-half inch and three-fourths

inch in diameter, and spaced longitudinally approximately four (4") inches on centers. The rows of holes may be equally spaced 120 degrees on centers around the periphery, or three rows may be located in the lower portion of the tubing, the outside rows being approximately on 120-degrees centers.

d. Nitrification trenches shall be constructed as level as possible but in no case shall the fall in a single trench bottom exceed one-fourth inch in 10 feet as determined by an engineer's level. The nitrification trench shall not exceed a width of three feet and a depth of three feet, except as approved by the local health department.

e. Rock used in soil absorption systems shall be clean, washed gravel or crushed stone and graded or sized between three-fourths inch to two and one-half inches. The rock shall be placed a minimum of one foot deep with at least six inches below the pipe and two inches over the pipe and distributed uniformly across the trench bottom and over the pipe.

f. The soil cover over the nitrification field shall be to a depth of at least six (6") inches. The finished grade over the nitrification field shall be fine graded and seeded to prevent the ponding of surface water and run-off of surface water shall be diverted away from the nitrification field.

g. Effluent distribution devices, including distribution boxes, flow dividers, and flow diversion devices, shall be of sound construction, watertight, not subject to excessive corrosion, and of adequate design as approved by the local Health Dept. Effluent distribution devices shall be separated from the septic tank and nitrification lines by a minimum of two feet of undisturbed or compacted soil and shall be placed level on a solid foundation of soil or concrete to prevent differential settlement of the device.

h. Stepdowns or drop boxes may be used where topography prohibits the placement of nitrification trenches on level grade. Stepdowns shall be constructed of two feet of undisturbed soil and constructed to a height level with the top of the

upper nitrification line. Drop boxes shall be constructed so that the inlet supply pipe is one inch above the invert of the outlet supply pipe which is connected to the next lower drop box. The top of the trench outlet laterals, which allow effluent to move to the nitrification lines, shall be two inches below the invert of the outlet supply line. Drop boxes shall be designed to close off the trench outlets to provide for periods of resting when the nitrification trench becomes saturated.

DPR ASSOCIATES, INC.
Landscape Architects
Planners & Engineers
2036 East Seventh Street
Charlotte, NC 28204
704/332-1204

JOB REEDY CREEK PARK
SHEET NO. 1 OF 1
CALCULATED BY SSW DATE 6/14/90
CHECKED BY DATE
SCALE

SEPTIC SYSTEM FOR EQUESTRIAN PARK

CALCULATION OF DAILY FLOW

2 HORSE WASHES

SAY FLOW = 2 gm
TIME = 2½ min / HORSE
30 HORSES / DAY

DAILY FLOW = 2 gpm X 2½ min X 30 = 150 gpd

TOILET FACILITIES

SAY 4 TOILETS @ 75 gpd = 300 gpd

TOT = 450 gpd

TANK DESIGN

V = 2Q = 2(450) = 900 GAL → SAY 1000 gal TANK

NITRIFICATION LINES

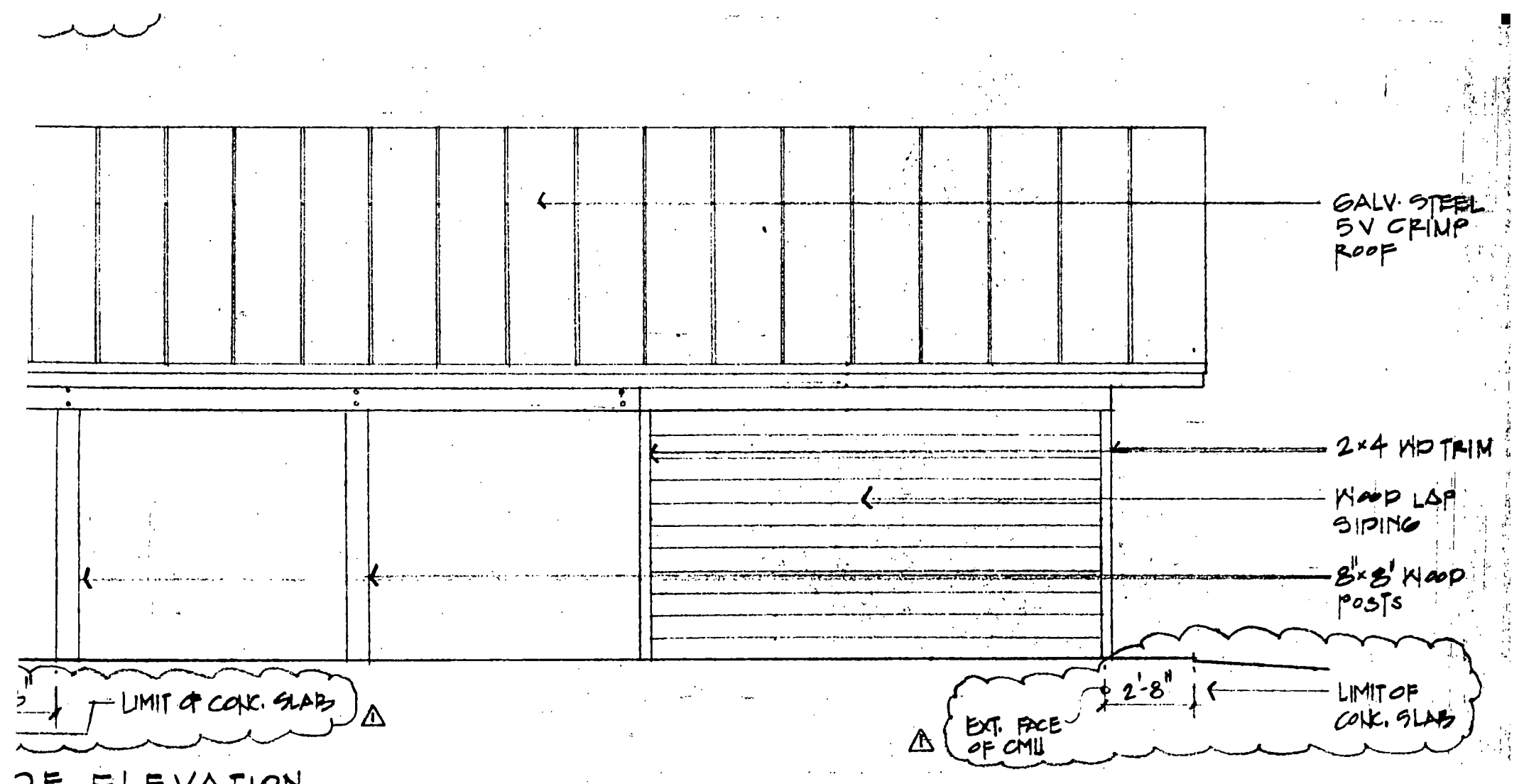
APPLICATION RATE = 0.3 gpd/SF - PER BILL MARLIN OF DEPT ENV HEALTH

TRENCH DIMENSION = 3 SF/LF

REQ'D AREA: A_r = 450 gpd / .3 gpd/SF = 1500 SF

LF = AR/3 = 1500/3 = 500'

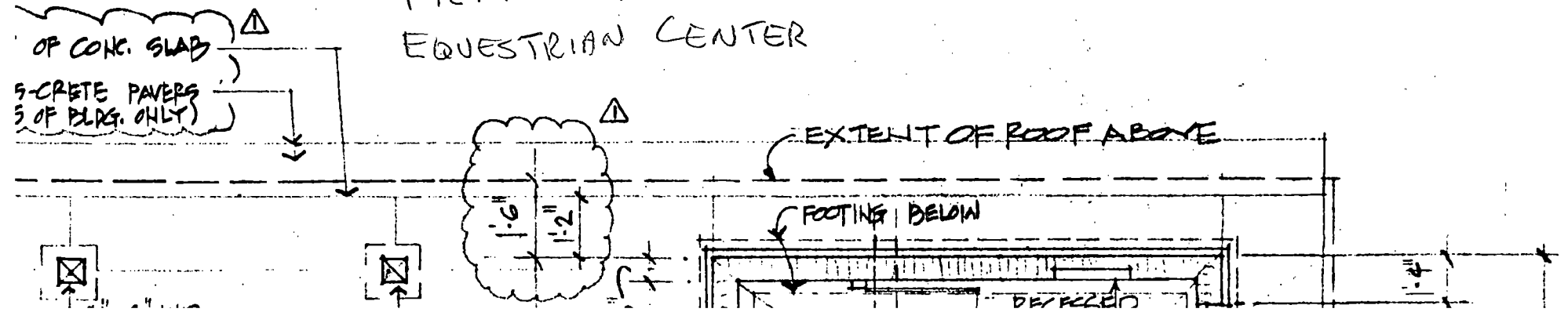
PRODUCT 205-1 NEBS Inc., Groton, Mass. 01471. To Order PHONE TOLL FREE 1-800-225-6380

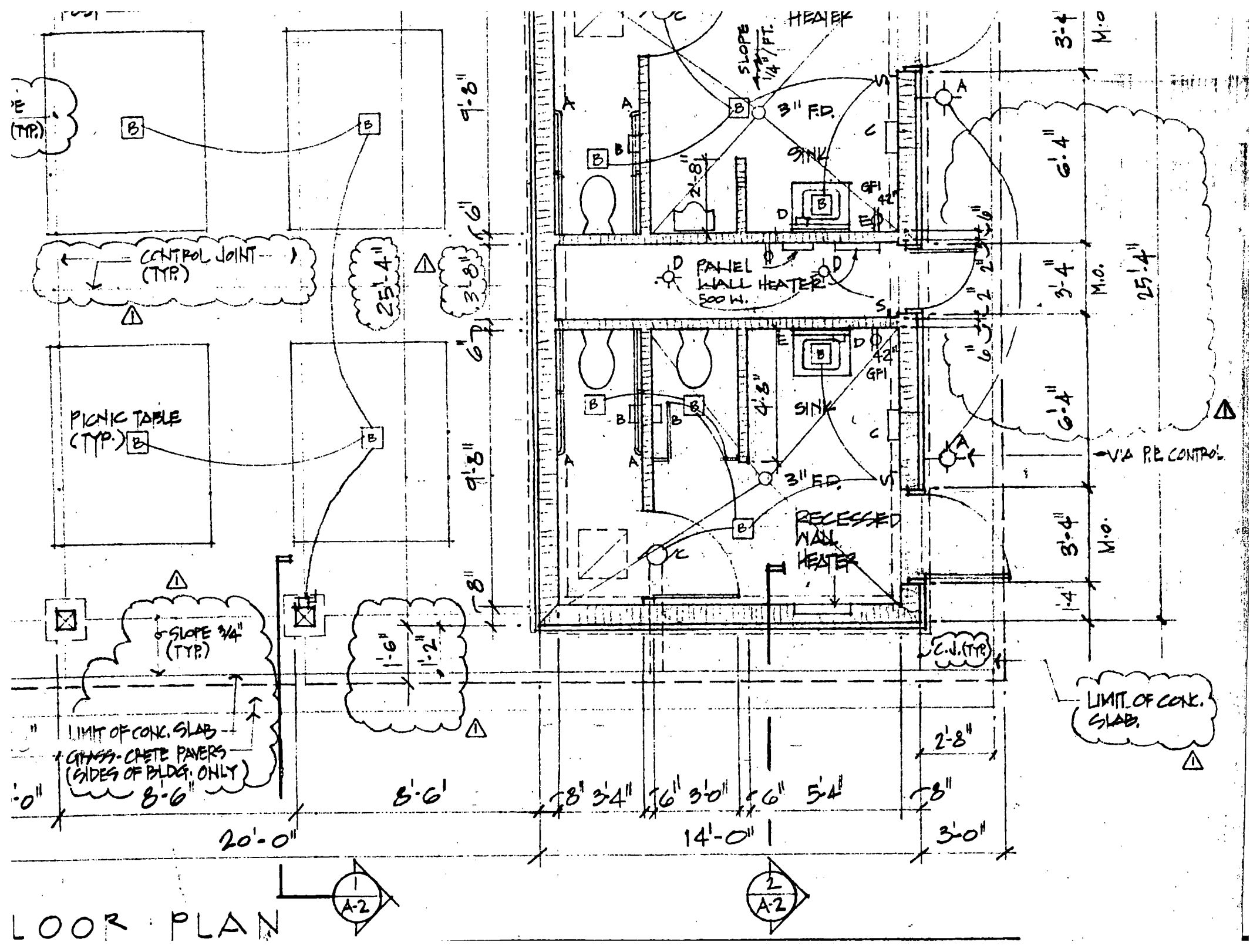


DE ELEVATION

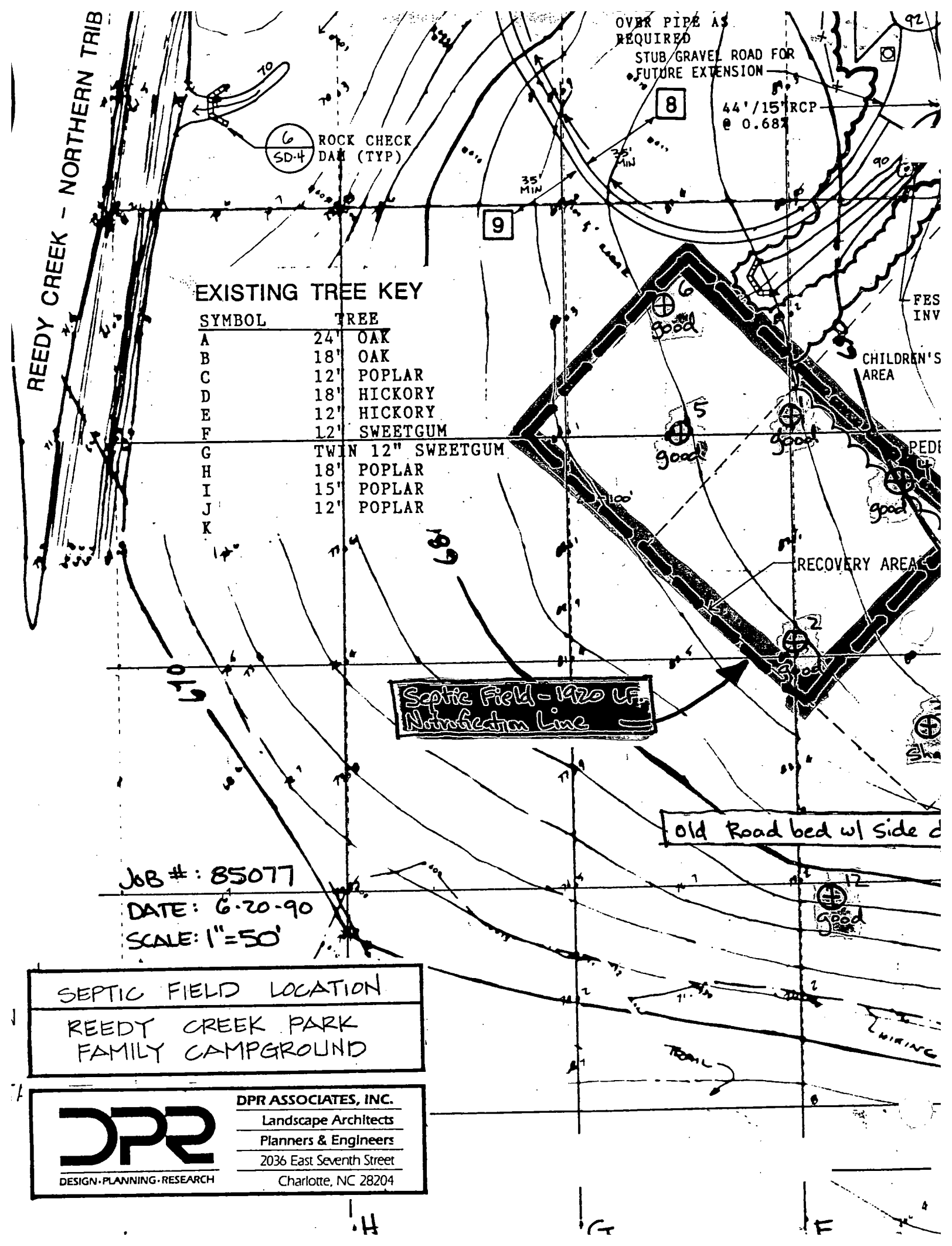
-1'-0"

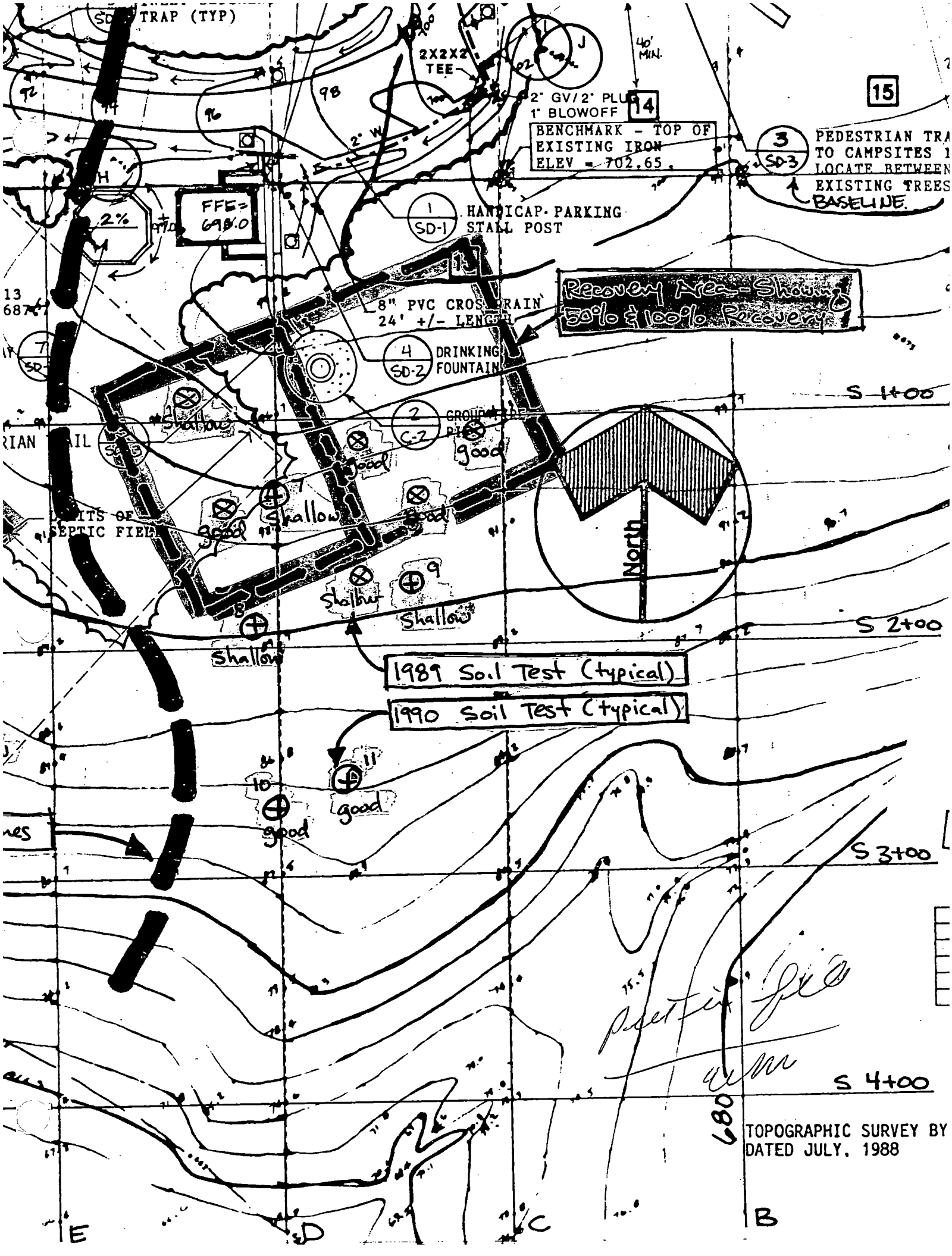
PICNIC SHELTER C
EQUESTRIAN CENTER




CONTROL JOINT (TYP.)
PICNIC TABLE (TYP.)
SLOPE 3/4" (TYP.)
LIMIT OF CONC. SLAB
GRASS-CRETE PAVERS (SIDES OF BLDG. ONLY)
SLOPE 1/4"/FT.
3" F.D.
SINK
GFI
42"
PANEL WALL HEATER 500 W.
RECESSED WALL HEATER
V'A P.E. CONTROL
C.J. (TYP.)
LIMIT OF CONC. SLAB.
M.O.
8'-6"
20'-0"
14'-0"
3'-0"
1
A-2
2
A-2

LOOR PLAN


REEDY CREEK - NORTHERN TRIB
OVER PIPE AS REQUIRED
STUB GRAVEL ROAD FOR FUTURE EXTENSION
44'/15"RCP @ 0.68%
6 SD-4 ROCK CHECK DAM (TYP)
35' MIN
8
9
EXISTING TREE KEY
SYMBOL TREE
A 24" OAK
B 18" OAK
C 12" POPLAR
D 18" HICKORY
E 12" HICKORY
F 12" SWEETGUM
G TWIN 12" SWEETGUM
H 18" POPLAR
I 15" POPLAR
J 12" POPLAR
K
CHILDREN'S AREA
RECOVERY AREA
Septic Field - 1920 LF. Nitrification Line
old Road bed w/ side d
JOB #: 85077
DATE: 6-20-90
SCALE: 1"=50'
SEPTIC FIELD LOCATION
REEDY CREEK PARK FAMILY CAMPGROUND
DPR ASSOCIATES, INC.
Landscape Architects
Planners & Engineers
2036 East Seventh Street
Charlotte, NC 28204
DESIGN · PLANNING · RESEARCH


TRAP (TYP)
2X2X2 TEE
2" GV/2" PLUG
1" BLOWOFF
40' MIN.
14
15
BENCHMARK - TOP OF EXISTING IRON ELEV = 702.65'
3 SD-3
PEDESTRIAN TRA
TO CAMPSITES 1
LOCATE BETWEEN
EXISTING TREES
BASELINE
FFE= 698.0
2%
1 SD-1
HANDICAP PARKING STALL POST
Recovery Area - Showing 50% & 100% Recovery
8" PVC CROSS DRAIN
24' +/- LENGTH
4 SD-2
DRINKING FOUNTAIN
2 C-2
S 1+00
Shallow
good
North
S 2+00
1989 Soil Test (typical)
1990 Soil Test (typical)
S 3+00
S 4+00
TOPOGRAPHIC SURVEY BY
DATED JULY, 1988
E
D
C
B

APPLICATION FOR AN IMPROVEMENT PERMIT

HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION
1200 BLYTHE BOULEVARD
CHARLOTTE, NC 28203
PHONE (704) 376-4603

Mecklenburg County services are available without regard to ethnic origin, sex, or disability.

(OFFICE USE ONLY)

FILE: _____

TC: _____

SERIAL: NC 19419 ☐ L ☐ CRT

JOB LOCATION

① ADDRESS: 2900 Rocky River Road (STREET NO. / STREET) ② FILE: 5462A

③ JURISDICTION: Charlotte ④ TAX PARCEL NO.: 105-111-01

⑤ SUBDIVISION: Reedy Creek Park ⑥ LOT: ----- ⑦ BLOCK: -----

OWNER

⑧ NAME: City of Charlotte (FIRST / MIDDLE / LAST)

⑨ MAILING ADDRESS: 600 E. Trade Street

⑩ CITY: Charlotte ⑪ STATE: NC ⑫ ZIP: 28202

⑬ PHONE: (WORK) (704)336-2241 ⑭ (HOME) _____

REQUEST

This request is for a(n): Need to contact Ray Gleason

⑮ ☒ New permit ⑰ ☐ Authorization for mobile home exchange

⑯ ☐ Repair or alteration permit ⑱ ☐ Other (specify) _____

DESIGN CRITERIA

System will serve:

⑲ ☐ Residence ⑳ ☐ Mobile home ㉑ ☒ Business or place of public assembly

㉒ Number of bedrooms? _____ ㉕ Type? Picnic Shelter

㉓ Maximum occupancy? _____ ㉖ Maximum number of employees? 0

㉔ Basement? ☐ yes ☐ no ㉗ ~~Maximum number of seats?~~ DESIGN FLOW: 430 gal/ day

WATER SUPPLY

㉘ Water supply from (present or proposed):

A ☐ Individual well

B ☐ Municipal system

C ☒ Community well

D ☐ Community system

㉙ The undersigned, owner of the property described above as the "JOB LOCATION" has read the foregoing application, acknowledges that the contents of same are true, and authorizes agents of the MECKLENBURG COUNTY HEALTH DEPARTMENT to enter onto the property for the purpose of processing this request.

Signed: _____

Date: 10-26-89

IMPROVEMENT PERMIT

The undersigned, an authorized agent of the MECKLENBURG COUNTY HEALTH DEPARTMENT, certifies that the Department has approved the Request for the Job Location contained in this document. This approval is granted in accordance with the provisions of Laws And Rules For Sanitary Sewage Collection, Treatment And Disposal in effect at the time of issuance of the permit and is subject to the following provisions:

... No work shall be conducted on the septic tank system until an Installation, Construction, Alteration and/or Repair permit is issued by this Department.

... This permit is not transferable, and shall become null and void 36 months from the date of issuance.

_____ / _____
Environmentalist Date

_____ / _____
Director or Authorized Section Head Date

*This permit must be signed by the Director of Mecklenburg County Health Department or an authorized section head in order to be valid.

INSTRUCTIONS

PLEASE PRINT OR TYPE ALL REQUESTED INFORMATION

ITEM(S) ....INSTRUCTIONS

① .....Indicate location of property for which the request is being made. Give **street number** and street or road name. If you do not know the street number, you must contact the Mecklenburg County Engineering Department to have one assigned.

② .....If a soil investigation has been run, copy the file number from the report. This may appear as Lot, Block or APT numbers on older reports.

③ .....Indicate the jurisdiction in which the property is located. The jurisdiction is assigned by County Engineering.

④ .....Indicate the tax account or parcel number for the property (example 000-000-00). If the property is comprised of a portion of a large tract, precede the parcel number with the letters "PO."

⑤-⑦ .....Indicate the subdivision name and the lot and block numbers in the subdivision if applicable.

⑧-⑭ .....Indicate, in the requested format, the information as it pertains to the person to whom the permit should be issued.

⑮-⑱ .....Indicate the purpose of the request by placing an "X" in the appropriate box.

⑲-㉑ .....Indicate the type structure the system will serve by placing an "X" in the appropriate box.

- Residence means a single or multi-family dwelling (duplex, apartment, hotel, motel) or any other place where people reside.
- Mobile home means a trailer used as a residence that is designed without a permanent foundation and is capable of being moved to another location.
- Business or place of public assembly means non-residential use of buildings such as manufacturing, office space, warehousing operations, place of amusement or recreation, church, fairground, stadium, campground or any other place where people work or assemble.

㉒-㉔ .....If the system will serve a residence or a mobile home, indicate the number of bedrooms, the maximum occupancy of the residence and whether or not the structure will have a basement. When calculating the number of bedrooms include all rooms which are intended to be used as bedrooms or might later be furnished or converted to bedroom use and any additional bedrooms to be constructed in the future.

㉕-㉗ .....If the system will serve a business, indicate the type business, the maximum number of employees and the maximum number of seats to be provided. Include in these figures projections for future expansions.

㉘ .....Indicate the type water supply by placing an "X" in the appropriate box.

- Individual well means a well located on the lot, serving a building occupied by only one family or one business establishment and will not be a public place, a place of public gathering, or business which processes or manufactures any product which is used as, or is used in a food product.
- Municipal system means a water supply furnished by a city, county, town or other governmental authority.
- Community well means a privately owned water system originating from a well source.
- Community system means a privately owned water system originating from a source other than a well.

㉙ .....Once you have completed the application, read the certification statement in the lower, left hand corner. The statement must be signed, dated, and returned to the Department along with a Proposed Plot Plan and a copy of the Engineering Address Record prior to the issuance of any permits. **IN ORDER FOR YOU TO RECEIVE A COPY OF THE COMPLETED PERMIT FOR CONSTRUCTION, ALL COPIES OF THIS FORM MUST BE RETURNED TO THE ADDRESS LISTED ON THE FRONT OF THE APPLICATION.**

Mecklenburg County
Health Department

Basil G. Delta, M.D., M.P.H.
Health Director

July 20th, 1989

City of Charlotte
600 E. Trade Street
Charlotte, NC 28202

RE: Property located at Rocky River Road
FILE: 5887A
PARCEL: 10511101 PO

Dear Sir:

At your request, a field investigation was conducted on the property designated above for the purpose of determining site suitability for the installation of a ground absorption sewage disposal system. The property was found to contain a limited area of soils which were classified as provisionally suitable for such an installation. A copy of the Site Evaluation Report (Serial Number 16253) is enclosed for your information.

Should you desire to file for permission to install a ground absorption sewage disposal system, please submit an Application For An Improvement Permit with an ACCURATELY dimensioned plot plan detailing the location of current and/or proposed buildings, wells and sewage disposal systems to this office. The plan will be reviewed and if it is found that the area of provisionally suitable soils is adequate for the proposed construction, an Improvement Permit will be issued by this Department.

If I may be of assistance, please do not hesitate to contact me.

Very truly yours,

Jim Ericson, R.S., Supervisor
On Premises Waste Disposal & Water Supply

Enclosure

Environmental Health Division
1200 Blythe Boulevard • Charlotte, North Carolina 28203 • (704) 376-4603

MECKLENBURG COUNTY ENVIRONMENTAL HEALTH
SITE EVALUATION REPORT
SERIAL NUMBER 16253

File: 5887A Action 1

Parcel: 10511101 PO ☐ PC

Location: Rocky River Road

Subdivision:

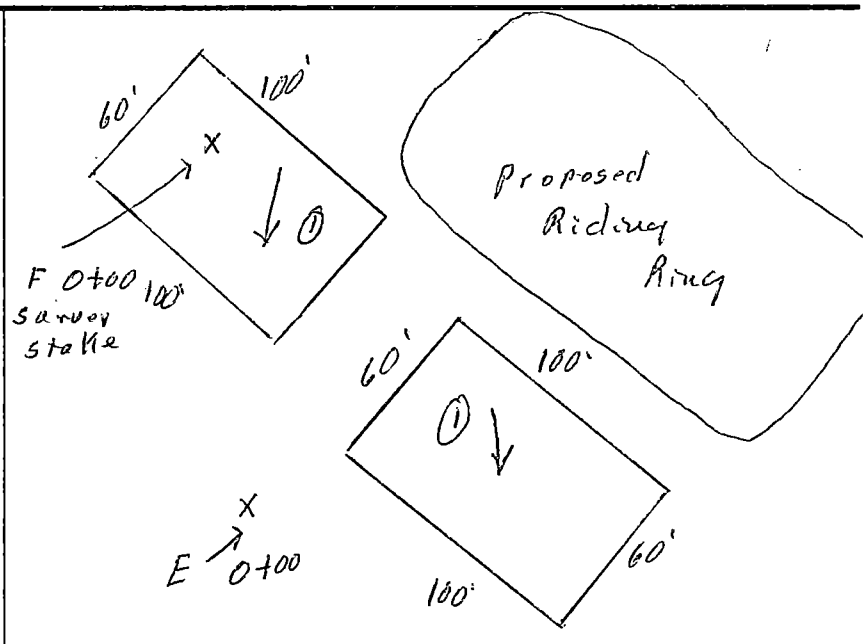
Lot: Block: Acres: Approx .28 ind.

Owner: City of Charlotte
Address: 600 E. Trade Street
Charlotte, NC 28202

Comments: _____

Described by: William A. Mueller

Date: 7-19-89



***** EVALUATION KEY *****

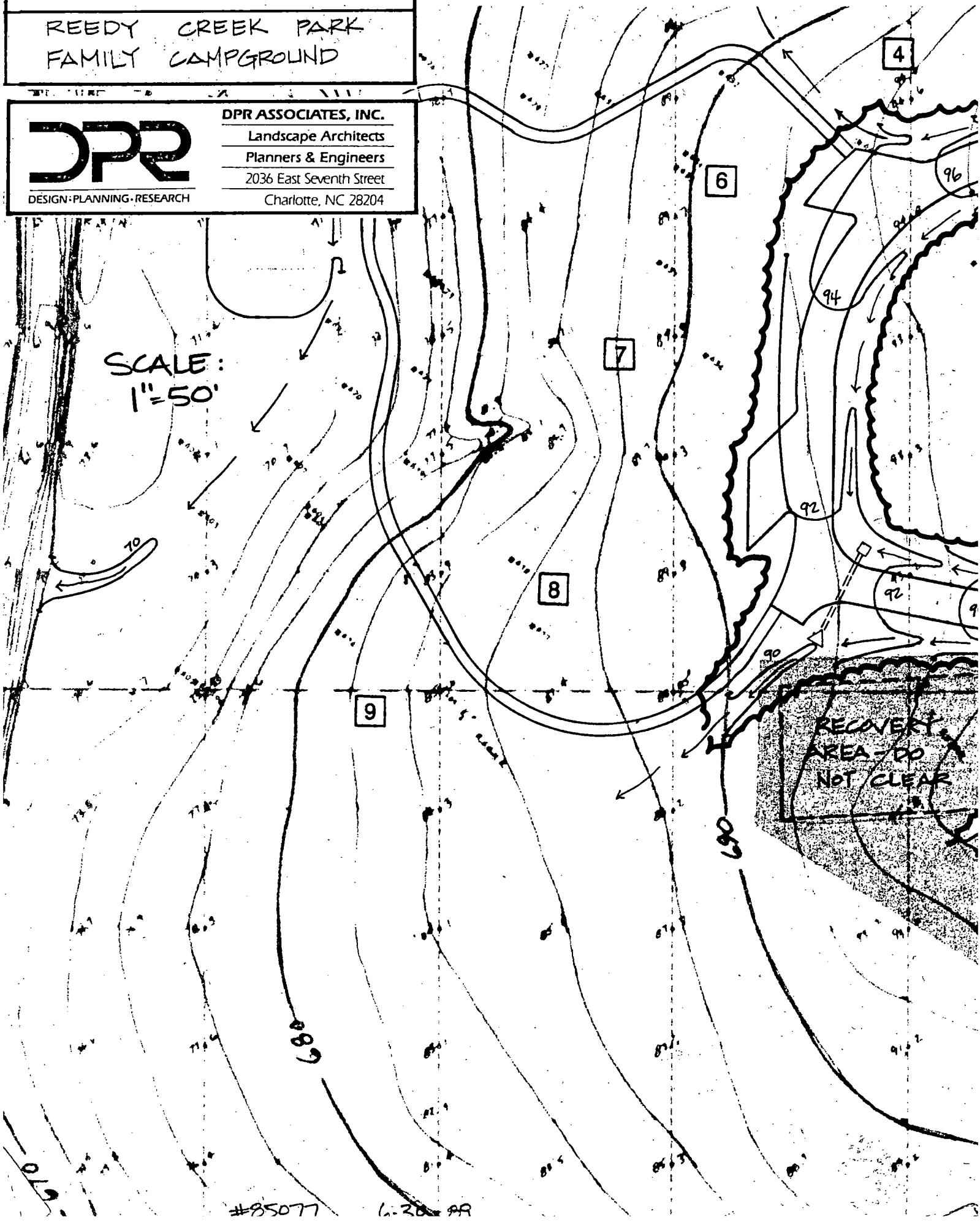
S = Suitable U = Unsuitable
PS = Provisionally Suitable
The "Area Classification" below indicates the suitability of areas in the diagram.

FACTORS	AREA 1	AREA 2	AREA 3	AREA 4	AREA 5	AREA 6
Topography	(S) PS U 2-10%	S PS U	S PS U	S PS U	S PS U	S PS U
Texture	S (PS) U Clay	S PS U	S PS U	S PS U	S PS U	S PS U
Structure	S (PS) U Blocky	S PS U	S PS U	S PS U	S PS U	S PS U
Drainage	S (PS) U 7.36"	S PS U	S PS U	S PS U	S PS U	S PS U
Depth	S (PS) U 36"+	S PS U	S PS U	S PS U	S PS U	S PS U
Restrictive Horizons	S (PS) U 7.36"	S PS U	S PS U	S PS U	S PS U	S PS U
Available Space	S (PS) U	S PS U	S PS U	S PS U	S PS U	S PS U
Other (specify)	S PS U	S PS U	S PS U	S PS U	S PS U	S PS U
Soil Group/Series	10A Cecil-1.40					
Area Classification	S (PS) U	S PS U	S PS U	S PS U	S PS U	S PS U

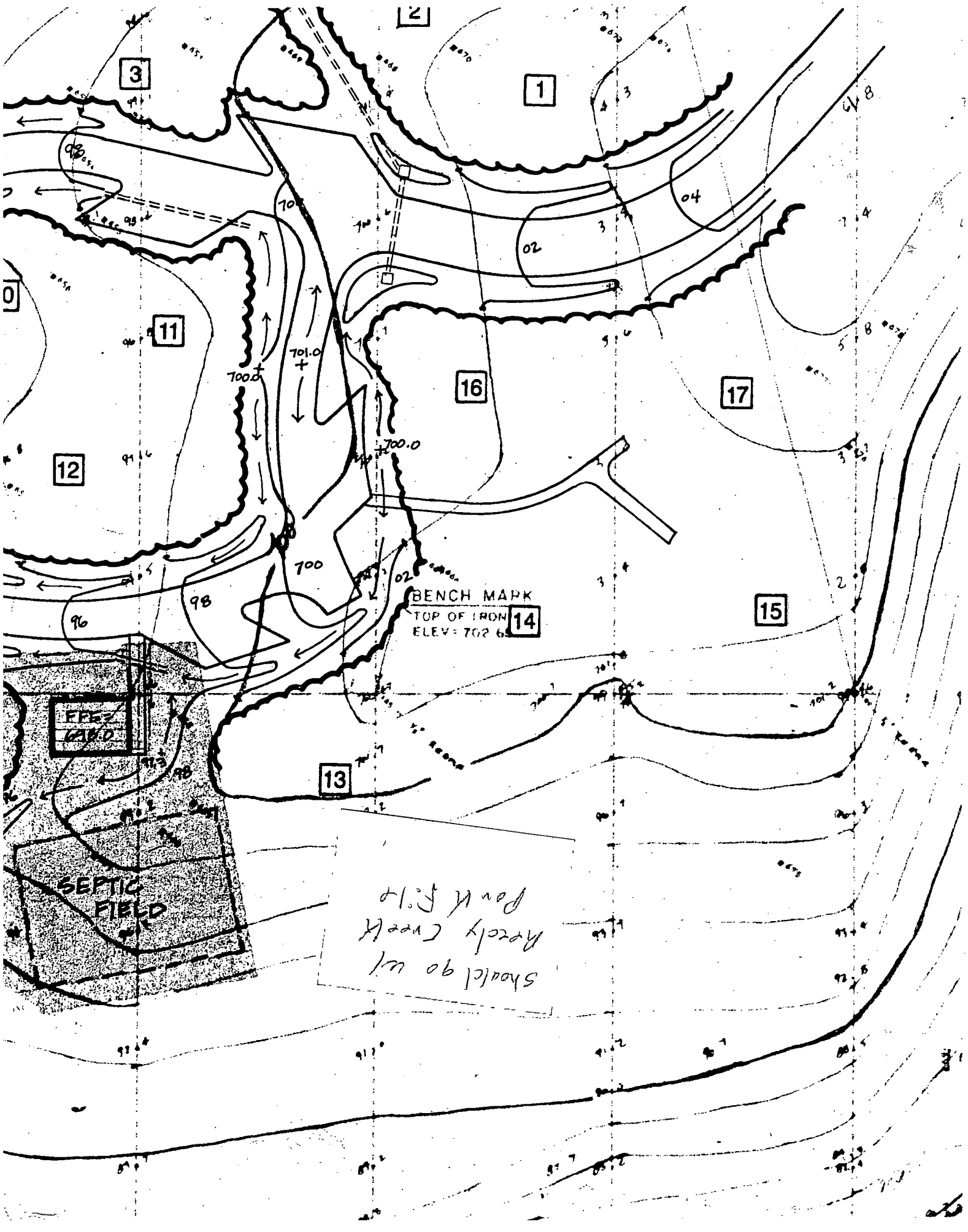
SEPTIC FIELD LOCATION

REEDY CREEK PARK FAMILY CAMPGROUND

DPR ASSOCIATES, INC.
Landscape Architects
Planners & Engineers
2036 East Seventh Street
Charlotte, NC 28204
DESIGN · PLANNING · RESEARCH



#85077 6-30-89


3
1
11
16
17
12
15
14
13
BENCH MARK
TOP OF IRON
ELEV= 702.65
FFE= 699.0
SEPTIC FIELD
700.0
701.0
700
98
96
02
04
Shaded go w/
Rocky Creek
Park Trip

DPR ASSOCIATES, INC.
Landscape Architects
Planners & Engineers
2036 East Seventh Street
Charlotte, NC 28204
704/332-1204

Design · Planning · Research

LETTER OF TRANSMITTAL

DATE	JOB NO.
7-6-89	85077

ATTENTION Bill Marlin

RE: Reedy Creek Park

TO Mecklenburg County Health Dept.

WE ARE SENDING YOU ☒ Attached ☐ Under separate cover via Delivery the following items:

☐ Shop drawings ☐ Prints ☐ Plans ☐ Samples ☐ Specifications
☐ Copy of letter ☐ Change order ☒ Application Fee

COPIES	DATE	NO.	DESCRIPTION
1	7-6-89	#4122	Application Fee of $30.00

THESE ARE TRANSMITTED as checked below:

☐ For approval ☐ Approved as submitted ☐ Resubmit_____copies for approval
☒ For your use ☐ Approved as noted ☐ Submit_____copies for distribution
☒ As requested ☐ Returned for corrections ☐ Return_____corrected prints
☐ For review and comment ☐ _____
☐ FOR BIDS DUE _____ 19_____ ☐ PRINTS RETURNED AFTER LOAN TO US

REMARKS This check goes with the application submitted on 6-26-89.

COPY TO _____

SIGNED: Rob Eggers

PRODUCT 240-3 NEBS Inc., Groton, Mass. 01471.

If enclosures are not as noted, kindly notify us at once.

APPLICATION FOR SOIL INVESTIGATION

HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION
1200 BLYTHE BOULEVARD
CHARLOTTE, NC 28203
PHONE (704) 376-4603

(OFFICE USE ONLY)

FILE: 5887A

TC: _____

☐ PC ☐ REPT

JOB LOCATION

① ADDRESS: SR 2828 - Mecklenburg County

② SUBDIVISION: Reedy Creek Park ③ ~~LOT~~: Equestrian Center Family Campground ④ BLOCK: —

⑤ PARCEL REFERENCE: BOOK NO.: 105 PAGE NO.: 111 PARCEL NO.: 01

⑥ DEED REFERENCE: BOOK NO.: 3811 and 4313 PAGE NO.: 850 and 924

OWNER

⑦ NAME: City of Charlotte
(FIRST) (MIDDLE) (LAST)

⑧ MAILING ADDRESS: 600 E. Trade Street

⑨ CITY: Charlotte ⑩ STATE: NC ⑪ ZIP: 28202

⑫ PHONE: (WORK) 704-336-2241 (HOME) _____

⑬ Accurately diagram and dimension lot.
See attached drawing

⑭ The undersigned, owner of the property described above as the "JOB LOCATION" has read the foregoing application, acknowledges that the contents of same are true, and authorizes agents of the MECKLENBURG COUNTY HEALTH DEPARTMENT to enter onto the property for the purpose of processing this request.

Signed: David P. Brown

Mecklenburg County services are available without regard to ethnic origin, sex, or disability.

Date: 6-29-89

WHITE - HEALTH DEPARTMENT'S COPY • CANARY - ENVIRONMENTALIST'S COPY • PINK - OWNER'S COPY

MECKLENBURG COUNTY HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION

CHARGE SLIP

Date 7/10/89

Name/Company DPR Associates, Inc.

Sanitation _____

Vector Control _____

O.P.W.D. ✓

Service: Soil test
#5887A

MECKLENBURG COUNTY
HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION
PAID
JUL 10 1989

CC#4122
$30.00

Fee: $30 -

Ray Duncan
7/10/89

_____ _____

DPR
DESIGN·PLANNING·RESEARCH

DPR ASSOCIATES, INC.
Landscape Architects
Planners & Engineers
2036 East Seventh Street
Charlotte, NC 28204
704/332-1204

LETTER OF TRANSMITTAL

DATE	JOB NO.
6·26·89	85077
ATTENTION: Bill Marlin	
RE: Reedy Creek Park	

TO Mecklenburg County Health Dept.
Environmental Health Division
Charlotte, NC

WE ARE SENDING YOU ☒ Attached ☐ Under separate cover via Delivery the following items:

☐ Shop drawings ☒ Prints ☐ Plans ☐ Samples ☐ Specifications
☐ Copy of letter ☐ Change order ☒ Application

COPIES	DATE	NO.	DESCRIPTION
1		—	Application for Soil Investigation
1	6·30·89	—	Septic Field Location — Equestrian Center
1	6·30·89	—	Septic Field Location - Family Campground
1	9·16·86	—	Orientation Plan

THESE ARE TRANSMITTED as checked below:

☐ For approval ☐ Approved as submitted ☐ Resubmit_____copies for approval
☒ For your use ☐ Approved as noted ☐ Submit_____copies for distribution
☐ As requested ☐ Returned for corrections ☐ Return_____corrected prints
☐ For review and comment ☐ _____
☐ FOR BIDS DUE _____ 19_____ ☐ PRINTS RETURNED AFTER LOAN TO US

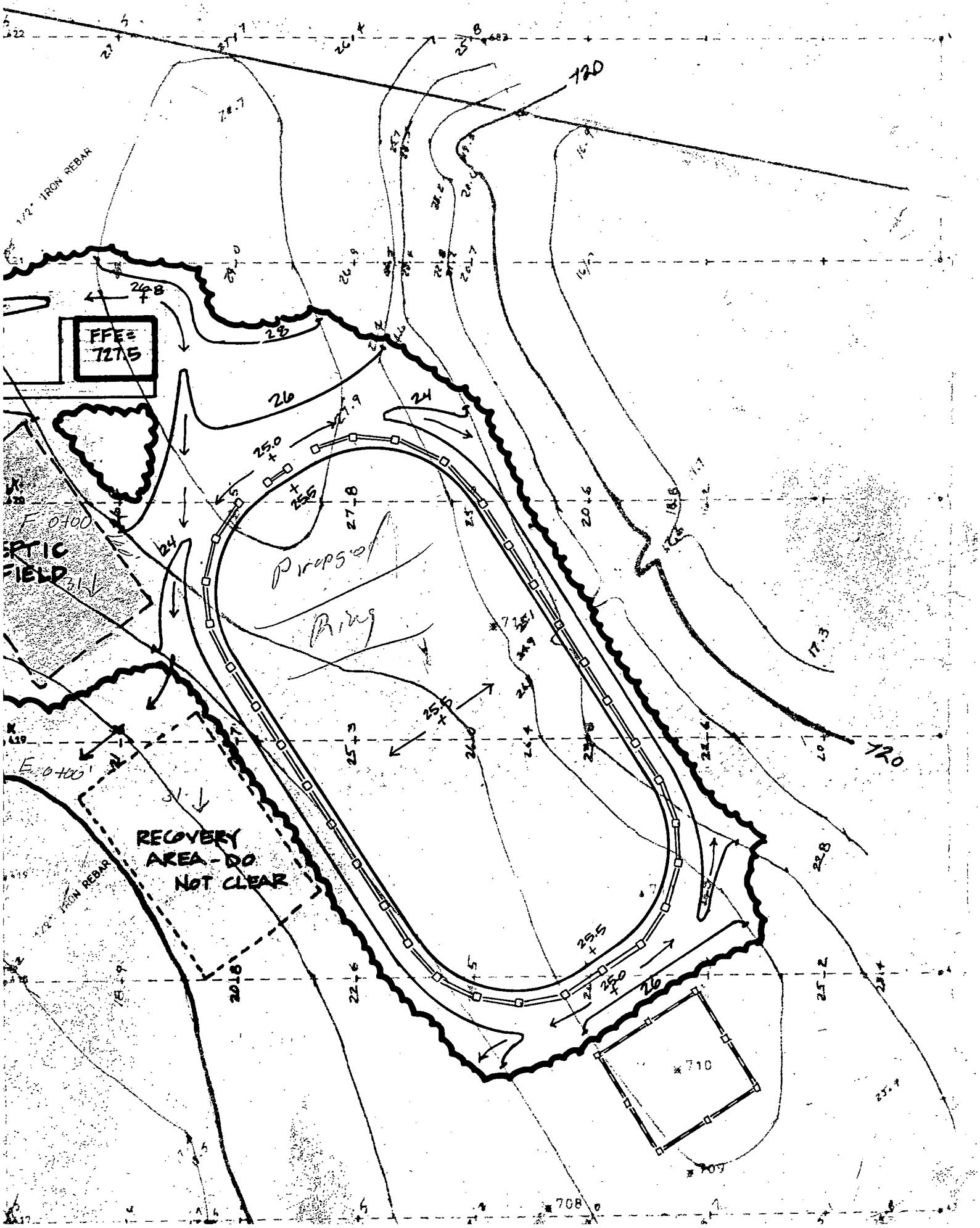
REMARKS Bill — Let me know when you can meet with me to make the soil investigations.

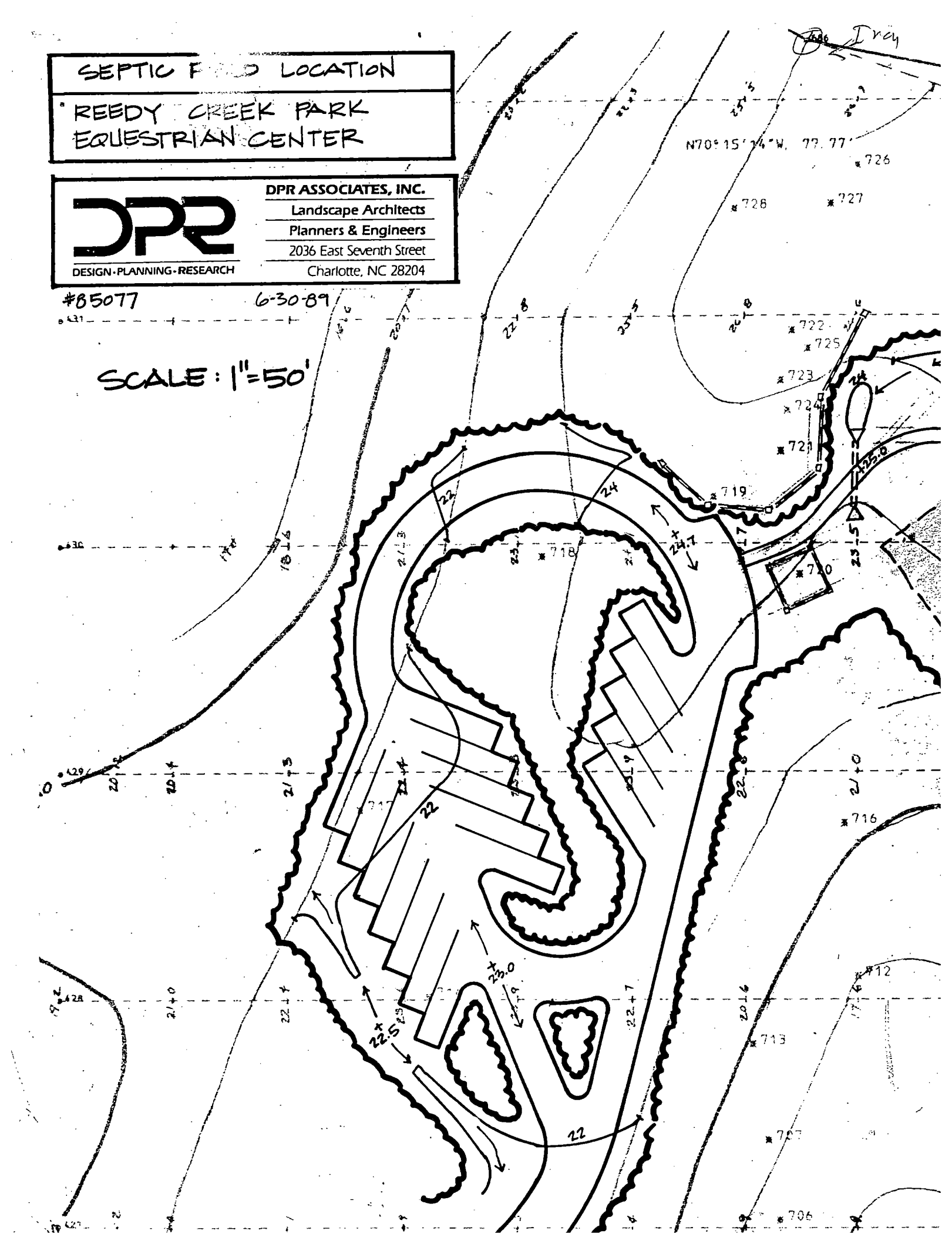
COPY TO _____

SIGNED: Rob Eggers

PRODUCT 240-3 NEBS Inc., Groton, Mass. 01471.

If enclosures are not as noted, kindly notify us at once.


1/2" IRON REBAR
FFE= 727.5
RECOVERY AREA - DO NOT CLEAR
Proposed Ring
120
710
708.0


SEPTIC FIELD LOCATION
REEDY CREEK PARK
EQUESTRIAN CENTER
DPR
DESIGN · PLANNING · RESEARCH
DPR ASSOCIATES, INC.
Landscape Architects
Planners & Engineers
2036 East Seventh Street
Charlotte, NC 28204
#85077
6-30-89
SCALE: 1"=50'
N70° 15' 14" W, 77.77'
726
728
727
722
725
723
724
721
719
718
720
716
713
712
706
22
24
24.7
23.0
22.5
25.0

DPR ASSOCIATES, INC.
Landscape Architects
Design · Planning · Research
2036 East Seventh Street
Charlotte, NC 28204
704/332-1204

5887A

JOB #87109
SHEET NO. 1 OF 2
CALCULATED BY WMR DATE 2-1-88
CHECKED BY DATE
SCALE

REEDY CREEK PARK ZB

- SEPTIC SYSTEM @ MULTI-USE MEADOW (RESTROOM @ TENSILE PAVILION)

- DESIGN FLOW:

20 USERS / HR ∴ 160 USERS / DAY

5 GAL / USER

∴ DAILY FLOW = (5)(160) = 800 GPD

- TANK DESIGN

$V = 1.17Q + 500$

$= 1.17(800) + 500$

$= 1436$ GAL ∴ USE 1500 GAL TANK

- NITRIFICATION LINES

ASSUME APPLICATION RATE = 0.3 GPD / ft^2

TRENCH IS 3 ft^2 / LF

$A = Q \div 0.3 = 800 \div .3 = 2667.\ ft^2$

$LF = A \div 3.0 = 2667 \div 3 = 889.\ LF$

∴ USE 9 - 100' NITRIFICATION LINES

$9 \times 100 = 900' > 889$ ∴ ok

PRODUCT 204-1 NEBS Inc., Groton, Mass. 01471.

DPR ASSOCIATES, INC.
Landscape Architects
Design · Planning · Research
2036 East Seventh Street
Charlotte, NC 28204
704/332-1204

JOB P0101

SHEET NO. 2-7 OF 2

CALCULATED BY WMS DATE 2-1-88

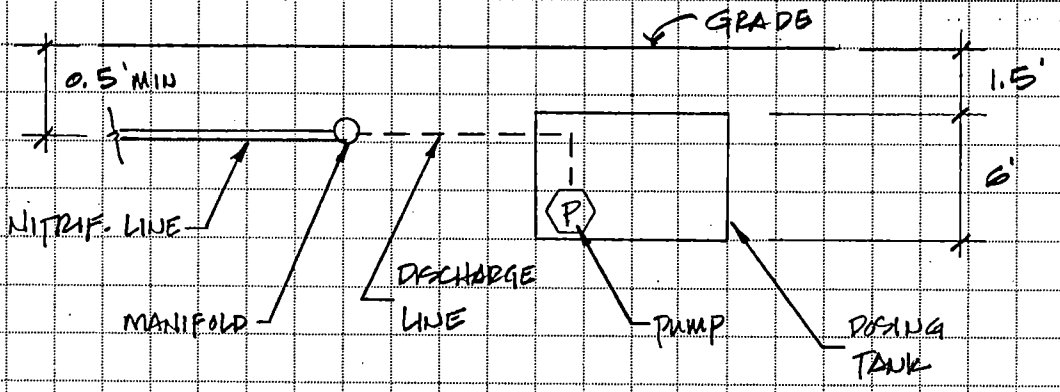
CHECKED BY _____ DATE _____

SCALE _____

- DAILY FLOW = 800 GPD > 750 GPD

∴ MUST SUPPLY DOSING PUMP (USE SOLID PRESSURE MANIFOLD TO DISCHARGE INTO NITRIF. LINES, IN LIEU OF STANDARD D-BOX.)

ASSUME THAT PUMP CYCLES 4 TIMES A DAY FOR 5 MIN RUN TIME; SYSTEM CONFIGURED AS SHOWN



ASSUME DISCHARGE LINE IS 4" ϕ PVC

C = 130

L = 50'

FLOW RATE = 800 ÷ 4 ÷ 5 = 40 GPM (CYCLES/DAY, TIME/CYCLE)

SAY 50 GPM (25% SAFETY FACTOR)

FOR Q = 50 GPM ; C = 130 , $h_L \cong 4'$ / 100 LF PIPE

∴ $h_L = 2'$, VERT. LIFT = 7'

ASSUME 10% LOSS THRU FITTING + 20% S.F.

$H = \{(2 + 7)(1.10)\} 1.20 = 11.9'$ SAY 12'.

SIZE PUMP FOR 50 GPM @ 12' HEAD

PRODUCT 204-1 NEBS Inc., Groton, Mass. 01471.

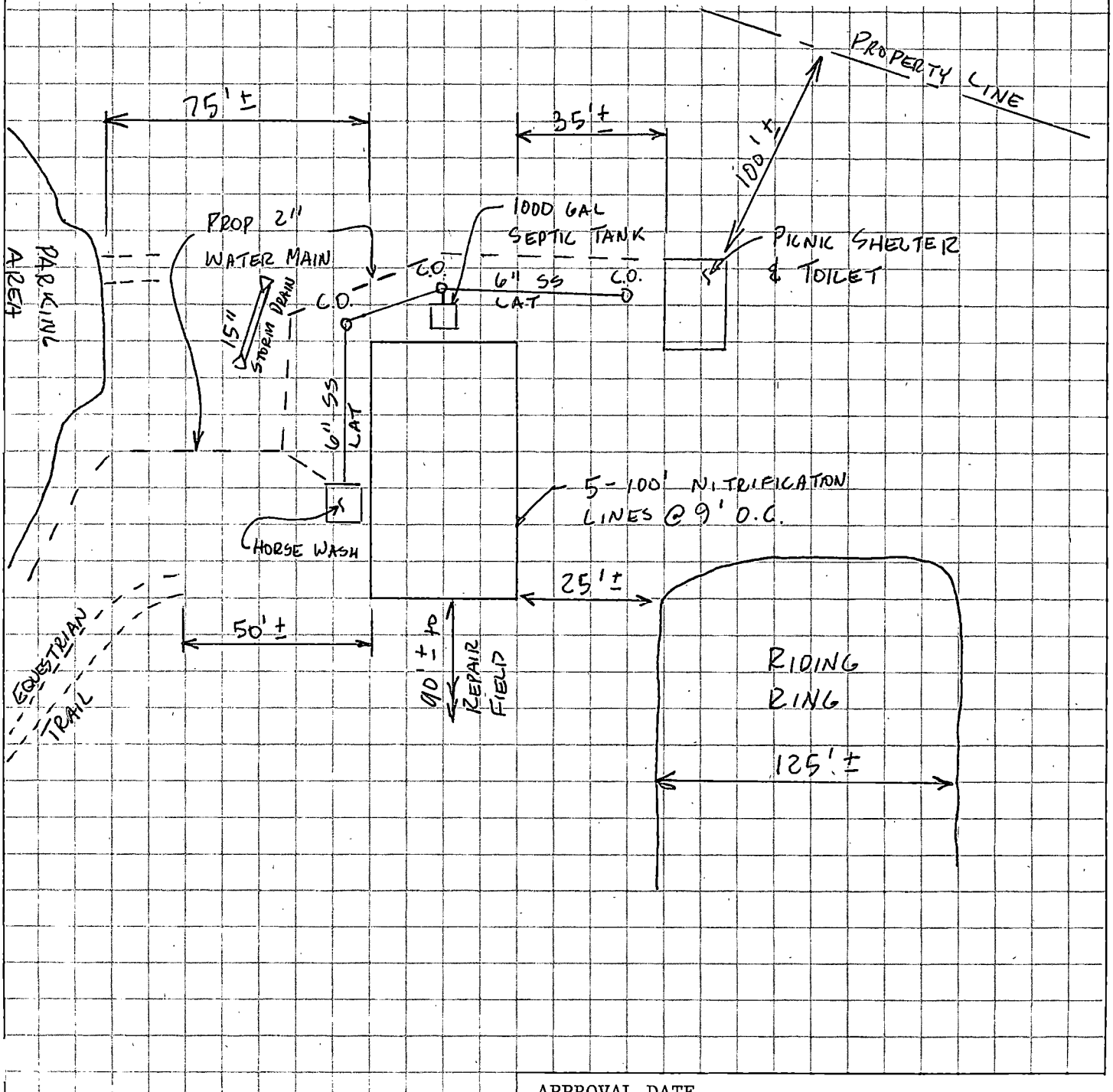
PROPOSED PLOT PLAN

HEALTH DEPARTMENT
ENVIRONMENTAL HEALTH DIVISION
1200 BLYTHE BOULEVARD
CHARLOTTE, NC 28203
PHONE (704) 376-4603

FILE: 5887A

TC: 105 111 01 PO

Draw in and name all roads adjoining the property. Draw in and accurately dimension the lot concerned. Accurately indicate property boundaries, proposed and/or existing structures and driveways, underground utilities, and wells and springs within 100 feet of the proposed building or drainfield.



APPROVAL DATE _____

White - Health Department's Copy Canary - Environmentalist's Copy Pink - Owner's Copy