## ON-SITE SOILS, LLC.

Toll Free 1-888-878-1461

February 25, 2020

Jason Arne Custom Homes 369 Pine Bluff Way Troy, MO 63379

Telephone: 636-734-2524

RE:

Soil Evaluation Report

Project Number: 20-M070

Dear Client:

Please consider this letter and attachments as a Soil Evaluation Report for the following property:

Lot 1 Callaway Ridge Drive

New Construction 3 Bedrooms St. Charles County, Missouri

The following are additional comments concerning your future on-site treatment system:

- 1) The area represented by each sample site is defined by landscape position.
- 2) Overland water flow and runoff water from roofs needs to be diverted away from the absorption field.
- 3) Do not disturb absorption field prior to system installation.
- 4) The treatment system should be installed by a registered installer.
- 5) Installation should be done when soil conditions are dry.
- 6) Consult with your administrative authority.

The soil information contained in this report is intended to assist the administrative authority in their evaluation of your property for an on-site treatment system. Any other conclusions or interpretations will be outside the scope of this report. On-Site Soils does not represent nor warrant the operation or functionality of any installed system.

Sincerely,

Matthew W. Roth

Soil Scientist

DHSS Registration #10039

Client copy County copy

701-D Crown Industrial Court Chesterfield, MO 63005

## Soil Evaluation Report Lot 1 Callaway Ridge Drive St. Charles County, Missouri

Project No.20-M070

February 25, 2020

Type of Sample:

**Backhoe Soil Pit** 

#### **Site 1 Detailed Soil Description**

Depth	Munsell Color (1)		Texture (2)		Structure (2)	Consistence (2)	Application Rate (gpd/sq.ft.)(3)		Soil Group (3)
(in.)	Matrix	Abundance/ Mottles & Coatings	Approx. percent Clay	Classification	grade size Type	Moist	Low Pressure Pipe System	Conventional System	, ,
0 - 3	10YR4/3 brown	none noted	24	SILT LOAM	2fsbk moderate fine Subangular blocky	Firm	0.25	0.5	III
3 - 7	10YR5/3 brown	none noted	26	SILT LOAM	2fsbk moderate fine Subangular blocky	Firm	0.25	0.5	III
7 - 16	10YR5/6 yellowish brown	none noted	34	SILTY CLAY LOAM	2fsbk moderate fine Subangular blocky	Firm	0.15	0.3	III
16 - 35	10YR5/4 yellowish brown	common 10YR5/2 grayish brown	46	SILTY CLAY	2fsbk moderate fine Subangular blocky	Firm	Not Suitable	Not Suitable	IVb
35 - 55	10YR5/4 yellowish brown	common 10YR5/2 grayish brown	34	SILTY CLAY LOAM	2csbk moderate coarse Subangular blocky	Firm	0.15	0.3	III

Slope percent: 3% Seasonal high water @ 16 inches
Landscape position: Shoulder Drainage Classification: Moderately well

Bedrock greater than 55 inches

- (1) Soil color designations, Munsell Soil Color Charts, (1994).
- (2) Soil texture and structure designation, Soil Survey Manual, (1993).
- (3) MO Laws accompanied by DHSS Rules, Table 13 & 14, (Oct. 1995). Refer to local & State code for drip system rates

## Soil Evaluation Report Lot 1 Callaway Ridge Drive St. Charles County, Missouri

Project No.20-M070

February 25, 2020

Type of Sample:

**Backhoe Soil Pit** 

#### **Site 2 Detailed Soil Description**

Depth	Munsell Color (1)		Texture (2)		Structure (2)	Consistence (2)	Application Rate (gpd/sq.ft.)(3)		Soil Group (3)
(in.)	Matrix	Abundance/ Mottles & Coatings	Approx. percent Clay	Classification	grade size Type	Moist	Low Pressure Pipe System	Conventional System	
0 - 5	10YR4/3 brown	none noted	24	SILT LOAM	2fsbk moderate fine Subangular blocky	Firm	0.25	0.5	III
5 - 16	10YR5/6 yellowish brown	none noted	28	SILTY CLAY LOAM	2fsbk moderate fine Subangular blocky	Firm	0.2	0.4	III
16 - 30	10YR5/4 yellowish brown	common 10YR5/2 grayish brown	38	SILTY CLAY LOAM	2fsbk moderate fine Subangular blocky	Firm	Not Suitable	Not Suitable	IVb
30 - 60	10YR 4/6 dark yellowish brown	common 10YR5/2 grayish brown	32	SILTY CLAY LOAM	2csbk moderate coarse Subangular blocky	Firm	Not Suitable due to poor soil structure	Not Suitable due to poor soil structure	V

Slope percent: 3% Seasonal high water @ 16 inches
Landscape position: Backslope Drainage Classification: Moderately well

Bedrock greater than 60 inches

- (1) Soil color designations, Munsell Soil Color Charts, (1994).
- (2) Soil texture and structure designation, Soil Survey Manual, (1993).
- (3) MO Laws accompanied by DHSS Rules, Table 13 & 14, (Oct. 1995). Refer to local & State code for drip system rates

## Soil Evaluation Report Lot 1 Callaway Ridge Drive St. Charles County, Missouri

Project No.20-M070

February 25, 2020

Type of Sample:

**Backhoe Soil Pit** 

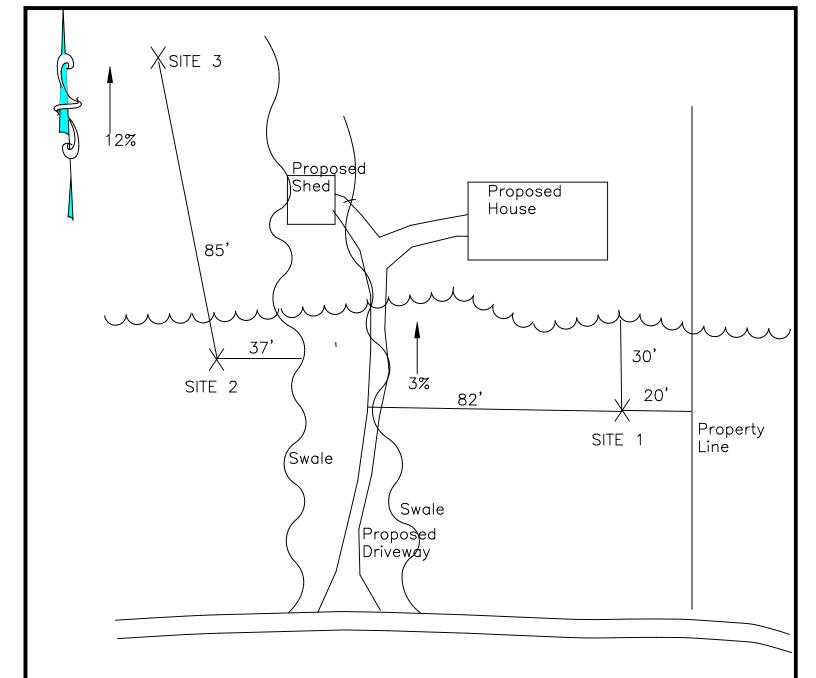
#### **Site 3 Detailed Soil Description**

Depth	Munsell Color (1)		Texture (2)		Structure (2)	Consistence (2)	Application Rate (gpd/sq.ft.)(3)		Soil Group (3)
(in.)	Matrix	Abundance/ Mottles & Coatings	Approx. percent Clay	Classification	grade size Type	Moist	Low Pressure Pipe System	Conventional System	
0 - 3	10YR4/3 brown	none noted	24	SILT LOAM	2fsbk moderate fine Subangular blocky	Firm	0.25	0.5	III
3 - 17	10YR5/6 yellowish brown	none noted	28	SILTY CLAY LOAM	2fsbk moderate fine Subangular blocky	Firm	0.2	0.4	III
17 - 26	10YR5/4 yellowish brown	common 10YR5/2 grayish brown	38	SILTY CLAY LOAM	2fsbk moderate fine Subangular blocky	Firm	Not Suitable	Not Suitable	IVb
26 - 60	10YR5/6 yellowish brown	common 10YR5/2 grayish brown	32	SILTY CLAY LOAM	2csbk moderate coarse Subangular blocky	Firm	Not Suitable due to poor soil structure	Not Suitable due to poor soil structure	V

Slope percent: 12% Seasonal high water @ 17 inches
Landscape position: Backslope Drainage Classification: Moderately well

Bedrock greater than 60 inches

- (1) Soil color designations, Munsell Soil Color Charts, (1994).
- (2) Soil texture and structure designation, Soil Survey Manual, (1993).
- (3) MO Laws accompanied by DHSS Rules, Table 13 & 14, (Oct. 1995). Refer to local & State code for drip system rates



#### LEGEND

X=Soil Sample Location

%=Slope in percent & Direction of Slope NOTES

Distances approximated.

SCALE: NONE

# ON-SITE SOILS

Lot 1 Callaway Ridge Dr. Site Map

St. Charles County, Missouri

Project # 20-M070 February 2020

DRW'N BY MWR CHK'D BY

Lot 1 Callaway Ridge Dr. St. Charles County, MO Project # 20-M070



Photo 1. Overview of Site 1, facing north.



Photo 2. Overview of Site 1, facing south.