



REPORT OF SOILS FIELD COMPACTION TESTING

CLIENT: Ludlow Construction Co., Inc.
 19 Carmelina's Circle
 Ludlow, MA 01056
 Attn: Mr. Mike Pio

PROJECT: Durham Meadows Waterline
 Durham, CT

DATE: October 17, 2019

REPORT #: 19-75-012-015 Page 1 of 10

General Location: South Main Street, Waterline Trench
Field Rep: Jason Reyes
General Contractor: Ludlow Construction Co., Inc.
Earthwork Contractor: Ludlow Construction Co., Inc.
Air Temp: 52°F
Weather: Cloudy
Soil ID#: 3519-600
Soil Type: Reddish Brown Silty Sand w/ Gravel
Proctor Sample Source: On site

Proctor Value: 136.3 lbs/ft³

Optimum Moisture: 6.6%

Gauge Type: Troxler 3430

Required Compaction: 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
1	10"/ 44.0" BFG	7.0%	132.8	97.4%
LOCATION:	Station #120+51			
2	10"/ 44.0" BFG	6.2%	133.6	98.0%
LOCATION:	Station #120+76			
3	10"/ 44.0" BFG	6.0%	134.0	98.3%
LOCATION:	Station #120+01			
4	10"/44.0" BFG	7.5%	134.3	98.5%
LOCATION:	Station #121+26			
5	10"/ 44.0" BFG	7.2%	134.1	98.4%
LOCATION:	Station #121+51			
6	10"/ 44.0" BFG	7.3%	132.4	97.1%
LOCATION:	Station #121+76			
7	10"/ 44.0" BFG	7.3%	134.7	98.8%
LOCATION:	Station #121+01			
8	10"/ 44.0" BFG	7.4%	132.7	97.4%
LOCATION:	Station #122+26			

REMARKS: BFG - Below Finish Grade
 Crew Finished at Station #122+91



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TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
9	10"/ 44.0" BFG	6.7%	134.8	98.9%
LOCATION:	Station #122+51			
10	10"/ 44.0" BFG	6.2%	134.1	98.4%
LOCATION:	Station #122+76			
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
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TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
11	10"/ 32.0" BFG	6.7%	132.8	97.4%
LOCATION:	Station #120+51			
12	10"/ 32.0" BFG	6.2%	134.7	98.8%
LOCATION:	Station #120+76			
13	10"/ 32.0" BFG	7.1%	134.4	98.6%
LOCATION:	Station #120+01			
14	10"/32.0" BFG	6.5%	133.8	98.2%
LOCATION:	Station #121+26			
15	10"/ 32.0" BFG	6.0%	135.9	99.7%
LOCATION:	Station #121+51			
16	10"/ 32.0" BFG	6.3%	134.8	98.9%
LOCATION:	Station #121+76			
17	10"/ 32.0" BFG	7.1%	134.8	98.9%
LOCATION:	Station #121+01			
18	10"/ 32.0" BFG	6.9%	133.6	98.0%
LOCATION:	Station #122+26			

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Proctor Sample Source: On site

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Gauge Type: Troxler 3430

Required Compaction: 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
19	10"/ 32.0" BFG	6.5%	132.6	97.3%
LOCATION:	Station #122+51			
20	10"/ 32.0" BFG	6.2%	132.9	97.5%
LOCATION:	Station #122+76			
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				

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Weather: Cloudy
Soil ID#: 3519-600
Soil Type: Reddish Brown Silty Sand w/ Gravel
Proctor Sample Source: On site

Proctor Value: 136.3 lbs/ft³

Optimum Moisture: 6.6%

Gauge Type: Troxler 3430

Required Compaction: 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
21	10"/ 20.0" BFG	5.9%	133.6	98.0%
LOCATION:	Station #120+51			
22	10"/ 20.0" BFG	6.3%	134.8	98.9%
LOCATION:	Station #120+76			
23	10"/ 20.0" BFG	7.3%	134.5	98.7%
LOCATION:	Station #120+01			
24	10"/20.0" BFG	6.8%	134.2	98.5%
LOCATION:	Station #121+26			
25	10"/ 20.0" BFG	6.4%	133.3	97.8%
LOCATION:	Station #121+51			
26	10"/ 20.0" BFG	7.8%	134.9	99.0%
LOCATION:	Station #121+76			
24	10"/ 20.0" BFG	7.3%	134.7	98.8%
LOCATION:	Station #121+01			
28	10"/ 20.0" BFG	6.8%	134.2	98.5%
LOCATION:	Station #122+26			

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Earthwork Contractor: Ludlow Construction Co., Inc.
Air Temp: 52°F
Weather: Cloudy
Soil ID#: 3519-600
Soil Type: Reddish Brown Silty Sand w/ Gravel
Proctor Sample Source: On site

Proctor Value: 136.3 **lbs/ft³**

Optimum Moisture: 6.6%

Gauge Type: Troxler 3430

Required Compaction: 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
29	10"/ 20.0" BFG	6.1%	133.8	98.2%
LOCATION:	Station #122+51			
30	10"/ 20.0" BFG	6.4%	134.2	98.5%
LOCATION:	Station #122+76			
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
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General Location: South Main Street, Waterline Trench
Field Rep: Jason Reyes
General Contractor: Ludlow Construction Co., Inc.
Earthwork Contractor: Ludlow Construction Co., Inc.
Air Temp: 52°F
Weather: Cloudy
Soil ID#: 3519-608
Soil Type: Light Gray Gravel w/ Silt & Sand (1.5" Gravel)
Proctor Sample Source: Haynes Group

Proctor Value: 138.9 **lbs/ft³** **Optimum Moisture:** 7.8%
Gauge Type: Troxler 3430 **Required Compaction:** 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
31	8"/ 12.0" BFG	3.1%	132.6	95.5%
LOCATION:	Station #120+51			
32	8"/ 12.0" BFG	2.7%	135.4	97.5%
LOCATION:	Station #120+76			
33	8"/ 12.0" BFG	2.9%	136.3	98.1%
LOCATION:	Station #120+01			
34	8"/ 12.0" BFG	3.3%	135.7	97.7%
LOCATION:	Station #121+26			
35	8"/ 12.0" BFG	2.9%	135.5	97.6%
LOCATION:	Station #121+51			
36	8"/ 12.0" BFG	3.6%	133.8	96.3%
LOCATION:	Station #121+76			
37	8"/ 12.0" BFG	3.3%	136.9	98.6%
LOCATION:	Station #121+01			
38	8"/ 12.0" BFG	2.9%	135.6	97.6%
LOCATION:	Station #122+26			

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Earthwork Contractor: Ludlow Construction Co., Inc.
Air Temp: 52°F
Weather: Cloudy
Soil ID#: 3519-608
Soil Type: Light Gray Gravel w/ Silt & Sand (1.5" Gravel)
Proctor Sample Source: Haynes Group

Proctor Value: 138.9 **lbs/ft³**

Optimum Moisture: 7.8%

Gauge Type: Troxler 3430

Required Compaction: 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
39	8"/ 12.0" BFG	3.4%	136.3	98.1%
LOCATION:	Station #122+51			
40	8"/ 12.0" BFG	3.3%	136.5	98.3%
LOCATION:	Station #122+76			
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				

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Weather: Cloudy
Soil ID#: 3519-608
Soil Type: Light Gray Gravel w/ Silt & Sand (1.5" Gravel)
Proctor Sample Source: Haynes Group

Proctor Value: 138.9 lbs/ft³ **Optimum Moisture:** 7.8%
Gauge Type: Troxler 3430 **Required Compaction:** 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
41	8" / 4.0" BFG	1.5%	132.5	95.4%
LOCATION:	Station #120+51			
42	8" / 4.0" BFG	1.8%	135.2	97.3%
LOCATION:	Station #120+76			
43	8" / 4.0" BFG	1.9%	134.7	97.0%
LOCATION:	Station #120+01			
44	8" / 4.0" BFG	1.8%	134.1	96.5%
LOCATION:	Station #121+26			
45	8" / 4.0" BFG	2.2%	136.1	98.0%
LOCATION:	Station #121+51			
46	8" / 4.0" BFG	2.3%	132.8	95.6%
LOCATION:	Station #121+76			
47	8" / 4.0" BFG	2.7%	136.9	98.6%
LOCATION:	Station #121+01			
48	8" / 4.0" BFG	2.5%	136.5	98.3%
LOCATION:	Station #122+26			

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Soil Type: Light Gray Gravel w/ Silt & Sand (1.5" Gravel)
Proctor Sample Source: Haynes Group

Proctor Value: 138.9 **lbs/ft³** **Optimum Moisture:** 7.8%
Gauge Type: Troxler 3430 **Required Compaction:** 95.0%

TEST NUMBER	DEPTH/ELEV. (in/ft)	MOISTURE (%)	DRY DENSITY (pcf)	COMPACTION (%)
49	8"/ 4.0" BFG	2.5%	132.7	95.5%
LOCATION:	Station #122+51			
50	8"/ 4.0" BFG	2.6%	136.3	98.1%
LOCATION:	Station #122+76			
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				
LOCATION:				

REMARKS: BFG - Below Finish Grade
Crew Finished at Station #122+91