ICHD - ENVIRONMENTAL HEALTH DIVISION

Statesville Office (704) 878-5305 Mooresville Office (704) 660-3625 PERMIT # 303268.

SEPTIC: IMPROVEMENT PERMIT / AUTHORIZATION TO CONSTRUCT / OPERATION PERMIT / EXISTING SYSTEM

PIN # 4685 -16 -5398

APPLICANT/OWNER: IQ Custom Construction. APPLICANT ADDRESS: 840 Edmiston Rd Mt. Ulla

SITE ADDRESS: 836 Patterson Farm Rd Mooresville NC 28115 PHONE: — ALT. PHONE 704-578-4951 (LSS)

SITE DIRECTIONS: Linwood @ Patterson Farm on Left SAP CONTROLLED: ☑ YES ☐ NO

SUBDIVISION: Meadows Place SECTION: — LOT # 7 LOT AREA: 1.53 Acres. DESIGN FLOW: 360 L.T.A.R.: .25

Septic Tank 1000 (gal)	STB 425	Date 3-12-2020	☑ New System ☐ Repair ☐ Expansion System Type: I II III IV V VI		☑ Residence	No. Bedrooms 3	Water Supply
Pump Tank 1000 (gal)	PT 302	Date 10-20-2020	System Description: LP-PDBRS		☐ Business	No. Persons 6	☑ Private
Pump Make Liberty	Model	Serial #	Repair System Description: LP-PDBRS		☐ Other	No. Employees	☐ Public
# Nitrification Fields 1	# Lines 3	Linear Ft 240	Maintenance Agreement Required: ☑ YES ☐ NO		☐ Slab	☐ Crawl Space	☐ Community
Trench Width 24	Trench Bottom Depth 30 in	Gravel Depth	☐ GRAVITY ☑ PRESSURE		☑ Basement w/plumbing	☐ Basement w/o plumbing	

Comments / Conditions: Divert Storm away from Septic System and Repair System Fill in Ditch and compact. Maintain Silt Fence from Filled Area

INITIAL SITE SKETCH

This permit is issued pursuant to Section 11 . (C) of S.L. 2018-114 using the signed and sealed LSS Evaluation by:

The Oaks Group, PA

LSS # 1313

AS BUILT SKETCH

FOR SEPTIC FINAL INSPECTION CALL: 704-664-3703 between 8am-9am the day the inspection is needed. Be sure to speak with an inspector to confirm your time.

12/3 - Tanks + Lines - Box - Pressurized + Floats
- Need Electrical / Manifold / Alarm / ~~Pressure~~
Electrical / Alarm and Manifold

12-16-2020

Permit can be suspended or revoked if any false information is supplied toward securing the permit / any unauthorized changes are made to the site / any unauthorized changes are made in the installation of the system. **CONTACT A LOCATOR SERVICE PRIOR TO ANY EXCAVATION**

☐ **IMPROVEMENT PERMIT** *with plat valid without expiration.* ☑ **IMPROVEMENT PERMIT** *with site plan valid for 60 mos.* ☑ **AUTHORIZATION TO CONSTRUCT** *valid for period equal to IMPROVEMENT PERMIT--not to exceed 60 mo.*

Owner / Applicant Signature: Kathleen Saunders Date: 11/17/2020 Installed by: Rayon Septic

IMPROVEMENT PERMIT by: Date: 11/16/2020 OPERATION PERMIT by: Date: 12-16-2020

AUTHORIZATION TO CONSTRUCT by: Date: 11/17/2020 Existing System Inspected by: Date:

FOR SEPTIC FINAL INSPECTION: CALL 704-664-3703 between 8am-9am the day the inspection is needed.

LOT 7
DB:
PB:
S 89°49'13"E
505.78'
15' SIDE SETBACK
30' SIDE SETBACK
L26
50'
N 89°18'27"W 425.46' (TOTAL)
15' SIDE SETBACK
POOL
DECK
PROPOSED HOUSE Basement
GARAGE
PORCH
Slope
25'
DRIVE
80' Repair
80' Repair
80' Repair
scaled in ditch Fill + Compact
* Fill and Shallow Slope
Road
1" = 30'
#4 REBAR
#5 REBAR
N 01°34'23"E
132.17'
33.71'
N 03°05'15"E 102.46'
230.53'

N 01°34'23"E
132.17'
N 03°05'15"E 102.46'
33.71'
EX. #5 REBAR
#4 REBAR
1"=30'
Drive
80' Repair
EX. 55' ROW
Scaled in Ditch, Fill & Compact
8'
8'
8'
VB
25'
32.1'
PORCH
Slab
GARAGE
Slab
45.0'
PROPOSED HOUSE
Basement
DECK
ST
PT
* Fill and c
Shallow
* Shape
shed
Road
2,30.53
N 89°18'27"W 425.46' (TOTAL)
15' SIDE SETBACK
20 pool 30
LOT 7
well
50'
L26
NIP
NIP
15' SIDE SETBACK
S 89°49'13"E
506.78'
30
1650
SS
35
350
LOPA VOL
DB:
PB:

Meadows Field Lot 7 Fast Track Septic System Information

Number of Bedrooms	3
Basement or Crawl	**Basement with Plumbing**
Design Flow (gpd)	360
LTAR (gpd/ft2)	0.25
Primary System Type	**LP PPBPS**
No. Lines	3 (See Table)
Total Linear Feet	240
Trench Width	24" Kms
Trench Spacing	8' Kms
Max Trench Depth	30"
Pump Required	Yes
Distribution Device	Gate Valve Box w/ LPP Distribution
Maintenance Agreement Required	Yes
Length and Diameter of Supply Pipe	70' of 2" SCH 40 PVC
Size of laterals	1 1/4" SCH 40 PVC
Flow Rate through the system	27 gpm
Elevation head	Approx. 18.6'
Pressure head	3.0'
Friction head	1.2'
20% Contingency	4.6'
Total Head	27.4'
Pump Requirements	27 gpm @ 27.4' of head To be designed by installer.
Maximum Dosing Volume	194.4 gal -2.2 doses/day @ design flow*
Volume of water pumped per dose	Calculated to specific tank by measure or dealer engineering specifications (1 cubic ft. of water equals 7.48 gal.)
Pump Run per dose	approx. 7.2 min.
Check Valve	Yes
Siphon Break hole	No
Repair System	**LP PPBPS**
Total Linear Feet	240
Repair LTAR	0.25
Repair Trench Depth	30"

Table 1: Summary of Primary and Repair Nitrification Line Specifications

Line No.	Use	Line Color	System Type	Line Length (Ft.)	Rod Reading Elev. (Ft.)	Panels	Holes	Hole Spacing	Hole Size (In.)
1	System	Pink	LPPPBPS	80 endfed	2.2	18	18	1 per panel	5/32"
2	System	Blue	LPPPBPS	80 endfed		18	18	1 per panel	5/32"
3	System	Red	LPPPBPS	80 endfed		18	18	1 per panel	5/32"
4	Repair	Pink	LPPPBPS	80					
5	Repair	Red	LPPPBPS	80					
6	Repair	Orange	LPPPBPS	80					
						Total: 54	Total: 54 (1 in each panel turned up)		
				Total System: 240'					
				Total Repair: 240'					

Tank	Red	1000 gal (2 compartment)	
Pump Tank	Red	1000 gal.	14.8
House	Blue		

Notes: **Tight fit**
Soils on site are variable; features may be present which were not encountered in the eval.
Fill and compact shallow diversion ditch. Shape system area to shed water towards road

The LSS evaluation attached is being submitted pursuant to and meets the requirements of SL 2018-114 Section 11.(c).

Sheet ____ of ____
PROPERTY ID #: ____
COUNTY: Iredell

SOIL/SITE EVALUATION
for **ON-SITE WASTEWATER SYSTEM**
(Complete all fields in full)

OWNER: IQ Const
ADDRESS: 301 Watkins Farm Rd
PROPOSED FACILITY: SFR
LOCATION OF SITE: Patterson Farm Lot 7
APPLICATION DATE ____
DATE EVALUATED: 7/13/2020
PROPOSED DESIGN FLOW (.1949): 360
PROPERTY SIZE: ____
PROPERTY RECORDED: yes

WATER SUPPLY: ☐ Private ☐ Public ☒ Well ☐ Spring ☐ Other ____
EVALUATION METHOD: ☒ Auger Boring ☒ Pit ☐ Cut
TYPE OF WASTEWATER: ☒ Sewage ☐ Industrial Process ☐ Mixed

PROFILE #	.1940 LANDSCAPE POSITION/ SLOPE %	HORIZON DEPTH (IN.)	SOIL MORPHOLOGY (.1941) .1941 STRUCTURE/ TEXTURE	.1941 CONSISTENCE/ MINERALOGY	OTHER PROFILE FACTORS .1942 SOIL WETNESS/ COLOR	.1943 SOIL DEPTH	.1956 SAPRO CLASS	.1944 RESTR HORIZ	PROFILE CLASS & LTAR
1	L <2%	0-36	MoSBKC	FR SS/SP	R; C Mn R; F Mn; C sap	48+	N/A	N/A	0.25
		36-48	WKSBKC	↓					
2	L <2%	0-20	MoSBKC	FR SS/SP	R R; C sap	48+	N/A	N/A	0.3
		20-48	WKSBKCL	↓					
3	L <2%	0-28	MoSBKC	FR SS/SP	R; F yel Br R; F yel Br; F Mn				0.25
		28-48	WKSBKC	FR SS/SP					
4	L <2%	0-19	MoSBKC	FR SS/SP	R R; C yel Br sap yel Br				0.3
		19-34	WKSBKC	|					
		34-48	MA L sap	↓					

DESCRIPTION	INITIAL SYSTEM	REPAIR SYSTEM
Available Space (.1945)	PS	PS
System Type(s)	IV	IV
Site LTAR	0.25	0.25

OTHER FACTORS (.1946): ____
SITE CLASSIFICATION (.1948): ____
EVALUATED BY: KMS
OTHER(S) PRESENT: ____

LICENSED SOIL SCIENTIST
KATHLEEN M. SAUNDERS
THE GREAT SEAL OF THE STATE OF NORTH CAROLINA
ESSE QUAM VIDERI
1313
STATE OF NORTH CAROLINA

Kathleen Saunders

COMMENTS: ____

Updated February 2014